

Herman Heyn

Baltimore Sidewalk Astronomer
Observing Notes for 1987-2018

Vol 2. – 2000-2018



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STREET CORNER TELESCOPE LOG -- 2000

- 8 1534) 1/02/2000(SUN)HPL(5:04-8:40PM). OK sky, despite adverse W.P. Very busy scene. Waited for juggler to end before setting up. As Andeans were scheduled 5-8, I paid for my parking. JUPITER(Good "stripes" at start, but they got murky due to poor seeing). SATURN(1-moon; not the usual great image due to seeing). A number of people asked if I still go to Fpt. Makes me want to go back, but then HPL is so much better! Had a number of extra good contribs, tonight! Gave them comet photos as thank-you's. \$166.00 + \$6.04 = \$172.04(\$47.79/)
- 9 1535) 1/06/2000(THU)HPL(5-9:25PM). Good sky; cold. Left home reluctantly, imagining Hpl would be dark & empty. Much to my relief, it was busy. Good number of lookers from Nurserymen's convention. JUPITER(2, then 4 on R; exciting!). SATURN(4 moons!). M 42 (once; nice). Did both J & S for many lookers, thanks to my own enthusiasm! \$98.00 + \$8.72 = \$98.72 (\$22.35/)
- 8 1536) 1/07/00(FRI)HPL(5:34-10:13PM). Good sky; boldish. Unbusy scene, but getting busier at time I quit (out of boredom, maybe). JUPITER(2+2). SATURN(2, maybe 3 moons). I was feeling a bit depressed. Why? \$126.00 + \$15.79 = \$141.79 (\$30.51/hr.)
- 8 1537) 1/12/00(WED)HPL(5:22-9:45PM). Sl. hazy sky; coolish. 6-d. MOON(Aristotel/Eudoxus; muted by haze). JUPITER(4, then 3). SATURN(looker saw 4 moons early eve.). \$92.04 (\$21.01/hr.)
- 8 1538) 2/8/00(Tue)HPL(5:37-7:30PM). First stint since spending 2nd half of Jan. on a bicycling tour of Cuba. Cold (+/-30°F). People present, but few lookers + many non-contribs. 3-d. MOON; JUPITER; SATURN; M 42. \$16.43 (\$8.74/hr.)
- 8 1539) 2/9/00(WED)HPL(5:47-8:27PM). A lot milder weather than last night. Didn't need gloves! 4-d. MOON; JUPITER; SATURN(2 moons). \$44.04 (\$16.49/hr.) Very poor seeing, tonight. J's belts hardly there. Saturn survived reasonably well but was not great.
- 9 1540) 2/25/00(FRI)HPL(6:26-7:29PM). Stupid night! ~~Very windy and hazy~~ but intermittent clouds and wind. Seeing terrible. Decided rain was imminent and packed up, only to return and to start setting up again 1/2-hr. later. Got 1/2 set-up and decided sky was still too shaky, so packed up again and went home. Very busy in HPL. Would have been a very good night had I stuck it out. JUPITER(4 on right). SATURN. Lights at Hpl now very bad...giving me a headache! \$17.00 (\$16.14/hr.)
- 8 1541) 2/29/00(TUE)HPL(6:06-9:37PM). Mild; sl. hazy. Sometimes pretty busy. JUPITER(3+1+star). SATURN(Set behind bldg. just after I pulled plug!). ACCIDENTS(1. R front wheel hit curb as I was turning off of Greenmt; no damage, I believe. 2) I stumbled carrying tripod up front steps, scraping wrist and smashing watch face. I feel like in both instances I must have been spacing out, not paying attention to what I was doing.) \$92.50 (\$26.30/hr.)
- 8 1542) 3/3/00(FRI)HPL(6:15-9:25PM). Cool; ok sky. JUPITER(A few times). SATURN(Some lookers saw 3 moons). SCOPE(Trouble w/finder; couldn't find M42!). \$99.71 (\$31.48/hr.)
- 8 1543) 3/4/00(SAT)HPL(5:59-7:43PM). Mild. V. busy, with a good number of people waiting to look when, around 7PM, clouds closed me down. Waited for a while for clearing, then left for Bill Spangler's Cuba trip reunion party. JUPITER(acq. 6PM on 1st try; 2+2 classic). SATURN(Maybe 2 moons). Performed w/permission of singer, Chas. Lee. \$55.45 (\$31.92/hr.)
- 8 1544) 3/5/00(SUN)HPL(5:53-9:27PM). Mild; great sky(good images renewed my faith in scope, after many nights of poor seeing!). (JUPITER(HH; moons in fantastic arrangement close-in!). SATURN(TBRmost of evening, then me too @ 165X after J set). Lots of enthusiastic lookers, including a +/-3-yr. old who knew planets in order! \$227.00 + \$23.11 = \$250.11 (\$70.06/hr)
 Teressa's presence definitely responsible for record hourly rate!
- 8 1545) 3/6/00(MON)HPL(6:10-9:20PM). Teressa. Mild. Lots of lookers from Optical Soc. of Am. convention. Great sky. JUPITER(Teressa). SATURN(HH; 2 moons). M42(several times). Fairly busy scene in HPL. Took T. to Bopp in Fpt. for Pizza. \$107.00 + \$18.41 = \$125.41(\$39.69/)

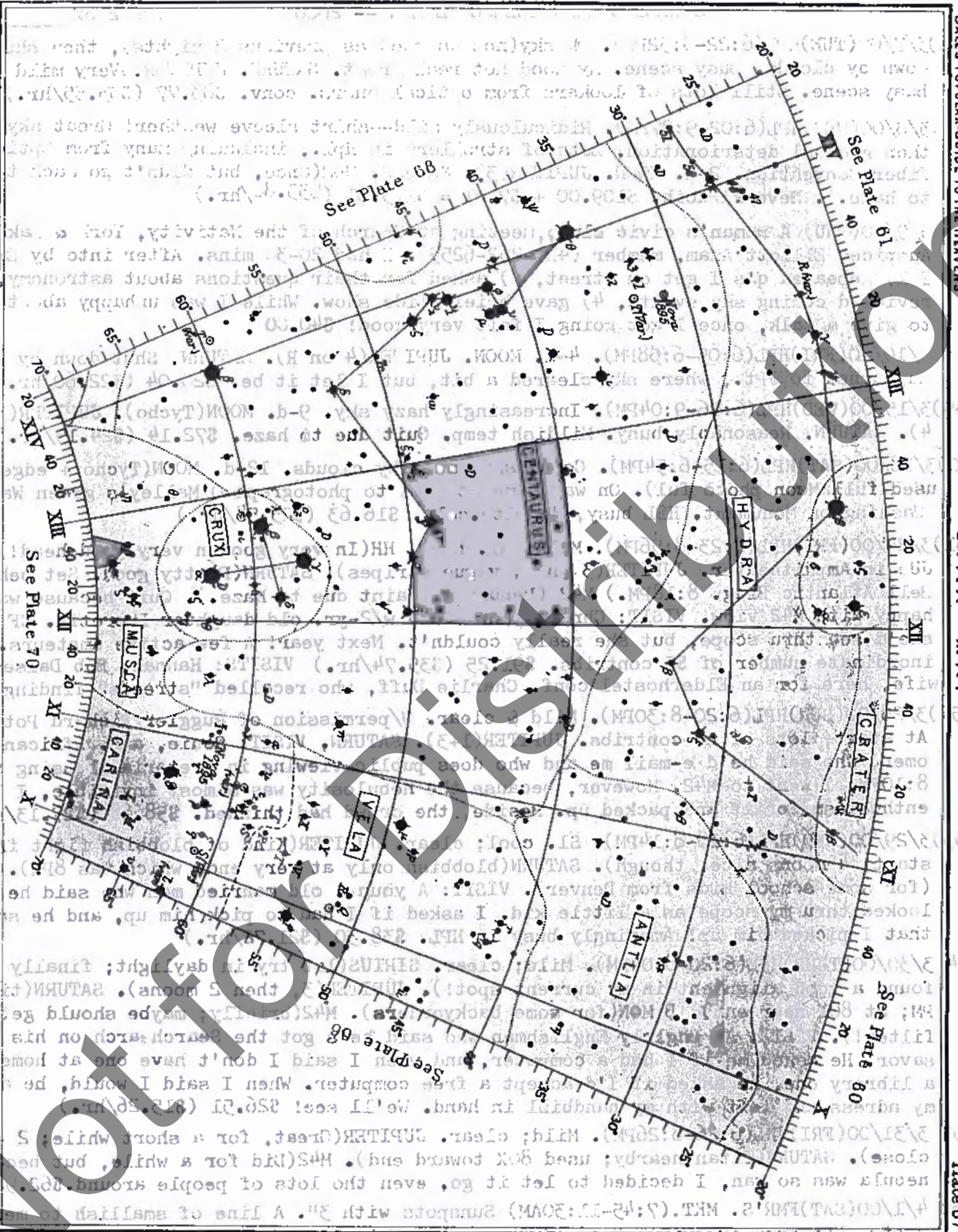
TOTAL THIS PAGE = \$1,205.24

TOTAL THIS YEAR = \$1,205.24

- 8 1546) 3/7/00(TUE)HPL(6:22-8:52PM). Ok sky(not as good as previous 2 nights), then shut down by clouds. Busy scene. My mood not real great. SATURN. JUPITER. Very mild temp. Busy scene. Still lots of lookers from optical engrs. conv. \$83.77 (\$33.55/hr.)
- 8 1547) 3/8/00(WED)HPL(6:02-9:27PM). Ridiculously mild--shirt sleeve weather! Great sky at ss, then gradual deterioration. Lots of strollers in Hpl., including many from Optical Fiber Convention. 2-d. MOON. JUPITER(3). SATURN, M42(Once, but didn't go back to it due to haze.). ~~\$39.45~~ \$109.00 + \$7.61 = \$115.61 (\$33.80/hr.)
- 6 TALK 3/9/00(THU) ~~Konkwood Women's Club~~, meeting at Church of the Nativity, York & Lake. Auspices Elliott Azam, member (410-252-6255). I had 20-30 mins. After into by Elliott, I 1) Repeated q's I get on street, 2) asked for their questions about astronomy, 3) reviewed coming sky events, 4) gave brief slide show. While I was unhappy about having to give a talk, once I got going I felt very good! \$40.00
- 8 1548) 3/10/00(FRI)HPL(6:05-6:58PM). 4-d. MOON. JUPITER(4 on R). SATURN. Shut down by clouds. Adjourned to Fpt., where sky cleared a bit, but I let it be. \$20.04 (\$22.60/hr.)
- 8 1549) 3/15/00(WED)HPL(6:06-9:04PM). Increasingly hazy sky. 9-d. MOON(Tycho). JUPITER(3, then 4). SATURN. Reasonably busy. Mildish temp. Quit due to haze. \$72.14 (\$24.15/hr.)
- 8 1550) 3/18/00(SAT)HPL(6:15-6:54PM). Cold; shut down by clouds. 12-d. MOON(Tycho + edge craters; ~~full Moon renox helpful~~). On way home stopped to photograph O'Malley's green lighted Washington Monument. HPL busy, despite cold. \$16.63 (\$25.58/hr.)
- 9 1551) 3/24/00(FRI)HPL(6:23-8:56PM). Mild, sl. hazy. HH(Articulate; in very good head!). Chas. Lee in Amphitheater. JUPITER(3 on R; vague stripes). SATURN(Pretty good. Set behind Bell Atlantic Bldg. 8:18PM.) M42 (Nebula v. faint due to haze.). Quit because was not happy with M42 view. VISIT: Christopher Field 2-yr. old daughter Lucretia. CF hoping she'd see thru scope, but she really couldn't. Next year! A few active amateurs. Rec. inordinate number of \$5 contribs. \$91.25 (\$35.74/hr.) VISITS: Hannah, Bob Dalsemer's wife, here for an Elderhostel conf. Charlie Duff, who recalled "streets" finding.
- 8 1552) 3/26/00(SUN)HPL(6:20-8:30PM). Mild & clear. w/permission of Juggler Richard Potter. At start, lots of no-contribs. JUPITER(1+3). SATURN. VISIT: Louis, a S. African astronomer, who said he'd e-mail me and who does public viewing in Pretoria. ~~Loosing~~ Saturn at 8:10PM, I went to M42. However, because the nebulosity was almost invisible, I lost my enthusiasm for it and packed up. Beside, the crowd had thinned. \$58.88 (\$27.13/hr.)
- 8 1553) 3/29/00(WED)HPL(6:28-8:14PM). Sl. cool; clear. JUPITER(Kind of blobbish right from start; 4 moons nice, though). SATURN(blobbish only at very end, which was 8PM). M42 (for some school kids from Denver). VISIT: A 21-yr. old married man who said he first looked thru my scope as a little kid. I asked if I had to pick him up, and he said yes, that I picked him up! Amazingly busy in HPL. \$38.30 (\$21.72/hr.)
- 8 1554) 3/30/00(THUR)HPL(6:20-8:04PM). Mild; clear. SIRIUS(1st try in daylight; finally have found a good alignment in my current spot!). JUPITER(3, then 2 moons). SATURN(till 7:57 PM; at 80X near end). B MON(for some backyarders). M42(briefly; maybe should get a nebula filter!). VISIT: An elderly Englishman who said he's got the SETI Search on his screen savor. He asked me if I had a computer, and when I said I don't have one at home but use a library one, he asked if I'd accept a free computer. When I said I would, he asked for my adress and left with my handbill in hand. We'll see! \$26.51 (\$15.26/hr.)
- 8 1555) 3/31/00(FRI)HPL(6:26-8:26PM). Mild; clear. JUPITER(Great, for a short while; 2 + 2 close). SATURN(Titan nearby; used 80X toward end). M42(Did for a while, but because nebula was so wan, I decided to let it go, even tho lots of people around. \$62.92(31.46/))
- 1 1556) 4/1/00(SAT)FMR'S. MKT.(7:45-11:30AM) Sunspots with 3". A line of smallish to medium spots. Not esp. exciting. Used 13mm, mainly. Not alot of passerby interest, plus lots of non-contribs. \$24.10 (\$6.43/hr.)

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TOTAL THIS PAGE \$ 650.15

TOTAL THIS YEAR \$1,855.39



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- 14* 4/5/00(WED)GILMAN SCHOOL(7:15-9:15PM). The second half of a package which included a talk yesterday to Tom Shields' astronomy class. Spotty sky all day, but improvement late afternoon. Got good enough alignment with magnetic compass to acq. Sirius in finder on 1st try! JUPITER(3+1). SATURN. 1-DAY MOON(V. thin crescent!). MARS. M42(Impressive. Much nicer than from Hpl.). 17 HYA(Wide; uninteresting). 1 Cnc. Mizar. Four girl students attended. Also, joined by Michael Marshack and his dad with Michael's 8" Meade SCT. He brought his astro-photos, which were not bad for starting out. Tom S. present, too. \$175.00 honorarium. ck.rec.
**Combining yesterday and today.
- 64 4/11/00(TUE)GODDARD ASTRONOMY CLUB MONTHLY MTG.(12-1:00PM). Per invite from Keith D. Evans keith@karma.gsfc.nasa.gov; 301-614-6282 code 912. Talk title "Can You See The Flag On The Moon And Other Pressing Questions From The Public". I felt good, and talk was enthusiastic. One aspect I mentioned was that while I don't recommend quitting your day job, if somehow, like me, you are channelled into street astronomy, you will have an interesting, exciting experience. Nobody guess the most often asked question(cost of scope?). Showed VCR tape of Venus at IC + me in Fpt., plus played apes with Hammel in Fpt. and Kieler's Hale-Bopp song. 9 mems. present. Sold 4 comet cds. + 3 Moon maps. NO HONORARIUM
- 7 4/26/00(WED)ROLAND PARK MIDDLE SCHOOL(1:30-2:45PM). Per invite from science teacher David Nelson (410-889-7853-h; 396-6420-w), who found me at the Fnn's Mkt. a month ago. 8th grade, +/-35 students, a number of whom were interested and asked q's. David had recently been teaching magnetism. I started w/usual def. of astronomy, then discussed the four fundamental forces of nature and their relative strengths (class impressed!). (I prefaced my astro def. with the requirement of one's being interested in learning about nature.) Then I gave my "magnetic streets" W3 show, which went well. Ended by setting up scope outside for viewing sunspots, several of which we naked-eye. Unfortunately, clouds came after only a few mins., but students were very impressed. Passed around welders glass, too. \$100 HONORARIUM ck.rec.
- 2 1557)4/29/00(SAT)FARMER'S MKT. WITH 3" "SUNSCOPE". Two marginally naked eye spot gps., which were pretty impressive projected. Intermittent interest; lots of no-contribs. VISITS: Alin & Magda, Grace, Dave & Anne Greene, Jim & Willie(!), etc. (7:30-12noon) \$24.31 (\$5.40/hr.)
- 1558)5/7/00(SUN)HPL-MILLENIUM STAGE(7:40-10:40PM). Alborada also there. Hot! 3-D MOON(Mostly at 11OX and 8OX; lookers impressed.). I really didn't want to go out but, thought it was hard work, the people were ok and it felt good to make some money! \$86.51 (\$28.84/hr.) VISITS: 1 student from my recent Roland Pk. M.S. talk; Susie, Fnr's Mkt. coffee vendor.
- 8 1559)5/9/00(TUE)HPL(7:44-11:03). Alborada in Amphith. 1st contrib. \$5! Hot & clear. 5-d. MOON (Great! Nice enough craters to stay at 8OX). Lots of strollers in HPL. VISIT: Norm Lewis, Ch2 weatherman, who crowed about his 18" Dob. Lots of families/kids. \$80.00 + \$8.16= \$88.16(\$26.55/
- // 1560)5/12/00(FRI)HPL(8:48-11:46PM).Late start due to weather confusion, as well as to getting stuck in traffic jam. Also, part way to Hpl. I returned home to make sure I'd locked front door! MILLENIUM STAGE. Amazing number of people on promenade. 8-d. MOON(Copernicus still experiencing sunrise; Tycho; Plato just finishing sr.VISIT: Norm Lewis, who asked if I could see Scorpius from Hpl. Met Val in Chas. V. for sandwich, first. \$104.02 (\$35.02/hr.). Had an 4-yr. boy who the planets and learned J's moon in an instant!
- 8 1561)5/14/00(SUN)HPL(7:45-10:30PM).Good sky;coolish. 10-d.MOON(8OX w/filter; Tycho region). SCOPE(I was not 100% happy w/image; good after collimation). V. busy in Hpl.; accompanied by Andean musicians, Laya. VISIT:Many lookers from Museum Assoc. Balto. mtg., incl. Shannon Vairo. of Denver M. of Nat. Hist., who knows Laura Danly. \$70.00 + \$8.79 + \$78.79 (\$28.65/hr.) VISIT: Girl student from Roland Pk. M.S. class to which I gave a talk recently.
- 8 1562)5/15/00(MON)HPL(7:50-10:11PM).Coolish; cloud trouble till near end. 11-d.MOON(8OX; Tycho & rim craters; great!)VISIT: Phil, piano store guy from Catonsvle.\$45.16 (\$19.19/hr.)
- 65 5/22/00(MON)BUSHY PARK ELEM.SCH.(7-8:30PM). In response to req. for speakers from Joel Goodman(410-531-5988;stardocJG@aol.com). Young Astronomer's Club. Sky didn't allow proj. sunspots, unfortunately. Began w/street corner lookers, q's; spent bal. w/still camera astrophotography id showing slides. Good gp. +/-20, half adults. NO HONORARIUM

TOTAL THIS PAGE = \$ 701.95

TOTAL THIS YEAR = \$2,557.34

- 4 5/23/00(TUE)THE GREENMOUNT SCHOOL(1:45-2:45PM). Invited by Karen Decamp (410-323-9780), who found me w/sunscope at Fmr's. Mkt. 5-6th grades. Bright kids; good q.'s. Sky didn't allow telescoping sunspots. Started with def. of astronomy as a "science"; demonstrated still camera astrophotography; showed slides as time allowed. \$100.00 HONORARIUM
- 3 1563)6/3/00(SAT)CHARLES VILLAGE FESTIVAL(12:45-4:00PM).SUN(sizable gps. near opposite limbs; not naked-eye). I did not recruit, so only intermittent interest. I was in a very articulate head. DISCOVERY(I should invite viewers to sit on my stool, as it is much easier for them than squatting to view image!). VISITS(Lots of friends.) \$22.36 (\$6.88/hr.)
- 8 1564)6/3/00(SAT)HPL-Bicen.Stage(8:17-11:20PM). Fine sky, cool. Accompanied by Diana Ritenour, who appeared to enjoy the experience. 1-d. MOON(I couldn't find it, though mid-evening a look-rpt'd. seeing it as an extremely thin crescent.). ARCTURUS(Before could see it by eye; ok object.). B SCO(briefly). ALBIREO(Main feature!). A SCO(once). \$46.00 + \$6.93 = \$52.93 (\$17.35/hr.)
- 8 1565)6/7/00(WED)HPL--Water's edge(8:03-10:50PM). Nice sky. 5-d. MOON(T-C&G; impressive). Lots of no-pays early, then ok. PARKING(Jugglers & Alborado had permits, so I simply parked on Pratt St. side. Wasn't bothered.) WATER TAXI(Exhaust gave me a mild headache!). VISIT: Flavio, his wife and a friend. \$64.31 (\$23.11/hr.)
- 8 1566)6/9/00(FRI)HPL--Bicen.(8:03-12:40AM).Clouds retarded start, then fine sky. Joined by T. Palomar, who had parking trouble, then scope trouble, but eventually focused on B Cyg--which looked fine thru her scope. SCOPE(Screw which tightens finder eyepiece has failed, and eyepc. is flopping around.) 7-d. MOON(Term. just past Archimedes; great sight; lookers wowed!). VISITS: R. Sams, street performer boss; Chas. Holley, recovering from chemo, and wife; Linda Caplan & friend & friend's son; some astronomy friends; Larry Bliche! Very busy, intense night. Incredible number of people in Hpl.! \$137.00 + \$18.29 = \$155.29 (\$33.61/hr.)
- 8 1567)6/10/00(SAT)HPL-BICEN.(7:57-11:58PM).Clear, hot, muggy. Promenade packed. Joined by Teresa. Crazy night! W/help from passers-by, had to move scope to make rum for a fire engine to exit promenade. Later, there was a near riot at the cruise ship, which simmered down when ship left pier. 8-d. MOON(Used 165X on Tycho-Clavius-Straight Wall region; Copernicus just becoming visible. Looked really liked the high power!). VISITS: Christopher Fields & family to show daughter Lucrecia the Moon. Lots of child lookers. \$160.00 + \$9.75 = \$169.75 (\$42.26/hr.)
- 8 1568)6/20/00(TUE)HPL-BICEN.(7:58-11:20PM).Adverse forecast; nice sky. Joined by Teresa. ARCTURUS(I touted it as "the evening star", which worked well!). ALBIREO. 16 CYG(Wide but too dim). THETA SER(Good; bright & intense pair). \$41.00 + \$12.08 = \$52.08 (\$15.50/hr.)
- 8 1569)6/22/00(THU)HPL-BICEN.(08:23-11:05PM). Gambled that scheduled performer wouldn't show, which he didn't. Clouds early, then clear. "Tall Ships" in town. Big crowd. ARCTURUS(Thru clouds at first.). ALBIREO(Had to wait till it cleared spar of a tall ship!). VISITS: Lucy Albert of Hartford Co. club; some friends of John; Al Kline, old car buff.\$49.72 (\$18.39/hr.) Lots of people came along happily reporting they'd seen Saturn thru my scope. Two women reported they were named after stars--Capella and Adhara (e CMA).
- 8 1570)6/23/00(FRI)HPL-BICEN.(8:07-11:50PM). Warm, sl. sticky, clear. Dense crowd. Had line for a while. PARKING(Spotted a space on street and took it to avoid any probs. in loading dk.). Worked with ok of piper Michael Scott. ARCTURUS(2nd try, thanks to near perfect align.). Albireo(1st try! Due to crush, I rationalized my patter considerably.). VISITS: Jerry Bell, Linda, Linda, Fleecy from Fmr.Mkt. \$86.00 + \$8.74 = \$94.74 (\$25.52/hr.) Huge # of child lookers!
- 10 1571)6/24/00(SAT)CYLBURN PK. SOLSTICE DAY(11:30AM-5:15PM). As always, it was a very slow scene. Significant numbers didn't arrive till 6PM, when a steel drum band and food was scheduled. SUN (Just a few scattered small to med. spots; didn't look like a solar max.! Mercifully, it was cloudy 75% of the time!). Treated to a Caribbean supper by a male supporter. \$75.00 fee
- 8 1572)6/30/00(FRI)HPL-BICEN.(8:15-9:57PM). W/ok of Rbt. Strong, juggler. Nice sky, then shut down by clouds. Lots of no-pays! ARCTURUS. ALBIREO. Bad night! \$18.15 (\$10.68/hr.)
- 1 1573)7/1/00(SAT)FARMER'S MKT.(9-11:30AM). 3" "Sunscope. Moderate scattering of small & med. spots. Moderate interest. VISITS: Jim Sarsgard, Teresa P., many friends. \$18.36 (\$7.34/hr.)

TOTAL THIS PAGE = \$ 872.69

TOTAL THIS YEAR = \$3,430.03

- 9 1574)7/1/00(SAT)FELL'S PT.(7:40-11:41PM). 1st time in Fpt. this year. Decided too much confusion tonight at Hpl. Joined by Teresa. SCOPE(Perfect alignment!). ARCTURUS(Lost lots of looks due to early evening clouds.). ALBIREO(Fine, but takes alot of energy to explain it.). T SERPENS(Briefly, then back to Albireo). B SCORPIUS(Briefly. Pretty good, but I need alot more data on it.). Fpt. not nearly as crowded as Hpl., but we had a fairly steady stream of lookers. \$63.00 + \$6.90 = \$69.90 (\$17.42/hr.)
- 9 1575)7/2/00(SUN)FPT.(7:45-10:45PM). Nice sky. Kind of slow, mello evening, compared to Hpl. Still lots of no-pays. ARCTURUS. ALBIREO. VISITS: Luis, a Cuban from Camaguey whose been in the U.S. since 1980. When I told him I'd just been in Camaguey, he almost began crying. Lots of kids, with whom I worked well. \$38.00 + \$2.74 = \$40.74 (\$13.58/hr.). A woman came along w/a plastic card bearing the coordinates of a star in Cas which had been "named" for her. I set the dec. and swept the Cas area and showed her a dim star which I told her looked about like what her star looked like if we could find it.
- 8 1576)7/5/00(WED)HPL-BICEN.(7:31-10:35PM). Nice sky; continuous stream of strollers. SCOPE (Collimated on Arcturus, which made Moon v. sharp, but B Cyg was then messed up!) 4-DAY MOON(Lookers impressed.). \$56.00 + \$9.83 = \$65.83 (\$21.49/hr.) VISIT: A man who said when he first looked at Saturn thru my scope he thought it was fake. However, he went and bought a scope ("bottom of the line" Orion) and has seen it for himself!
- 8 1577)7/6/00(THUR)HPL-BICEN.(7:32-11:00PM). Scattered clouds, even a light rain, for 1st hr, hiding both a Boo and Moon most of the time. Semi-clear for bal. of evening. a Boo (1x). 5-d. MOON(Sunrise on Theophilus--spectacular. Passing clouds, which lookers liked, were excited by!). VISIT: Lorinda, who was very turned on by scope and recruited lookers, and her visiting friend, Charlotte. For a change, almost everybody paid! Sold 16 comet cds. to a single looker. Peak night in Hpl.! \$94.00 + \$3.56 = \$97.56 (\$28.12/hr.)
- 8 1578)7/7/00(FRI)HPL-BICEN.(7:26-11:23PM). Good sky, v. cool breeze. 6-d.MOON(Sunrise on Licetu Heraclitus; not as impressive as sunrise on Theo., last night. Sometimes 135 & 165X.). Slow traffic at start, but then v. busy(lots of no-pays). VISIT: Paul Reamer w/grandsons. Could have stayed longer but was too bushed. \$83.00 + \$8.69 = \$91.69 (\$23.20/hr.)
- 9 1579)7/8/00(SAT)FPT.(8:51-11:07PM). Delayed start due to clouds, then haze. 7-d. MOON. B CYG (2x). VISITS: Linda ?. Val Frankos & friend, Jim Smith. Adjourned early to W. Oyster with them. Slow night, which is what I wanted, I guess. \$42.50 (\$18.75/hr.)
- 8 1580)7/11/00(TUE)HPL-BICEN.(7:40-10:59PM). Int. clouds, then clear, then int. clouds. Pleasant evening. 10-d. MOON(Tycho & Jura Mts.; 135X). VISIT: Val, Jim, Dana. \$79.62 (\$24.01/hr.)
- 9 1581)7/12/00(WED)HPL-BICEN.(7:43-10:45PM). Ok sky; intermittent clouds. Long stretch early-on of no lookers. 11-d.MOON(Tycho region). \$63.00 + \$4.55 = \$67.55 (\$22.29/hr.)
- 11 7/13/00(THU)BORDERS BOOKS(11-11:45AM). Auspices Brad Seibel, Community Rels. Coord.(410-823-4454). Slide show + look at Saturn photo thru 3" scope. Mothers w/infants and small kids. Prob. youngest group have ever talked to! Gave out Hubble photos + summer star map + Porco art. VISIT: John Stroh., who brought framed comet photos, which I plugged. \$75.00 fee Began slides w/Cruze, then passed around flags color xerox. Showed slides through Ori. Handouts included Hubble photos, summer star map, Porco art.
- 84 7/15/00 Deliver slide projector to Strauss Photo, D.C., for repair
- 8 1582)8/5/00(SAT)HPL-BICEN(7:52-10:40PM). Clear, the interm. haze. 1st stint since return 8/29 from Iran. Invited Teresa to come incase I had attack of diarrhea and had to leave scope. Had not problem, but ended stint at first hint of one. 5-d. MOON. ALBIREO(Switched to it after tiring of Moon.). Quite busy from start. Several Iranian lookers, to whom I showed some photos of trip. HH(For a while I was glad to be back and enthusiastic, but I gradually became bored and depressed--much in contrast to T's great enthusiasm.)\$125.15(\$44.70/hr.)
- 8 1583)8/16/00(WED)HPL-BICEN(7:43-11:05PM).V.clear. PROBLEM(Confronted with 3 v. rough young men, one of whom pushed me away. Same one grabbed and spun front of scope. as they left.) ARCTURUS. ALBIREO. 16-d. MOON(Beautiful moonrise at 9:15PM). \$63.51 (\$18.88/hr.)

TOTAL THIS PAGE = \$ 819.05

TOTAL THIS YEAR = \$4,249.08

**I really thought scope was going to be upended and destroyed!
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Encouraging Girls: Tips for Budding Astronomers

SUCCESSING IN THE sciences has always been a struggle—especially for women. Now, teachers are accepting some of the blame. "Nobody means to do this," says Margaret Niess of Oregon State University. But she admits that gender discrimination can be "so pervasive, so subtle, that people don't realize it's happening."



You can help spark a child's curiosity.

If you are a budding astronomer or know someone who is, here are some suggestions offered in *Space for Women*, a booklet for high school students compiled by the Harvard-Smithsonian Center for Astrophysics:

Children should be encouraged to look at the night sky and ask questions. Look for books on astronomy for youngsters at the public library. Also, there's an astronomy magazine

Odyssey, just for kids. For information, write: Odyssey, Cobblestone Publishing Inc., Dept. P, 7 School St., Peterborough, N.H. 03458-1454.

High school students should be encouraged to take as many math and physics classes as possible. They will help provide a good foundation

for any scientific career.

Adults should check the public library for books and magazines, such as *Sky & Telescope* and *Astronomy*, for details of "what's up" in the sky.

For a free copy of "Space for Women," write: Harvard-Smithsonian Center for Astrophysics, Publications Dept., MS-28, Dept. P, 60 Garden St., Cambridge, Mass. 02138.

- 8 1584)8/20/00(SUN)HPL-BICEN.(7:26-9:50PM). Great sky. ME(I felt better for going out, over staying home and wringing my hands in indecision--even though Albireo was a strain to sell.) Accompanied by a steel drum band for first 45 mins., which was difficult to talk over. VEGA. ALBIREO. \$27.00 + \$7.08 = \$34.08 (\$14.18/hr.) Fireworks display from Ft. Mc.H. mid-evening. Why?
- 1 1585)8/21/00(MON)HPL-BICEN(7:32-9:39PM). Great sky. ME(Last night was good therapy for me. I felt alot better today...not depressed. Decided to go out tonight for the theraputic benefits, even tho I knew Albireo would be difficult to work with and that I would not be recruiting lookers, so it would be a slow night.) VEGA(1st try!). ALBIREO. Searched for 16 Cyg and M 11 but found neither. \$16.90 (\$7.97/hr.)
- 8 1586)8/25/00(FRI)HPL-BICEN(7:39-10:42PM). Good sky. VEGA. ALBIREO. Unable to find (or, maybe, identify) Uranus. \$43.00 + \$6.43 = \$49.43 (\$16.21/hr.)
- 8 1587)9/7/00(THU)HPL-AMPHI.(7:22-10:05PM). Mild; great sky. Set-up while Unicycle Lady performing, w/her ok. V. slow for 1st hr., then steady activity. 9-d. MOON(Fine! Copernicus, Tycho area.) ME(A bit bored, but gen. ok. Seeing \$\$\$felt good!). \$48.78 (\$17.98/hr.)
- 13 9/12/00(TUE)DULANEY VALLEY WOMAN'S CLUB; ATTN: MS. FRANZONE(410-252-5872)(8:15-9:30PM) Maybe 40 members. Started w/def. of astronomy/astrology. Then, played a game, asking everyone to close eyes and those who do not know 9 planets in order to raise hands. I then walked about and gave raised hands my planets mnemonic--half of them. Did some q's I'm asked on street; asked them for their q's. Talked about Xmas eclipse coming. Gave astrophoto handouts to ones interested. Showed some slides, incl Crux. After show a woman said she'd been to Cuba in Jan. on an architectural tour! \$100.00
- 1588) 9/29/00(FRI)FELL'S PT.(9:47-12:20AM). Great sky SATURN(Rose 9:20PM; acq. 10:30PM..Got better & better as it rose higher). JUPITER(4, then 3). TELESCOPE(Performing beautifully!). y AND(briefly before Sat.). Looked for Uranus but don't know if I found it. Accompanied by a woman bagpiper. Some enthusiastic lookers. \$51.00 + \$6.77=\$57.77(\$22.65)
- 1589) 9/30/00(SAT)HPL(7:00-11:15PM). Went straight from my job at Md. Sci. Ctr.Scope stored in car under blanket. Was expecting visit from NJ woman who called 2-wks. ago. She never showed, but daughter did saying she (Crissie) was sick in hotel! 3-d MOON(Great, but brief!). 57 AQL(too wide!). y AND. URANUS(Finally, after many futile tries. Really is a great dot!). SATURN(rose 9:15, acq.9:50). JUPITER(acq.10:25). \$65.51 (\$15.41/hr). "Hat" low due to long deal period between Moonset and Saturn rise!
- 1590) 10/04/00(WED)HPL(6:56-9:38PM). Warm, good sky. 7-d. MOON. Accompanied by Barry, who helped me move scope at one point to extend Moon view. \$59.01 (\$21.83/hr. Drove Barry home.
- 11 10/05/00(THU)BORDERS TOWSON(7:30-8:30PM). My talk was today's "Best Bet" w/photo of me in today's SUN "Live" section. Dissapointingly small turnout, I felt. Maybe 6 at start. Brad counted 19 over the course of talk. FORMAT: I introduced myself, then handed out Autumn star maps and talked about what to see. Then showed my Jupiter/Saturn/Hyades/Pleiades slides.(Unfortunately, ceiling lights could not be doused sufficiently, so my beautiful slides lost most of their impact!). Ended w/step-by-step astrophoto instrs., which began with my reading a short history of astrophoto. and the astronomy connection. \$85.00
- 43 10/10/00(TUE)Md. FEDERATION OF WOMEN'S CLUBS, Attn: Jenny Kuhn, 410-859-5309 & rkuhn9@juno.com; Ft. Meade Officers Club(1:00-1:45PM). +/-70 women! (see file card in "Presentations" folder for my format). Went well. I was in a good head. \$100.00
- 1591) 10/12/00(THU)HPL-BICEN(7:05-10:30PM). Envisioning a lonely scene, forced myself to go, given a great sky. Glad I did! SATELLITES(Thanks to a HAL alert, saw ISS followed by Shuttle 8-mins. later. I pointed them out to passersby; 2 men were totally awestruck by the sight!). 15-d. MOON(Rim craters;Tycho). SATURN(rose 20:25, acq.20:51). JUPITER(acq. 21:36). Moderate to good traffic. VISIT: Mike Bardoff. \$55.50 (\$16.23)

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TOTAL THIS PAGE = \$ 671.98

TOTAL THIS YEAR = \$4,921.06

- 8 1592)10/13/00(FRI)HPL-BICEN.(7:10-11:10PM). Joined by Teresa. Great sky, then intermittent high clouds. PEAK NIGHT! Busy, few no-contribs, enthusiastic lookers! ISS(3-min flyover, starting 7:46PM. Put out announcement sign which drew attention. +/-30 watchers.). 16-MOON("Full"; till Saturn appeared.). URANUS(While T. did Moon; got on 1st try!). SATURN(v. sharp by 10:30PM; 2-moons). JUPITER(T. did).\$181.00 + \$11.41 = \$192.41 (\$48.10/)
- 8 1593)10/14/00(SAT)HPL-BICEN(7:41-12:16AM). Teresa(She devised a Jupiter and moons display with a strip of metal and movable magnets to demonstrate the scene to her lookers!) Sl. late start, as we decided to set-up at moonrise. ALBIREO(Briefly, awaiting Moon). SATURN(Absolutely terrible seeing till +/-11PM!). 17-d. MOON(Crisium impressive. Very busy night, w/lots of enthusiastic lookers! \$202.00 + \$19.83 = \$221.83 (\$48.33/hr.)
- 8 1594)10/20/00(FRI)HPL-BICEN.(7:55-11:17PM). Great sky. URANUS(briefly). SATURN(acq. 8:20PM; sloppy image for 30-mins., then great). JUPITER(acq.9:04PM; exciting!). VISIT: Lorinda and her two women out-of-town guests; Eric from Sc.Ctr. \$83.00 + \$7.75 = \$90.75 (\$27.01/
- 8 1595)10/22/00(SUN)HPL-BICEN.(8:07-10:22PM). Magnificent sky! SATURN(acq.8:10pm; lots of shading on planet; Casinni jumped out at you!). JUPITER(4 on left; lots of stripes). VISIT: Frank Heyn, in town from A'dam for a week! \$59.91 (\$26.63/hr.).
- 8 1596)10/23/00(MON)HPL-BICEN.(8:13-10:45PM). Mild. Early clouds, then good sky. SATURN(not quite as good as last night). JUPITER(v.good; 4, then 3). VISITS: Frank & Elsbeth; Janet Baletti, photographer from NJ, who I met 2 yrs. ago and with whom I had a nice night dancing at Bertha's! \$37.82 (\$14.95/hr.)
- 8 1597)10/25/00(WED)HPL-BICEN.(7:48-10:30PM). Kind of slow night, but had some lookers in town for some kind of space conf., some working on a Europa orbiter. Lost 1/2-hr. at start due to haze in NE, though was able to see Uranus and Albireo. SATURN(eventually another good-as-it-gets night!). JUPITER(2+2). VISIT: Frank, Elsbeth and Tommy, who looked thru scope reluctantly and showed no reaction. F&E said he was very tired from their trip today to Harpers Ferry, but it looked to me like typical behavior. \$50.36 (\$18.65/hr.)
- 8 1598)10/27/00(FRI)HPL-BICEN.(7:52-11:40PM). AMBIENCE(More than usual groups of young, roudy black males. One filched \$1, while I convinced one of the group to return a second \$1. No fun, this! Arrived to find lots of Halloween costumes boarding cruise ship. Otherwise, also had some enthusiastic, appreciative lookers.) ALBIREO(while awaiting Saturn).SATURN haze delayed acq. till 9:15PM!). JUPITER(1 + 3 in beautiful triangle!).\$76.88(\$20.23/)
- 8 1599)10/28/00(SAT)HPL-BICEN.(8:20-10:24PM). Clear, cold, windy. Left a bit early because of cold. ME(Reluctant to go out, having spent day seeing off Eve & Frank & family, incl. drive to Dulles, + cold wind and feeling v. tired. However, once set-up, I didn't feel too bad, and I enjoyed some of my lockers.) SATURN(3 moons). JUPITER(1+3, nice). VISIT: Brian Eney, an old Wed. dance guy. \$75.43 (\$36.44/hr.)
- 8 10/29/00(SUN)HPL-BICEN.(7:30-8PM) Decided not enough strollers to setup. WHY? It used to be that I'd setup in severe weather and hardly anyone in sight. Tonight, it was nice weather and knots of strollers were present. My first ans. is money. Years ago I was totally thrilled with any dollar, even one, I collected. Today, I feel more comfortable financially, and making a few bucks is not worth the effort and risks of setting up. It's worth it only when there are enough people out to potentially produce a good return. ALSO, my dislike of being alone in a bleak scene kept me from setting up, tonight. FINALLY, my "show & tell" need has diminished to where I can survive not showing Saturn on a clear night. (Acq. Saturn by eye at 7:41PM.)
- 4 1600)10/30/00(MON)ROTUNDA(5:10-6:10PM).Shut down by clouds.Called for permission. Kimberly Hogan, Prop. Mgr., said I could go tonight but that she must check liability sit. w/new owners before I come again. 3-d. MOON. VISIT: Del Sweeny. \$9.05 (\$9.05/hr.)

TOTAL THIS PAGE = \$ 814.44

TOTAL THIS YEAR = \$5,735.50

- 4 1601) 11/1/00 (WED) ROTUNDA (4:51-7:50PM). Mild; ok sky. 5-d. MOON. ISS (Supposed to appear at 5:44PM for 3-mins., but I got confused and didn't start looking till 5:46PM. Much to my inner embarrassment and to the disappointment of 6 or 8 assembled lookers, we didn't see it!). MIR (Appeared at 6:31PM and put on an exciting flyover!). SATURN (Acq. 7:08PM; 2-moons, even with glare from lights!). JUPITER (Could have acq. at 8:10PM, had I stayed set-up.) VISITS: M. Roswell; Teresa... sans scope. \$31.43 (\$10.54/hr.)
- 4 1602) 11/2/00 (THU) ROTUNDA (5:32-8:23PM). Delayed start due to hazy sky which cleared at ss. 6-d. MOON. SATURN (2-moons). JUPITER (Acq. 7:53PM; great!). Slow most of evening with a small rush just as I was packing up. VISIT: M. Steiner (has split w/Tonya) \$29.52 (\$10.35/)
- 8 1603) 11/5/00 (SUN) HPL. (5:52-8:13PM.). Sl. late start as I came from Sci.Ctr. job, on which I felt v. depressed, today.... probably over prospect of loosing time at Hpl. Great sky; pleasantly cool. 9d. MOON (Copernicus just past term. Alternated between 80 & 222X.). JUPITER (Acq. for a few mins. before it went behind WTC; 4 on L!). SATURN (Acq. 7:45PM. Was set-up sl. S. of Amphi., near water taxi stop. Good traffic for a few hrs. By 8PM, it was noticeably slower. Never reacq. J. \$80.00 + \$6.60 = \$86.60 (\$36.90/hr.)
- 4 1604) 11/6/00 (MON) ROTUNDA (4:55-8:10PM). V. good sky. 10d. MOON (Jura Mts.; Tycho). SATURN (incredibly, 4-moons, even in glare of Hg light!). JUPITER (Great!). VISITS: John Stroh; Lisa Simone; Craig of Fmr. Mkt.; Ken (a Hampden 6th grader who stuck around for +/- 2 hrs. and was v. interested, and to whom I gave copies of all my lit. \$37.00 (\$11.40/)
- 8 11/15/00 (WED) WALDORF SCHOOL, ATTN: DAWN FOX, 410-664-8977 (1-2PM). Invited by Andrea Neft to speak to Her son, Gabe's, 6th grade class. Started by describing how I got interested in the stars when Miss Wicker drew UMa on the board and I found it that night. Since UMa is not readily visible right now, I drew Taurus/Pleiades with Jupiter/Saturn and had students take an oath to go out and see them. Then explained twinkling, and moved on to the Leonids, ~~saturns/aurora~~, the ~~Uma's eclipses and other~~ subsjs. Left alot of handouts with teacher. Good kids; I was pretty "hot". This was the day of Goldie Lurie's funeral. Went to Hettleman's to see family after talk. \$66.50
- 8 1605) 11/17/00 (FRI) HPL--near Amphi (6:45-10:06PM). Cold; 1st really wintery stint! Intermittent cloud prob. early, then ok. Lots of lookers from Science Teachers mtg., which I had no idea of AHEAD! SATURN (Could have acq. 6:30PM; 3 moons). JUPITER (2+2; exciting). Good traffic despite cold. Enthusiastic lookers. \$106.00 + \$10.98 = \$116.98 (\$34.92/hr.)
- 8 1606) 11/24/00 (FRI) HPL--near Amphi (6:04-9:40PM). Cold. Nice sky. Pretty steady traffic, w/lots of families. SATURN (saw @ 5:57PM). JUPITER (3+1; great!). \$118.00 + \$7.79 = \$125.79 (\$34.94)
- 8 1607) 11/26/00 (SUN) HPL--v. high tide, so setup near pavilion steps. Adverse weather rpt. but 5:53-8:50 good sky. ROBBERY!: Had +/- \$10.00 snatched from hat by kid who hung around for an hour. He asked good q.'s and seemed genuinely interested, but then he grabbed money and ran. First time this has happened in 8 yrs. in Hpl. SATURN (4 moons!). JUPITER (4, then 3; terrific!). Quiet scene but steady stream of lookers. \$87.00 + \$9.02 + \$96.02 (\$32.55/hr.)
- 8 12/1/00 (FRI) Dry run to Hpl. Army-Navy f'ball game here, taw. Adverse weather rpt, but at ss 6-d. Moon in clear sky. Got parked, walked around, met Myra and walked her to a cab home. Lots of people in Hpl., a sleek looking crowd. Would have been great night!
- 8 1608) 12/2/00 (SAT) HPL--near Amphi (5:37-10:4 PM) V. cold, windy; good sky. Worked at SciCtr. this afternoon, rushed home, shg'd. clothes, drove to Hpl. forgetting sign, water, handouts! Join by Teresa around 7:30PM (It was so great to see her, plus she brought hot choc!) Evening after Army-Navy game. Lots of strollers. SATURN (2-moons). JUPITER (4 on right!). 7-d Moon (once). On req., M42 & M45. Enthusiastic lookers! \$195.00 + \$13.94 = \$208.94 (\$34.37/hr.) Lots of lookers were locals in Hpl. for the annual Lighted Boats Parade! Also some army & navy cadet lookers, + adults in town for game. VISIT: Jeanie Pickett & Henry.
- 4 1609) 12/4/00 (MON) ROTUNDA (4:48-8:05PM). Cold, but not frigid. Good sky. Slow for 1st hr., then fairly busy. 9-d. MOON. SATURN (2-moons). JUPITER (2+2). Lots of hassle from lights and the Uma bows on them! Enthusiastic lookers. \$55.77 (\$16.99/hr.)

TOTAL THIS PAGE = \$ 854.55

TOTAL THIS YEAR = \$6,590.05

L 1610)12/25/00(CHRISTMAS MONDAY)FARMER'S MKT. LOT(10:50AM-1:30PM) PARTIAL SOLAR ECLIPSE!
 Eclipsed began at 11:05AM and peaked 12:42PM (mag. .541; obsc. .425). Temp. in 20's, brisk breeze, v.clear sky! Probably had +/-25 lookers at peak and 50 over course of event. I advertised it by handing out 1"-strip alerts for two Sats. at Mkt., Roylance mentioned me in his eclipse art., plus Myles Hoenig and John Spurrier, both of whom came, adv'd. it on the Waverly & Chas. Wil Web sites. Equip: 3" "Sunscope" projection, 3ea. #14 welders lenses, oatmeal container pinhole proj's, masked mirror on tripod reflecting sun image onto white car door(!), unmasked hand mirror which threw a large image onto a building 150' away(!). Great time had by all! VISITORS INCL'D: Mike & Ilene Franch(1st arrivals), Julius Westheimer & wife(called earlier to confirm), Leah, Teressa (brought filecard pinholers, which worked ok), Jonathan (JHU astro. std.) Alice & Neils Liem & daughter, people who got my notice at mkt. We discovered could use hands and fingers to form pinhole images on side of car! I took some photos, incl. through #14 held by Sheila Rees as bright cloud was near Sun. Myles took photos, as well as others. Hopefully, I'll see their results! NO HAT!

I
 TOTAL THIS PAGE = (none)

TOTAL THIS YEAR = \$6,590.05

Year = 945 miles

STREET CORNER EXPENSES -- 2000

| | |
|---|----------|
| SP 1/2/00 1000-post-its (Staples) | \$ 4.00 |
| STA 1/2/00 parking at HPL | \$ 6.00 |
| SP 1/3/00 artwork for Cuban Saturno sticker (JHU) sizing artwork | \$ 1.05 |
| SP 1/3/00 Saturno rubber stamp (Baumgarten Co.) | \$ 18.64 |
| STA 1/4/00 Web strap w/buckle for 3" telescope box (Sunny's) | \$ 5.24 |
| SP 1/5/00 10-copies star maps for Cuba (JHU) | \$ 0.50 |
| STA 1/6/00 brake cable/brake shoes (horizon) | \$ 2.36 |
| SP 1/7/00 60-sides SC handouts (JHU) | \$ 3.00 |
| POST 1/11/00 2-letters to Cuba | \$ 1.20 |
| TEL 2/1/00 bill of 1/13 | \$ 2.10 |
| SP 2/8/00 tip to Hpl. artist for bus fare | \$ 1.35 |
| TEL 2/22/00 bill of 2/13 | \$ 0.30 |
| STA 2/25/00 stamp pad ink (Staples) | \$ 2.17 |
| POST 2/29/00 Crux photos & article to S&T | \$ 0.55 |
| SP 3/04/00 48-sides misc. SC handouts (JHU) | \$ 2.40 |
| SP 3/5/00 Teresa parking at HPL | \$ 4.00 |
| SP 3/6/00 Frankie for pushing scope back to car at HPL | \$ 2.00 |
| SP 3/6/00 Teresa--pizza treat at Bopp after Hpl. stint | \$ 5.91 |
| STA 3/3/00 new wrist watch--1/3 of cost | \$ 13.97 |
| STA 3/7/00 HPL parking | \$ 5.00 |
| SP 3/8/00 SC handouts (JHU) 23-sides | \$ 2.30 |
| SP 3/8/00 tip to Frankie for pushing scope back to car | \$ 1.00 |
| SP 3/9/00 1000-post-its (Staples) | \$ 4.40 |
| STA 3/11/00 Ink stamp pad (Office Depot) | \$ 1.88 |
| SP 3/15/00 tip to Frankie for pushing scope | \$ 1.00 |
| SP 3/24/00 Hpl parking | \$ 6.00 |
| TEL 3/26/00 bill of 3/13 | \$ 0.60 |
| SP 3/29/00 60-sides astro handouts + forthcoming talks materials (JHU) | \$ 6.00 |
| SP 3/31/00 10-solar cycle printouts for Gilman talk (JHU) | \$ 0.50 |
| POST 3/31/00 mail Indemnification Agreement to Mare Cromwell | \$ 0.33 |
| SP 4/2/00 12-copies mats. for Gilman talk (sunspot numbers, Web sites)(JHU) | \$ 0.60 |
| SP 4/3/00 21-sides mats. for Gilman talk (JHU) | \$ 0.05 |
| POST 4/7/00 mail performance req. to N. Scola | \$ 0.33 |
| SP 4/20/00 9-copies sun materials for Roland Park Middle Sch. talk (JHU) | \$ 0.45 |
| SP 4/25/00 8-epys. mats. for Roland Park Middle Sch. talk (JHU) | \$ 0.40 |
| SP 4/25/00 4-transparencies for (ibid) @ \$0.40/ea. (JHU) | \$ 1.60 |
| SP 4/26/00 4-xeroxes mats. for Roland Pk. Middle talk (JHU) | \$ 0.20 |
| SP 4/26/00 2-transparencies (ibid) @ \$0.40/ea. (JHU) | \$ 0.80 |
| TEL 4/27/00 Bill of 4/13 | \$ 0.70 |
| SP 4/28/00 10-epys SUN Cuba CRUX article (JHU) | \$ 0.50 |
| SP 4/29/00 5-epys. (2) CRUX art. + 3-flags/photo (JHU) | \$ 0.25 |
| SP 5/8/00 10-sides street corner handouts (JHU) | \$ 1.00 |
| POST 5/7/00 mail schedule req. to HPL | \$ 0.33 |
| SP 5/14/00 36-sides SC handouts (JHU) | \$ 1.80 |
| SP 5/16/00 20-sides materials for Bushy Park talk (JHU) | \$ 1.00 |
| POST 5/17/00 mail originals to J.Goldberg for Bushy Park talk | \$ 0.77 |
| SP 5/19/00 2-transparencies for Bushy Pk. talk (JHU) | \$ 0.80 |
| SP 5/19/00 8-epys. prep. mats. for above transparencies (JHU) | \$ 0.40 |
| TEL 5/22/00 bill of 5/13 | \$ 0.35 |
| POST 5/23/00 Return eyepiece 18mm Or. to Univ. Optics | \$ 2.31 |
| SP 5/23/00 9-sides handouts for Greenmt. Sch. talk (JHU) | \$ 0.45 |
| POST 6/6/00 mail schedule req. to Hpl. | \$ 0.33 |
| SP 6/6/00 22-sides SC handout materials (JHU) | \$ 1.10 |
| SP 6/7/00 to Frankie for helping me load scope in car at Hpl. | \$ 2.00 |
| PAGE TOTAL | \$125.67 |

STREET CORNER EXPENSES -- 2000

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| SP 6/9/00 3-color cpys. S&T aurora photos for sunscope demos (JHU) | \$ 2.25 |
| SP 6/9/00 16-cpys. sunspot articles (ibid) (JHU) | \$ 0.80 |
| SP 6/9/00 parking for T. Palomar at Hpl. at meter | \$ 4.00 |
| SP 6/10/00 2-cpys. SC handbill(4-up) (JHU) | \$ 0.10 |
| SP 6/10/00 5-cpys. Sun Cuba art. (JHU) | \$ 0.25 |
| SP 6/10/00 3-cpys. Kepler mats for Bruce Weintraub (JHU) | \$ 0.15 |
| SP 6/10/00 to Frankie for helping me load scope at Hpl. | \$ 2.00 |
| SP 6/20/00 3-cpys child's books art. for Brad Sibol, Borders Bks. (JHU) | \$ 0.15 |
| POST 6/20/00 mail above art. to Sibol | \$ 0.33 |
| SP 6/20/00 to Frankie for assist in loading at Hpl. | \$ 2.00 |
| SP 6/21/00 100-sides SC handouts (JHU) | \$ 10.00 |
| SP 6/23/00 35-sides SC handouts (JHU) | \$ 3.50 |
| TEL 6/24/00 bill of 6/13/00 | \$ 3.86 |
| SP 7/1/00 Fpt. parking meter | \$ 0.40 |
| SP 7/2/00 3-cpys. "WWW.SPACEWEATHER.COM" (JHU) for Sunscope screen | \$ 0.15 |
| SP 7/3/00 50-sides SC handout materials (JHU) | \$ 2.50 |
| SP 7/4/00 10-sides SC handouts @ \$0.06/ea. (JHU) | \$ 0.60 |
| SP 7/7/00 4-cpys. Moon photos for SC use (JHU) | \$ 0.24 |
| SP 7/7/00 to Frankie for assist in loading at Hpl. | \$ 3.00 |
| SP 7/8/00 26-sides SC handouts (JHU) | \$ 1.56 |
| SP 7/10/00 3-cpys. Summer Star Map for Borders talk (JHU) | \$ 0.18 |
| SP 7/11/00 25-cpys. summer star map for Borders talk (JHU) | \$ 1.50 |
| SP 7/11/00 20-sides Porco art. for Borders talk (JHU) | \$ 1.20 |
| SP 7/12/00 1-copy. e-mail from E. Azzam re speaking engagement (JHU) | \$ 0.06 |
| POST 7/12/00 mail August requests to Hpl. | \$ 0.33 |
| SP 7/12/00 tip to Frankie at Hpl. | \$ 2.00 |
| STA 7/13/00 packaging tape (Staples) | \$ 1.41 |
| SP 7/13/00 150-sides(5-twosided handouts) for Iran conference (JHU) | \$ 9.00 |
| SP 7/14/00 1-copy e-mail re. speaking date (J. Kuhn) (JHU) | \$ 0.06 |
| SP 7/18/00 5-cpys. arts. for Sc. Ctr. Planetarium application (JHU) | \$ 0.30 |
| POST 7/18/00 mail Sc. Ctr. application | \$ 0.33 |
| TEL 7/31/00 bill of 7/13/00 | \$ 1.54 |
| EQUIP 8/7/00 repair of Momet 760H Carousel Projector (Strauss Photo) | \$ 126.50 |
| SP 8/16/00 to Frankie for loading at Hpl. | \$ 2.00 |
| SP 8/20/00 " " " " " " | \$ 2.00 |
| SP 8/21/00 " " " " " " | \$ 2.00 |
| STA 8/22/00 2-rolls masking tape (Staples) | \$ 2.56 |
| TEL 8/24/00 tel. bill of 8/13/00 | \$ 3.77 |
| SP 8/24/00 10-ea. SC Star Maps (JHU) | \$ 0.66 |
| SP 8/25/00 to Frankie for help loading | \$ 2.00 |
| POST 8/29/00 mail sked req. to HPL Oct. | \$ 0.33 |
| STA 9/3/00 erasers (Staples) | \$ 1.71 |
| SP 9/7/00 to Frankie for loading help at Hpl. | \$ 2.00 |
| SP 9/12/00 74-sides handouts for tonight's talk to women(s club (JHU) | \$ 2.04 |
| COMP 9/16/00 AUTUMN '00 star map 15-sides) (JHU) | \$ 0.90 |
| STA 9/28/00 bike repair (Horizon) | \$ 3.66 |
| SP 9/29/00 tip to Fell's Pt. girl bagpiper | \$ 1.00 |
| SP 9/30/00 tip to Frankie for help focusing, plus help loading | \$ 3.00 |
| SP 10/01/00 1-color copy of N.A. Nebual from magazine (JHU) for presentation use | \$ 0.75 |
| SP 10/4/00 94-sides handouts for Borders and street (JHU) | \$ 5.64 |
| SP 10/4/00 tip to Frankie at Hpl. | \$ 2.00 |
| PAGE TOTAL | \$220.27 |

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|----------------|---|----------|
| SP 10/5/00 | 45-sides add'l handouts for Borders talk (JHU) | \$ 2.70 |
| SP 10/9/00 | 12-sides mnemonic (JHU) | \$ 0.72 |
| SP 10/12/00 | tip to Frankie for help in Hpl. | \$ 2.00 |
| SP 10/13/00 | tip to Frankie (ibid) | \$ 4.00 |
| SP 10/14/00 | tip to Frankie (ibid) | \$ 4.00 |
| STA 10/17/00 | bike repair (Horizon Cycles) | \$ 9.09 |
| SP 10/19/00 | SC handouts 38 sides (JHU) | \$ 2.28 |
| SP 10/20/00 | tip to Frankie (ibid) | \$ 4.00 |
| SP 10/25/00 | tip to Frankie (ibid) | \$ 2.00 |
| SP 10/26/00 | 2-cpys. art. on disc. of all plutino(JHU) | \$ 0.06 |
| TEL 10/26/00 | bill of 10/13/00 | \$ 5.23 |
| SP 10/27/00 | money filched from hat at Hpl. | \$ 1.00 |
| SP 11/1/00 | 10-star maps (JHU) | \$ 0.60 |
| SP 11/2/00 | 1000-post-it notes (Staples) | \$ 4.60 |
| SP 11/3/00 | 36-sides SC handouts (JHU) | \$ 2.16 |
| POST 11/3/00 | mail Dec. Hpl. requests to R. Sams | \$ 0.33 |
| POST 9/3/00 | (Ibid. Sept.) | \$ 0.33 |
| POST 10/3/00 | (Ibid, Oct.) | \$ 0.33 |
| SP 11/05/00 | tip to Frankie in Hpl. | \$ 1.00 |
| SP 11/7/00 | 1-planets 8x12 + frame & mat for Teresa (Tech 2000) | \$ 30.14 |
| SP 11/9/00 | 23-sides mats. for Waldorf talk (JHU) | \$ 1.38 |
| SP 11/9/00 | 2-sides winter star map mats. | \$ 0.12 |
| EQUIP 11/10/00 | ENH Projector Bulb (Service Photo) | \$ 34.64 |
| SP 11/10/00 | 16-sides mats. for Waldorf talk (JHU) | \$ 0.96 |
| SP 11/10/00 | 10-sides Winter star map (JHU) | \$ 0.60 |
| SP 11/13/00 | 9-sides mats. for Waldorf talk (JHU) | \$ 0.45 |
| SP 11/13/00 | 8-sides of informational arts. for HH(JHU) | \$ 0.48 |
| SP 11/14/00 | 4-sides SETI mats. for Waldorf talk (JHU) | \$ 0.24 |
| SP 11/17/00 | tip to Frankie in HPL. | \$ 4.00 |
| SP 11/18/00 | 50-sides SC handouts (JHU) | \$ 3.00 |
| STA 11/20/00 | typewriter ribbon (Staples) | \$ 3.13 |
| TEL 11/24/00 | bill of 11/13/00 | \$ 0.55 |
| SP 11/24/00 | tip to Frankie in Hpl. | \$ 3.00 |
| POST 11/27/00 | mail data personal to Marquis Who's Who in Science & Engr. | \$ 0.33 |
| SP 11/28/00 | 33-sides SC handouts (map + handbill) (JHU) | \$ 1.98 |
| SUBS 11/30/00 | Astronomical League membership + Reflector sub (ck#489) | \$ 25.00 |
| STA 12/07/00 | Artistic Greetings, address labels (ck#492-P) | \$ 4.60 |
| SP 12/14/00 | 17-sheets (13-up) of solar eclipse blurbs (JHU) | \$ 1.02 |
| SP 12/21/00 | 14-cpys "Eclipse Alert" blurb (13-up) (JHU) | \$ 0.84 |
| SP 12/23/00 | 2-laminate cpys + 1-reg. Eclipse info (Kink) | \$ 0.49 |
| TEL 12/26/00 | Bill of 12/13 | \$ 0.70 |
| SUBS 12/30/00 | AGU membership + contribution | \$ 40.00 |
| SP 12/31/00 | Comet H-B cards given out on street to deserving lookers (NY photo) 150 ea. (Herman Heyn Photography) @ \$0.50/ea. | \$ 75.00 |

PAGE TOTAL

STREET CORNER TELESCOPE EXPS. -- 2002

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|--|----------|
| 11/14/02 SP Frankie, Hpl. | \$ 3.00 |
| 11/18/02 POST S&T to Helen Glazer | \$ 1.42 |
| 11/18/02 SP 2-sides for tonights talk (Kinkos) | \$ 0.16 |
| 11/18/02 SP 25-sides mats for tonight's talk (JHU) | \$ 1.50 |
| 11/18/02 SP purchase comet cds. for Jerry Feldman, telescopist. (SC) 8ea. | \$ 4.80 |
| 11/25/02 SUBS renew AGU membership/subscriptions | \$ 20.00 |
| 12/1/02 SP 14-sides 12/02 star map @ \$0.06/ea. (JHU) | \$ 0.84 |
| 12/9/02 SP 12-sides star map @ \$0.06/ea. (JHU) | \$ 0.72 |
| 12/10/02 POST mail original handouts to Brian Flowers for talk | \$ 0.74 |
| 12/10/02 SP 4-copy handout for talk (Kinkos) | \$ 0.33 |
| 12/10/02 SP 3-sides Geminid info for talk (JHU) | \$ 0.18 |
| 12/05/02 BOOKS Observer's Handbook 2003 (Sky Pub.) | \$ 27.45 |
| 12/21/02 SP Frankie in HPL | \$ 5.00 |
| 12/22/02 SP 21-sides DEC. starmap (JHU) | \$ 1.26 |
| 12/23/02 SP 1-color cpy. CIRCUMPOLAR photo for Teresa (Kinko's) | \$ 1.05 |
| 12/23/02 SP 1-11"x14" frame for Teresa's photo (Techlab) | \$ 7.88 |
| 12/24/02 SP 1-color ppy CIRCUMPOLAR 112% for Teresa (Kinkos) | \$ 1.05 |
| 12/24/02 TEL bill of 12/18/02 | \$ 0.28 |
| 12/29/02 POST mail reqs. to Hpl. Feb. | \$ 0.37 |
| 12/30/02 Int'l Dark-Sky Assoc. membership (ck#652) SUBS. | \$ 30.00 |
| 12/30/02 Astronomical League indv. membership (ck#653) SUBS. | \$ 25.00 |
| 12/30/02 POST stamps to mail above checks | \$ 0.74 |
| 12/31/02 STA 1-typewriter ribbon (Staples) | \$ 3.45 |
| 12/31/02 SP 2-sides Jan. '03 star map (JHU) | \$ 0.12 |
| 12/31/02 SP 25 Comet Holiday cds. given away in Hpl. to lookers (HH photo) | \$ 15.00 |
| PAGE TOTAL | \$152.33 |

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|------|---------|--------|--------|--------|---------|--------|---------|----------|
| PAGE | SP | EQUIP. | POST | TEL | SUBS | STA | BOOKS | PAGE 3 |
| | \$42.88 | --- | \$3.27 | \$0.28 | \$75.00 | \$3.45 | \$27.45 | \$152.33 |

| | | | | | | | |
|----------|---------|--------|--------|----------|---------|---------|----------|
| SP | EQUIP. | POST | TEL | SUBS | STA | BOOKS | YEAR |
| \$220.38 | \$87.95 | \$8.08 | \$1.47 | \$105.00 | \$20.49 | \$27.45 | \$470.82 |

528 miles x \$0.365 = \$192.72

2001

Not for Distribution

- 8 1611)6/9/01(SAT)HPL(9:50-12:02AM). First stint since hernia diagnosis and 2/14/01 operation. Have been considering myself "retired" from the street. Persuaded to go out by Teresa, who I met this AM at Fmr's Mkt. and who joined me tonight. Once I got started I felt ok about being there. She felt great to be back! Intermittent clds., then clear. MARS(Nearing 6/21 closest approach; 20.3". Very unsettled for good while; beginning to get decent at quit time. Albedo markings; pole? Showed lookers S&T cover photo to lend context. Still like squeezing blood from turnip!). B SCO(Whole Mars behind light post.). SCOPE: performed well. Teresa did B Cyg for a while. \$55.00 + \$6.71 = \$61.71 (\$28.05).
- 9 1612)6/24/01(SUN)FPT.(8:45-10:55PM). Teresa not avail., and didn't want to go to Hpl alone... but wanted to go out. Good interest, incl. man who bought 4" refractor having looked thru my scope(!). 3-d. MOON (Maybe best at 165X.). MARS(Easy to see in twl. Unfortunately only 1 smallest dark feature. Image not bad but degraded by heat from light for +/-1-hr. I hyped it best I could for lookers.) a Sco, B Sco, B Cyg(once each). VISITS: Judie, Ralph (dancers); Gurbaneet(JHU Med student). HH(Ok at start, then somewhat bored with repetition! While unloading scope at home, I was reminded that I really should get a lighter, much easier to handle scope!) \$36.00 + \$5.92 = \$41.92 (\$19.32/hr.)
- 9 1613)7/13/01(FRI)HPL.(8:43-11:55PM). Accompanied by Teresa. Clear but unsteady sky. MARS (Syrtis Maj. finally on meridian, but planet covered by most intense dust storm in 30 yrs, so just a yellowish disc. Very frustrating! I show lookers picture of "what we were supposed to be seeing."). ANTARES(Several times). ALBIREO(by Teresa). VISITS: CARLOS (fellow planetarium worker; stayed entire eve.; I gave him ride home). ELLEN HOCHMAN AND HER ALBANIAN STUDENT VISITOR, ELDA. Busy night! \$99.55 (\$31.14/hr.)
- 9 1614)7/15/01(SUN)FPT.(8:07-10:45PM). Surprise visit by Teresa! Nice sky; a few intermittent clouds. ARCTURUS(Before sunset; while awaiting Mars). MARS(Still dusty; vague, if any, features). B Cyg(Intermittently). URANUS(Remained behind Rec. Pier.). VISITS: DARYL MASON(Invited to observe my modus operandi.); MIKE POTTER(Just a breakdown time.). Not a busy night, but kind of mello with friendly people. JOE(One of Charlie Doble's girls.). HH(Till I got bored, my head in pretty good shape.). \$33.66 (\$12.80/hr.)
- 9 15)7/22/01(SUN)FPT.(7:57-10:23PM). Ok sky. MARS(Was semi-decent in twilight, but deteriorated with dark, which made it a tough sell.) B Cyg, B Sco. VISITS: Willie, who I'd invited to visit; Jon Wasserman, Jay. 2-d. MOON(very briefly). \$30.13 (\$12.38/hr.)
- 8 1616)7/23/01(MON)HPL. NEAR AMPHI.(8:28-10:50PM). Nice sky; humid. HH(Have been very depressed for a while, up till a few days ago. Must check last yr's. log. Tonight felt very good!) 3-d. MOON(Great, while it lasted!). MARS(Something whittish on top edge which I sold as a snow cap.). METEOR(There was a daytime bolide around 5PM. Several people came by who saw it.) \$65.06 (\$27.57/hr.)
- 8 1617)7/30/01(MON)HPL.(8:14-10:17PM). Ok sky, then shut down by clouds. 10-d.MOON(Copernicus, Tycho). MARS(on req.). VISITS: Tony Scott ("borrowed" \$5); lookers from Sudan, Albania. \$42.02 (\$20.47/hr.)
- 8 1618)7/31/01(TUE)HPL. nr. Amphthi.(8:07-10:55PM). Good sky, then shut down by clouds. V. busy, the lots of families looking for \$1. SCOPE(Was worried that I messed it up today. Attached a rubber tube to vacume cleaner and tried to suck out fuzz on secondary. Failed, but in process tip of tube left little smears on secondary and a few thin, hairlike fabric pieces from tube ended up inside scope. Felt really terrible about this, but view thru scope of Moon seemed ok, which was a relief!). ISS(Good flyover just before 10PM. Recruited a good group of watchers.). 11-d. MOON(Tough. I bounced back-and-forth from 80X to 136X. Fairly intense evening. HH(My stamina seemed good, which makes me think I'm healthy.)\$66.46(23.76
- 8 1619)8/01/01(WED)HPL. nr. Amphthi(8:23-11:33PM). Great sky; mild. Busy in Hpl. HH(Still w/great stamina; energy!). 12-d.MOON(Tycho & edge craters. Ok. Used all mags!). MARS(Several times ALBIREO(twice.)). ISS(2 passbys! #1 @ 8:55PM, SSW-ESE; #2 10:32PM WNW-NNE. A family from Ohio saw both!). VISITS: Ellen Hochman & friend from work; two professional astronomers who were thrilled with what I'm doing! \$87.34 (\$27.55/hr.)

TOTAL THIS PAGE = \$527.85

TOTAL THIS YEAR = \$527.85

- 8 1620) 8/24/01(FRI)HPL-BIGEN(8:20-10:45PM). Late start due to cloud indecisiveness, plus confusion as to where to set up. Was a bit leary of Bicen., but as Amphth. was jammed w/performer went there anyway. Was fine! 6-d. MOON(Fine; lost for 1/2-hr. behind bldg. Set around 10:45PM). MARS(While Moon absent.). \$55.00 + \$12.17 = \$67.17 (\$7.76/hr.)
- 9 521) 8/26/01(SUN)FPT.(7:35-9:25PM). Good sky, then shut down by clouds. 8-d. MOON(Copernicus not yet; Apennines on terminator--great!). MARS(Looks gibbous). VISITS: Anne Kinney w/ friend, who said Anne is now head of NASA science projects!; Stephen Lampretti (we went out for pizza). DARYL(I welcomed him; he said it was his 4th time in Fpt.). \$20.75(\$11.28/
- 8 1622) 9/1/01(SAT. BEFORE LABOR DAY)HPL-BIGEN(7:30-12:20AM). Good sky, except seeing a bit shaky. Sometimes a river of people flowing past! MARS(While waiting for rising Moon to emerge from clouds.). 14-d. MOON (Essentially full; a few craters on boss edge. Never got fully settled on how to show it, what mag. to use. Maybe a very low power showing all of it would be good. Forgot Moon filter!) y AND. URANUS. VISITS(Carla, demonstration stage SciCtr. person. Jack Hoffberger, Dick M's. stepson.) HH (Long stint, but I was well rested and held up well; also well nourished!). \$128.00 + \$20.76 = \$148.76 (\$30.80/hr.)
- 9 1623) 9/7/01(FRI)HPL-BIGEN.(7:44-11:34PM). Good sky. Accompanied by Teresa. MARS(Gibbous blob; primarily by T.). URANUS(An incredible thing happened. Searching for it I kept coming across a fairly bright, close double. I invited T. to look at it, and she remarked that one of them looked like Uranus. I magnified them up and, lo and behold, the lower left one was Uranus! It was passing +/-25" past a fairly bright, yellow-orange star. Checking SAT at home, I found it said, "Uranus passes just arcseconds from a 7th mag. orange star on the evening of 9/7! I stayed with it most of the evening. It was appreciated by most lookers.) NEPTUNE (By req. of Ron Lucarelli. Small blue dot.) y AND(Briefly toward end.) 20-d. MOON(Rose +/-10:30PM, handled by T.) VISITS: Lorinda and Nidia. Ron Lucarelli, an art director at NPR, who hung around along time and said he suggest to NPR to do a story on us. All in all, an exciting night! \$102.00 + 9.51 = \$111.51 (\$29.06/hr.) VISIT(Ruis, a Camaguey Cuban, reintroduced himself, saying we'd met in Fpt. some time ago.). HH(I felt good; stamina good. Was thinking, THE MOST EXCITING THING AN AMATEUR ASTRONOMER CAN DO IS TO SHARE HIS/HER KNOWLEDGE OF THE SKY WITH THE PUBLIC! FOR SHEAR EXCITEMENT AND SATISFACTION, IT BEATS JUST ABOUT EVERYTHING ELSE!)
- 9 1624) 9/22/01(SAT)HPL-BIGEN.(7:34-8:12PM). First time out since 9/11 WTC/Pentagon bombings. Hpl. LOADED w/people, very few of whom wearing the RW & Blue ribbons you see politicians on TV with. Crowd appeared very upbeat, energized! 5-d. MOON(Great while it lasted. Shut down by clouds, plus Moon went behind birise, where it would have stayed for 1 hr. SHOULD HAVE SET UP NR. AMPHITH. FOR THIS MOON, IF POSS.: \$19.78 (\$31.23/hr.)
- 9 1625) 9/23/01(SUN)HPL-E. OF AMPHITH.(7:05-10:00PM). Good sky. HH(It was 50 mins. from time I got up from short nap till I was set-up!). 6-d. MOON(Great. It's amazing how many people have no idea what the Moon looks like thru a scope! For us amateurs it's pretty prosaic, but for the public it's a revelation!). MARS(Several times. No detail.). ALBIREO(Briefly, when Moon went behind light.) VISIT(Cotters). DEXTER TRIPP(A rope walker who put on a terrific show in the Amphith. while I was set-up.) \$61.00 + \$11.16 = \$72.16 (\$25.71)
- 8 1626) 9/25/01(TUE)HPL-E.(7:00-9:05PM). Clear; cold(wore sweat sht. + beret). 8-d. MOON(Apennines, Eratosthenes). MARS. URANUS. VISITS(Ellyn Baynes & friends). Sparse crowd. Even Dexter Tripp had few watchers. \$18.00 + \$5.30 = \$23.30 (\$11.26/hr.)
- 9 1627) 11/3/01(SAT)HPL-BIGEN.(7:10-11:25PM). Teresa. Great sky; sl. chilly. SATURN(Acq. 7:20PM; 4-moons, Cassini Div. Great!). 17-d. MOON (T-reffic!). JUPITER(Acq.9:40PM; 4, then 3). Busy night, with lots of enthusiastic lookers. No recession here! \$241.98 (\$56.97/hr.)
- 9 1628) 11/10/01(SAT)HPL-BIGEN.(6:51-11:09PM). Mild; clear. SATURN(acq.6:52; v. murky for 2hrs., then good. 3-moons). JUPITER(acq.9PM; 2+2; nice). M42 Once;no good). VISITS: OFFICER AVERELLA, who last night ran off Teresa. He checked my ID card at security office and returned saying I'm ok! ANTHONY, of Images, w/womanfriend. ?? SAXON, childhood friend of Johnny Heyn...in his early movies.) \$102.00 + \$18.29 = \$120.29 (\$27.97/hr.) VISIT: Linda Turbeyville and her fiancée(!). Couple who said it was nice they were looking at the ring of Sat., tonight, because they'd just become engaged. I wished them well.

TOTAL THIS PAGE = \$ 825.70

TOTAL THIS YEAR = \$1,353.55

- 9 1629)11/16/01(FRI)HPL-BICEN.(7:15-11:10PM). Joined by Teresa. Mild. Due to large, Brazilian ship blocking view, setup at waters' edge, sl. s. of usual spot. SATURN(Smothered in haze for 1st hr., then great; 4-moons). JUPITER(by T.; 4 on right!). Lots of enthusiastic lookers. VISIT: Mark, a tall college student who'd taken my MdSci summer course yrs. ago and remembered it fondly!). \$138.00 + \$16.25 = \$154.25 (\$39.35/hr.) HH THIS WAS THE START OF MY 15TH YEAR ON THE STREET! VISITS: The whole planetarium staff strolled by. Jim O'leary was only one who looked thru scope. PHOTOS: An ex-water taxi captain and his woman friend said they'd send \$25.00 for an aurora print.
- 8 1630)11/19/01(MON)HPL-E. of Amph; by benches. Mild! Some lulls, but generally steady traffic. 4-d. MOON(bit unsteady). MARS(1X). SATURN(Acq.7PM, L of WTC; murky, then decent. Lost 7:43P.) Lots of \$5's! (5:15-7:45PM). \$57.00 + \$2.31 = \$59.31 (\$23.72/hr.) VISITS: A goodly number of people who had seen the Leonids Sunday morning!
- 9 1631)11/23/01(FRI; DAY AFTER TG)HPL-BICEN.(6:42-10PM). Teresa. Adverse weather rpt., but clear. Mild, then cold breezes. Dewy 8-d.MOON(Plato). SATURN. JUPITER(4 close-in on one side. Great!). Busy night! \$169.00 + \$14.52 = \$183.52 (\$55.61/hr.)
- 21 1632)11/27/01(TUE)BIOTREK NATURALISTS, INC(7-9PM) Talk & slide show (see "Presentations" folder for format). +/-12 people. Cloudy, so no telescope. \$60.00 (paid)
- 9 1633)12/01/01(SAT)HPL-BICEN.(6:58-10:56PM). Moderate high haze diminished views. Mild, then cold. SATURN(Liked by all lookers.). JUPITER(3+1; nice). 16-d. MOON(Craters near M. Crisium). LIGHTED BOATS NIGHT! Huge number of people watching. Crowd drifting away as I was setting-up but, still, I got the attn. of part of it. Had line for first hr. VISIT: (Calvin Miller & friend; Laurie Dewitt & friend).\$133.00+\$15.44=\$148.44 (\$37.46/)
- 8 1633)12/5/01(WED)HPL-nr. W. W.Taxi landing.(6:30-9:50PM). Great sky; mild(record hi of 75°F today!). HH(Depressed. Struggled to stay upbeat, articulate.). SATURN(4-moons). JUPITER (3, then 4). Good traffic. Lots of enthusiastic lookers. VISIT(Barry & crew.). \$94.00 + \$5.04 = \$99.04 (\$29.74/hr.)
- 12/09/01 DRY RUN TO HPL. Place was dark because all promenade lights were out. Feeling vulnerable, I decided not to set-up. Also, it looked kind of quiet on the promenade. SATURN(acq. 6:13PM from above location). HH(Feeling v. depressed and socially disconnected. All I have going for me in my life is peddling cards and telescope looks, and keeping up with paperwork and health needs. Was at the Field's annual Xmas party today, where it was clear to me that I was out of touch and unable to communicate meaningfully with most people there. I almost didn't even go to the party fearing that outcome.)
- 9 1634)12/15/01(SAT)HPL-BICEN.(6:40-9:36PM). Theresa(for 2nd hrs.). Coldish; intermittent hi haze. SATURN(2-moons). JUPITER(by T.). Busy start, which gradually slowed. Promenade looked quiet by 9:30PM. Many enthusiastic lookers. \$82.00 + \$4.99 = \$86.99 (\$29.69/hr.)
- 8 12/21/01 DRY RUN TO HPL. Cold. Breezy at home, but calm around Amphitheater. Arrived at 5:45PM. Too early! V. few strollers--bleak scene. By 6:45PM it looked better. However, I was too demoralized (unsure I really wanted to do this) to set up. Could see Saturn ok from Amph., itself, by 6:45PM.
- 9 1635)12/22/01(SAT)HPL-AMPITH.(5:50-10:56PM).Cool. Intermittent hi haze, which almost stopped us; eventually v.clear. With Theresa. MOON(8-d., 1st qt.). SATURN(3-moons). JUPITER(4, 3,4). Promenade not heavily trafficed, but we had a steady stream of lookers. Lots of families w/kids--probably here to see Santa. VISITS(Rosey & Matt, Irish musicians; John Strohsacker, who took digital photos.).\$177.00 + \$16.02 = \$193.02 (\$37.82/hr.)
- 5 (shared)12/26/01(WED)HPL.(5:45PM). Dry run to see what I'm missing. Cold. Definitely enough w/photo) strollers on Promenade to justify setting-up!
- 9 1636)12/30/01(SUN)HPL/AMP.(5:02-7:50PM). Theresa. Clear but cold(22°F!);occlly. blustery. Wasted 1st cold 45-mins. while Saturn behind WTC! SATURN(fair seeing; 3 moons).JUPITER(2+2; great!).16-d.MOON(trailing J.). Busy night! VISIT(Ellyn & sister, Lola).Adjourned to J. Patrick's Pub. \$109.15 (\$51.24/hr.!)
PAGE TOTAL = \$1,093.72
YEAR TOTAL = \$2,447.27

Year = 266 x \$0.345 = \$91.77

1st wave of sun storm energy reaches Earth, disrupts radio waves

The Sun : Friday, June 9, 2000: Page 3A

Blast of sun gas, energy hurtling toward Earth

Solar storm could bring power disruptions

By FRANK D. ROYLANCE
SUN STAFF

A powerful eruption on the sun's surface yesterday has sent a storm of solar particles and magnetic energy hurtling toward Earth at more than a million miles per hour.

Scientists aren't sure yet what to expect when it arrives late tomorrow or early Friday.

Electric utilities and satellite operators have been advised to prepare for possible disruptions from what is being described as the first big event of the current 11-year solar cycle.

"It's rare. It's unusual. And we do anticipate a strong geomagnetic storm on June 8 and 9," said Ernie Hildner, director of the federal government's Space Environmental Center in Boulder, Colo.

The approaching solar storm is no direct threat to people. And if it arrives at night, it might even produce a rare display of northern lights across the continental United States — possibly as far south as Baltimore, Hildner said.

Solar scientists have been anticipating such solar storms for more than a year. The sun is nearing its "solar maximum," the peak of its sunspot cycle. The failure of a major eruption to occur before now has disappointed many in the solar research community.

"I've been going out there for some time now warning about this solar maximum," Hildner said. "So far it's been a dud, and proven me a false prophet until now."

The current storm began with a powerful X-ray flare that erupted late yesterday morning from a large region of sunspots now rotating across the surface of the sun.

That was followed by what scientists call a coronal mass ejection — a huge blast of ionized gas and

magnetic energy from the same region. The blast was aimed almost directly at Earth.

Hildner said the event hurled about a billion tons of material out from the sun's atmosphere at speeds estimated between 1 million and 2 million mph.

Depending on its exact speed, the first of this cloud of solar debris should arrive in Earth's vicinity by late tomorrow or early Friday.

Sentry satellites orbiting a million miles sunward of Earth will feel its first effects and radio the data to Earth, Hildner said.

That will give scientists and utility managers their first reliable look at the strength and magnetic characteristics of the storm and about an hour's time to prepare for its effects.

"It may get interesting here in a few days," said John Kappenman of Metatech Corp. His company provides electric utilities, pipeline companies and satellite operators with advance warning of solar events that could threaten their operations.

Solar events like this one can induce fluctuations in Earth's magnetic field, triggering potentially damaging voltage surges in long-distance electric transmission lines and oil pipelines and damage to orbiting satellites.

Kappenman said yesterday's solar flare was 20 to 30 times more powerful than one in April.

"We did see a lot of interesting power system problems from the storm in early April," he said. "Bigger storms cause more interesting problems."

A big solar eruption during the last solar maximum, in 1989, triggered widespread power outages in Quebec, and lesser storms since then have caused several major satellite failures.

Such storms also expand Earth's atmosphere, increasing drag on satellites in low orbits and hastening their fall from the sky.

For more information, try www.spaceweather.com.

By FRANK D. ROYLANCE
SUN STAFF

The first squalls of a geomagnetic storm described as "severe" by space weather forecasters swept past Earth yesterday.

The 1.6-million-mpg impact by the cloud of ionized gas and electromagnetic energy rattled electric power grids in the Northeast, and at least one commercial satellite briefly lost its bearings.

"On a scale from zero to nine, we've moved into the sevens — severe levels," said David M. Speich, a space scientist at the National Oceanic and Atmospheric Administration's Space Environment Center — the space equivalent of

the National Hurricane Center.

The storm began Tuesday with two "X-class" solar flares, the strongest X-ray emissions from them blacked out shortwave radio communications for up to an hour.

Then a "coronal mass ejection" blasted billions of tons of electrified gas and magnetic energy toward Earth. The first shock from that blast rained Earth's magnetic field at 5:41 a.m. yesterday.

Another blast was expected to strike Earth overnight, the result of a smaller flare and mass ejection at 11:45 a.m. Wednesday.

"It's clearly something that bears watching over the next few days. There's lots of junk in the pipeline from the sun at present,"

said John Kappenman, of Metatech Applied Power Systems. The firm helps industrial clients prepare for solar events.

Marylanders hoping to see a rare, mid-latitude display of northern lights were advised to find a dark spot and look north about midnight nightly through Monday morning if skies are clear.

The solar disturbances are part of the sun's regular 11-year cycle of activity, which peaks this year.

These are getting more attention because it is the first "solar maximum" that scientists have been able to monitor closely, thanks to a growing network of research satellites and geomagnetic ground stations.

Society is also more dependent than ever before on electrical grids, satellite communications and navigation systems that are vulnerable to damage from such storms.

The solar blasts pose no direct health threat. Earth's magnetic field remains an effective shield against solar radiation.

The buffeting of Earth's magnetic field, however, can induce damaging surges of direct current (DC) in long-distance transmission lines and power transformers designed for alternating current.

As the current storm began, "we saw things start to chatter with respect to DC levels. And we

had a small peak I'd classify as moderate," said David W. Fugate, president of Electric Research and Management Inc.

He said his utility clients were rushing this week to complete maintenance on vital generators and transformers needed to help manage any threat.

The X-ray flares Tuesday and Wednesday triggered radio blackouts strong enough to disrupt maritime, aircraft and amateur shortwave communication.

Satellites that use Earth's magnetic field to orient themselves in space can get "lost" when that field is moved by a solar storm.

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STREET CORNER TELESCOPE EXPS. -- 2001

| | | | |
|----------|---|----|-------|
| TEL | bill of 1/13/01 | \$ | 0.40 |
| STA | 1-typewriter ribbon (Staples) | \$ | 3.13 |
| TEL | bill of 2/13/01 | \$ | 0.45 |
| 1/6 | SUBS Astronomy magazine - 2-yr. sub. (cks#510) | \$ | 39.95 |
| 3/2 | EQUIP Hybrid star diag. 1.25/.965 (ORION) (CREDIT CARD) | \$ | 29.25 |
| TEL | bill of 4/13/01 | \$ | 0.60 |
| 5/24 | TEL bill of 5/13/01 (Verizon) | \$ | 5.40 |
| 6/22 | TEL bill of 6/13/01 | \$ | 1.50 |
| 7/13 | SP 2-copies S&T Mars map from street use (JHU) | \$ | 0.12 |
| 7/22 | TEL bill of 7/13/01 | \$ | 0.40 |
| 7/22 | SP 1-cpy. Hpl. "hold harmless" agreement (JHU) | \$ | 0.06 |
| 7/23/ | SP bus fare to derilict in Hpl. | \$ | 0.75 |
| 7/24/01 | SP 26-sides materials for SC handout (JHU) | \$ | 1.56 |
| 7/30/01 | SP tip to Frankie for help packing up at HPL. | \$ | 3.00 |
| 7/31/01 | SP Frankie | \$ | 2.00 |
| 8/2/01 | SP 26-sides SC handouts (JHU) | \$ | 1.56 |
| 8/23/01 | TEL bill of 8/3 | \$ | 0.51 |
| 8/24/01 | SP Frankie (Hpl.) | \$ | 5.00 |
| 9/01/01 | SP 12-Sept. sky maps (both sides = 24 sides) (JHU) | \$ | 1.44 |
| 9/01/01 | SP 10-sides SC handouts (JHU) | \$ | 0.60 |
| 9/7/01 | SP 1-Visine moisturizing (for plastic squeeze bottle) (Rite Aid) | \$ | 4.29 |
| 9/7/01 | SP 32-sides SC handouts (maps, hand exercise) (JHU) | \$ | 1.92 |
| 9/7/01 | SP Frankie (Hpl) | \$ | 4.00 |
| 9/18/01 | TEL bill of 9/3 | \$ | 0.60 |
| 9/22/01 | STA bottle of water for Hpl. stint | \$ | 2.00 |
| 9/23/01 | SP Frankie (Hpl.) | \$ | 2.00 |
| 9/30 | SP 5-star maps Oct. both sides (JHU) | \$ | 0.60 |
| 10/23/01 | SUBS S&T 3-year sub. renewal (credit card) | \$ | 99.95 |
| 10/29/01 | SP 20-side November star map (JHU) | \$ | 1.20 |
| 11/7/01 | STA tire repair (Horizon) | \$ | 4.60 |
| 11/21/01 | SP 18-sides copies SC handouts (JHU) | \$ | 1.08 |
| 11/22/01 | TEL bill of 11/13/01 | \$ | 0.34 |
| 11/26/01 | SP 40-sides handouts for Biotrek talk (JHU) | \$ | 2.40 |
| 12/02/01 | SP 13-Dec. sky maps downloaded and xerox (26-sides) (JHU) | \$ | 1.56 |
| 12/14/01 | SP 14-sides Dec. star map (JHU) | \$ | 0.84 |
| 12/20/01 | SP Frame & mat for Theresa's "thank you" photo (Michaels--cr.cd.) | \$ | 14.05 |
| 12/20/01 | SP 1-Aurora print for Theresa | \$ | 6.00 |
| 12/21/01 | SP 9-sides cyps. SC handouts (JHU) | \$ | 0.54 |
| 12/21/01 | TEL call to Theresa from Hpl. | \$ | 0.50 |
| 12/22/01 | SP 30 comet H-B cards purchased from HH Photography for SC give aways | \$ | 15.00 |
| 12/25/01 | TEL bill of 12/13/01 | \$ | 0.91 |
| 12/30/01 | SP 24-sides Jan. '02 star map (JHU) | \$ | 1.44 |
| 12/30/01 | SP supper for Theresa at J. Patrick's Pub. | \$ | 6.90 |

SP = \$ 80.91

PAGE TOTAL \$269.90

Tel. = 11.61

Sta. = 9.73

Subs. = 139.90

Equip. = 29.25

Auto = 91.77 (266 x #0345)

\$363.17

2002

Not for Distribution

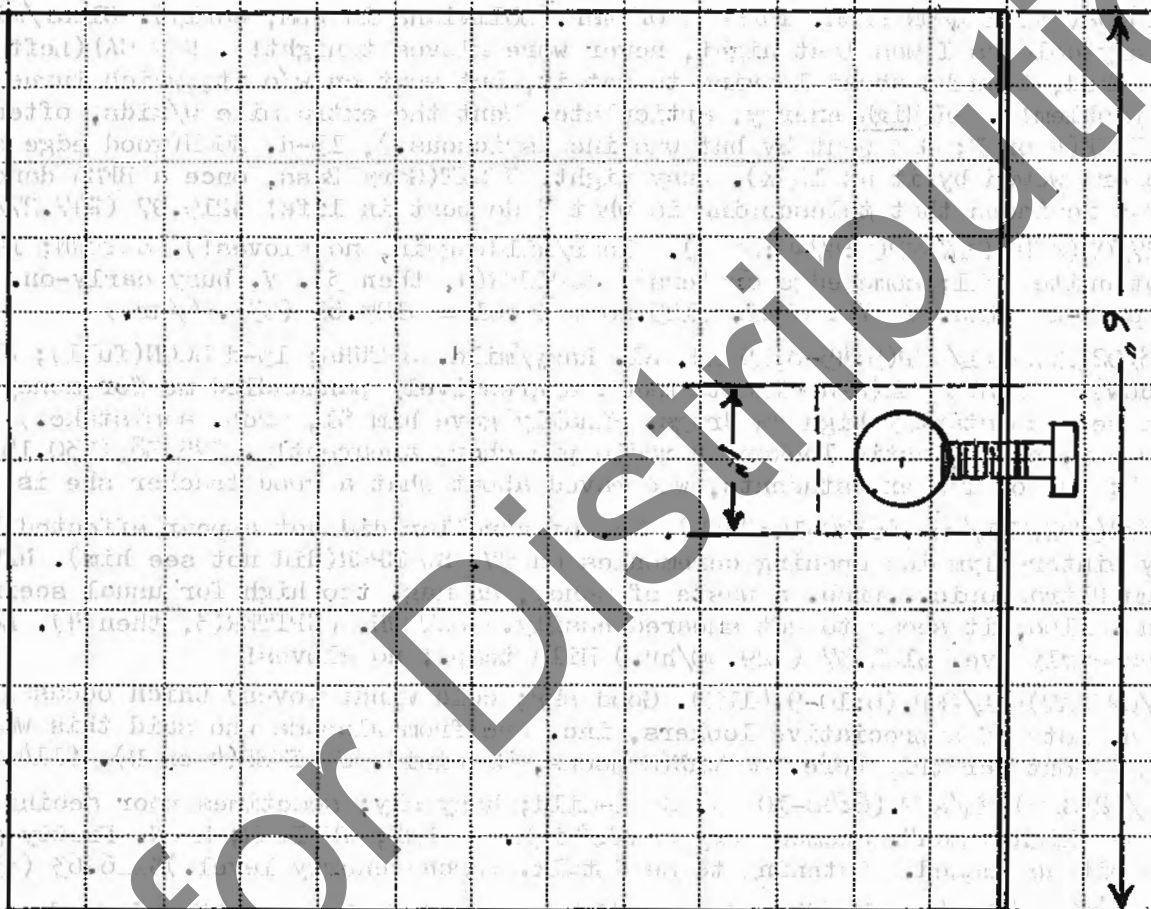
- 8 1637)1/18/02(FRI)HPL/AMP.(6:25-10:07PM). Clear/cold 30's. Surprising amt. of traffic in HPL. 5-d MOON; SATURN; JUPITER; M 42. VISIT: Hwd. Co. teacher from SSIP class, with 1/2-do. enthusiastic 12 yr. old girls in tow. Lots of kid lookers. \$83.21 (\$22.51/hr.)
- 8 1638)1/22/02(TUE)HPL/AMP.(5:19-8:14PM). V.clear, then passing haze; mild. 9-d MOON(Sunrise on Copernicus...awesome!. SATURN(3-moons; Cassini sometimes v.clear; 166X. Used Hubble photo occasionally.) JUPITER(T-riffic! 3 close on R, Io close on L, w/Io's shadow distinct. Good banding.). VISIT: Barry. \$40.00 + \$5.01 = \$45.01 (\$15.45/hr.)
- 8 1639)1/25/02(FRI)HPL/AMP.(6:55-10:40PM). w/Teresa(for the 1st time she got a parking pass and parked at loading dock). Clear/cold(I had finger stiffness, compounded by my mallet finger splint.). SATURN, 12-d. MOON, JUPITER. Bleak scene at start, but then pretty good traffic. VISIT: The C. fields. \$132.35 (\$35.29/hr.)
- 1640)1/26/02(SAT)HPL/ON PROM. INFRONT OF AMP.(Bolivians in Apr, early). Clear/mild(as miserably cold as I was last night, never wore gloves tonight!). DEW CAP(Left it home! 10:56PM) Panicked, thought about leaving to get it, but went on w/o it, which turned out to be no problem!). HH(High energy, articulate. Went the extra mile w/kids, often!). SATURN, JUPITER(4 on R; GRS went by but was inconspicuous.), 13-d. MOON(good edge craters; lookers wowed by it at 165X). Busy night! VISIT(Gary Bass, once a BFMS dancer). Tonight, I was reminded that telescoping is what I do best in life! \$219.97 (\$47.27/hr.)
- 8 1641)1/27/02(SUN)HPL/AMP(5:47-9:08PM). Clear/mild(again, no gloves!). SATURN; 14-d. MOON (not quite full; some edge craters); JUPITER(4, then 3). V. busy early-on. Quite slow at pack-up time. VISIT: Olaf. \$125.00 + \$4.61 = \$129.61 (\$38.66/hr.)
- 8 1642)1/28/02(MON)HPL/AMP(5:45-8:15PM). Sl. hazy/mild. SATURN; 15-d MOON(full); JUPITER(Io's shadow). HPL SWEEPER(aka "lights man": aggressively parhanded me for money. Am pretty sure he's constantly high on drugs. Finally gave him \$1, prob. a mistake.) Rec. \$20 from a v. enthusiastic looker, a radio preacher, apparently. \$75.38 (\$30.15/hr.) VISIT: One of T's ex. students, who raved about what a good teacher she is!
- 8 1643)2/8/02(FRI)HPL/Amp.(6:20-10:26PM). No. of stroller did not appear effected by Saltlake City Winter Olympics opening ceremonies on TV. SWEEPER(did not see him). NEW OCCULAR(10mm Ultrascopic...prob. a waste of money, as mag. too high for usual seeing conditions. Also, it seems to get smeared easily.) SATURN. JUPITER(3, then 4). Lots of families early eve. \$121.37 (\$29.60/hr.) Mild temp.; no gloves!
- 8 1644)2/9/02(SAT)HPL/AMP.(6:10-9:41PM). Good sky; cold wind(gloves) which occasionally shook scope. Lots of appreciative lookers, inc. one from Alabama who said this was the best thing about her trip here. SATURN(2 moons, Cassini). JUPITER(4 on R). \$114.82 (\$32.68/)
- 9 1645)2/23/02(SAT)HPL/AMP.(6:40-10PM). Semi-mild; hazy sky; sometimes poor seeing. Hassled a bit by "lights man". Seemed very drunk/high. SATURN; JUPITER; MOON. Pretty good traffic. HH(A bit depressed. Listening to self talk. Forced energy level.)\$116.63 (\$35.02/hr.)
- 8 1646)2/24/02(SUN)HPL/AMP.(5:48-8:35PM). Mild; great sky! Good traffic, but slow by quitting time. HH(In a good head; anxiety during afternoon over gen. situation...parking, lights man. No probs. encountered.) JUPITER(Storm...classic oval at 200X; first noticed by looker!). SATURN(2 moons; Cassini. 12-d MOON(fine!). I feel I did a good job, tonight! Lots of families. \$93.29 (\$33.56/hr.)
- 8 1647)3/1/02(FRI)HPL/AMP.(6:25-10:30PM). Good sky; cold wind. Surprisingly good traffic. SATURN(2 moons). JUPITER(GRS on c.l. early eve. Looked for it after prompting by looker.). 17-d. MOON. Lots of families/kids. \$149.53 (\$36.65/hr.)
- 8 1648)3/7/02(THUR)HPL/AMP.(6:32-7:15PM). Ridiculously warm; good crowd, but shut down by clouds. Ugh! JUPITER(intermittently). SIRIUS. Never saw Saturn. \$18.51 (25.71/hr.!)
- 8 1649)3/8/02(FRI)HPL/AMP.(6:30-8:25PM). Steel drum gp. in Amp., so setup near water. Teresa. V.mild, but shut down when increasing haze finished off J's moon. Too bad, as v. busy. JUPITER(4 on L). SATURN(Reduced mag. down to 80 as it faded. Still some lookers skeptical!). \$111.76 (\$61.25/hr.!).

TOTAL THIS PAGE = \$1,411.44

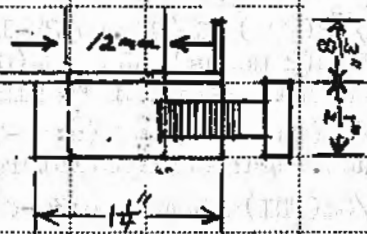
TOTAL THIS YEAR = \$1,411.44

SUPPORT PLATE FOR SOLAR PROJECTION SCREEN

(top view)



(side view)



Notes: screw dia. = 5 mm
plate thick enough to be stiff

Scheme: A tube is inserted through hole. Screw is tightened to lock plate to it.

- 8 1650)3/14/02(THU)HPL/LEDGE(6:15-9:30PM). Good sky at start. Shut down by thickening haze. BATTERY(No juice! Had forgotten to separate connector and rechg!! Started rechg. immediately upon ar. home. I sure hope it will work again!!! Moved scope by hand. Doable, but req.'d alot of extra effort.) JUPITER(4, then 3; good background stars. Great!). SATURN(Lookers impressed.) V. mild eve.; lots of stroller. Lots of enthusiastic lookers! HH(Very energized! doing well what I do best!). \$114.74 (\$35.30/hr.)
- 8 1651)3/15/02(FRI)HPL/LEDGE(6:25-10:00PM). Clouds dissolved at sunset, producing great sky early eve. Shut down by intermittent clouds. Very busy scene. BATTERY(Worked fine, after 18 hr. chg. Whew!). JUPITER(T-riffic, with moons, background stars!). SATURN(Ok. CHARACTERIZED AS "THE RING THING" BY A LOOKER!). Lots of families; lots of no-contribs. HH(Tired, but in good head. Telling myself, that when I'm doing this is the only time I feel really in chg. of my life...especially w/people. Sad but true.) \$160.31 (\$44.78/hr.)
- 8 1652)3/23/02(SAT)HPL/LIP(6:16-10:48PM). Coolish. Clear but sl. unsteady sky. 10-d MOON(Tycho area. JUPITER(3, then 4). SATURN(2 moons). HUBBLE ST(passed beneath Sirius 7:33:50PM. Predicted to be mag. 3.5 but was +/-1.0!) SATURN(Lost at 10:30PM!). Very busy night. Line lasted for several hrs. Lots of families w/kids. \$220.44 (\$48.66/hr.)
- 8 1653)3/28/02(Thu)HPL/LIP(6:27-9:55PM). Teresa. Thickening haze late afternoon, + adverse weather rpt., but went for it, anyway. Intermittent haze but doable sky. Good traffic, incl. lots of girl volley ball players here for convention. JUPITER. SATURN, 15-d MOON. Lots of enthusiastic lookers, families. Adjourned alone to J.Pat's. \$177.36 (\$51.11/hr.) Cold. Hands pretty uncomfortable.
- 8 1654)3/29/02(FRI)HPL/LIP(6:48-8:13PM). Same deal as yesterday. Late afternoon clouds, but I went for it. Turned into one of my roughest stints, ever...v. strangwind gusts, intermittent clouds, lots of little kids. I was miserable, almost ready to cry! As clouds thickened, switch from S. to J. Fortunately, clouds finally ended it. Managed to have lots of lookers, even under such adverse conditions. \$75.55 (\$3.20/hr!)
- 8 1655)3/30/02(SAT)HPL/BIGEN(6:45-7:14PM.). Lost gamble that late afternoon haze would dissolve at sunset. Clouds thickened and had to pack-up. Too bad, as was warm and there were lots of people waiting to look! JUPITER(Thru holes in clouds; maddening!). \$9.00 (\$18.62/hr.)
- 2 1656)4/14/02(SUN)SHERWOOD GDNS.(3:14-4PM). SUNSCOPE. Adequate number of medium size spots. Fair amount of interest. Quit because of increasing haze. SCOPE(1st. time out w/new screen holder produced by Bloomberg shop & financed by Space Grant Consortium. It worked fine. Focus was slipping under weight of screen, but prob. corrected at home by tightening a screw.)HR(I was surprisingly articulate. What's the message here? Why am I having so much trouble with my voice tone & articulation in everyday life?). AURORA PHOTO(The I didn't have one w/me, I immediately saw an opening for selling them, as I mention the aurora in connection w/my sunspot exposition!). No hat.
- 8 1657)4/16/02(TUE)HPL/LIP(7:33-10:40PM). Hi 70's°; humid. Sl. haze; fair seeing. Lots of promenade strollers--almost like mid-summer. 4-d MOON. SATURN. JUPITER. ISS/SHUTTLE (Good flyby observed by a dozen of public.). HH(Good spirits.) \$137.90 (44.24/hr.)
- 21 1658)4/18/02(THUR)BIOTREK TALK(7:00-9:45PM). Attn: Elizabeth D'Alessio(410-343-1487). Hoped to do scope rather than talk/slides, but weather didn't allow. Gave long intro talk, covering backyard astro., and astrophotography, followed by slides. Only four attendees, but they seemed to enjoy presentation and had lots of q's. Handouts included pages from S&T showing pending gathering of 5 planets in eve. sky. By end of talk sky had cleared somewhat, and we did some naked eye & binoc. observing. Hard gig! \$60.00
- 8 1659)4/24/02(WED)HPL/LIP.(7:22-10:53PM). Ex. sky; cool, breezy. HH(Felt terrible driving down, but had nothing else interesting to do tonight. Once set-up, however, I rediscovered what a great service I offer the public and how good I am at it.) V.busy night. Trouble closing down. 12-d. MOON(Tycho area).JUPITER.SATURN(Lost at 9:40PM). ALIGNMENT OF THE 5 NAKED-EYE PLANETS(Lots of inquiries. Gave out 25 observing charts.)\$98.23 (\$27.99/hr.)

TOTAL THIS PAGE = \$1,053.53

TOTAL THIS YEAR = \$2,464.97



Frank's Smoke House

Ambachtelijke Rokerij en Win

Hickory gerookte vis, vlees en gevog

Wittenburgergracht 303 Tel: +31 (0) 20 670 (0)
1018 ZL Amsterdam Fax: +31 (0) 20 471 1
The Netherlands

Frank Heyn
eigenaar

- 8 1660)4/25/02(THUR)HPL/LIP(7:45-10:39PM). Ok sky; mildish. HH(After last night's experience, was unambiguously ready for tonight.) 13-d.MOON(Still craters near Tycho terminator). JUPITER(3, then 4). SATURN. Enthusiastic lookers, but not as much as last night. Closed down w/o interference. Gave out many fewer planets sheets. J.Pat's. \$112.53 (\$38.80/hr.)
- 1661)5/4/02(SAT)OLD GOUCHER COMMUNITY SPRING FAIR(10AM-3:30PM). SUNSCOPE. Good sky, then shut down by clouds. Fair amt. of interest from neighborhood children. Gave out lots of planet mnemonics; also Hubble pictures supplied by Charles Baker. Was a bit surprised by how up on reading and numbers some children were. Adequate spots. \$50.00
- 8 1662)5/15/02(WED)HPL/LIP(7:57-10:24PM). Ok sky; mild. HH(Was v. depressed this afternoon. Even called JHU Geriatric Depression Study to see if it will enroll me. Decided telescoping would be better for me than dancing. Depression lifted once I was in action, and right now I feel alot better than this afternoon. Got to keep remembering that, whatever image I have of it, the public appreciates me as telescope man!). Crescent Moon between V & J. Nice! 3-d.MOON(mostly at 135X). JUPITER(A bit fuzzy. 2, then 3). \$78.98(322
- 7 1663)5/21/02(TUE)HPL/LIP(7:45-10:13PM).Excellent sky; chilly. HH(Again, had to force myself to go but then felt very good while telescoping. Could match lookers enthusiasm!). 9-d.MOON (Tycho, Copernicus). JUPITER(stripes, 1+3; gave out stickers!). \$59.57 (\$24.12/hr.)
- 8 1664)5/22/02(WED)HPL/LIP(7:45-10:40PM).Another ex. sky; chilly. HH(Ready to go, tonight. Felt like routine stint.) 10-d.MOON(Tycho, Jura Mts.). JUPITER(1+2). \$68.18 (\$23.35/hr.)
- 8 1665)5/23/02(THUR)HPL/LIP(7:53-10:45PM). Sl. hazy sky; mild. HH(Ok, articulate, w/energy). 11-d.MOON(Tycho "South Pole" region, at 80X). JUPITER(diminished by haze; 3 on R). More than usual no. of \$5 contribs. \$80.21 (\$27.95/hr.)
- 3 1666)6/1/02(SAT)CHARLES VILLAGE FAIR(1:30-4:30PM). SUNSCOPE. Disappointingly low level of interest. SUN(1-naked-eye gp.; nice passing clouds). \$6.00 (\$2/hr.)
- 8 1667)6/1/02(SAT)HPL/BICEN.(8:10-9:48PM). Good sky; summer. HH(Ready to go. OK.). Teresa was intending to join me, but I invited her to do the Chas. Vil. Fair camp-out. Can't wait to hear how it went for her! VENUS/JUPITER SYZIGY(An eye-catching pairing in the NW. Acq. V quickly, but swung to J asap. J, with 4 moons above. Fine! Only able to hold it till 9:33PM. Too bad, because lots of potential lookers. & Cnc(briefly). VISIT: Vallery Kozimor, WEA Vista worker, with whom I adjourned to J.Pat's, where we had a great time talking and waltzing to the music of The Hedgerows. We waltzed so nicely, apparently, that people complimented us! \$42.51 (\$26.08/hr.)
- 3 1668)6/2/02(SUN)CHAS. VIL. FAIR(2:00-4:40PM). SUNSCOPE. Drew more attention than yesterday. While only 50% contributed, I spent almost the whole time explaining.SUN(Same spots as yesterday, rotated.) \$19.00 (\$7.12/hr.) Often asked if I'm still going to Fell's Pt.
- 6/8/02(SAT) MASON-DIXON STAR PARTY(8:30AM-11PM). Offered cards & photos for sale at morning "swap meet"(sold 16 cds., no photos, but rec. lots of compliments). Entered 4 photos in contest and won a 3rd, 2nd, and 1st prize, for Aurora, J&S in Tau, and H-B. After lunch, set-up 8" in field, polar aligned w/compass, and went for Venus. Took a frustratingly long time to find it--prob. because I neglected to raise polar axis for site lat. Compass gave me an excellent true north bearing. Had a trickle of lookers, as well as aggravating clouds. Kept company by Kevin (tall dancer), whose tent I set-up near. Had an enjoyable time. During eve. I helped a couple with a new 10" Dob learn to find interesting objs. Teresa, J. Sarsgard also there. Left for home around 11PM.
- 7 1669)6/15/02(SAT)HPL-BICEN(8:02-11:37PM). Fine sky. HH(Good mental danergy.) 5-d.MOON(Theophilus-Cyrrillus-Catharina; good!). Lots of enthusiastic lookers. VISIT(Kisha...nextdoor neighbor). \$123.23 (\$34.35/hr.)
- 8 1670)6/17/02(MON)HPL-LIP(7:32-11:10PM). Ex. sky. Lots of strollers; lots of enthusiastic lookers. Mild. 7-d.MOON(good as it gets! 80X). VISITS: Eliasberg(while setting-up); Wendy Shufert. B Sco(once). Sold a Hyakutake 8x12! \$100.11 (\$27.50/hr.)
- V.(Diane Albergia).

TOTAL THIS PAGE = \$ 740.32

TOTAL THIS YEAR = \$3,205.29

- 8 1671)6/20/02(THU)HPL-IIP(8:02-11:23PM). Sl.hazy sky. HH(Not in a happy mood. Whole evening seemed like work.) Pretty busy...challenging. 10-d.MOON(Tycho region, Jura Mts.; 80X, then 135X). B Sco(once, for STSci woman astronomer).VISIT(Valery Kozimor and her friend, Joe.They also visited ScCtr. scope.) Lots of no-contribs. Maybe that's why I I wasn't feeling so happy, tonight. \$98.12 (\$29.26/hr.)
- 8 1672)6/21/02(FRI)HPL-BIGEN(8:13-12:25AM. 1st day of summer! Good sky. Lots of nopays, early long lull mid-eve., but then very busy! 11-d.MOON(Tycho region). HH(Felt out of it driving down, but was energetic at scope. VISITS(Ron, fireman from Halthorpe, who also has 8" SCT. Did B Cyg and B Sco for him.). \$136.44 (\$32.51/hr.) Also Brian Eney & friend.
- 8 1673)6/22/02(SAT)HPL-BIGEN(7:58-11:32PM). OK sky, then thin cloud. HH(Not fully recovered from last night. Needed a break!) Tough night. Many, many small children. Lots of no-pays or \$1/many lookers. 12-d.MOON(Tycho area, but not a good as last night. Lookers seemed to like it ok.) VISIT(Linda Block, w/boyfriend & mother. In from Ashville, where she's street performing w/recorder! Monther unable to see Moon!). Quit early. Just had to escape, tho still lots of people on promenade. \$118.57 (\$33.28/hr.)
- 8 1674)7/5/02(FRI)HPL-BIGEN(8:21-10:40PM). Ok sky. No Moon, no good planets, but I HAD to go! VENUS(Low, sl. gibbous). ANTARES. B Sco. ALBIREO(ok). HH(I did no recruiting of lookers. Consequently, not real busy.) VISIT(Christian, who I didn't remember, but who introduced himself as having looked thru scope some months ago and bought his own scope! Is from Chile and works for Tyco Intl. on cable ship. He met me a J. Pats. Am planning to take him taw. night to Carrs Mill. While at J. Pats., in walked AMANDA, an absolutely gorgeous 20's something, who sat alone at the bar. I asked her to waltz. She accepted and we had two good one's!) HH(I feel absolutely confident in asking any woman to waltz. I wish I had the same confidence, sexually, to ask any woman to jump into bed with me! Sexual self-confidence is the key factor for a man's being a great womanizer!) \$32.45 (\$14.01/hr.) 7/6/02(SAT) Returned to J,Pat's-hoping to see Amanda, but she wasn't there. I'd love to see her face at least once more.
- 8 1675)7/12/02(FRI)HPL-BIGEN(8:00-10:22PM).Hi, thin clds., then ok. HH(Felt bored and sleepy all day, but came to life in Hpl., telling me that my daily routine doesn't meet my need. ALIGNMENT(Perfecto! Acq. both a Boo and Venus on first try!). SCOPE: Collimated on a thru clouds! a BOO(briefly). VENUS(Used illust. to explain.). 2-d MOON(Nice. Held till 9:30PM). ALBIREO(After loosing Moon, Venus. People liked, but I didn't recruit lookers.) VISIT: 2 of Rebecca Bruce's Bulkan stds. \$58.51 (\$24.72/hr.)
- 8 1676)7/15/02(MON)HPL-LEDGE(7:42-11:17PM). Sl. hazy; hot. FEET(This has been coming on for a while, but the bottoms of both feet hurt more and more as I stand. Will try thicker socks.) 5-d MOON(Good craters!). a BOO(Several times by req.). ALBIREO(After lost Moon, briefly.). Very busy night. Line, several times. VISITS(Stephen L.; Jay). \$113.13 (\$31.60/hr.)
- 8 1677)7/16/02(TUE)HPL-LEDGE(7:42-11:10PM). Good sky; hot. FEET(Improvement. Put inserts in shoes, wore thicker socks, took stool.). VISITS: A Middle Eastern family from Dallas, whose teenage son told me he was turned on to astronomy when he saw Jupiter thru my scope 4 yrs. ago! He is seriously into it and went to space camp this summer. Valerie K. and Joe.). 6-d.MOON (Great!). VENUS(1X). ALBIREO(1X). Sometimes did Moon at 200X. \$111.06 (\$32.01/hr.)
- 8 1678)7/17/02(WED)HPL-LEDGE(7:40-11:05). Good sky, then thin haze. FEET(Really hurt. Will visit Dr. Kleiman.). 7-d.MOON(Craters, + Apennine Mts.). Slow start. VISIT: Elaine Breslow & husband. Good Irish music in Amphi.! \$92.82 (\$27.22/hr.)
- 8 1679)7/20/02(SAT)HPL-BIGEN.(8:04-10:57). Late start due to parking crunch and having to wait till break dancers vacated space. Clear, sl. hazy, then zhut down by clouds. Huge number of strollers on promenade, 10-d.MOON(Tycho region; alternately 80X, 136X. ## ANNIVERSARY OF 1ST MOON LANDING!). ALBIREO(1X). FEET(Saw Dr. Kleiman, Thurs. No prob., tonight.\$90.79(\$31.5
- 3 1680)8/9/02(FRI)HPL-BIGEN.(7:38-10:38PM). Early hi clds., then good sky. HH(Felt tired & depressed, afternoon, and driving down, but being out picked me up.).Roudies(3 gps. of shoving, hopped-up young men. Unpleasant.). DEW CAP(1st time w/new one which Edith Cutler helped me construct.). VENUS(Couldn't find till vis. by eye. Why? Med. size 1/2 moon. V. low. Lost 9:28PM.). VEGA(By day, 1st try, but trouble a little later.). ALBIREO(After V.). VISIT (Michael Laupheimer. Looked good, but rotund.). \$45.54 (\$15.18/hr.)

TOTAL THIS PAGE = \$ 897.43

TOTAL THIS YEAR = \$4,102.72

- 8 1681) 8/13/02 (TUE) HPL/EDGE (7:44-10:20PM). V. hot, sticky. Sl. hazy but ok sky. HH (In excellent shape, v. articulate. This IS what I do best in life!). VENUS (+/- "1/2-moon"; till sky dark enough for Moon.) 5-d. MOON (Good!). ALBIREO (Briefly at end.). JERRY ROWAN (Performing in Amphi. Gave me several good plugs, which gave me a brief rush after end of his act.) ISS (Hi, bright flyover. Had lots of excited viewers!) \$73.03 (5/
- 8 1682) 9/12/02 (Thu) HPL/EDGE (6:55-9:36PM). Great sky; mild. Pretty good number of strollers. 6-d. MOON (impressive craters; in SCO; low, would have lost by 9:46PM). ALBIREO (1X) VENUS (Forgot about till almost too late; nice crescent). VISIT (Shawn, juggler, who was performing in Ampitheatre). Lots of nopays. FORGOT DEW CAP! \$47.51 (\$17.73/hr.)
- 8 1683) 9/13/02 (FRI) HPL/EDGE (7:14-10:10PM). Assigned to Bicen. Checked out Edge and found Shawn performing, so set-up. Shawn later replaced by music, which I don't think noticed me. Accompanied by Edith, who showed little interest in my act. 7-d. MOON (Clear, than a bit hazy.) Did not want Bicen due to Moon's low dec. HH in good form! \$72.36 (\$24.61/hr.)
- 2 1684) 9/14/02 (SAT) FARMERS MKT. (9:10-11:45PM). SUNSCOPE: Naked-eye spot. Late start due to haze. Had 1 1/2 hrs. clear viewing, then haze, then clouds. Occasional interest. Enjoyed meeting lots of friends and admirers. Gave out mnemonics, literature. Hat in inconspicuous place. Did not solicit at all. \$4.00
- 8 1685) 9/17/02 (TUE) HPL/W.EDGE (7:00-9:50PM). Slightly to moderately hazy sky. 11-d. MOON (Tycho area at 80X; when haze thickened, NW edge at 135X). ALBIREO (1X). Lgt. Traf. \$51.54 (\$18.19/)
- 8 1686) 9/18/02 (WED) HPL/W.EDGE (7:06-9:21PM). Good sky, then shut down by increasing haze. 12-d. MOON (Used Moon filter for a while, then went to 135X. Tycho & Plato regions. Fairly slow scene. VISIT: Paul Siger, a friend of Eve. \$49.71 (\$22.09/hr.)
- 10 1687) 9/26/02 (THU) TOWSON UNIV. RE: ANNE R. COLGAN 410-323-6795 (11AM-NOON). A talk to 25 foreign stds. taking English immersion course. Defined astronomy as science. Asked q.'s; answered q.'s. Planets mnemonic; why stars twinkle. Handouts (resources, star map, astrophoto, credo). Had camera on tripod; explained. Slides. Accompanied by Edith. Showed slides beyond quitting time till next class arrived. \$100.00 (Paid)
- 8 1687) 10/18/02 (FRI) HPL/W.LIP (6:35-10:35PM). Good sky; coolish. ISS (Supposed to appear in N. 18:49:53. I had a doz. people looking, and none of us saw it. Why? Was very disconcerting to me!). HH (Did not sit down. Hips aching sl. toward end.). 12-d. MOON (Terminator at 135X; lookers liked it.). SERIAL SNIPER! (No signs that SS, who has been terrorizing DC area for last 2 wks., has reduced traffic in HPL.). \$99.09 (\$24.77/hr.)
- 8 1688) 11/02/02 (SAT) HPL/BICEN. (8:26-11:03PM). Clear; coldish. With Teresa. (She landed a \$50 contrib. (!), which we split.) SATURN'S BACK! (Acq. 8:36PM. Mushy at 80X for 1st hr., then gradual improvement. Eventually good at 135X. 4-moons. Enthusiastic lookers, even w/mushy 80X image!) HH (In v.g. head; energitic!). Promenade often looked empty, but we had fairly steady traffic. \$64.12 (\$24.47/hr.) *1st ever!
- 8 1689) 11/08/02 (FRI) HPL/BICEN. (8:00-11:35PM). Mild; good sky. SATURN (8:10PM; decent image from start; 135X after 1/2-hr.; 2-moons). JUPITER (Spotted rising, 11:40PM). Many enthusiastic lookers, tho v. slow for 1st 1/2-hr. VISITS (Valerie K & Spring; family from AL who found me 3 yrs. ago and were hoping they would again, which they did! David & Evelyn, dancers, who arrived by seiboat.). Eve of Navy-N.D. game, but no noticeable spike from it. BORN AGAIN! (Started to set-up show next to me. I told them it was my spot, that they needed permission and ran them off!). \$88.00 (\$24.58/hr.) VISIT: PAUL
- 8 1690) 11/14/02 (THU) HPL/AMPL. (5:20-7:31PM). Mild; shut down clouds. 10-d. MOON (Tycho). JANE KOEGEL! (A 30-something lawyer from SF here on an asbestos case. Looked at Moon, said she wanted to go to Fpt. for crabs. Frankie suggested Crabby Dick's. She took water taxi to Fpt. After closing up, I drove to Crabby Dick's and reintroduced myself. She invited me to share her crabs and bought me some beer, besides. After crabs we stopped a Bertha's for a bumper sticker, and went to Cat's Eye, where I bought us Becks beer. From there to J.Pata. She was very cool and really interested in Balto. After 1/2-hr. at J.P.'s, drove her to Windham. HAT A NEAT WAY TO START MY 16TH YEAR!) \$18.00 (\$8.22/hr.)

TOTAL THIS PAGE = \$ 667.36

TOTAL THIS YEAR = \$4,770.08

- 43 1691) 11/18/02 (MON) OREGON RIDGE NATURE CTR.; contact Katherine Patterson, 410-887-1815(w), 410-329-3032(h). (7:30-11:30PM). It was to be my std. intro. to astro. talk. Then, 2-wks. before date, kp e-Mailed saying she saw an Astronomy Magazine art. at her mother's house in Fla. about a meteor shower and asking if I'd include something about it in my talk. I'd been completely blindsided by the Leonids! Immediately, I launched into intense preparation. KP said attendees who wanted could come to her farm 4-miles north to see the meteors. On Sunday, 11/17, Frank Roylance had a prominent Leonids art. in the SUN, which announced my talk. Consequently, there was a big turnout, an attendance of 147 by KP's count! (I forgot to ask how many were there from the Sun article, but I'm pretty sure it was at least 50%) Following talk was a telescope look-see at Saturn, 4.5" reflector provided by Jerry Feldman of HAL, who came to Oregon Ridge simply because it was closer to home than HAL's Carrs Mill site. (Since he saved me the need to set-up my scope, I gave him +/- 8 comet cds. Also, sold 1 aurora 8x12 to attendee.) At 11:30PM, +/- 18 of us drove 4-mi. north to near KP's farm on Western Run Rd. We parked on roadside, hoping to see something of the first of the two Leonid peaks. Disappointingly, partly due to bright Moon + haze, in an hour we saw only 3. At 12:03AM, an hour after the peak, I suggested we disband, suggesting people try again on their own for the 5:36AM peak. To say the least, it was a demanding night! VISITS (Ted Chernak & grandson; Steve & Angie McDaniel). \$100.00
- 8 1692) 12/7/02 (SAT) HPL-PROMENADE, 250' S. OF AMPHI. (8:00-10:38PM). Cold, w/snow around, but not tough on hands; clear, with brief periods of poor seeing. HH (1st stint since premature atrial contractions diagnosed on 11/20 by Dr. D. Was afraid of a problem, but everything was fine. Had good energy & mood. Hardly felt it, which would not have been the case had I stayed home obsessing about it.) Sometimes a bleak scene, but I had steady stream of lookers. SATURN (3-moons; fine.). JUPITER! (Acq. +/- 10PM). VISITS: Debbie Eng's daughter, Jennifer, husband, daughter. \$68.11 (\$25.86/hr.)
- 56 1693) 12/13/02 (FRI) CUB SCOUTS, ST. JAMES, MONKTON; REF: BRIAN FLOWERS 410-472-2196, WHO HEARD MY TALK AT OR RDG; One of my worst astro experiences! Long drive thru v. heavy rain. Got lost on back roads. Was angry w/self for agreeing to talk. Talk in big gym. Lots of young kids, some parents. Talked, then slides. HH (Was worried over pulse problem, that I wd overtax myself. Got sl. dizzy early in talk and had to hold on to lecturn. Recovered on, and felt strong till end.) Flowers xeroxed 3 handouts for me, plus I gave away back issues of ASTRONOMY, Orion cats., etc. \$75.00
- 8 1694) 12/21/02 (SAT) HPL-W. END LIP (7:05-10:40PM). Clear (sl. mushy seeing), bare hands temp. Joined by Teresa. Busy from 1st moment! SATURN. 16-d. MOON (Acq. early, passed behind WTC, reacq. 2-hrs. later). JUPITER (Acq. 10:10PM). Enthusiastic lookers. Sufficiently busy for T and I to do Sat. simultaneously. When Moon returned, we split objs. \$175.56 (\$48.94/hr.)
- 8 1695) 12/26/02 (WED) HPL-W. LIP (7:07-9:07PM). Coldish (fingerless glove temp.); (clear, good seeing). HH (Depressed all day. Forced myself to go. As always, once my 1st lookers came along, I became upbeat, energized. This activity is v.g. therapy for me!) SATURN. HPL (Ok scene at start then slower & slower.) Adjourned to J. Pat's. \$58.52 (\$29.26/hr.)
- 8 1696) 12/29/02 (SUN) HPL-W. LIP (6:45-8:56PM). Clear, cool (gloves). Accompanied by Edith. We attended a party at Paul Sweetman's, then had a baked potato supper at HPL. Steady traffic. KIDS (A group of 3 grabbed my hat and tried to run off with it. Since it is screwed down, they failed. Hat was damaged irreparably. A disconcerting event. Two lookers shooed them away and picked up some scattered bills. SATURN. VISIT (1st lookers were a family who attended my Oregon Ridge talk, which they said they enjoyed alot. Also, a young man who said he is Jack Horkheimer's nephew.) \$78.30 (\$35.92/hr.)

131 TOTAL THIS PAGE \$ 555.49

TOTAL THIS YEAR = \$5,325.57

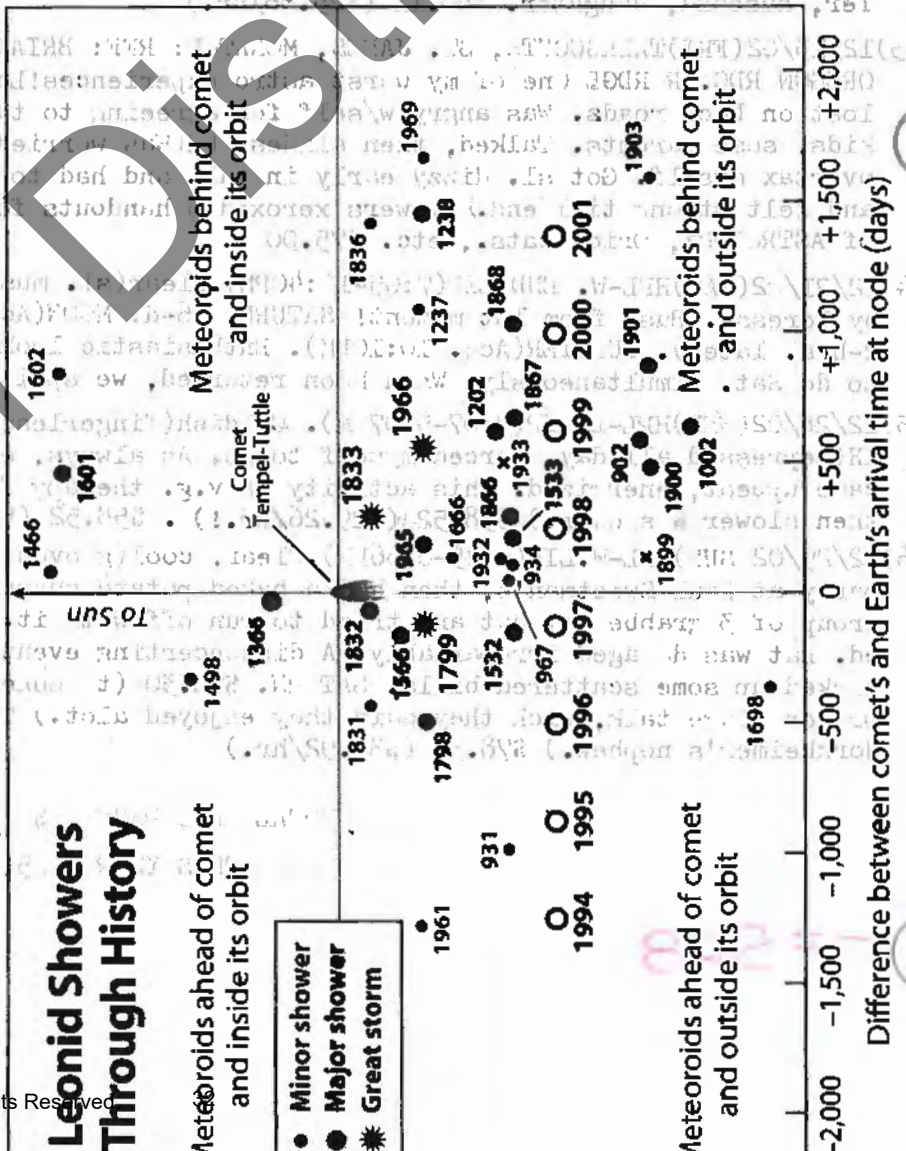
Yr = 528

ISO modeled the Leonid stream. They investigated on the assumption that most of the meteors observed in 1965-66 were reflected from the comet at one of its nodes. Like Brown and Jones, Wu and Williams were to have their model account for the nonstorm years of 1993 and the display of 1966. Yet their findings for quite different from Brown and Jones's. In 1998 a display perhaps similar to that of 1899 (only 40 per hour) and Williams conclude "few will be seen." Contrast between these two studies buttresses the David Meisel, executive director of the American

because they leave us puzzled at a lower speed than other Leonid showers. They are much less affected particularly because they are much less affected by the solar radiation pressure that quickly sweeps away smaller dust particles. If this trend holds, we should get a high proportion of bright meteors in 1998 but not in 1999 or 2000. There's another possible unknown to ponder. The records from 1900 and 1901 are strange. Both years seem to have produced very different showers over places not far apart on Earth. In 1900 a Leonid storm was said to create "a panic" among people near Hudson Bay in Canada, yet nothing noteworthy was reported from most other locations. In 1901 the estimated hourly rates ranged widely, from dozens to hundreds or thousands, with the highest counts clustered over the American Southwest and adjacent parts of Mexico.

Conventional wisdom holds that meteoroid streams contain no significant

Where meteoroids have been thickest around Comet 55P/Tempel-Tuttle, as revealed by Earth getting a meteor shower on passing through the comet's orbital plane (the plane of the paper) in various years. The "dud years" 1899 and 1933 are also plotted. The horizontal scale gives the number of days by which meteoroids run ahead of the parent comet (-) or lag behind it (+) in orbit. The vertical axis is the distance in astronomical units that the particles are outside the comet's orbit (-) or inside it (+). In 1998, 1999, and 2000 our passes through the orbital plane will probe a promising area. Most data courtesy Donald Yeomans.



STREET CORNER TELESCOPE EXPS. -- 2002

| | |
|--|----------|
| 11/14/02 SP Frankie, Hpl. | \$ 3.00 |
| 11/18/02 POST S&T to Helen Glazer | \$ 1.42 |
| 11/18/02 SP 2-sides for tonights talk (Kinkos) | \$ 0.16 |
| 11/18/02 SP 25-sides mats for tonight's talk (JUV) | \$ 1.50 |
| 11/18/02 SP purchase comet cds. for Jerry Feldman, telescopist. (SC) 8ea. | \$ 4.80 |
| 11/25/02 SUBS renew AGU membership/subscriptions | \$ 20.00 |
| 12/1/02 SP 14-sides 12/02 star map @ \$0.06/ea. (JHU) | \$ 0.84 |
| 12/9/02 SP 12-sides star map @ \$0.06/ea. (JHU) | \$ 0.72 |
| 12/10/02 POST mail original handouts to Brian Flowers for talk | \$ 0.74 |
| 12/10/02 SP 4-copy handout for talk (Kinkos) | \$ 0.32 |
| 12/10/02 SP 3-sides Geminid info for talk (JHU) | \$ 0.18 |
| 12/05/02 BOOKS Observer's Handbook 2003 (Sky Pub.) | \$ 27.45 |
| 12/21/02 SP Frankie in HPL | \$ 5.00 |
| 12/22/02 SP 21-sides DEC. starmap (JHU) | \$ 1.26 |
| 12/23/02 SP 1-color cpy. CIRCUMPOLAR photo for Teresa (Kinko's) | \$ 1.05 |
| 12/23/02 SP 1-11"x14" frame for Teresa's photo (Techlab) | \$ 7.88 |
| 12/24/02 SP 1-color ppy CIRCUMPOLAR 112% for Teresa (Kinkos) | \$ 1.05 |
| 12/24/02 TEL bill of 12/18/02 | \$ 0.28 |
| 12/29/02 POST mail reqs. to Hpl. Feb. | \$ 0.37 |
| 12/30/02 Int'l Dark-Sky Assoc. membership (ck#652) SUBS. | \$ 30.00 |
| 12/30/02 Astronomical League indv. membership (ck#653) SUBS. | \$ 25.00 |
| 12/30/02 POST stamps to mail above checks | \$ 0.74 |
| 12/31/02 STA 1-typewriter ribbon (Staples) | \$ 3.45 |
| 12/31/02 SP 2-sides Jan. '03 star map (JHU) | \$ 0.12 |
| 12/31/02 SP 25 Comet Holiday cds. given away in Hpl. to lockers (HH photo) | \$ 15.00 |

PAGE TOTAL \$152.33

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|------|---------|--------|--------|--------|---------|--------|---------|----------|
| PAGE | SP | EQUIP. | POST | TEL | SUBS | STA | BOOKS | PAGE 3 |
| | \$42.88 | --- | \$3.27 | \$0.28 | \$75.00 | \$3.45 | \$27.45 | \$152.33 |

| | | | | | | | |
|----------|---------|--------|--------|----------|---------|---------|----------|
| SP | EQUIP. | POST | TEL | SUBS | STA | BOOKS | YEAR |
| \$220.38 | \$87.95 | \$8.08 | \$1.47 | \$105.00 | \$20.49 | \$27.45 | \$470.82 |

528 miles x \$0.365 = \$192.72

2003

Not for Distribution

- 8 1697) 1/9/03 (THU) HPL-W.EDGE (5:30-8:27PM). Cool. Blue sky all day; intermittent haze/clouds early eve. SS = 4:58PM. 5-d. MOON. SATURN. Good traffic early eve. \$98.33 (\$33.34/hr.)
- 8 1698) 1/11/03 (SAT) HPL-W.EDGE (5:17-8:22PM) V. cold, but people out. HH (Despite worry over irreg. heartbeat, I felt great and had good energy. Adjourned to contra dance, where I still felt good. Excellent stamina!) 7-d. MOON (Eratosthenes, with SR just beginning on Cope when I left.) SATURN (v.g. image). \$103.15 (\$33.41/hr.)
- 8 1699) 2/8/03 (SAT) HPL-W.Edge (5:27-8:50PM). Cold (ice formed in water bottle). Clear. Lots of strollers. VISITS (daughter Eve & grandson Aren!). 7-d. MOON. SATURN. JUPITER (4 on one side). HH (Despite prior displeasure, once in action I felt great!) \$115.51 (\$34.17/hr.)
- 8 1700) 2/9/03 (SUN) HPL-W.Edge (5:10-7:10PM) Adverse w. rpt but good late PM sky. Quit due to slow traffic + increasing haze.) 8-d. MOON (1st qt.). SATURN (Prob. finding in twl. due to poor alignmt.) JUPITER. HH (Again in fine fettle!). \$55.89 (\$27.95/hr.)
- 8 1701) 3/9/03 (SUN) HPL-W.Edge (5:40-7:55PM). Kept away by weather for month. Mild afternoon, but cold, windy evening. Yet, a good number of strollers. Clear but poor seeing. 6-MOON (w/ polarizer at first). JUPITER (3+1; nice!). SATURN (inferior image). HH (Reluctant to go but energized by the people.) VISIT (Barry). \$64.48 (\$28.66/hr.)
- 8 1702) 3/14/03 (FRI) HPL-W.Edge (6:30-10:02PM). Clear; cold (early wind, then breeze; 32°). Despite cold, lots of people out! JUPITER (2+2; great!). 11-d MOON (Just 2X). SATURN (Good!). HH (Reluctant to go but energized, once there!). \$135.00 + \$4.72 = \$139.72 (\$39.58/hr.)
- 8 1703) 3/24/03 (MON) HPL-WE (6:30-9:12PM). Mild, clear (good seeing). JUPITER (2+2 close!). SATURN. Pretty good traffic. \$69.95 (\$24.43/hr.)
- 8 1704) 3/25/03 (TUE) HPL-WE (6:20-9:56PM). Mild, clear. Lull mid-eve., otherwise pretty busy. JUPITER (1+3, im-ressive!). SATURN (Used 18mm Or. Looker reaction indicated it worked ok, but I had to clean off smears twice. Used 220X ones. Worked well, so I should be less afraid of it!). VISITS: (Lots of teachers, here for convention. A woman amateur from Mass., who was very excited by my work.) HH (In fine fiddle. Rec. a few positive responses to my peace buttons.) \$105.00 + \$9.74 = \$114.74 (\$31.87/hr.)
- 8 1705) 3/27/03 (THU) HPL-WE (6:29-10:16PM). Chilly, Adverse weather rpt. + increasing olds. at ; rapid clearing after SS. JUPITER. SATURN. Busy early, then a lull, then extremely busy! Lots of enthusiastic lookers, some from teachers' convention. VISITS (the Cotters; Amanda, student of Teresa.). \$117.31 (\$30.95/hr.) HH (Late eve. began feeling down.)
- 8 1706) 4/2/03 (WED) HPL-WE (6:25-10:36PM). Mild; good sky. JUPITER (4, then 2). SATURN. Pretty busy night. HH (Feeling like it's a job; voice weak...need megaphone?) \$133.14 (\$31.85/)
- 8 1707) 4/3/03 (THU) HPL-WE (6:24-8:50PM). Falltemp. & cold wind caused me to close down early. JUPITER. SATURN. Ok traffic, but lots of no-pays. Adjourned to J.Pat's. \$61.42 (\$25.24/)
- 8 1708) 4/12/03 (SAT) HPL-EE (7:37-11:45PM). After attending anti-Iraq war demo in DC w/Edith. Mild & clear. 11-d. MOON. JUPITER. SATURN. Hpl. extremely crowded. Had lots of lookers at start, many of whom were no-pays. HH (in good form). \$179.68 (\$43.51/hr.)
- 8 1709) 4/13/03 (SUN) HPL-E. Ledge (7:21-10:09PM). Coolish, clear. SCOPE (Collimated at end of eve., which noticeably improved images.) 12-d. MOON (Tycho region). JUPITER (3+1). SATURN. Lots of very happy lookers! Hpl. v. crowded at start, but semi-empty by 9:30PM). \$102.41 (\$36.58/hr.)
- 8 1710) 4/14/03 (MON) HPL-EL (7:25-9:37PM). AMBIENCE (8-10 inner-city youth wilding in Amphitheater. Considered not setting up, but did, with trepidation. They continued most of evening, which was unnerving, but they never came my way. Could have stayed longer, but between cold wind and youths, packed-up.) JUPITER. SATURN. 13-d. MOON. Enthusiastic lookers. Maybe some of their enthusiasm comes from my own. \$63.17 (\$28.71/hr.)

112
TOTAL THIS PAGE = \$1,414.90

TOTAL THIS YEAR = \$1,414.90

- 8 1711)4/15/03(TUE)HPL-(7:20-10:12PM). Warmish; hi thin cloud cover. JUPITER(Started w/polarizer, which showed Ganymede.) 14-d MOON(Not quite full. Craters on Tycho edge. Was rising thru ship ropes.) SATURN(Diminished by haze. Titan barely vis.). VISIT(Valerie & Joe who, when I complained about hunger shakiness, bought me a pizza.). HH(4th night in a row. Was a bit tough keeping up energy level.). \$97.26 (\$33.89/hr.)
- 8 1712)4/19/03(SAT)HPL-EL(7:40-10:30PM). Good sky. Mild but cold wind 10PM. JUPITER(3 + shadow, then 4). SATURN. HH(Highly energized!). \$124.00 + \$6.44 = \$130.44 (\$46.04/hr.)
- 8 1713)4/27/03(SUN)HPL-EL(7:45-9:55PM). Mild, ok sky. HH(Ret. mid. afternoon from week-end w/ Edith WNC for swim team 50th anniversary, at which I had a better-than-expected experience. Late afternoon at home had chills + 100.4° temp. Decided to telescope in hopes it would be good medicine, which it was. I had ok energy and back home temp. was 97.5°) Jupiter & Saturn. Fairly busy but lots of no or low contribs. \$64.92 (\$29.92/hr.)
- 8 1714)4/28/03(MON)HPL-EL(7:40-9:40PM). Relatively quiet scene. HH(Not feeling 100% well. Low energy. Gave out stickers but few mnemonics.) JUPITER(Great w/polarizer 10-mins before ss. 3, then 4 on left.). SATURN(3-4 stars in field.). \$42.07 (\$21.04/). Lots no-pays!
- 8 1715)4/29/03(TUE)HPL-EL(8:25-10:25PM...delayed start due to phone call from Nydia asking me to come to Old York & Willow, where she'd just had an auto accident. She was shock-up but physically ok.) Mild; good sky. Accompanied by Edith, who payed no attention to my act. Irish musicians performing in Amphi. SATURN(Followed it all the way down.) JUPITER 3, then 4). Quiet scene, with knots of attention. \$50.45 (\$25.23/hr.)
- 8 1716)5/14/03(WED)HPL-EL(8:07-10:14PM). Accompanied by Edith. Clear, then somewhat hazy. 18mm Ortho(Great view, but smears easily.). JUPITER(2+2+shadow; great during twl.). SATURN (Lost 9:27PM). 13-d. MOON(Acq. early; Decent edge features.). Fairly busy but lots of no-pays. Some threatening young kids for a few minutes. \$48.00 (\$22.72/hr.)
- 8 1717)5/19/03(MON)HPL-EL(7:55-10:51PM). Mild; good sky. Near perfect alignment. JUPITER(15-min. before sunset). SATURN(Great, but briefly.). Y Leo(once, for amateur astronomer). Pretty busy, thanks to a physicists' meeting. SCOPE(Collimated, mid-eve.). \$86.40 (\$29.49/hr.)
- 8 1718)6/2/03(MON)HPL-EL(8:27-9:54PM). Mild. Haze thinned at sunset but returned later, putting me out of business. Too bad, because there were lots of people around who are in for an electro-optics conven. and who were finding me interesting! JUPITER(3+1). 3-d MOON (nice, till haze fuzzed it). VISIT(Frank Roylance, at a moment when I was drawing an incredible amount of attention, mostly no-pays!). \$28.37 (\$19.57/). HH(good head!).
- 8 1719)6/05/03(THU)HPL-EL(8:05-9:02PM). 50% clouds at SS, but instead of "dissipating" at ss (as predicted by TV weather), they thickened, causing me to shut down. Too bad. It would have been a busy night! 6-d. MOON(good!). JUPITER(Unable to see moons before clouds covered it.) VISIT: Lib. Singles "Mark" w/friend. \$15.96 (\$16.75/hr.)
- 8 1720)6/06/03(FRI)HPL-EL(7:55-11:19PM). Clear late afternoon. Increasing high haze at set-up time, then clear to sl. hazy. Shut down by haze. HH(Hi-energy enthusiasm!) 7-d. MOON (impressive) JUPITER (3+1). HPL(Lots of strollers; many enthusiastic lookers!) \$121.64 (\$35.88/hr.)
- 8 1721)6/09/03(MON)HPL-EL(7:55-10:40PM). HH(Somewhat depressed; not with it. Talking an effort.) Intermittent puffy clouds. 10-d. MOON(Tycho; sunrise on Jura Mts.). JUPITER(2+2). Steady traffic. Several large families, generating confusion. \$82.74 (\$30.12/hr.)
- 8 1722)6/23/03(MON)HPL-EL(8:14-10:49PM). Warm; clear. HH(Good energy, despite being very depressed and feeling sorry for myself late afternoon.) ARCTURUS + SCOPE(2nd try, only to find collimation way off. Got 90% col. on Arc.) JUPITER(3+1; lost 10:02PM) B SCO + a SCO. Pretty busy evening. VISITS(Amateur Steve w/wife Laurie on 1st wed anniv.; Barry; neighbor Janet, who rode home w/me) \$66.60 (\$25.74/hr.) SUBARU OUTBACK(1st stint w/wagon pur. Sat. Had to lift a bit higher than with Honda (my perfect car, which was rusting away dangerously) but everything fit ok.) Finished collimation on a SCO.

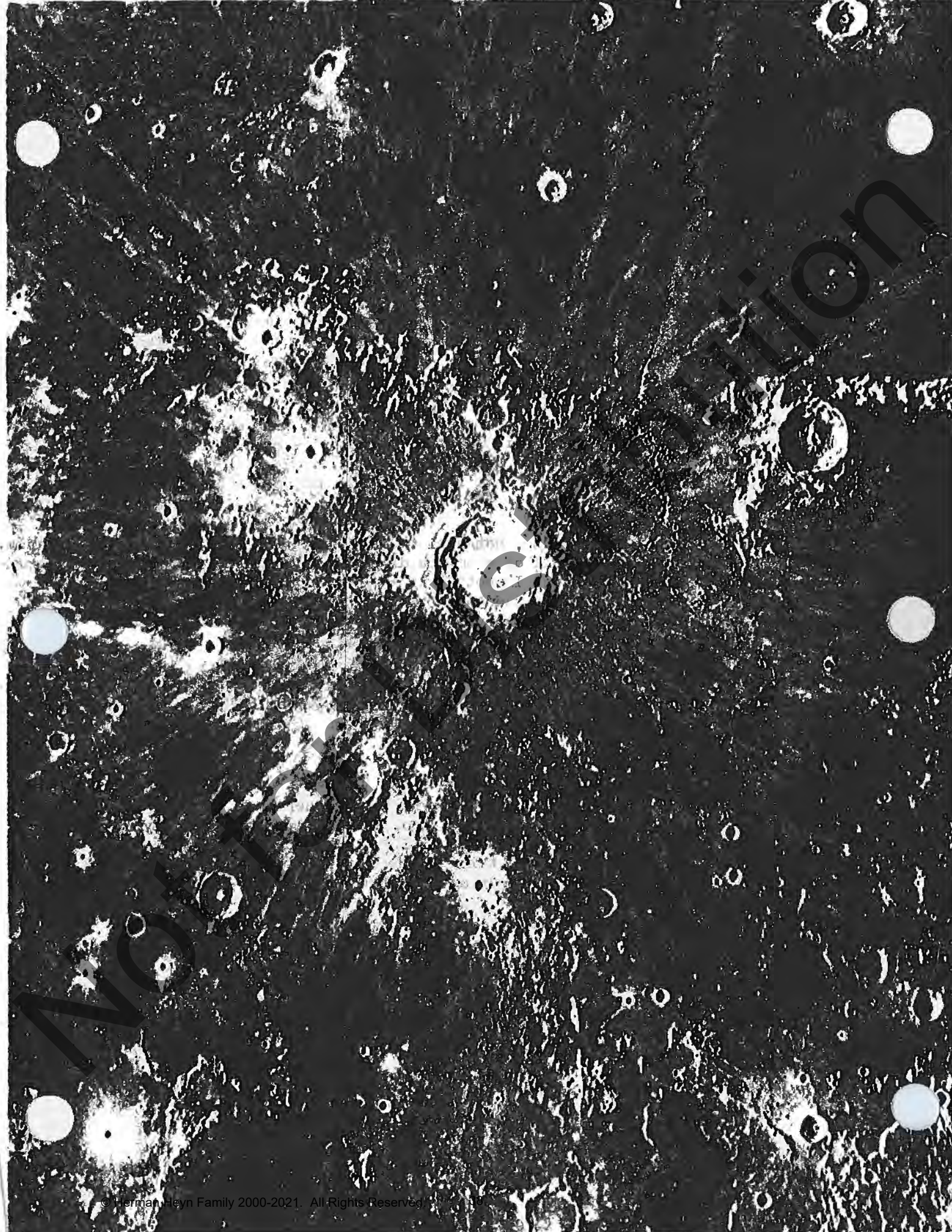
TOTAL THIS PAGE = \$ 834.85

TOTAL THIS YEAR = \$2,249.75

- 8 1723)6/24/03(TUE)HPL-EL(8:12-10:25PM). Clear; muggy. ALIGNMENT(In 15 min.s of looking, couldn't find Arcturus, yet Jupiter was right on the mark! Why? PARKING(Valet parking guy keeps saying only 1 performer at a time, forcing me to park on Light St., loading dock, a long walk.) JUPITER(3). ANTARES(briefly). HH(This is hard, hot work!) \$44.75 (\$20.18/hr.) Gave out I SAW...JUPITER FELL'S POINT stickers.
- 8 1724)6/26/03(THU)HPL-EL(8:12-9:38PM). HH(Although there was a Nader/Kuchinich talk tonight at JHU for which I'd bought a tkt., decided best thing for my mental state was to go telescoping. As usual, felt ok there, tho seeing conds. were pretty discouraging.) ALIGNMENT(Wasted 1/2 looking for a Boo and Jupiter. Found latter after rotating tripod radically eastward!) JUPITER(2+2, but lousy image due to heat and pollution. Am sure tonight was the finale of my Jupiter season!) CROWD(Due to lousy image, I did not recruit. Scattered lookers, except that when I was ready to leave it got busy!) VISIT(Alan Umoto & family.) \$12.00 (\$8.37/hr.)
- 8 1725)7/08/03(TUE)HPL-EL(8-10:30PM). Hot, sticky! Good sky early, then high haze, which eventually shut me down. 9-d. MOON(1st stint w/this lunation because Frank & fam. in town; plus last night's supper with Isabel.Tycho, Copernicus) Pretty good traffic.\$67.32(\$26.93/
- 9 1726)7/25/03(FRI)HPL-EL(8:27-11:10PM). Hot but tolerable. Good sky. No Moon nor planets, so did stars. ARCTURUS(2nd try). ANTARES(briefly). ALBIRO(My main feature. Lookers felt ok about it...seemed satisfied. However, requires alot of talking!). DARRYL MASON(At HPL heard that DM was in EPT. and intending to do Mars. Went there after HPL stint. When I could get it in focus using his pushbutton system, Mars looked great...polar cap + albedo regions. He drew alot of attention but didn't seem to be collecting many contribs. Needs a sign on his collections bucket. Mars just clearing Rec. Pier as I arrived. \$56.05 (\$20.61/hr.) VISITS: Myra, Peter & Paulina; Henry & Dot Szymanski; Dorothy(massagist).
- 20 1727)8/21/03(THU)HPL-WL(10-11:43PM). Hazy, hot/humid. MARS! (1st time in public this apparition. It worked well with the public, all of whom could see the S. polar cap. Most lookers appreciated the opportunity to see Mars. I spotted it by eye at 9:35PM and set-up when it began brightening. S. polar cap + vague shaded area viz.) HH(Good therapy!) \$62.16 (\$32.20/hr.) *(incl. two trips to Baumgarten for "Mars Party" rubber stamp)
- 8 1728)8/23/03(SAT)HPL-WL(9:15-12:51AM...latest stint ever. Prob. should quit +/-midnight, but late crowd feels a little more threatening.) Clear; warmish. Terrible seeing, unfortunately! MARS(Rose over ship, 9PM. Acq. 9:15PM. Basically, only snow cap visible. People seemed satisfied with that, but I was sorely disappointed with image.) VISITS: Ellen Hochman with neighbor, Lisa. They were great help for a while, EH picking-up money and using folder to block light.) Line of 20-25 people for +/-3 solid hours! \$169.35 (\$47.04/hr.) Promenade as crowded as I've ever seen it. My voice had to compete with a very loud band. HH(High energy; strong voice.). Despite the good "hat" IMHO Mars sucks!
- 8 1729)8/24/03(SUN)HPL-WL(8:55-11:06PM). Coolish, clear, but another night of poor seeing. Teresa said seeing Sat. night at Carrs Mill was bad, too, confirming but not mollifying my feeling of disappointment. MARS(Acq. 8:55PM. Was ok briefly, then fuzzied-up. I showed everybody my Hubble photo, telling them the only thing we can really see is the polar cap. Tho it took alot of effort, just about everybody saw it. Had a line of 15-20 for 2hrs.!). \$115.76 (\$3.10/hr.)
- 8 1730)8/25/03(MON)HPL-WL(8:40-11:10PM). Muggy, clear. Better seeing than 2 prev. eves. HPL looked a bit empty when I arrived. At Mararise, however, had a good crowd around me watching (as has happened on prev. nights. MARS(Sl. better image than prev. eves. I feel I am using my Hubble Mars photo to great advantage. Explaining Mars using it really help lookers to know what to look for. Had a steady line for 1st hour or so.). HH(Feeling a bit worn down by back-to-back stints, but my performance energy level remains good!).\$111.33(\$44.53/hr!)

TOTAL THIS PAGE = \$ 638.72

TOTAL THIS YEAR = \$2,888.47

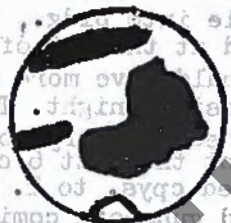


- 2 1731)8/28/03(THUR)WAVERLY PARKING LOT(9-11:45PM). MARS EVENT(planet at its closest opposition since 57,615 B.C.)I advertised it by handing out hundreds of blurbs at last Sat's Fmrs. Mkt and by mentions on the Chas. Vil., Waverly, & Bloomberg list serves. Accompanied by fellow telescopists Teresa Palomar, Jerry Feldman, and Bruce Manger. Covered for forthcoming SUN article by Kevin Cowherd w/photographer. Great night, with good turnout, which exceeded my worst fears. Used 5 traffic cones supplied by across the street neighbor Frank, to demark area (we set-up on north end of lot). I announced a free beer to 1st person who spotted Mars. It was won by a young woman. MARS(Rose slowly but soon showed a pretty decent image. Seeing was quite good. Ice cap; shaded areas reasonably evident.) HAT(Removed solicitation from hat, but after a while people began spontaneously putting money in it.) Some lookers from Bloomberg, who tired of waiting in line there! VISITS (Edith C., John H., Leah H., Meagan Shock, Gren & Jan, Sylvia Moese, Don & Lainey...). +/- \$50.00. NOTE #1 Police arrived at closing time and confiscated beer bottle, most empty. NOTE #2. After closing I drove to Bloomberg hoping to visit Alin. However guard wasn't allow any more people into bldg., saying line was too long! I contemplated setting up on sidewalk but rebelled at thought of staying up for many more hours. Also thought that the locked-out ones would have more chances in coming weeks to see Mars at JHU. EYEPIECES(Worked at 165X most of night. Toward end found that 220X worked fine, especially after orange-red filter added. Am very sorry I didn't use that set-up alot sooner!) HUBBLE (3/30/97) PHOTO(I got the last 6 copies, Wed., from Cheryl Gundy. Gave one to telescopists present. Mailed cyps. to T. McIntyre, NYC, and K. Bourque, Charleston, SC. NOTE #3 Arriving home heard gunshots coming from Melville, followed by lots of police activity. NOTE #4 K. Cowherd reported counting 80 people present at one point in evening. NOTE #5 We had the W. side of the parking lot pretty much to ourselves till, just at the end, cars carrying late night Greenmt. bar patrons began streaming in. We got off lucky! NOTE #6 While the lot's Na lamps were v. bright, they didn't unduly interfere w/scopes. NOTE #7. Not long after I got home, clouds arrived and blocked out Mars, which I'm sure put an end to Alin Toless stint at Bloomberg! VISIT(Dawn Culberson and her mother.)
- 3 1732)9/5/03(FRI)CHARLES VILLAGE, INFRONT OF 3120 ST. PAUL(8:05-11:22PM). In Chas. Vil. to once again serve the neighborhood. Some Images Cafe regulars were among early lookers; later they were mostly passerby students. MARS(Acq. +/-8:40PM. Poor image till +/-10:00 PM. Sirtis Maj. vis. at start, but polar cap took a while to be really there. Accompanied by Jerry Feldman. EYEPIECES(Used 135, then 165 w/red filter for most of eve. Later, used 220X sans filter.) VISITS(Alice, Mardi, & Alex Brock; Marion, Rissel, Mike; Colleen & Emil, who bought icecream for J and me; Andrea Naft; Zora. LOUIS ROSENSTOCK, who took photos for Charles Villager.) MARS(Frustrating, aggravating! HAT \$37.93 (\$11.53/hr.)
- 8 1733)9/09/03(TUE)HPL-W.L.(7:45-11:00PM). Chilly; good sky. SCENE(I was worried it would be bleak & lonely, but it was lively. Didn't have long-lasting, solid lines, but had a steady stream of lookers.) MARS(In & out of ship rigging for 1st hr., then pretty good image. Dark "ridge" across center; polar cap difficult.). 14-d MOON(On request; some good edge craters.). HH(Good energy; taxing job!) \$109.55 (\$33.71/hr.) (Most looks paid!) MOON-MARS(Full Moon 4-5° east of Mars; a spectacular pairing!)
- 8 1734)9/10/03(WED)HPL-WL.(7:35-11:10PM). Comfortable temp. Great sky, except seeing problems. Incredibly busy; thru 20-25 deep line returned! MARS(Good early, then seeing prob. I tried every which way to get it right...filters, magnifications, but sometimes it was like getting blood from a turnip. Polar cap now miniscule?). HARVEST FULL MOON(Impressive! Several groups of Chinese asked to see it, as this is the time of their annual "Moon Festival"). Most everybody paid. VISIT(Barry). HH(Is very hard work!). \$137.17 (\$38.21/hr.)
- 8 1735)9/11/03(THU)HPL-WL(8:25-10:17PM). Start delayed by clouds, hide-and-seek w/clouds during stint, then shut down by clouds. MARS(Still good interest. FEATURES EASIER TO SEE WHEN LOOKING THRU CLOUDS, SUGGESTING THAT A ND FILTER IS THE BEST FILTER TO USE. EVEN POLAR CAP MADE MORE OBVIOUS.) VISIT: Terry Kemp & friend. Terry said view thru my scope better than Sc. Ctr.'s scope! \$63.50 (\$34.08/hr.) Mars 92% of its 8/27/03 size.

TOTAL THIS PAGE = \$ 398.15

TOTAL THIS YEAR = \$3,286.62

MARS PARTY



2003
AUGUST-SEPTEMBER
BALTIMORE, MD.

- 8 1736) 9/16/03 (TUE) HPL-WL (7:37-11:38PM). Mild; clear. Good seeing at start, which degraded as Mars rose higher. MARS (Entangled w/ship for 1st 15-mins. Used 165X w/ND filter. Tried 220X several times, but too fuzzy. "5-0'clock shadow"; cap got tougher and tougher.) VISITS: (JHU student, Catherine Ackerman, who is using me as subject for a paper. A woman who excitedly reported she bought a scope thanks to me. Valerie Kozimor & Joe.) HH (Very busy night. I am prob. working too hard on trying to get my lookers to see anything. Is real hard work!). \$135.64 (\$33.83/hr.)
- 2 1737) 9/21/03 (SAT) CHAS. VIL. (7:55-10:17PM). Wore myself down watching clouds. Headed out at 7:30PM, when it finally looked like would be ok. Saw parking spot very near my Chas. Vil. spot and, feeling tired, pulled in and set up. V. slow traffic compared to what Hpl. would have been! MARS (81% of its 8/27 self. Great seeing at start, which degraded as it rose and became intermittent. Brief cloud probs. Vague grey region vis. to all and polar cap to most. Sl. hazy sky prob. helped seeing.) VISITS (Kim Nolan, who lent me her cell ph. to call Bruce Major. B. & Suzzie Manger, who ar. 9:50PM.) \$40.66 (\$17.21/)) ((Mars contributions now total \$1,033.05. What would they be if weather had cooperated?))
- 8 1738) 9/24/03 (WED) HPL-WL (6:58-11:14PM). Mild; clear. Seeing generally decent. HH (Energetic, articulate. Was ready to leave at 10:30PM, but lookers kept arriving.) SCENE (Many lookers from the Dish Network, a satellite dish business, convention.) MARS (Seeing good enough that almost everyone saw polar cap. At 22", or 76.8% of its largest, still presented a doable image. Used 165X w/ND filter.) DERILIGT (Had to summon nearby cop to chase off a deranged person who was badgering me and my lookers.) \$135.06 (\$31.68/hr.)
- 8 1739) 9/26/03 (FRI) HPL-WL (7:05-11:50PM). Mild, sl. hazy. Good seeing for 3 hrs., then degradation. MARS (40 million mi., 73% of 8/27. Snow cap easy at first, then harder.) HH (In good shape till 10:30PM, then wanted to leave but lookers kept arriving.) STICKERS (Gave our +/-215, before running out. Could have given out +/-250.) VISIT (Diane Zammel, of "To Sea With 2", who recruits cruise entertainers and who seemed interested in recruiting me for a cruise.) \$175.95 (\$37.02/hr.) BASED ON NO. STICKERS DISPENSED, I HAD 1.42 LOCKERS FOR EVERY \$1.00 CONTRIBUTED. VISIT: (Middleton Evans, photographer) ((Mars contributions now total \$1,344.06.))
- 8 1740) 9/28/03 (SUN) HPL-WL (6:57-8:55PM). Chilly. SEEING (Clear sky at start but semi-poor seeing, which eventually became discouragingly bad enough that I shut down scope. Not long after, clouds rolled in obliterating Mars.) MARS (Polar^{cap}, progressively harder to see, finally impossible.) FOUND MONEY (A passerby handed me a bill that was laying on the bricks, thinking it was mine. It was a \$20! A few mins. earlier I was conversing w/two lookers who were standing at that spot. As I was packing, they passed by and I asked if they'd lost anything. One immediately said, "A twenty dollar bill," at which point I gave it to him, \$5 of which he gave me for "being honest".) \$55.31 (\$28.08/hr.)
- 8 1741) 9/30/03 (TUE) HPL-WL (7:15-9:25PM). Mild, fall evening. Mostly poor seeing. PARKING (Told by desk officer that Adair has said there's to be no more Pratt St. parking, only loading dock! When I asked parking attendant about cost of parking, he said I could park for \$12.00.) 5-d MOON (lost it at 8:20PM). MARS (Reluctantly! Snow cap vis. most of time, but unsharp image.) VISITS (Murray Bentley; woman who said she bought a scope having looked thru mine. Two astronomers from Mt. Stromulo Obsv., Canbury, Australia. Pointed out Polaris and scoped B Cyg for them.) TRAFFIC (Sparoe amt. of strollers, but I had occasional busy moments.) \$34.00 (\$15.67/hr.) ((Mars total now \$1,433.37.))
- 8 1742) 10/05/03 (SUN) HPL-WL (6:30-9:05PM). Cool, sweater weather. Nip & tuck w/clouds early, then clear, then clouds at quitting time. Next to nobody around by 9PM, 10-d. MOON (At start and at end when Mars in clouds.) MARS (64% of 8/27; snow cap fairly easy! Most lookers saw it. Mars mania diminishing but not totally over! \$71.44 (\$27.66/hr.)) ((Mars = \$1,510.81

50
TOTAL THIS PAGE = \$ 648.06

TOTAL THIS YEAR = \$3,934.68

- 8 1743)10/06/03(MON)HPL-WL(6:42-8:30PM). Clear. Forced to quit by cold wind, because I neglected to wear a warm sweater. Also, the crowd was growing very thin. 11-d. MOON (Good edge craters @ 167X; lookers impressed.). MARS(The usual struggle.) VISIT: Middleton Evans, photographer. \$39.84 (\$22.13/hr.) ((Mars now \$1550.65))
- 4 10/08/03(WED)GREENMOUNT SCH., attn: Jennifer Lee, 410-319-6354(9-10:30AM). 38 children, 2nd thru 4th grades. Most knew the 9 planets in correct order, and intro. devol. into a discussion of whether Pluto is or is not a planet. Talked about stars twinkling but not planets. Slide show thru Moon landing. Indoor telescope look-see at Saturn. Very alert, well behaved kids. \$50.00 Given all the prep I did, I would have been a more enthusiastic speaker had I gotten \$100.00. Got to keep remembering that fact!
- 10 1744)10/8/03(WED)HPL-WL(6:41-10:00PM). Threatening clouds at start which dissolved into high haze. HH(In very good form...energetic, articulate.) MARS(Not too bad...Syrtis Major, in w. hemi; cap small but there.) 13-d MOON(Lookers impressed by edge craters.) ALBIREO(Several times.) URANUS(At end for some young people who were hanging around.) HPL(Surprising number of strollers. Steady traffic for me.) \$84.00 (\$25.30/hr.)(((\$1634.65) MARS(19" = 57.3% max. = 45.5 million miles.))
- 9 1745)10/12/03(SUN)HPL-WL(6:30-9:47PM). Mild, busy scene. MARS(18.3" = 53% of 8/27. Terrible seeing produced difficult to deal with image. I turned myself into knots trying to get it focused for lookers. It was a miserable, wearing experience. I wanted to simply quit, but the line would not go away, and I didn't want to turn people away. Finally, when an opening came, I scrambled to pack up. THIS WAS IT FOR MARS...THE LAST TIME I'M GOING TO DO IT!). HAT(First night with sign saying CONTRIBUTIONS APPRECIATED....rather than CONTRIBUTIONS WELCOMED. Did it make a difference?) \$119.90 (\$36.52/hr.)((MARS=\$1,754.55))
- 33 Discovered tonight that my round trip is 9 rather than 8 miles. Added unrecorded mileage.
- 10/20/03(MON) HAL'S MONTHLY SIDEWALK ASTRONOMY NIGHT AT GLENWOOD LIBRARY(6:30-10:15PM). Clouds early, then clear. ALIGNMENT(Near perfect, achieved with mag. compass @ dec.11°W.) MARS(Gratifyingly good image compared to my last stint in Hpl. Syrtis Maj. + snowcap.) ALBIREO, y AND, URANUS. Failed to find Neptune, disappointedly. ATTENDANCE(V. slow start, then a total of +/-2-dozen people. A slow night, per the regulars.) Pulled plug at 9:00 then spend an hr. with Malcolm Willet hunting down M's(27 Dumbell, 31, 32, 110, 71, 17, 33). One HAL had a video setup which gave a decent view of M57 and a striking one of M13. HH(It was fun doing amateur astronomy again!). NO HAT 54.5 miles.
- 2 1746)10/25/03(SAT)FARMERS MKT.(8-12noon). SUNSCOPE. Ok to slightly hazy sky. Two "Jupiter-sized" sunspots, both easily naked-eye. Had bought a bus tkt. for a "Bring Our Troops Home" march in DC, but with the advent of these spots, decided to do them at the Mkt. and then drive myself to the march. However, after Mkt. stint decided to do spots some more in Fpt. Pretty good level of interest, partly because spots made the 8AM news, this AM. I projected w/20 mm, 1.25" Erfle, which worked fine. Used #14 glass, too, which lookers were excited by. Visits from several professional astros. Gave out mnemonics....they paid for themselves many times over! Received lots of appreciative comments. Displayed poster saying GIGANTIC SUNSPOTS SEEN THEM HERE TODAY!, which helped get attention. \$41.85 (\$10.46/hr.)
- 10 1747)10/25/03(SAT)FELLS PT.(2:45-4:08). SUNSCOPE. Sunspots (#'s 484 & 486). Hesitated setting up because of haze, but decided I was there, so why not. Thin to semi-thick haze most of the time. Slow scene in Fpt., with little interest in me, and lots of no-pays among those who did stop. Took Greg to Jimmie's for pie after stint. \$6.24 (\$4.51/hr.) Had called Sun's city desk inviting coverage, but when it looked like I wasn't going to do it, I called back to cancel. Was told nobody avail. to cover, anyway.
- 9 1748)10/30/03(THU)HPL.-EL(5:10-7:47PM). Mild, great sky. Invited by Alin to go aurora hunting. Decided, since is a "shot in the dark" would do Hpl. 5d. MOON(Theophilus-Cyrrillus-Catharina). MARS(I could see polar cap ok at 220X, but it was tough for lookers to focus. Decided not to pursue it after loosing Moon behind lights.) URANUS(once). Lots of no-pays, but a few \$5 contribs. HH(A bit bored.). \$48.30 (\$18.48/hr.)

TOTAL THIS PAGE = \$ 390.13

TOTAL THIS YEAR = \$4,324.81

- 1749) 11/01/03 (SAT) FARMERS KT. (8:30-12NOON). OK sky (partly hazy); 86°F! SUNSPOTS (w/SUNSCOPE; Two naked eye ones toward W. Limb. Good interest from Mkt. goers, as their eruptions have been on the news all week. Displayed my sign, along w/today's SUN Md. Section featuring Dave Kone's beautiful aurora shot from Wed. eve. 300 announcements of next Saturday's total lunar eclipse handed out.) VISITS (Willie... whose swollen belly I shrunk enough for him to button his jeans!; Suzanne Lebovit & Bruce Manger, who he distribute eclipse announcements... mainly S.L., ic.) Best Mkt. yet! \$63.03 (\$18/hr.).
- 1750) 11/01/03 (SAT) HPL-EL (5:52-8:43PM). 77°F! Off & on cloud probs. Eventually, Moon blotted out. I had no idea if/when it would reappear, so packed up. Arriving home, it was quite doable again. 7d. MOON (Stress Ptolemaeus as being one of largest Moon craters. Otherwise lots of features. Lookers impressed.) MARS (A few times, but unsatisfactory. So-so seeing plus hard to focus.) Busy scene. Busy night! \$139.48 (\$48.99/hr.)
- 1751) 11/02/03 (SUN) HPL-WL (5:05-8:37PM). HI clds & haze at start, then great sky. Accompanied by my new woman friend, Suzanne Lebovit, who enjoyed the variety of people and translating Spanish. 75°F! Pretty busy, but crowd thin by 8:30PM. HH (In V.G. form!). 8d-MOON (Sunrise on Tycho; Stayed south, mostly, but occasionally ventured to the Appennine-Plato region, which was breathtaking. Mainly used 166X.) VISITS (Several physicists attending American Vacuum Soc. mtg... Germany, Swiss.). \$122.50 (\$34.63/hr.)
- 1752) 11/03/03 (MON) HPL-WL (5:15-9:24PM). Mild. Great sky at start, then declining seeing. 9-d. MOON (Post Copernicus sunrise; jumped back & forth from Tycho to Copernicus to Plato. Sometimes 220X.) MARS (On req. Poor.) Slow start, then good traffic mid-evening. HH (Not as upbeat as last night. May need a break!) \$93.10 (\$22.43/hr.)
- 1753) 11/04/03 (TUE) HPL-WL (5:27-7:20PM) Mild. Great sky till predicted clouds rolled in, which allowed me to race home to catch Part III of NOVA's String Theory series. Its graphics were nice, the interviews of mathematicians interesting, but I didn't get much from it beyond the idea that string theory is out there and someday may or may not be proved. HH (Worked hard today around house preparing for Derek Wallentine's Fri. arrival for a 3 day stay. Plus, was feeling worn down from a 3-stint run. Also, was supposed to to WIA monthly mtg.. However, sky looked so great couldn't resist. Once in Hpl. felt SUBARU (Dinged RR bumper trying to park in Light St. loading dock. 1st ding!) 10-d. MOON (Tycho up to Jura Mts. Used craters photo to great effect.) \$58.68 (\$31.21/hr.!)
- 1754) 11/08/03 (SAT) 3100 BLK. ST. PAUL ST. (6:30-9:15PM). TOTAL ECLIPSE OF THE MOON (Totality 8:06-8:25PM). Accompanied by Derek Wallentinsen (astro from CA with whom I've corresponded since 1974 and who came visiting in the wake of his wife's death), Bruce Manger, & another telescopist. 33°F, SKY COND. (Began w/hi, thin clds. which gradually thickened, making for difficult, near fatal obsvs. MOON (A little color approaching and leaving totality.) SITE (Good, esp. since light across st. was out!). TV MONITOR (Derek brought an electronic eyepiece. Using his EFX90, my TV set, and power from extension cords plugged in to Ellen Gifford's Hair Unlimited. During setup discovered ext. cords incompatible, and had to rush home to file down plug prong!) CROWD (Lively, broke out singing "My The Light of the Silvery Moon"; maybe 50 people at peak.) VISITS (Mark Steiner, who paid me back by check the \$200 loan I gave him in 1961 to visit Cuba! John H., who stopped by briefly. E. Hochman, who brought hot choc. Suzanne & her friend, Betty. Merle Ann & Stan. M. Roswell, Bill Marker, + many others. HAT (Sans sign) \$32.91 (\$11.97/hr.) HH (For me, due to clouds, was a frustrating evening. Also, was chiding myself for forgetting to bring my 40mm Kelnor wide angle eyepiece. Somethings that went right were parking, the light out across street, good crowd, friends, compliments received.)
- 1755) 11/21/03 (FRI) HPL-BICEN (8:11-10:50PM). Mild; great sky. BACK IN THE SADDLE WITH SATURN! (Acq. 8:20PM. Semi-blurry for +/-50min., then fine. Rose 7:30PM.) Semi-alow scene. FRANKIE (Fell asleep on ship mooring post; almost fell into water!). \$62.52 (\$23.57/hr.)

TOTAL THIS PAGE = \$ 572.22

TOTAL THIS YEAR = \$4,897.03

- 9 1756) 11/22/03(SAT)HPL-BICEN.(8:15-10:30PM). Great sky at start, but then haze which sometimes diminished Saturn. EYEPIECES(Tried 18mm Or., but decided RKE 15mm easier to look thru.) HAT(Early eve., as I was preoccupied with lookers, a young woman snatched a \$5 bill. First time in long time that's happened. One consolation is that Frankie didn't show tonight, so I saved \$5 there.) SATURN(Sometimes absolutely sharp; Cassini Div.). CH (Several unpleasant groups of loud, pushy young men.) Sparce by 10:30PM. YOUNG JEW. COUPLE(Reported they became engaged the night they looked at Mars thru my scope. Looked at Saturn tonight, Marrying in a week.) \$84.76 (\$37.67/hr.) VISIT(Sally Goff, Sci.Ctr.)
- 9 12/20/03(SAT)HPL. Dry run. Too few strollers(looked like end of evening of busy night.). Would need to set-up toward Bicen, as WTC still blocking from W.lip.
- 9 12/21/03(SUN)HPL. Dry run. Saturn rose at 5:31PM. From Bicen., could have acq. it around 6:10PM, but there were scattered strollers, not enough to make me feel comfortable about setting up. Would have been a lonely time. Pushed scope to Amphitheater, but couldn't see Sat., plus too few strollers there, too. Bottom line: Didn't want to play to an empty house!
- 9 1757) 12/27/03(SAT)HPL-BICEN.(4:53-9:25PM). Mild; gloves not needed. Cloudless sky; seeing sl. shaky. Steady, moderately thick, stream of strollers. 4-MOON(pretty nice; till Saturn.) SATURN(Spotted low 5:35PM, but soon went behind Power Plant stacks; reacq. 5:50PM; 136X at 7:05PM; 2-moons.) SATURN/WTC.(WTC from w.lip = 35°hd. At 9:45PM, Sat. was 20° above WTC, meaning it cleared it +/-8:25PM.) \$100.82 (\$22.21/hr.)
- 9 1758) 12/28/03(SUN)HPL-E.Lip(4:53-8:04PM). Good sky; mild, gloveless temp. STRATEGY(Was torn between Bicen., where I'd acq. Saturn fairly soon and hold it, or the Amphitheater area, where I'd have the Moon and, maybe, Saturn briefly. Figuring that business would be more brisque and last longer, I went with the latter. Am pretty sure was correct dec.!) 5-d. MOON(Awesome; sunrise on Theophilus.). SATURN(6:10PM till 7:01PM, when it went behind WTC. Great image!). Lots of families with kids; lots of no-pays!. FRANKIE(Reported has been layed-off from Phillips, where he's worked for 6 yrs.). VISIT(Neighbor, Janet, and her friend, Eric. J. said she really liked my comet holiday ed.) \$103.44 (\$32.46/hr.)
- 9 1759) 12/30/03(TUE)HPL-E.Lip(4:50-7:50PM). Good sky; semi-gloveless temp. 7-d MOON(1st of lookers impressed. SATURN(5:55-6:47PM. Poor image, unlike last night's good image. es 1h25m to reach top of WTC. Had I stayed would have re-acq. +/-8:07PM). Pretty good traf- fic; lots of families. Had a quiet spell and decided to leave, but things were picking up again. Maybe should have stayed longer. VISITS: Amanda Cunningham & her father. Sheila Rees, who rpt'd her husband of 33 yrs. has left her and she's on her way to making a new life for herself. Adjourned to J. Pats. for sandwich/beer. HH(It's been a pretty good yr. at the telescope. Not a record year, but then I don't think I have the go-power that I used to have. Also, am slightly more willing to let it go for other committments. Telescoping is more routine for me now, but I believe I still am putting on a pretty good show for my lookers. 63 stints in 2003. That's respectable!) \$79.56 (\$26.52/hr.)

54 TOTAL THIS PAGE = \$ 368.58

TOTAL THIS YEAR = \$5,265.61 (= \$83.58/stint!)

Year = 554

| | |
|--|--------------------|
| 1/2/03 SP 16-sides January '03 star map (JHU) | \$ 0.96 |
| 1/10/03 SP 24-sides (ibid) | \$ 1.44 |
| 1/13/03 SP 18-sides MARS PARTY materials for BAS mtg. (JHU) | \$ 1.08 |
| 1/24/03 POST mail dates for March. to Hpl. | \$ 0.37 |
| 2/8/03 SP 22-sides Fe. star map (JHU) | \$ 1.32 |
| 3/7/03 SP 18-sides March star map (JHU) | \$ 1.08 |
| 3/10/03 SP Post-it notes 1,200 (Office Depot) (-=\$0.007/ea.) | \$ 8.39 |
| 3/11/03 SP 46-sides SC handouts (JHU) | \$ 2.76 |
| 3/14/03 SP Frankie, HPL | \$ 4.00 |
| 3/18/03 SP 3-Comet cds. in Hpl. (HMH Photo) | \$ 1.80 |
| 3/18/03 POST mail May request to HPL | \$ 0.37 |
| 3/22/03 SP 12-sides star map (Kinkos) | \$ 0.96 |
| 3/24/03 SP Frankie, Hpl. | \$ 4.00 |
| 3/25/03 SP Frankie, HPL. | \$ 5.00 |
| 3/25/03 STA (Horizon Cycles) | \$ 4.10 |
| 3/22/03 SP 46 sides SC handouts (JHU) | \$ 2.76 |
| 3/27/03 SP Frankie, HPL | \$ 5.00 |
| 3/27/03 SP 5-comet cds., (Hpl. (SC) | \$ 3.00 |
| 4/2/03 SP 1-comet cd. Hpl | \$ 0.60 |
| 4/2/03 SP 25-sides April star map (Kinkos) | \$ 2.00 |
| 4/3/03 SP 14-sides star map (JHU) | \$ 0.84 |
| 4/3/03 SP Frankie, Hpl. | \$ 3.00 |
| 4/10/03 SP 14-sides SC handouts (JHU) | \$ 0.84 |
| 4/12/03 SP Frankie, HPL. | \$ 5.00 |
| 4/13/03 SP 40-sides for handouts (kinkos) | \$ 3.20 |
| 4/13/03 STA stamp pad inker XXXXXX (Staples) | \$ 2.20 |
| 4/14/03 SP 32-sides SC handouts (JHU) | \$ 1.92 |
| 4/15/03 SP 26-sides SC handouts (Kinkos) | \$ 2.08 |
| 4/15/03 SP Frankie Hpl. | \$ 4.00 |
| 4/16/03 SP 5-sides misc. SC mats. (JHU) | \$ 0.30 |
| 4/20/03 SP 32-sides SC handouts (JHU) | \$ 1.92 |
| 4/27/03 SP Frankie in Hpl. | \$ 4.00 |
| 4/28/03 SP 12-sides May star map (JHU) | \$ 0.72 |
| 4/29/03 SP Frankie, Hpl. | \$ 4.00 |
| 4/29/03 SP Irish musicians in Hpl. | \$ 1.00 |
| 5/2/03 POST mail June req. to Hpl. | \$ 0.37 |
| 5/14/03 SP Frankie, Hpl. | \$ 4.00 |
| 5/16/03 SP Post-it notes 1,200 (Staples) | \$ 4.60 |
| 5/19/03 SP Frankie, Hpl. | \$ 4.00 |
| 5/20/03 SP 16-sides SC handouts (Kinkos) | \$ 1.28 |
| 5/30/03 SP 19-sides June star map (JHU) | \$ 1.14 |
| 6/2/03 SP Frankie in Hpl. | \$ 4.00 |
| 6/5/03 SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 6/6/03 SP 8-sides SC starmap (Kinkos) | \$ 0.64 |
| 6/6/03 STA Horizon Cycles (Returned) | \$14.66 |
| 6/6/03 SP Frankie in HPL. | \$ 4.00 |
| 6/09/03 SP 22-sides SC star map (JHU) | \$1.32 |
| 6/14/03 STA rubber fingers (Office Depot) | \$1.00 |
| 6/24/03 SP 60-sides SC handouts (JHU) | \$3.60 |
| 7/8/03 SP Frankie in Hpl. (Gave me a Phillips crab cake. Was pretty good.) | \$ 6.00 |
| 7/25/03 SP 20-sides July star map (JHU) | \$ 1.20 |
| 7/25/03 SP Frankie in HPL | \$ 4.00 |
| 7/26/03 SP 12-sides SC handouts (KINKOS) | \$ 0.96 |

PAGE TOTAL \$128.48

SP = \$120.07
 POST = \$ 1.11
 STA = \$ 7.30
 TOTAL = \$128.48

| | | | |
|----------|--|---------------------------|-----------|
| 07/30/03 | SP 2-sides (download Aug. skymap) (JHU) | SP = \$117.95 | \$ 0.12 |
| 08/06/03 | POST mail Sept. slots req. to Hpl. | POST = 1.71 | \$ 0.37 |
| 08/15/03 | SP 20-sides Aug. skymap (JHU) | STA = 16.29 | \$ 1.20 |
| 08/19/03 | SP 6-copies Mars Party rubber stamp art (Kinkos) | TEL = 0.70 | \$ 0.51 |
| 08/20/03 | SP 5-copies (Ibid) (Kinkos) | PAGE = \$136.65 | \$ 0.42 |
| 08/20/03 | SP 4-copies (ibid) (Kinkos) | | \$ 0.34 |
| 8/20/03 | SP 1-MARS PARTY rubber stamp (Baumgarten Co.) | | \$ 21.53 |
| 8/21/03 | SP 32-copies Waverly Mars announcement blurb (JHU) | | \$ 1.92 |
| 8/21/03 | SP Hpl. handtruck pusher | | \$ 2.00 |
| 8/23/03 | SP 2-copies Mars event blurbs (JHU) | | \$ 0.12 |
| 8/24/03 | SP Mike in Hpl. for "bodyguard" service walking back to car | | \$ 2.00 |
| 8/25/03 | STA Scotch tape (Office Depot) | | \$ 1.16 |
| 8/26/03 | SP 32-sides SC handouts (JHU) | | \$ 1.92 |
| 8/27/03 | POST mail Mars Hubble photo to Tom McIntyre | | \$ 0.60 |
| 9/6/03 | SP 28-sides SC handouts (sky map, handbill) (JHU) | | \$ 11.68 |
| 9/12/03 | SP 16-sides SC handouts (JHU) | | \$ 0.96 |
| 9/16/03 | SP Frankie, Hpl. | | \$ 5.00 |
| 9/17/03 | SP 2-pkgs Post-it notes (Staples) for handouts | | \$ 9.20 |
| 9/20/03 | SP 6-copies mats for Ackerman interview (Kinkos) | | \$ 0.48 |
| 9/24/03 | SP Frankie, Hpl. | | \$ 5.00 |
| 9/26/03 | SP 10-sides SC handouts (JHU) | | \$ 0.60 |
| 9/26/03 | SP Frankie, Hpl. | | \$ 5.00 |
| 9/29/03 | SP 15-copies Oct. star map (attempts at getting good copy) (JHU) | | \$ 0.90 |
| 9/30/03 | SP 6-sides SC handouts (JHU) | | \$ 0.36 |
| 10/5/03 | SP 8-sides mnemonics for Greenmt. School talk (JHU) | | \$ 0.48 |
| 10/5/03 | SP 80-sides Oct. sky map. for Greenmt. Sch. talk (JHU) | | \$ 4.80 |
| 10/5/03 | SP Frankie, Hpl. | | \$ 5.00 |
| 10/08/03 | SP 6-sides mats. for Greenmt. Sch. talk (JHU) ((Total = \$5.64.)) | | \$ 0.36 |
| 10/08/03 | SP Reimbursed by school for xeroxing expenses. | | (\$ 5.64) |
| 10/11/03 | SP 16-sides Oct. star map (JHU) | | \$ 0.96 |
| 10/12/03 | SP Frankie, HPL | | \$ 5.00 |
| 10/13/03 | SP 10-sides SC handouts (JHU) | | \$ 0.60 |
| 10/24/03 | SP 24-sides SC handouts (JHU) | | \$ 1.44 |
| 10/24/03 | SP 5-sides sunspot info for tomorrows Farmers Mkt.(JHU) | | \$.30 |
| 10/24/03 | STA 1-Red Sharpie pen for sunspots sign (Rite Aid) | | \$ 1.25 |
| 10/25/03 | TEL Sun city desk to cancel invite to cover me in Fpt. | | \$ 0.50 |
| 10/25/03 | SP pie and lemonaid for Greg in Fpt. | | \$ 2.18 |
| 10/27/03 | STA new wrist watch battery (Chil's Jewels) | | \$ 0.50 |
| 10/27/03 | STA typewriter ribbon (Staples) | | \$ 0.86 |
| 10/29/03 | SP 31-sides lunar eclipse announcement(11-up = 34lea.) (Kinkos) | | \$ 2.48 |
| 10/29/03 | POST mail Dec. req. to Hpl. | | \$ 0.37 |
| 10/30/03 | SP 26-sides SC handouts (JHU) | | \$ 1.56 |
| 11/01/03 | SP 1-qt. cider to S. Lebovit for dispensings Moon eap. notices at Mkt. | | \$ 2.75 |
| 11/02/03 | SP 81-sides to replentish SC handouts (JHU) | | \$ 4.86 |
| 11/07/03 | SP 32-sides SC handouts(JHU) | | \$ 1.92 |
| 11/07/03 | SP 10-holiday cards to Ellen Gifford for providing eclipse electricity(HC) | | \$ 7.00 |
| 11/08/03 | STA 1-box childproof plugs for Moon eclipse video setup(Falkenhans) | | \$ 1.36 |
| 11/21/03 | SP Frankie in Hpl. | | \$ 5.00 |
| 11/22/03 | STA Mt. Washington Bike Shop | | \$ 9.38 |
| 11/24/03 | TEL bill of 11/18 | Y E A R | \$ 0.20 |
| 11/29/03 | SP 16-sides Dec. '03 star map. (JHU) | SP = \$238.02 | \$ 0.96 |
| 12/04/03 | STA Bike chain lub. (Gordon Cycle Shop) | POST = \$ 2.82 | \$ 1.30 |
| 12/17/03 | STA whiteout (Staples) | STA = \$ 23.59 | \$ 0.48 |
| 12/26/03 | SP 21-sides Jan. '04 star map (JHU) | TEL = \$ 0.70 | \$ 1.26 |
| 12/26/03 | POST mail January request to Hpl. | YEAR = \$265.13 | \$ 0.37 |
| 12/27/03 | SP Frankie in Hpl. | | \$ 5.00 |
| 12/28/03 | SP 20-sides Jan. star map (Staples) | 554mi @ \$0.36 = \$199.44 | \$ 1.44 |
| 12/28/03 | SP Frankie in Hpl. | | \$ 5.00 |
| 12/31/03 | SP 50-sides SC handouts (JHU) | | \$ 3.00 |

2004

Not for Distribution

STREET CORNER TELESCOPE LOG - 2004

9 1/3/04(SAT). Dry run to HPL. Combination of things kept me from setting up....
 1) A bit of a bleak scene, 2) Penetrating dampness, even tho mild temp., 3) Unpredictable clouds situation, and 4) Some apprehension about the mood of the crowd which would be leaving a Ravens football game midevening. SATURN(Acq. 7:20PM from W. lip.). Hung around 2-hrs., walking back & forth, and pondering the situation!

9 1760) 2/01/04(SUN). HPL(5:06-6:45PM). Clear, cold(35°F). Superbowl night. Ok traffic till 6:30PM, then died out. 11-d. MOON(Tycho). SATURN(Acq. from W-Lip +/-5:20PM. 2-Moons. Lookers impressed.) M42(1X; ok, even w/bright Moon nearby). VISIT(Denny Bliss, just returned from NH, where he voted for Kucinich in primary.). \$31.51 (\$19.10/hr.)

2 1761) 2/04/04(WED). 3120 St. Paul(5:45-8:32PM). Didn't try Hpl. (for fear of not being allowed to perform because of new schedule restrictions. After much hesitation went to Chas. Vil. Once set-up, was in good head! Spotty traffic; not too many no-pays. SATURN(Good as it gets w/my scope. Looked like a miniature of my Hubble demo photo!). 14-d. MOON (Ok rim craters.). M42 (1X). VISITS: Mariannette, Alice, Marty, Alex, Enver, Anthony, Sandy W....). \$32.00 + \$5.82 = \$37.82 (\$13.60/hr.)

9 1762) 2/10/04(TUE)HPL(5:27-7:23PM). Mild, but dampish. There, despite Hpl.'s new sched. saying Sat.s & Sun.s only thru 5/14. Was a bit nervous driving down. Security office cop seemed unaware of new sched. Hpl. was kind of a bleak scene, except for occasional knots of passersby. Used clouds as pretext to pack-up. ALIGNMENT(Lost 15-mins. due to very bad alignment. Must check tripod.). SATURN(As always, great!). M42(1X. Lower rt. trapizium star seemed unusually bright!). \$29.40 (\$15.21/hr.)

9 1763) 2/13/04(FRI)HPL(6:02-9:40PM). Clear, w/intermittent hi clds. Gloves intermittently. NEW SKED.(Over phone, Melba Bradley said "no prob. w/setting up.) DELAYED START(Had to wait out park space. Had to wait for crowd watching man being pulled from harbor to disperse.) ALIGNMENT(Ok, partly thanks to my adjusting tripod head.). SATURN(A crowd pleaser; 2-moons). JUPITER!(Acq. in ship rigging 8:15PM; did several times for lookers. HPL(Amazingly busy. Even had line for a while!). \$120.87 (\$33.23/hr.)

64) 2/19/04(THU)HPL(5:42-8:46PM). Mild. Good sky. NEW SKED.(I disregarded it.) SATURN(Good image; 3-moons. Used 18mm Or. 111K, which worked fine, but twice had to clean smears.) JUPITER(Fine. 3 moons.) Quiet scene, but worthwhile. \$70.55 (\$23.01/hr.)

2 1765) 2/25/04(WED)3120 St. P.(5:54-8:09PM). Clear, cold 35°F, wind. Here, because Images friend Byron, wanted to see Sat. Early afternoon posted 2 signs, but I don't think they brought anyone. Parked right at set-up spot. Slow, but interesting, enthusiastic lookers. 5-d-Moon(Huge crater, Hipparchus?, on term.). MARS(1X, no detail.) MOON-MARS CONJ(Great w/finder scope!). SATURN(Good show. 2-moons.) M42(+/-6X. Suprisingly good from Chas. V. Lookers impressed!) 1 Cnc(1X while awaiting J.) JUPITER(7:30PM. 2+2, stripes. Impressive!) VISITS: Byron & Melinda, Deborah, Kimberly N.(who I invited by tel.), Kimberly-II. I like this spot. It's convenient, lively people, but bad money! \$20.30 (\$9.02/hr.) VISIT: Joe Sweeney, an old Gandy Dancer friend.

9 1766) 2/27/04(FRI)HPL(6:01-10:02PM). Cool, 38°F(fingers got stiff). Lots of strollers; steady stream of lookers. 7-d.MOON. SATURN(3 moons; began w/18mm Or. but eventually went to 25mm Or. due to glare from lights.) JUPITER(4, then 3; bright star nearby; stripes.) An intense family w/many kids wore me down for a while! \$152.15(\$37.85/)(Incl. a \$20)

9 1767) 2/28/04(SAT)HPL(5:31-10:08PM). MILDISH; v.clear. On arrival it was almost frightening the number of people in Hpl! 8-d.MOON, then SATURN, then JUPITER, then back & forth among them. Lots of families/kids. HH(I was hot and went all out for the kids!) QUITTING TIME (pleanty people still, but I was feeling worn down.) \$217.33 (\$47.11/hr.)

9 1768) 2/29/04(SUN)HPL(5:07-7:30PM). Mild. Shut down by haze, which was ok, as I hadn't fully recuperated from last night. Haze was lifting as I left. 9-d.MOON(SUNRISE ON COPERNICUS... AWESOME FOR ME AND LOOKERS!) SATURN(1-moon) Busy, lots of families. \$99.61(\$41.85/hr.)

TOTAL THIS PAGE = \$779.54

TOTAL THIS YEAR = \$779.54

The Evening Sky Map

FREE! LOOK NORTH FOR YOU TO EXPLORE, LEARN & ENJOY THE NIGHT SKY

Calendar - October 2003

- 8 Last Quarter Moon at 19:29 UT.
- 9 Moon near Mars at 16h UT (evening sky). Skywatchers throughout Russia, Asia and Australia will witness the beautiful sight of a brilliant Mars (mag. -1.9) near the Moon. Skywatchers in New Zealand will see an even rarer and spectacular occasion of Mars a few minutes before sunrise. Mars remains a most worthy telescopic target because it will fade from mag. -2.1 at the beginning of the month to -1.2 by its end. At the same time the apparent diameter of the red planet will shrink from 21" to just 15". So make the most of Mars viewing opportunities in the first weeks of October.
- 10 Full Moon at 1:27 UT. The full Moon of October, as the first full moon after the Harvest Moon, is called the "harvest moon" in old almanacs.
- 11 Moon near the Pleiades at 23h UT (morning sky).
- 12 Moon at apogee (furthest from Earth) at 21h UT. Distance 405,592 km; angular size 29.5".
- 13 Moon near Saturn at 13h UT (morning sky).
- 14 Last Quarter Moon at 12:31 UT.
- 15 Moon near the Beehive cluster (M44) at 12h UT (morning sky). Binoculars provide a splendid view.
- 16 Delicate meteor shower peaks. Arises from the dust trail of Halley's comet. Active from October 2 to November 7. Produces very fast (66 km/sec), generally faint meteors (20 per hour). Observe in the pre-dawn hours; radiant is near Orion's "club".
- 17 Moon near Jupiter at 2h UT (47' from Sun, morning sky). Jupiter (mag. -1.8) rises 4 hours before the Sun.
- 18 Mercury at superior conjunction at 10h UT (not visible). The planet passes into the evening sky.
- 19 New Moon at 12:50 UT. Beginning of lunation 1000.
- 20 Moon at perigee (closest to Earth) at 12h UT (distance 358,549 km; angular size 33.7").
- 21 Moon near Venus at 20h UT (18" from Sun, evening sky).
- 22 Moon near Antares at 2h UT (36" from Sun, evening sky).

All times in Universal Time (UT). (USA Eastern/Summer Time = UT - 4 hours.)

NORTHERN HEMISPHERE

OCTOBER 2003

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS

EARLY OCT 8 PM
LATE OCT 7 PM
 Sky maps prepared using a latitude of 45°.
 Suitable for locations up to 10° north or south of this latitude.



- ### Symbols
- Galaxy ☾
 - Double Star ••
 - Variable Star ●
 - Diffuse Nebula □
 - Planetary Nebula ◇
 - Open Star Cluster ○
 - Globular Star Cluster ⊙

- ### Star Magnitudes
- 1
 - 2
 - 3
 - 4

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 Sky Maps Publications is a small attractive constellation map for use in the Northern Hemisphere.

The Great Square of Pegasus is a large asterism made up of stars in Pegasus and Andromeda. A compass rose indicates the direction that you face. Stars are shown in magnitude size.

The Great Square of Pegasus is a large asterism made up of stars in Pegasus and Andromeda. A compass rose indicates the direction that you face. Stars are shown in magnitude size.

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STREET CORNER TELESCOPE LOG

- 8 1769)3/02/04(TUES)HPL.(5:59-10:04PM).Mild(58°F), v. clear. Fairly busy scene. Lots of lookers here for truckers' convention. SATURN(2-moons). 11-d Moon(Tycho region). JUPITER(4, then 3). HH(Energized!). \$107.98! (\$26.42/hr.) Pretty good for a Tues. night! HH(I had the "ah-ha" realization tonight that my longing for women is really a longing for intimacy, that in my whole life I have not taken the importance and benefits of an intimate relationship seriously...have been distracted from intimacy by other considerations.)
- 9 1770)3/05/04(FRI)HPL.(6:53-7:32PM). Late start due to hand ringing over sky cond. After finally going, didn't last long. Might have been a good evening! Mild. SATURN. JUPITER. \$15.75 (\$24.12/hr.)
- 9 1771)3/12/04(FRI)HPL.(6:36-9:25PM). Late start due to procrastination over cold wind, which I thought would diminish w/sunset, but didn't. Cold, + cold wind. Nevertheless, a steady stream of people walking by! SATURN. JUPITER(1+3 + stripes; great!). Quit, not because of no people, but because of cold wind! \$81.01(\$28.76)
- 9 1772)3/13/04(SAT)HPL.(6:12-9:38PM).Cold, but not windy.v.clear. SCENE(Not esp. busy for a Sta. night.) SATURN. JUPITER(w/moon shadow).VENUS & M42(For some Japanese lookers). HH(In good form, esp. w/kids.). \$147.93 (\$43.09/hr.)
- 9 1773)3/15/04(MON)HPL.(6:05-8:57PM).Mild; shut down by clouds. Despite a quiet looking scene, I had a steady stream of lookers. SATURN(3-moons). JUPITER(3, then 4). M42(once). B Mon (once). VISITS: Richard, a retired UMD physicist who worked with Weber on gravity waves and who also has an 18" Dob. Alex Shook, who is now a really big kid. Had a pleasant demeanor. HH(Very energized. If only I'd be that up beat in the rest of my life! VISIT; Dominick Murray with visitors from Ireland. \$77.47 (\$26.99/hr.)
- 9 1774)3/23/04(TUE)HPL.(6:08-8:49PM).Chilly; clear. 5 PLANETS(We're in a period when Mercury, Venus, Mars, Saturn and Jupiter are above the horizon immed. after sunset. Some mems. public aware. I tried for Merc. asap, but was already below roof. I pointed out the others when asked.) Slow scene but ok interest for a while. SATURN. JUPITER. VENUS. 3-d. MOON. \$67.27 (\$25.01/hr.) Lookers toxicology conven.; Cameroons, China.
- 9 1775)3/26/04(FRI)HPL.(6:36-7:55PM).V. mild. Late start due to clouds q. Then shut down by clouds. 6-d. MOON(Theophilus, Cyrillus, Catharina just past terminator.). Moon came thru clouds, but never laid eyes of Saturn nor Jupiter. Lot of no-pays. \$26.02 (\$19.76/hr.)
- 9 1776) 3/28/04(SUN)HPL(5:47-8:15PM). Clear, but taken by surprise by a strong, cold wind. I was uncomfortably cold whole time. Slow start, then busy. 5 PLANETS(Looked for but didn't find Mercury. Pointed out V-M-S-J to many who asked about them.) 8-d. MOON(Acq.39-min. before sunset; used polarizer for a while. Great craters. Lookers awed!) SATURN. JUPITER(1+3; great!). HH(In good head, except cold!) VISITS(U. of M student, Matt. Hung cut enjoying scene and asking q.'s) \$82.22 (\$33.29/hr.)
- 9 1777) 3/29/04(MON)HPL.(6:20-7:40PM). Clear, cold, breezy, but I was dressed ok tonight. 5-PLANETS (No luck w/Merc.) 9-d. MOON(Termi. just past Clarus, Tycho.) JUPITER, SATURN; PLEIADES(1X) Ok traffic at start, then bleak scene, except for a sudden rush as I began packing-up. HH(Worked hard during day, then taken by surprise by clear sky. Rested for 35-min., then went to Hpl. feeling tired. However, once there performed ok.\$34.75(\$26.05,
- 8 1778)4/09/04(FRI)HPL(7:23-11:03 DST).Mild; clear but sl. unsteady sky.Easter week-end; lots of strollers. VENUS(Almost 1/2.Lookers liked it.)JUPITER(2+2;nice)SATURN(2-moons; is shrinking!) Most lookers contributed. Lots of fams/kids. VISITS:Brian, on a photo shoot for June's Balto. Mag. Lighting, people, everything right for some good shots! A group from Micronesia who I mistook for Latinos! HH(in good form!).\$188.71 (\$51.42/hr!!)
- 9 1779)4/10/04(SAT)HPL.(7:25-8:45PM).Mild. Adverse weather rpt.but clear toward ss.Good sky, then shut down by clouds. For some reason, no lookers for 1st 10-15 mins.Passersby paying no attention to me. Then it got good. Lots of families/kids. VENUS, JUPITER, SATURN. \$64.27 (\$48.32/hr.)

TOTAL THIS PAGE = \$ 893.38

TOTAL THIS YEAR = \$1,678.92

STREET CORNER TELESCOPE LOG

- 9 1780) 4/16/04 (FRI) HPL (7:29-10:37). Mild, clear. Fairly busy scene. VENUS (Still sl. crescent). JUPITER (3+1. After V. Had lots of trouble switching from it to Sat...ie., a steady line of lookers satisfied with J.). SATURN. VISITS (While setting up, a very inquisitive, kind of pushy, 12-yrs. old Black kid. Gave him map, etc.) Lots of enthusiastic lookers. HH (in good form). \$127.71 (\$40.71/hr.)
- 9 1781) 4/24/04 (SAT) HPL (7:23-11:47PM). Mild; thin clouds early. Very busy scene upon arrival. Very busy evening. Had a line for most of evening. Nice people; most contributed. 5-d. MOON (Lookers impressed, even w/daytime view.) SATURN (Acq. by popular demand before visible to eye. Lost 11:20PM. Somewhat mushy image.) JUPITER (1+3). \$219.93 (\$49.98/hr.)
- 8 1782) 4/28/04 (WED) HPL (7:32-10:34PM). Great sky. Mild till 8PM, when cold wind started. I wanted to close-up, but lookers kept coming. Happily, by 9PM wind had stopped, because I had lots of lookers till near end of stint. 9-d. MOON (Sunrise on Copernicus! Tycho also fine.) VENUS (Nice crescent.) SATURN. JUPITER (2+2, all close.). At start, scene was bleak, but traffic gradually picked-up nicely. \$99.69 (\$32.83/hr.)
- 9 1783) 4/30/04 (FRI) HPL (7:49-11:39PM). Extremely taxing night. Lots of lookers, plus strong wind and intermittent clouds. I wanted to scream! After wind subsided, for a while it was trying to spot things through "sucker holes" in clouds. Finally, last 45-min. was decent. 11-d. MOON (Tycho region). SATURN. JUPITER (3, then 4). VISITS: Clint & Catherine Bamberger Dan Lockney, ex. Western H.S. Eng. teacher, friend of Teresa's. \$129.36 (\$33.78/hr.) VISIT: Woman, Sun, medical sc. writer who works with F. Roylance.
- 9 1784) 5/04/04 (TUE) HPL (7:45-10:12PM). Great sky. HH (A bit depressed, requiring extra effort to be articulate.) HPL (Bleak scene, early, but steady stream of lookers. VENUS (Quite crescent.) SATURN. JUPITER (4 on left, nice!). 14-d. MOON (full!). \$72.15 (\$29.45/hr.)
- 9 1785) 5/05/04 (WED) HPL (7:45-10:33PM). Adverse weather rpt., but sky began cleaning late afternoon. Good sky; mild. Set up on E-lip for Comet NEAT, but didn't find it. VENUS. JUPITER (3+1. Nice!) SATURN. Busy night, but not one child looker! Also, no contribs. larger than \$1.00. HH (In a better head, tonight, than last night.) \$70.28 (\$25.10/hr.)
- 9 1786) 5/08/04 (SAT) HPL (7:45-10:30PM). Adverse weather rpt. in AM. Was looking fwd. to dancing tonight, but then sky cleared. Another hard night, with strong wind (money blowing out of hat!), a line that wouldn't quit, lots of kids. VENUS. SATURN. JUPITER. HH (In a good head but wishing for an occasional break. Tough work. Could have stayed longer but was fed up with intensity of it.) \$137.09 (\$49.85/hr.)
- 8 1787) 5/09/04 (SUN) HPL (7:29-10:14PM). Another really intense night, w/a line lasting 2-hrs. It took a max. effort to sustain the energy level necessary to deal with everybody (to explain the objects, check focus, chg. setup for children, give out handouts, etc.). This is tough, tough work! I don't understand why I'm attracting so much interest these days! JUPITER (3, then 4. Venus was blocked by haze, so made J my opening object.) SATURN. VENUS. COMET NEAT (Tried for it once without success.) VISITS (Middleton Evans, who took lots of photos. Jan Van Rensaleer, of the JHU photo lab.) \$104.22 (\$37.86/hr.)
- 9 1788) 5/10/04 (MON) HPL (7:45-10:22PM). Hot, somewhat humid. Wore summer whites and ss shirt. Good sky. VENUS (Big crescent!) JUPITER (1+3; great!). SATURN (Looking smallish at 110X). VISITS: A TK amateur who attends the TK Star Party. Andrea and Joe Neft, with A's brother from Denver and Gavi. A excitedly reported seeing an Eve art. in People! HH (Trying to balance the routine job factor with the need to perform factor!) \$62.68 (\$23.92/hr.)
- 9 1789) 5/12/04 (WED) HPL (7:35-10:35PM). Clamy heat; good sky. VENUS (held till 9:40PM.) JUPITER (2+2, great!) SATURN (held till 10:20PM). HH (Feeling beat. Need to take it easier during day if going telescoping that night!). HPL (Surprising number of strollers. \$82.21 (\$27.40/hr.) VISIT: Passerby who works in Phila. planetarium and said, "Keep up the good work!"

TOTAL THIS PAGE = \$1,105.32

TOTAL THIS YEAR = \$2,778.24

STREET CORNER TELESCOPE LOG

- 9 1790)5/13/04(THU)HPL(7:30-10:07PM). Warm, but less humid than last night. Good sky. VENUS (impressive crescent, 45", 35 million mi.) JUPITER. SATURN. ISS(Predicted to make close Jupiter passby +/-9:33PM. Was actually was +/-10° north. I announced event beforehand and had a good crowd of lookers for it.) Less busy night, which was a relief. HH(Felt better tonight, having taken it easy during the day.) Many very enthusiastic lookers!\$57.47(219¢)
- 9 1791)5/14/04(FRI)HPL(7:41-11:13PM). Warm. Clouds in W blocked V & S for a while, then disapate. BREAKNESS WEEK-END(Pretty busy scene. Didn't notice many out-of-town lookers. Had lots of young children...too many. Plenty of strollers when I quit, but I was too beat to keep going...esp. to deal with more kids.) PICKPOCKET SCARE(I believe was surrounded mid-eve by 4 or 5 young men intent on grabbing my wallet out of my pocket. One was trying to distract me, but I sensed one behind me putting a hand in my pocket. I instantly ordered them all to move back and to get in line, at which point they left.) JUPITER(4, then 3). VENUS SATURN. HH(In a bit of a bad mood, which never quite lifted.) FIREWORKS(An intense display mid-eve. from far side of Constellation. lasted 25-min., during which I had no lookers!) \$105.73 (\$29.89/hr.) VISIT(Valerie Kozimor and her friend, Joe...maybe it was last night
- 9 1792)5/28/04(FRI)HPL(8:25-11:55PM). Clearing sky late afternoon. However, cloud prob. mid-eve. Almost packed up! 9-d. MOON(post Copernicus s.r.; Tycho region @ 166X). JUPITER(4 on R). HPL(Very busy scene. Lots of little kids...too many!). HAT(1st w/new card on HAT saying simply CONTRIBUTIONS WELCOMED!, and omitting \$1 SUGGESTED). \$118.83 (\$33.95/hr.) Balto. MAG.(I have prominent coverage in June issue, but nobody mentioned it.)
- 9 1793)5/29/04(SAT...MEMORIAL DAY WEEK-END)HPL(7:59-11:36PM). Arrived to a huge crowd of people. My friends or fellow telescopists would have freaked out, but I calmly set-up my scope, figuring all would be well. Soon as I started working, a big band started playing very loudly. I think half my evening's energy went into trying to be heard over it. Happily, my voice had good timbre, and I survived the band ok. 10-d. MOON(25-min. before ss with polarizer. Tycho region, mainly.). JUPITER (4, then 3; lookers impressed). Lots of families with kids, in town for "final 4" lacrosse playoff). TROUBLE!(Late evening was badgere by a drunk man who just wouldn't quit intruding. I summoned Frankie to sort of stand behind me, but he accosted the guy and a shoving match began. I stood between them to keep F. from hitting him. Asked a passerby to call the cop stationed beyond the Amphitheater. He came and I asked him to deal with the trouble maker, and he shoed him off. The unpleasant episode lasted +/-10-min. LESSONS LEARNED? I should more readily accomodate intrusive drunks to get them to move on. Also, I should have a flashlight (laser pointer?) to summon the police when I think I need them.). Great sky! HH(Despite a steady stream of lookers and the loud music, I held up remarkably well...great stamina...hut for how much longer should I continue this crazy gig?? Happily, it's supposed to be cloudy for the next few days/nights!! STREET TELESCOPING HAS TO BE ONE OF THE MOST WILD & WACKY EXPERIENCES LIFE OFFERS!SATURN(Assumed it was not doable but discovered it low in W at 9:20PM, and held it till 9:30PM). ISS (Made a great passby +/-9:37PM, ^{first} appearing between the Legg M. and IBM bldgs. Lots of my lookers very excited by it!) BALTO. MAG.(1st person to comment on art...a woman who said she liked it and called me a "real celeb". \$147.26(\$40.68/hr. ((I pose. was flim flamed by someone who had me make chg. for a \$20 bill which was actually a \$2 bill. If so, my hourly would have been \$45.93/.)
- 8 1794)6/01/04(TUE)HPL(8:17-10:25PM). Pleasantly mild. Clear, w/occasional thin clds. BATTERY (Seems I forgot to rechg. bat. after above stint, and it died after 15-mins. I believe is 1st time have done this! I sure hope it revives ok!) JUPITER(Nice. 3 then 4). SATURN (v. low; distorted by heat from bldg.). 13-d.MOON(several times; edge craters). VISIT: A very tall pleasant T. Palomar std. and her father, Milton. HH(Felt bad going down but, as usual, once there became galvanized!) HPL(Serene scene compared to last stint!) \$45.86 (\$21.43/hr.)*Tracked manually, sticking with 80X to minimize motion.

TOTAL THIS PAGE = \$ 475.15

TOTAL THIS YEAR = \$3,253.39

- 9 1795)6/03/04(THU)HPL(8:16-10:53PM). Near perfect sky! Moderate traffic scene. Mild. BATTERY(Worked fine, after 36-hr. rechg. Was half expecting it to not work.) DRUNK (A really nasty one. Confronted by Frankie till police arrived, who wrote him up for drunk & disorderly, so he will have to appear in ct.). JUPITER(3+1; during twilight was as good as it gets!). SATURN(Sharp) 8:50 to 9:10PM). VISIT(Tommy Brager & friends strolled by, talked, but didn't look.) \$61.78 (\$23.67/hr.)
- 6/08/04(TUE)WEST END OF DRUID HILL PARK LAKE(5:30-7:30AM). TRANSIT OF VENUS! Accompanied by Derek Wallentinsen, my long-time astro friend from Calif., who came here for the TOV. Joined by Alin Tolea and Bruce Manger with scopes. DW used his 70mm ETX to project sun/Venus onto my television set (Subarus' battery thru inverter to pwr. TV). A fine loc. for observing today's sunrise, as it was a sunrise (5:40AM to 7:26AM) event. Haze blocked sun for first 15-20 mins., followed by gradual clearing. Good views of Venus had by all.(HR could not see V w/o magnification...at least early on.) DW's TV setup didn't attract much interest. Looking thru scopes, naked eye, and my 3" projector scope seemed adequate. (I made filters for Vern Vigil and Bruce from Baader mat. given me by Alin.) Visitors included Gren & Janice, John Hoopes (Lucy H's son, who is a Ctrl. Am. archeologist at U. KS. Skyler Denham, a Balto. City policeman, who told me he was a high school friend of Kenny!. Nikia V. Williams, a teacher at Kennedy Kreiger. A few people who'd seen site announced in Roylance art. Half-dozen or ten from JHU/PHA, especially from the FUSE Project. Total attendance, which came and went, 30-50. Early-on when sun was in haze, some say Venus naked-eye. My BIG project was to photograph a Brood X, 17-yr., periodical cicada looking at the TOV. This was the first time since 797 CE and the cicadas and a TOV coincided. Vaugh found a cicada that was especially cooperative & willing to pose on the screen of my 3" projector for extended periods! I took many photos of it. (I've kept it and, sadly, to preserve it for posterity, euthanized it in my refrigerator.) It seems that Baltimore got off lucky, in that Alpha Ridge, Randallstown, Pikesville were fogged out; Lutherville sun greatly diminished. No hat.
- 1796)6/08/04(TUE)HPL(8:00-10:37PM). Hazy but ok sky. Accompanied by Derek Wallentinsen, my long-time(since '73) astro friend from Calif., here for the TOV. JUPITER(Acq. 8:05PM. 4, then 3 moons. Pretty nice. TOV(A number of people asked about it, and several saw it.) BALTO. MAG.(Somebody said saw my write-up in his hotel copy.) \$78.47 (\$29.96/hr.) It was nice having Derek, in that he chatted with people while I telescoped.
- 9 1797)6/09/04(WED)HPL(8:05-10:49PM). Hazy, hot, somewhat humid. JUPITER(3+1). TOV(A number of people asked if I saw it. None said they did.). VISITS:(Christina Antoniadis, author of my Balto. Mag. art., w/her 1-mo. old infant, meaning she was very pregnant when she interviewed me! Mark Evans of Fells Pt. days. Betsy, a dancer.) \$78.30 (28.58/hr.) VISIT(An APL astronomer whose speciality is Jupiter's moons!)
- 9 1798)6/12/04(SAT)HPL(8:18-11:18PM). Sl. cool breeze. So-so seeing. BICEN STAGE!(Such a crush of people near Amphitheater to hear a Beattles immatators group, was impossible to operate in usual spot. Plus, music would have been deafening.) Pretty steady traffic. TOV (Several people who saw it and we excited by it.) JUPITER(2+2; never a knock your socks off image.). HH(Lots of hi energy lookers and young kids. I rose to the occasion, but would have preferred a more serene evening. I wonder if the day is coming when I won't be able anymore to match the energy output of my lookers.) \$92.68 (\$30.89/hr.)
- 9 1799)6/20/04(SUN)HPL(8:19-10:40PM). Cool, gd. sky. HH(A few hrs. after ret. from a 5-d visit w/Phyllis Levy Weber in St. Louis. Felt shaky lv. hse., but was fine once lookers start-reacting excitedly!) SUMMER SOLSTICE @ 20:57! 3-d MOON(Lookers liked.) JUPITER(2+2; nice! HAT SIGN(Lots of no contribs. Will resurect \$1 Suggested sign!) \$82.63 (\$35.16/hr.)

45
TOTAL THIS PAGE = \$ 393.86

TOTAL THIS YEAR = \$3,647.25

- 8 1800) 6/23/04 (WED) HPL (8:56-9:50PM). Late start due to handringing over whether to telescope or go to Swallowtail dance. Confusion compounded by iffy sky. Drove to dance, decided to telescope, went home, and loaded up. Good scene in Hpl. Good sky at start, then thickening haze. Had to shut down. Not a great start to new 100's stints series! 6-day MOON. JUPITER (3+1). Lots of young lookers. Challenging! \$60.42 (\$67.13/hr.!!!) THE ABOVE NOTED PROBLEMS, NOTWITHSTANDING, THIS WAS MY HIGHEST /HR. STINT EVER!!!!
* Seeing the Moon in a blue sky, I felt I would not be true to myself if I went to dance. Once in Hpl., I was reminded again that this is what I do best...is where I belong!
- 9 1801) 6/24/04 (THU) HPL (8:40-10:08). Warm. Thick haze late afternoon, but went out figuring it would dissipate at sunset. It began to but then gradually thicked till I had to quit. 7-d. MOON. JUPITER (4 on L, then 3.) HPL (Very busy, with lots of families. VISIT: Lisa, Ch. 11 reporter, w/her daughter, Grace. Nick, JHU astronomer. \$41.19 (\$28.21/hr.)
- 9 1802) 6/26/04 (SAT) HPL (8:09-11:36PM). Mild, w/occasional hi, thin clds. BICEN STAGE (It looked to me like a very loud band would be in Amphitr, and decided it would be oppressive.) HH (Pain in right buttoch, which I first noticed on Wed. and which has been bothering me off and on, but which didn't bother me today during the day, returned as soon as I set up. Since it is caused by motion, I had to grin & bear it and work around it as best I could.) Slow start, then pretty busy. 9-d MOON (As good as it gets. Tycho & sunrise on Copernicus. Stayed on 80X.) JUPITER (3+1. Nice at 80X.) VISIT (A man who remembered well my "magnetic streets" discovery.) \$164.16 (\$45.60/hr.) PARKING (Apprehensive about finding a light St. space, parked in Gallery loading dock. Long walk to Bicent!)
- 9 1803) 6/27/04 (SUN) HPL (8:03-11:25PM). Comfortably warm; occasional thin clds. EAST LIP. HH (Leg pain much less. Last night in bed gave it two hot water bottle treatments. Am also taking 1-big aspirin/day + 81mg.) 10-d MOON (As last night, started with polarizer, which allowed me an extra 20-mins. Tycho region great at 166X.) JUPITER (1 + 3. Lookers liked.) ARCTURUS & ALBIREO (Per req. "what does a star look like?") LINE (Lasted whole night, giving me no break. Tough work! Am glad rain is predicted for tomorrow night!) FAMILIES (Lots. I worked well with the little kids.) Shutdown by clouds, otherwise m might still be there! VISIT (STScI astronomer w/wife and two +/- 12-yr. old girls. After looking at J & moons he remarked, "Maybe it's time for me to get a telescope." I gave him my "How to buy a telescope" blurb.) \$126.28 (\$37.47/hr.) WHEAT PENNY 41935 (Contribute by a looker who said he found it today and that it's worth a few bucks. We'll see!)
- 9 1804) 6/29/04 (TUE) HPL (8:10-11:10PM). Comfortably warm; intermittent high haze. Very busy for a Tues. night! ARCTURUS (Briefly, before Moon clear ship.) 12-d MOON (Tycho-edge craters; some lookers awestruck!) JUPITER (4, then 3). VISIT (Barry, an elderly man from Luther-ville who said he once photoed me at JHU Sp. Fair. Took digital shots of moon thru scope. HAT (Changed back to "\$1 SUGGESTED" card. Might have helped!) \$107.48 (\$35.83/) WHEAT PENNY (Seems to be worth \$2.00 on E-bay.)
- 9 1805) 6/30/04 (WED) HPL (8:39-11:20PM). Somewhat hazy sky. Warm. JUPITER (Diminished a bit by haze. 3, then 4.) 13-d. MOON (Again, Tycho & edge craters. Terrific. As good or better than last night!) HH (Feeling a bit overwhelmed by the never ending line. It's like I want things to slow down a bit, but they won't. Sometimes, looking at all the eager faces in line, plus seeing all the little kids, who are a real challenge, I feel like screaming!) VISIT (John Pieone(?), a H.S. chum of Eve's, with 4 little kids and grandparents. A tough job, probably for only a buck.) VISITS (Men and women sailors from Portuguese tall ship, who didn't pay but to whom I gave lit.) \$101.42 (\$37.56/hr.)
- 9 1806) 7/2/04 (FRI) HPL (8:37-9:48PM). Warm. Haze prior to sunset, but went to Hpl. figuring it would lift at sunset. It did for a while, but then thickened. Jupiter dimmed so much, I quit. JUPITER (4 on right.) \$34.00 (\$28.81/hr.) CASSINI SPACE PROBE (Went into orbit around Saturn Wed. night and has been sending back spectacular photos. Was asked by many lookers if I have seen them. Sofar have only seen what's on TV news.)

TOTAL THIS PAGE \$ 601.29

TOTAL THIS YEAR \$4,248.54

- 8 1807)7/03/04(SAT)HPL-BICEN.(8:44-10:44PM). Very busy scene! Set up late because of haze + lowness of Jupiter. JUPITER(2+1) Decent image briefly, then it gradually succumbed to haze. I felt bad about image quality and wanted to stop, but the line persisted. Amazingly, unlike me, lots of lookers felt ok about experience! At 10:30PM finally called it quits. Jupiter was nearly invisible to eye.) ALBIREO(Once, for a family with 5 little kids. Decided was too hard to explain and wrapped it up.)\$95.35(\$47.68/) At this point, I think I will be doable only on exceptionally clear evenings. It's alot easier to end viewing when something sinks behind a bldg. than when it simply fades away in haze! SUNSET(Has been 8:37PM for the last 7-10 d. but, too bad, tonight it was 8:36PM. The end of my relaxed, casual approach to leaving the house for Hpl. is ending.
- 9 1808)7/09/04(FRI)HPL-BICEN.(8:50-10:05PM). Late start due to hze at sunset. JUPITER(Spotted by looker around 9:05PM. Never a good image. 2 moons vis. Stripes marginal.)ARCTURUS (Actually, started on it before Jupiter found. Lookers liked ok). Actually, while I felt very defensive about Jupiter's poor image, lookers didn't seem to mind! However, unless there's an exceptionally clear night, and soon, I think this was the end of the road for I this year! HH(Felt bad about going out but good once in action!)\$30.00(23.94, ALBIREO(Couldn't find after loosing J., prob. because wedge misaligned in azimuth.) VISIT(Cuba bike tripper Bill Sneeringer and wife.)JUPITER(Calisto was there but nobody, incl. me, saw it because of the yuk.)
- 9 1809)7/29/04(THU)HPL-W.LIP(8:14-9:31PM). Pretty busy. Lots of families w/kids. Shut down by clouds. The 20-day gap since last stint was due to consistently cloudy skies. 12-d. MOON(Tycho region. Pythagoras at N. edge also good...+/-80mi dia.) VISIT(Steve & Erin Rifkin prior to setting up.) A man walking by during set-up plopped \$5 in hat. \$36.00 (\$27.97/hr.)
- 9 1810)8/22/04(SUN)(HPL-E.LIP(7:35-10:18PM). Ok sky, mild. HH(1st stint since Chicago trip, followed by bad weather. The idea of telescoping felt kind of alien. Except for the money, I might not have gone. But, what else could I have done this eve.? Once I was set-up, I felt ok about it. My energy level was good. 7-d. MOON(Began w/polariser, 17-min. before sunset. Set behind bldg. 10:18PM.) ALBIREO(Several times per req. to see a star. Good align., so acq. easily. Nice.) \$110.58 (\$40.65/hr.)
- 9 1811)8/23/04(MON)HPL-E.LIP(7:45-10:15PM) V.G. sky. Warm, sticky. HH(More tired than last night, so the work felt harder...very hard!) 8-d. MOON(Qt. Craters, Apennine Mts.) STRAIGHT WALL("Discovered" by a looker!) ANTARES("Discovered by a looker close SE to Moon. I invited looks at the pair thru finder scope.) \$116.27 (\$46.51/hr.)
- 9 8/24/04(TUE)HPL. DRY RUN. Went down on the basis of a "partly cloudy" forecast. However, after I set up the clouds continued to thicken and hide the Moon. Gave up.
- 9 1812)8/26/04(THU)HPL-W.LIP(7:32-8:55PM). A really hard stint! Great sky at start, but then increasing clouds, accompanied by a strong wind. Eventually doing 21-d. MOON through "sucker holes". Several times scoped Domino sign so kids could see how scope works. Also, lots of young kids, making the challenge even tougher! Mercifully, was totally clouded out, so packed up. \$36.87 (\$26.58/hr.)
- 9 1813)8/28/04(SAT)HPL-BICEN.(8:20-11:28PM). Good sky.Kept company by Phyllis Levy Weber, here for 5 days. She helped me reposition scope so Moon wouldn't drift behind light. 13-d MOON(Tough! Kept skipping back & forth from Tycho to edge craters. 24 hrs. short of full.)Lots of families, kids. VISIT(A female cousin of Debbie Pickett.) \$118.58(\$37.80/) VISIT(Freelance writer, Reed Hellman, who said I'm good material and would hear from him
- 9 1814)8/31/04(TUE)HPL-W.LIP(8:23-10:12PM). Clear, semi-mild. Accompanied by PLW, who helped spot the rising Moon...a valuable service! ALBIREO(Have been hesitating to do it, but it worked ok. I added the explanation that was waiting for the Moon and doing it meanwhile. 16-d.MOON(Acq. 9:25PM rising over Constellation. Mare Crisium edge..great!). VISIT: A large Afghani family, the women dress in bright saris. A woman resident of Charlestown, to whom I gave Audrey Wicker's name with a req. to look her up.) \$30.83 (\$16.94/hr.)

TOTAL THIS PAGE = \$ 574.48

TOTAL THIS YEAR = \$4,823.02

- 8 1815)9/4/04(SAT)HPL-BICEN.(8:00-11:10PM). Clear, then sl. hazy. HH(With no Moon or bright planets, went strictly for the money. Have a \$60.00 fine from city for overgrown bank yard which I wanted to cover. This prob. 1st time have done this.) ALBIREO(Used a sign saying TONIGHT STARS HAV-A-LOOK! Most lookers were ok with it, I guess. Explained that it's a single star to the eye but two stars through a scope. Had to do alot more explaining than with, say, the Moon. Very demanding!) URANUS(Couldn't find.) 20-d.MOON (Rose 10:28PM and was hoping to finish eve. w/it. Due to clouds, it didn't appear till 10-min. after I closed down.) HH(Tough stint. Not sure I want to do Albireo as main obj. again!) VISITS(Several pro astronomers, incl. Larry Marshall of Gettysburg College and a woman who teaches astro at A.A. Com. Col. All commented they like what I am doing.) HH(Unlike w/Moon, I did not actively recruit lookers. Was a very busy scene. Had the Moon or a planet been up, would have done alot better!) \$58.17 (\$18.35/hr.)
- 9 1816)9/10/04(FRI)HPL-W.LIP(7:29-11:00PM). Good sky, w/occasional think clds. HH(Decided to do Albireo again because it was a nice night and the \$\$ would feel good.)HH(Arthritis-like pain in L. hip last few days, maybe from sitting too long at computer. Took stool in case it flared up, but I was ok.) ALBIREO("They are far from Earth but close enough to each other to probably be connected by gravity and therefore orbit around each other slowly over thousands of years.") URANUS(Nice green dot. Will do more of. Need Hubble photo!) HPL(Very busy scena. Oriols/Yankees game.) \$61.89 (\$17.58/hr.) Gave out cicada fliers.
- 9/11/04(SAT)LAKE-WALKER ANNUAL COMMUNITY BLK. PTY.(INVITED TO BRING SCOPE BY JIM PICKETT) (7:29-10:45PM). Good sky till near end. As Jim said even was from 4-7:30PM, I originally intended to set-up at 4PM on "daytime stars". However, sky didn't clear sufficiently till +/-6:30PM, at which time I left for event. Upon arrival I found such a big crowd that I felt intimidated and hesitated to set-up. However, since my name was on events sked. and I saw that Jim's front yard was available, (+, I got a close-by parking space), I went ahead and set-up. ALIGNMENT(Used magnetic compass, corr.'ted to 11.5°W of N and acheived a near perfect alignment!) Mostly kid lookers at first. Was prepared to give them lots of handouts, but because I felt they'd loose them, I gave out very few. To a +/-14 yr. old boy who seemed esp. interested I gave a star map. Eventually, I had a fairly steady stream of adult lookers. One, Jeff Morris, an artist, was a fellow amateur. VEGA, ALBIREO, M 13 (just once...too fuzzy), y AND, and finally URANUS. A great observing night! Gave out cicada-Venus blurb to adults. After a scary start, I had a really great time!! NO HAT
- 9 1817)9/19/04(SUN)HPL-E.LIP(6:47-10:03). Great sky, cool. HH(Felt good. No signs of arthritis for a week.)5-d.MOON(Good, Sharp. Acq. before ss using polarizer. Tangled in light for +/-10 mins. Set behind bldg. 8:47PM.) ALBIREO(A few times.) URANUS(Put put sign and, using Hubble photo, went for it. Explained to lookers that while it was much smaller than Hubble photo, its color was the same. They seemed satisfied!) VISIT(Fred Ruoff, who want to learn how I do "setting circles".) \$59.41 (\$18.17/hr.)
- 9 1818)9/20/04(MON)HPL-E.LIP(6:45-9:30PM). Another great sky! 6-d.MOON(Great thru polarizer till after 19:06 sunset. Good craters.) ALBIREO(Several times.) URANUS(Looked good.)\$36.13(13.1 Lost Moon behind highrise at 20:53.
- 9 1819)9/21/04(TUE)HPL-E.LIP(7:16-9:42). Slow start due to clouds, which eventually dissolved, leaving a good sky. Earlier today was in DC w/Peggy Price for the opening ceremony for the Nat. Museum of American Indians. 7-d.MOON(Great craters + Appenine Mts. Sometimes at 220X. ARCTURUS & ALTAIR & ALBIREO as start requests. Warmish temp. \$38.38 (\$15.79/hr.) Having the thought that my best nights are when there are lots of families with childred.
- 10 1820)9/22/04(WED)HPL-E.LIP(7:05-10:00PM). Late start due to traffic jam. Good sky(sometimes degraded seeing); warm. 8-d. MOON(Sunrise on Copernicus just starting at setup. 1/5 of way at shutdown. Plato, Tycho, Straight Wall.) MONEY(Have thought that, given it's dependent on \$1 contribs., this is a stupid way to try to make money!)\$53.77 (\$18.41/hr.)

TOTAL THIS PAGE = \$ 307.75

TOTAL THIS YEAR = \$5,130.77

- 8 1821) 9/23/04 (THUR) HPL-W.LIP(6:54-7:15PM). Thickening clouds during setup, which soon shut me down. Waited for 15-20 mins., but it got worse, so packed up. Bytime I got was clear. Too bad I didn't stick around, as was a busy scene! CHANNEL 45 (Reporter Jeff Abel and cameraman interviewed and filmed me re the just passed city street performers ordinance. Happily, while they filmed, I had two enthusiastic lookers! \$2.00
- 9 1822) 9/24/04 (FRI) HPL-W.LIP(6:51-10:45PM.) 40% cloud cover late afternoon, but after last night's debacle was determined to go for it. 10d.-MOON(Tycho region vs. Plato region... jumped back & forth. Started w/80X but later used mostly 167X. Haze prob. middle evening for +/-1 hr.) HH(Very animated for a while, then began tiring.) \$102.02 (\$26.16/hr.)
- 9 1823) 9/25/04 (SAT) HPL-BICEN(7:20-8:17PM). Quite cloudy as I drove down but was hoping it would clear post sunset. It really didn't. Too bad, because I was attracting great interest. 11-d.MOON(With the haze, it was hard to know if bookers, esp. kids, weren't seeing it (Tycho region) right because of the focus or the haze!) VISIT(Rick Foster, who I didn't recognize for several mins. because he was so out of context!) \$22.00 (\$23.16/hr.)
- 9 1824) 10/01/04 (FRI) HPL-W.LIP(7:02-9:50PM) Coming and going clouds, which finally shut me down HH(Really rung my hands about going out, but once there I was ok.) ALBIREO(Tonight's main feature.) URANUS(What I really wanted to be doing tonight, because I have a photo and can explain it. Held for around 20-mins till clouds.) Very busy scene! \$38.31 (\$13.67
- 9 1825) 10/03/04 (SUN) HPL-W.LIP(6:55-10:21PM). Mild, v. clear. Busy scene at first, then it melted out. HH(Stayed later than expected because was enjoying myself!) ALBIREO(1st try. URANUS(Having today laminated the Hubble photo, was eager to get going on it. Acq./-7:36PM and stayed with it. Lookers seemed satisfied, but I think an "I Saw..." sticker would be good. Bounced around bet. 80X and 220X.) M 31 (By req. actually got it by using a Cas as guide star!) Got inordinate no. of \$5 contribs! \$75.61 (\$22.04/hr.)
- 9 1826) 10/04/04 (MON) HPL-W.LIP(6:58-9:50PM). Mild, occasional thin clds. SCOPE(Big trouble finding Albireo. Finally decided scope's dec. axis off. Assuming I was polar align'd., I put dec. circle at +28° and turned dec. control till star in mid-field. It worked.) TOUGH KIDS(Early on visited by 6-8 very hard to control young men. They tried to screw around w/scope and made moves toward hat money. Somehow I prevailed, and they left.) ALBIREO. URANUS(Maybe should stick to 80X. Is easy to look thru, & color evident.) \$59.79 (\$20.91/
- 9 1827) 10/06/04 (WED) HPL-W.LIP(6:55-7:40PM) Mild, thin clouds early which were dissolving. BODY IN WATER!(A body was discovered floating in the water just in front of where I was set up. Just as I was starting on URANUS (7:33PM), a police boat and a huge number of police vehicles descended on the scene. They pushed back the crowd and stretched yellow tape around the whole area, leaving me isolated. At 7:40PM they told me to move. It took five mins., but I got everything beyond the yellow tape. After 1/2 hr., decided police were not leaving anytime soon, so gave up on the evening and came home. VISIT(Ravi, who had been at my Transit of Venus event.) \$8.15 (\$10.87/hr.)
- 9 1828) 10/07/04 (THUR) HPL-W.LIP(6:51-9:28PM). Mild, v. clear. Accompanied by Phyllis Levy Weber in from St. Louis for a few days, who enthusiastically recruited lookers. "I SAW...URANUS" STICKERS(1st night with them. Phyllis gave out alot and said people reacted very favorably to them.) ALBIREO. URANUS(Phyllis thinks it would be better to make Albireo the main feature and U the second one.) PHOTOGRAPHY(We arrived early to take photos of the Domino Sugar sign, which turns silvery at sunset.) \$48.76 (\$18.61/)
- 9 1829) 10/08/04 (FRI) HPL-W.LIP(7:13-10:02PM). Mild, clear. Accompanied by PLW, who did a good a good job talking to lookers in line and handing out Uranus sticker. ALIGNMENT(Perfect, for a change. Uranus on 1st try each time!) ALBIREO(Worked w/photo from the 6/03 S&T. Effective, I believe.) URANUS(Most lookers felt OK about it.) HH(Honed presentation "We don't have the Moon nor Saturn's rings, tonight, so We're doing the brightest planet up there tonight...the prettiest stars." \$65.41 (\$23.28/hr.)

TOTAL THIS PAGE = \$ 422.05

TOTAL THIS YEAR = \$5,552.82

- 9 1830) 10/11/04 (MON) HPL-W.LIP (6:35-9:20PM.) ss 6:32PM. Coolish, v. clear. PHOTOGRAPHY (Took more photos of me & scope with Uranus sign. Also, a looker took digital photos of me explaining Uranus to his son, which he said he'd e-mail me. Took photos of Penn Sta. sculpture on way home.) ALBIREO (Using photo helps, I think.) URANUS (Now near different stars.) M31 (For a young woman who seemed especially interested in astronomy. Star hopped from a Cas.) V. quiet scene at stint end. \$35.62 (\$12.95/hr.)
- 9 1831) 10/12/04 (TUE) HPL-W.LIP (6:38-8:35PM). Mild, scattered hi, thin clds. ALIGNMENT (Something very wrong. Couldn't even find Albireo! Finally used Vega to align as best I could. Adjusted dec. axis at home.) ALBIREO (Briefly. Left it feeling Uranus easier to invite passersby.) URANUS (Announced it as "7th planet from the Sun. In future will add "3rd largest planet." Image sl. degraded by thin clds.) SCENE (So quiet I quit early.) \$17.00 (\$8.70/)
- 8 1832) 10/23/04 (SAT) HPL-W.LIP (5:58-9:52PM). Coolish (wore longjohns). 1st stint in 11 d. due to clouds/rain. 10d. MOON (Rose in clear sky. Then increasing haze, Contemplated leaving, but stuck it out and haze thinned. Finally, haze again, so I quit. Tycho region at 165X. Did Apollo 11 site for man who said he shook hand of Neil Armstrong!) ALBIREO (1X) \$119.25 (\$30.58/)
- 9 10/26/04 (TUE) HPL-W.LIP (7-7:30PM). Mild. DRY RUN. 13d. Moon rose in clear area of sky, but became hazy looking as I set up. Hung around for 15 mins., then decided to give up. A very quiet scene contributed to decision. However, upon arriving home Moon looked good. Right now, however, (8:30PM) sky is very hazy.
- 2 1833) 10/27/04 (WED) 3120 ST. PAUL ST. (9:15-12:15PM) TOTAL ECLIPSE OF THE MOON. Weather rpt. adverse this morning, the sudden clearing late afternoon. Eclipse began in a great sky. However, just at totality thick clouds moved in. They stayed thru half of totality and then broke up, allowing a good view. Did the "sucker hole" thing during 1st half! OCULARS (Alternated between 80X, 50X and 6X finderscope, the latter giving a very satisfactory view.) ATTENDANCE (Alin was only other telescopist. Magda came, too. I was gratified by the number of attendees, who must have numbered 25-30 at peak..) VISITORS (Leah, Eta & 2 friends, Suzanne, Alice Bröck & Michele, Louis R., Kay & Eddie, Ann Gordon & friends, Ravi & friend, plus many others.) PHOTOGRAPHS (I took some, Alin & others took digital shots which I hope they'll put on line. CONCL. (A good time had by all, incl. me!) NO HAT Gave out +/- 30 copies of Roylance's eclipse art. + a doz. cicada/Venus blurbs.
- 9 1834) 10/28/04 (THUR) HPL-W.LIP (6:45-9:02PM). Chilly. Clear to sl. haze. Very slow scene. LAST NIGHT'S ECLIPSE (Lots of passersby saying they saw it and were pleased.) URANUS (Trouble finding, partly because I misinterpolated time!) DJ (A kid who arrived on a bike and who showed good interest. I handed him the Uranus photo and let him do some explaining to lookers.). 15-d. MOON (Acq. 8:35PM from behind WTC. Good edge craters.) \$18.63 (\$8.17/hr.)
- 9 1835) 11/14/04 (SUN) HPL-W.LIP (5:30-7:40PM). Chilly, but not glove temp. Sl. hazy. FIRST STINT OF MY 18TH YEAR! AMSTERDAM (Just back from a week in A-dam w/Phyllis Weber Levy visiting Frank & family.) HPL (Slow scene; pretty empty at quitting time.) STAR MAP (Unable to print Nov. map from computer, so worked with Oct. one.) ALBIREO (Started with and went back to a few times.) URANUS (Seemed to work ok. Used mainly 166X, but a few lookers favored 80X, so will use it more in future.) HH (In good form!) VISITS (Roslyn Ellis, who will mail me a poem about me she saw in local publication.) SCIENCE ED. CONVENTION (Had a looker from an Iowa planetarium who predicted there's be more like him this week!) \$25.38 (\$11.70/hr.) VENUS-JUPITER-MOON PRE-DAWN CONJ. (+/- 6 lookers rpt. 'd exciting obsvs. of it last week!)
- 9 1836) 11/15/04 (MON) HPL-E.LIP (6:08-9:20PM). Goveless temp. Increasing clouds at sunset, but decided to chance it. Some cloud interference, but managed to keep going. ALBIREO (Almost at bldg. line at end.) URANUS (80X, exclusively. It worked. Well hyped!) SCENE (Quiet. Was contemplating quitting at 7:30PM. Kept going for lack of better alternative. Good surge of lookers around 9PM. Forgot to ask if any from Sc.Ed.Conf.) \$35.37 (\$11.05/hr.) VISIT (Frank Roylance's daughter and friend.)

TOTAL THIS PAGE = \$ 251.25

TOTAL THIS YEAR = \$5,804.07

STREET CORNER TELESCOPE LOG

- 8 1837) 11/16/04 (TUE) HPL-E.LIP (5:42-7:05PM). Mild. Blue sky all day, then increasing haze around sunset. Overcast by 7PM. HPL (Very slo scene when I arrived, but it gradually livened up. Would have been ok, had I stayed.) 4-d MOON (Good. Set in lights, 6:55PM) ALIGNMENT (Poor. Maybe should take mag. compass next time!). VISITS (Two large Hispanic families with wide age spectrum. One contrib.'d \$5, the other \$6.) \$17.82 (\$12.89/hr.)
- 9 11/28/04 (SUN). DRY RUN. Cool, somewhat breezy, clouds on W. horizon but, imagining that with the Santa Claus House in business there would be lots of families with kids. Wrong! The place was pretty bleak. I wheeled scope to E.LIP but didn't set-up. Only objects would have been Uranus and B Cyg and I felt I didn't have enough enthusiasm to tout either to the few passersby. Am thinking I should simply wait for Saturn to arrive! Also tonight, there were scattered, puffy clds., so I might have had to sucker hole it!
- 9 1838) 12/05/04 (SUN) HPL-W.LIP (5:28-7:00PM). Cool but comfortable. Sl. haze. HH (With B Cyg as the only possibility, I hesitated going out. However, the sky & temp. were so right that I couldn't resist. Also, was imagining Hpl. would be pretty busy. However, it wasn't! It was dropping off rapidly as I was setting up. By 7PM was v. slow. Nevertheless, I was very energetic and enthusiastic in trying to recruit the few passersby!) ALBIREO (Between picture & my explanations, lookers like it. \$23.00 (\$15.03/hr.))
- 21 1839) 12/13/04 (MON) BIOTREK TALK, ATTN: JACK WENNERSTROM, 410-655-1876 (7-9:15PM) "Geminid Meteor Shower: Viewing the Pre-Solstice Heavens". +/-10 attendees. I gave a rambling talk, some about myself, some about meteor showers. After talk we adjourned to parking lot to look for Geminids. It was cold, sl. windy, but tolerable. The clouds present at first soon disapated. GEMINIDS (Everyone present--EXCEPT ME!--saw several and were very satisfied with the experience. A few brought loud ooh's and aah's. Maybe there was a total of 10-12 seen. SATURN (I was resisting setting up scope till someone asked, "What's that star over there?", at which point I decided I better put up scope. Sat. looked good. Several moons much brighter than in Hpl.) M 42 (After S. and thru trees, it was much better than in Hpl.) COMET MACHHOLZ (Was somewhere low over tree line, if not in trees, but couldn't find.). HH (Felt a bit disorganized during talk. It's like I've lost interest in the details of the subject and not retaining much info. Hi energy tho!) \$60.00
- 9 1840) 12/17/04 (FRI) HPL-W.LIP (5:15-8:15PM). Clear, cold. Suprisingly quiet looking scene upon arrival. However, I had fairly steady traffic, which was picking up over time. Would have stayed longer, except for cold! 6-d MOON (Fine! Back & forthed 80X-220X.) COMET MACHHOLZ G/2004 Q2 (Made up a TONIGHT SEE A COMET sign, but no luck finding it. Is now about 5th mag. and brightening.) Good number of families/kids. \$55.45 (\$18.48/hr.)
- 9 1841) 12/18/04 (SAT) HPL-W.LIP (4:46-9:20PM). Sl. adverse weather rpt. but great sky till toward end of stint. Semi-mild temp. Santa Claus House had a good line up till 8PM closing time. Had lots of families/kids, prob. thanks to it. ACCIDENT (Mid-eve. diagonal-eyepiece fell out of scope, hitting the bricks pretty hard. Fortunately, NO obvious damage!) 7-d MOON (Went let qt. while at Hpl. Fine! Some lookers very impressed. 80-220X. COMET M, (Tried offsetting from B Ori, but still no luck, prob. thanks to lights + haze.) SATURN! Spotted by Frankie just as I was starting to close up. It appeared from behind the top floors of the WTC at 9:20PM. It looked great. Spend +/-15 min. with it. \$153.56 (\$33.68/) MNEMONICS (First use of "color coded" one. Gave out planets on orange paper.) FRANKIE (Gave him a \$10 "happy holidays" tip.)

TOTAL THIS PAGE = \$ 309.83

TOTAL THIS YEAR = \$6,113.90

65
Year = 754 Miles
+ 13 (10/6-7/04: two RT's to Baumgarten)

T = 767 Miles

About the Celestial Objects

Listed on this page are several of the brighter, more interesting celestial objects visible in the evening sky this month (refer to the monthly sky map). The objects are grouped into three categories. Those that can be easily seen with the naked eye (that is, without optical aid), those easily seen with binoculars, and those requiring a telescope to be appreciated. **Note, all of the objects (except single stars) will appear more impressive when viewed through a telescope or very large binoculars.** They are grouped in this way to highlight objects that can be seen using the optical equipment that may be available to the star gazer.

Tips for Observing the Night Sky

When observing the night sky, and in particular deep-sky objects such as star clusters, nebulae, and galaxies, it's always best to observe from a dark location. Avoid direct light from street lights and other sources. If possible, observe from a dark location away from the light pollution that surrounds many of today's large cities.

You will see more stars after your eyes adapt to the darkness—usually about 10 to 20 minutes after you go outside. Also, if you need to use a torch to view the sky map, cover the light bulb with red cellophane. This will preserve your dark vision.

Finally, even though the Moon is one of the most stunning objects to view through a telescope, its light is so bright that it brightens the sky and makes many of the fainter objects very difficult to see. So try to observe the evening sky on moonless nights around either New Moon or Last Quarter.

Astronomical Glossary

Conjunction – An alignment of two celestial bodies such that they present the least angular separation as viewed from Earth.

Constellation – A defined area of the sky containing a star pattern.

Diffuse Nebula – A cloud of gas illuminated by nearby stars.

Double Star – Two stars that appear close to each other in the sky; either linked by gravity so that they orbit each other (binary star) or lying at different distances from Earth (optical double). Apparent separation of stars is given in seconds of arc (").

Ecliptic – The path of the Sun's center on the celestial sphere as seen from Earth.

Elongation – The angular separation of two celestial bodies. For Mercury and Venus the greatest elongation occurs when they are at their most angular distance from the Sun as viewed from Earth.

Galaxy – A mass of up to several billion stars held together by gravity.

Globular Star Cluster – A ball-shaped group of several thousand old stars.

Light Year (ly) – The distance a beam of light travels at 300,000 km/sec in one year.

Magnitude – The brightness of a celestial object as it appears in the sky.

Open Star Cluster – A group of tens or hundreds of relatively young stars.

Opposition – When a celestial body is opposite the Sun in the sky.

Planetary Nebula – The remnants of a shell of gas blown off by a star.

Universal Time (UT) – A time system used by astronomers. USA Eastern Standard Time (for example, New York) is 5 hours behind UT.

Variable Star – A star that changes brightness over a period of time.

NORTHERN HEMISPHERE SEPTEMBER 2004

Easily Seen with the Naked Eye

- Altair • Brightest star in Aquila. Name means "the flying eagle". Dist=16.8 ly.
- Capella • The 6th brightest star. Appears yellowish in color. Spectroscopic binary. Dist=42 ly.
- Arcturus • Orange, giant K star. Name means "bear watcher". Dist=37 ly.
- 5 Cephei • Cepheid prototype. Mag varies between 3.5 & 4.4 over 5.365 days. Mag 6 companion.
- Deneb • Brightest star in Cygnus. One of the greatest known supergiants. Dist=3,000 ly.
- α Herculis • Semi-regular variable. Magnitude varies between 3.1 & 3.9 over 90 days. Mag 5.4 companion.
- Vega • The 5th brightest star in the sky. A blue-white star. Dist=25.3 ly.
- Algol • Famous eclipsing binary star. Magnitude varies between 2.1 & 3.4 over 2.867 days.
- Formhaut • Brightest star in Piscis Austrinus. In Arabic the "fish's mouth". Dist=25 ly.
- Antares • Red, supergiant star. Name means "rival of Mars". Dist=135.9 ly.
- Polaris • The North Pole Star. A telescope reveals an unrelated mag 8 companion star.

Easily Seen with Binoculars

- M31 • The Andromeda Galaxy. Most distant object visible to naked eye. Dist=293 million ly.
- M2 • Resembles a fuzzy star in binoculars.
- η Aquilae • Bright Cepheid variable. Mag varies between 3.6 & 4.5 over 7.166 days. Dist=1,200 ly.
- M3 • Easy to find in binoculars. Might be glimpsed with the naked eye.
- μ Cephei • Herschel's Garnet Star. One of the reddest stars. Mag 3.4 to 5.1 over 730 days.
- χ Cygni • Long period pulsating red giant. Magnitude varies between 3.3 & 14.2 over 407 days.
- M39 • May be visible to the naked eye under good conditions. Dist=900 ly.
- ν Draconis • Wide pair of white stars. One of the finest binocular pairs in the sky. Dist=100 ly.
- M13 • Best globular in northern skies. Discovered by Halley in 1714. Dist=23,000 ly.
- ε Lyrae • Farther and smaller than M13. Use a telescope to resolve its stars.
- M92 • Famous Double Double. Binoculars show a double star. High power reveals each a double. Semi-regular variable. Magnitude varies between 3.9 & 5.0 over 46.0 days.
- M10 • 3 degrees from the fainter M12. Both may be glimpsed in binoculars. Dist=14,000 ly.
- IC 4665 • Large, scattered open cluster. Visible with binoculars.
- 6633 • Scattered open cluster. Visible with binoculars.
- M15 • Only globular known to contain a planetary nebula (Mag 14, d=1"). Dist=30,000 ly.
- M18 • Double Cluster in Perseus. NGC 869 & 884. Excellent in binoculars. Dist=7,300 ly.
- M8 • Lagoon Nebula. Bright nebula bisected by a dark lane. Dist=5,200 ly.
- M25 • Bright cluster located about 6 deg N of "teapot's" lid. Dist=1,900 ly.
- M2 • A spectacular globular star cluster. Telescope will show stars. Dist=10,000 ly.
- M6 • Butterfly Cluster. 30+ stars in 7x binoculars. Dist=1,960 ly.
- M7 • Super open cluster. Visible to the naked eye. Age=250 million years. Dist=780 ly.
- Mizar & Alcor • Good eyesight or binoculars reveals 2 stars. Not a binary. Mizar has a mag 4 companion. Goatshead asterism or "Brooch's Cluster". Not a true star cluster. Dist=218 to 1,140 ly.

Telescopic Objects

- γ Andromedae • Attractive double star. Bright orange star with mag 5 blue companion. Sep=9.8".
- 7009 • Saturn Nebula. Requires 8-inch telescope to see Saturn-like appendages.
- 7293 • Helix Nebula. Spans nearly 1/4 deg. Requires dark sky. Dist=300 ly.
- γ Aurigae • Impressive looking double blue-white star. Visible in a small telescope. Sep=7.8".
- ε Bootis • Red giant star (mag 2.5) with a blue-green mag 4.9 companion. Sep=2.8". Difficult to split.
- M51 • Whirlpool Galaxy. First recognised to have spiral structure. Dist=25 million ly.
- α Cassiopeiae • Yellow star-mag 3.4 & orange star-mag 7.5. Dist=19 ly. Orbital period=80 years. Sep=12".
- Albireo • Beautiful double star. Contrasting colours of orange and blue-green. Sep=34.4".
- 61 Cygni • Attractive double star. Mags 5.2 & 6.1 orange dwarfs. Dist=11.4 ly. Sep=28.4".
- γ Delphinii • Appear yellow & white. Mags 4.3 & 5.2. Dist=100 ly. Struve 2725 double in same field.
- β Lyrae • Eclipsing binary. Mag varies between 3.3 & 4.3 over 12.940 days. Fainter mag 7.2 blue star.
- M57 • Ring Nebula. Magnificent object. Smoke-ring shape. Dist=4,100 ly.
- M20 • Trifid Nebula. A telescope shows 3 dust lanes rising nebula. Dist=5,200 ly.
- M17 • Omega Nebula. Contains the star cluster NGC 6618. Dist=4,900 ly.
- M11 • Wild Duck Cluster. Resembles a globular through binoculars. V-shaped. Dist=5,600 ly.
- M16 • Eagle Nebula. Requires a telescope of large aperture. Dist=8,150 ly.
- M33 • Fine face-on spiral galaxy. Requires a large aperture telescope. Dist=2.3 million ly.
- M27 • Dumbbell Nebula. Large, twin-lobed shape. Most spectacular planetary. Dist=975 ly.

CELESTIAL OBJECTS

maps

| | |
|---|----------|
| 01/05/04 STA file folders (Staples) | \$ 1.57p |
| 01/31/04 SP download Feb. '04 star map (JHU) | \$ 0.12 |
| 02/01/04 SP 12-sides Feb. star map (JHU) | \$ 0.72 |
| 02/04/04 SP 10-sides star map (JHU) | \$ 0.60 |
| 2/07/04 POST mail March req. to Hpl/ | \$ 0.37 |
| 2/14/04 SP 16-sides Feb. star map (JHU) | \$ 0.96 |
| 2/27/04 SP 24-sides SC handouts (JHU) | \$ 1.44 |
| 2/28/04 SP 40-sides SC handouts (JHU) | \$ 2.40 |
| 2/28/04 VENUS 7-sides 1882 newspapers (JHU) | \$ 0.42 |
| 2/28/04 SP Frankie in Hpl. | \$ 5.00 |
| 2/29/04 VENUS 1-pkg. Pop-tarts to test wrapper as solar filter (7-11) | \$ 2.49 |
| 2/29/04 SP 14-sides SC star map (JHU) | \$ 0.84 |
| 2/29/04 SP Frankie in Hpl. | \$ 5.00 |
| 3/01/04 VENUS 1-cpy. Black Drop explanation (JHU) | \$ 0.06 |
| 3/01/04 SP 2-sides March star map (JHU) | \$ 0.12 |
| 3/02/04 SP 22-sides March star map (JHU) | \$ 1.32 |
| 3/02/04 VENUS 4.7 miles lookinf for Lake Montebello office(never found! @36¢/ | \$ 1.69 |
| 3/02/04 VENUS 6-cpys. letter & encls. to Right of Way Section (Kinkos) | \$ 0.48 |
| 3/02/04 VENUS mail permit req. + encls. to (ibid) | \$ 0.37 |
| 3/02/04 SP Frankie in Hpl. | \$ 5.00 |
| 3/03/04 SP 36-side SC handouts (JHU) | \$ 2.16 |
| 3/03/04 POST mail April reqs. to Hpl. | \$ 0.37 |
| 3/04/04 VENUS 8-sides pages from The Transits of Venus book (JHU) | \$ 0.48 |
| 3/06/04 VENUS 10-sides pages from Woplf and Danson books (Loyola) | \$ 0.80 |
| 3/7/04 VENUS 2-sides Encylopedia (Loyola) | \$ 0.16 |
| 3/09/04 VENUS 11-sides Sousa march; 2-sides misc. info. (JHU) | \$ 0.78 |
| 3/09/04 SP 6-sides Hubble Ultra Deep Field article (JHU) | \$ 0.36 |
| 3/11/04 SP 1000 post-it notes (Staples) | \$ 4.60 |
| 3/12/04 VENUS 6-sides letter plus insurance doc. to Paul Barnes (Loyola) | \$ 0.48 |
| 3/12/04 POST mail letter to Paul Barnes, DPW | \$ 0.37 |
| 3/13/04 SP Frankie in Hpl. | \$ 5.00 |
| 3/15/04 VENUS 4-sides art. p. 3 + letter to Sun (JHU) | \$ 0.24 |
| 3/17/04 VENUS 8-sides materials for BCC project (Kinkos) | \$ 0.64 |
| 3/17/04 VENUS mail project proposal to BCC | \$ 0.60 |
| 3/19/04 VENUS 11-sides background info (Loyola) | \$ 0.88 |
| 3/22/04 VENUS 6-sides revised art. (Kinkos) | \$ 0.48 |
| 3/22/04 VENUS mail art. to Eve Heyn for review | \$ 0.50 |
| 3/22/04 VENUS 3-sides M&D's contract w/Calvert-Penn (JHU) | \$ 0.12 |
| 3/22/04 VENUS 1-side letter from Kodak about silver emulsions (JHU) | \$ 0.01 |
| 3/23/04 SP Frankie in HPL. | \$ 5.00 |
| 3/24/04 STA typewriter ribbons (Ken & Ray) | \$ 4.60 |
| 3/24/04 SP 36-sides SC handouts (JHU) | \$ 2.16 |
| 3/28/04 SP Frankie in HPL | \$ 4.00 |
| 3/29/04 VENUS 5-sides e-mails (Loyola) | \$ 0.40 |
| 3/29/04 SP Frankie in Hpl. | \$ 4.00 |
| 3/31/04 VENUS 12-sides letters to BCC, article, enclosures (Kinkos) | \$ 1.01 |
| 3/31/04 VENUS postage to mail two letters to BCC | \$ 0.74 |
| 4/06/04 VENUS 5-side art. for Lucy Hoopes, editor (Staples) | \$ 0.30 |
| 4/8/04 SP 14-sides April star map (JHU) | \$ 0.84 |
| 4/9/04 SP Frankie in HPL | \$ 5.00 |
| 4/10/04 SP 42-sides replenish SC handouts (JHU) | \$ 2.52 |
| 4/13/04 VENUS Scanning & copyediting Venus art. @ \$5/page (EDITACTION)(ck#780) | \$100.00 |
| 4/16/04 SP Frankie in Hpl. | \$ 5.00 |
| 4/17/04 SP SC handouts 46-sides (JHU) | \$ 2.71 |
| 4/24/04 SP Frankie in Hpl. | \$ 6.00 |
| 4/28/04 SP Frankie in Hpl. | \$ 5.00 |

STA = \$ 6.26
 SP \$ 77.92
 POST \$ 1.11
 VENUS \$114.32

PAGE TOTAL \$199.61

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| 04/29/04 | SP 16-sides May star map (JHU) | \$ 0.96 |
| 04/30/04 | SP Frankie in HPL. | \$ 5.00 |
| 05/01/04 | POST mail HPL June requests | \$ 0.37 |
| 05/01/04 | VENUS 5-sides "sidebar" materials for Jeff Price(Kinkos) | \$ 0.40 |
| 05/01/04 | POST mail materials to J. Price | \$ 0.37 |
| 05/04/04 | SP Frankie in Hpl.(\$5); "Rose Man in Hpl.(\$3) | \$ 8.00 |
| 05/05/04 | SP 30-sides SC handouts (JHU) | \$ 1.80 |
| 05/07/04 | SP 1000-Post-It Notes for handouts (Staples) | \$ 4.60 |
| 05/08/04 | SP Frankie in HPL | \$ 5.00 |
| 05/09/04 | SP 36-sides SC handouts (JHU) | \$ 2.16 |
| 05/09/04 | SP Frankie in HPL | \$ 5.00 |
| 05/10/04 | SP Frankie in HPL | \$ 5.00 |
| 05/10/04 | SP 26-sides SC handouts (JHU) | \$ 1.56 |
| 05/12/04 | SP Frankie in HPL | \$ 7.00 |
| 05/12/04 | SP 1-copy ISS ephemeris (JHU) | \$ 0.06 |
| 05/13/04 | SP 23-sides SC handouts (Kinkos) | \$ 1.84 |
| 05/13/04 | SP Frankie in Hpl. | \$ 7.00 |
| 05/13/04 | VENUS 1-roll of Tri-X film for solar filter (Service Photo) | \$ 3.56 |
| 05/14/04 | SP 22-sides SC handouts (JHU) | \$ 1.32 |
| 05/14/04 | SP Frankie in Hpl. | \$ 5.00 |
| 05/16/04 | VENUS composing cover title (Kinkos) 25-sides @ \$0.08/ea. for booklet | \$ 2.00 |
| 05/16/04 | VENUS 11-booklets(7 p. ea.) = 77 sides (JHU) @ \$0.06/ea. | \$ 4.62 |
| 05/18/04 | VENUS 15-booklets(7 p. ea.) = 105 sides @ \$0.06/ea. (JHU) | \$ 6.30 |
| 05/21/04 | POST | \$ 0.37 |
| 05/23/04 | VENUS 56-side (14 sets) article for news papers (JHU) | \$ 3.36 |
| 05/23/04 | POST mail 14 sets of articles to news papers | \$ 5.18 |
| 05/24/04 | VENUS 2-sides art. to USA Today (JHU) | \$ 0.12 |
| 05/24/04 | VENUS mail art. to USA Today | \$ 0.37 |
| 05/28/04 | SP 22-side SC handouts (JHU) | \$ 1.32 |
| 5/28/04 | STA 1-bottle of H2O for HPL stint (HPL) | \$ 2.00 |
| 5/28/04 | SP Frankie in Hpl. | \$ 8.00 |
| 5/29/04 | SP 19-sides SC handouts (JHU) | \$ 1.14 |
| 5/29/04 | SP Frankie in Hpl. | \$ 6.00 |
| 6/01/04 | POST remail USA Today Venus art. | \$ 0.37 |
| 6/01/04 | SP Frankie in Hpl. | \$ 5.00 |
| 6/01/04 | SP 22-sides June star map (JHU) | \$ 1.32 |
| 6/03/04 | SP Frankie in Hpl.(packing-up + security help) | \$ 10.00 |
| 6/08/04 | VENUS 24-sides article (JHU) | \$ 1.44 |
| 6/08/04 | SP SC handouts (JHU) 10-sides | \$.60 |
| 6/08/04 | SP Frankie in Hpl. | \$ 5.00 |
| 6/08/04 | POST mail astro materials to Arbutus Mid. Sch. teacher, Heather Williams | \$ 0.60 |
| 6/09/04 | SP Frankie in Hpl. | \$ 7.00 |
| 6/10/04 | SP 20-sides SC handouts (JHU) | \$ 1.20 |
| 6/12/04 | POST mail astro mats. to N.V.Williams, Kennedy-Krieger teacher | \$ 0.83 |
| 6/20/04 | SP Frankie in Hpl. | \$ 5.00 |
| 6/24/04 | SP 12-sides SC starmap (Kinkos) | \$ 0.72 |
| 6/24/04 | SP Frankie in Hpl. | \$ 7.00 |
| 6/26/04 | SP 20-side SC handouts (JHU) | \$ 1.20 |
| 6/26/04 | SP Frankie in Hpl. | \$ 7.00 |
| 6/27/04 | SP 23-sides SC handouts (JHU) | \$ 1.38 |
| 6/27/04 | SP Frankie in Hpl. | \$ 7.00 |
| 6/28/04 | SP 7-sides SC handouts (JHU) | \$ 0.42 |
| 6/29/04 | SP 23-sides SC handouts (JHU) | \$ 1.38 |
| 6/29/04 | SP Frankie in Hpl. | \$ 5.00 |

STA = \$ 2.00

SP = \$143.98

POST = \$ 8.09

VENUS = \$ 22.17

PAGE = \$176.24

PAGE TOTAL \$176.24

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| 6/30/04 | SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 6/30/04 | SP Frankie in Hpl. | \$ 5.00 |
| 7/2/04 | SP 54-sides SC handouts @ \$0.07/ea. (JHU) | \$ 3.78 |
| 7/3/04 | SP Frankie in Hpl. | \$6.00 |
| 7/10/04 | SP 18-sides SC July star map (JHU) @ \$0.07/ea. | \$ 1.26 |
| 7/16/04 | SP Frankie in Hpl. | \$ 3.00 |
| 7/26/04 | STA funnel for pouring alcohol into squeeze btl. (Shoppers Food) | \$ 3.14 |
| 7/28/04 | POST mail Sept. reqs. to Hpl. | \$0.37 |
| 7/30/04 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 8/3/04 | STA Typewriter overhaul (Ken & Ray #0692) | \$26.75 |
| 8/12/04 | STA envelopes (Staples) | \$ 0.75 |
| 8/19/04 | SP 14-side August star map (JHU) | \$ 0.98 |
| 8/22/04 | SP Frankie in HPL | \$ 5.00 |
| 8/23/04 | SP 14-sides Aug. star map (JHU) | \$ 0.98 |
| 8/23/04 | SP Frankie in Hpl. | \$ 6.00 |
| 8/23/04 | FOOD before tonight's stint (Johnny Rockets) SP | \$ 3.62 |
| 8/24/04 | SP 14-sides Aug. star map (JHU) | \$ 0.98 |
| 9/01/04 | SP 3-sides Sept. star map (JHU) | \$ 0.21 |
| 9/3/04 | SP 72-sides SC handouts (JHU) | \$ 5.04 |
| 9/04/04 | SP Frankie in Hpl. | \$ 5.00 |
| 9/04/04 | POST mail October Hpl. requests | \$ 0.37 |
| 9/05/04 | SP 16-sides Sept. star map (Kinkos) | \$ 1.28 |
| 9/05/04 | STA #11 exacto blades (Plaza Arts)(33% of bill) | \$ 0.62 |
| 9/10/04 | SP Frankie in Hpl. | \$ 7.00 |
| 9/11/04 | SP 60-sides SC handouts (JHU) | \$ 4.20 |
| 9/13/04 | SP 3-sides SC handouts Uranus (JHU) | \$ 0.21 |
| 9/19/04 | SP Frankie in HPL | \$ 5.0 |
| 9/20/04 | SP Frankie in HPL | \$ 3.00 |
| 9/21/04 | SP Frankie in HPL | \$ 3.00 |
| 9/22/04 | SP 20 sides SC star map (JHU @ 7¢/ea.) | \$ 1.4 |
| 9/22/04 | SP Frankie in HPL | \$ 3.00 |
| 9/24/04 | SP Frankie in HPL | \$ 5.00 |
| 9/25/04 | POST mail Nov. requests to HPL | \$ 0.3 |
| 10/03/04 | SP Laminate Uranus photo/data (Kinkos) | \$ 216 |
| 10/03/04 | SP 50-sides SC handouts (Kinkos + JHU) @ \$0.077/ea | \$ 3.8 |
| 10/05/04 | SP 13-sides art for "I Saw...URNAUS!" sticker (Kinkos) | \$ 1.0 |
| 10/05/04 | SP 5-sides (IBID) | \$ 0.4 |
| 10/06/04 | SP 18-sides (IBID) | \$1.52 |
| 10/06/04 | SP Frankie in HPL | \$2.00 |
| 10/07/04 | SP 24-sides SC star map (Staples) | \$1.51 |
| 10/07/04 | SP 1000 post-it notes (Staples) | \$4.61 |
| 10/07/04 | SP 1-Rubber stamp (URANUS) (Baumgarten #155802) | \$ 19.9! |
| 10/06-07/04 | AUTO 2-RT's to Baumgarten | 13 m! |
| 10/07/04 | SP Frankie in HPL | \$ 5. |
| 10/08/04 | SP Frankie in HPL | \$ 4.00 |
| 10/12/04 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 10/14/04 | SP 1-color copy. of Albireo photo (Kinkos) | \$ 0.8 |
| 10/21/04 | SP 20-sides Lunar eclipse invitation handout (Kinkos) | \$ 1.6 |
| 10/22/04 | SP 6-sides IBID. (Kinkos) | \$ 0.50 |
| 10/23/04 | SP Frankie in HPL ((todate Frankie = \$245.00 = 4.28% of total take) | \$ 5.00 |
| 10/25/04 | SP 15-sides Lunar eclipse announcement for Images Cafe (Kinkos) | \$ 1.26 |
| 10/27/04 | SP 23-side(2-up) of Roylance lunar eclipse art. for handout (Kinkos) | \$ 2.00 |
| 10/28/04 | SP Frankie in HPL | \$ 1.00 |
| | STA = \$ 31.26 | |
| | SP = \$137.89 | |
| | POST = \$ 1.11 | |
| | PAGE = \$170.26 | |
| | | PAGE TOTAL \$170.26 |

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| 10/28/04 | SP | 10-sides(2-up) Venus-Cicada for handout (Staples) | \$ 0.63 |
| 11/15/04 | SP | 24-side for November star map (JHU) | \$ 1.68 |
| 11/15/04 | SP | 6-sides wasted trying to print star map (JHU) | \$ 0.42 |
| 11/17/04 | POST | mail Dec. reqs. to HPL. | \$ 0.37 |
| 11/17/04 | BOOKS | Obsvr.'s Hdbk. + SKY GAZER'S ALM (S&T) | \$ 28.45 |
| 11/30/04 | SP | 12-sides December star amp (Loyola) | \$ 0.96 |
| 12/07/04 | SP | 14-sides for SC handouts @ \$0.08/ea. (Loyola) same for BIOTREK talk | \$ 1.12 |
| 12/09/04 | SP | 3-sides for BIOTREK talk (Loyola) | \$ 0.24 |
| 12/16/04 | SUBS | HAL membership (\$25.00) + S&T sub (\$32.95) | \$ 57.95 |
| 12/18/04 | POST | mail Jan. req. to Hpl. | \$ 0.37 |
| 12/18/04 | SP | 40-sides SC handouts (Kinkos @ \$0.08/ea.) | \$ 3.20 |
| 12/18/04 | SP | Frankie in Hpl. | \$ 10.00 |
| | | PAGE TOTAL = | \$105.39 |

SP = \$ 18.25
 POST = 0.74
 BOOKS = 28.45
 SUBS = 57.95
 PAGE = \$105.39

Y E A R

| | <u>PAGE 1</u> | <u>PAGE 2</u> | <u>PAGE 3</u> | <u>PAGE 4</u> | <u>YEAR</u> |
|---------------------------|---------------|---------------|---------------|---------------|-------------------|
| STA = | \$ 6.26 | \$ 2.00 | \$ 31.26 | \$ --- | \$ 39.52 ✓ |
| SP = | 77.92 | 143.98 | 137.89 | 18.25 | \$378.04 ✓ |
| POST = | 1.11 | 8.09 | 1.11 | 0.74 | \$ 11.05 ✓ |
| VENUS = | 114.32 | 22.17 | --- | --- | \$136.49 ✓ |
| BOOKS = | --- | --- | --- | 28.45 | \$ 28.45 ✓ |
| SUBS = | --- | --- | --- | 57.95 | \$ 57.95 ✓ |
| PAGE = | \$199.61 | \$176.24 | \$170.26 | \$105.39 | \$651.50 |
| +767 MILES @ \$0.375/mile | | | | | + \$287.63 ✓ |
| <u>YEAR</u> | | | | | = <u>\$939.13</u> |

2005

Not for Distribution

- 8 1842) JANUARY 1, 2005 (SAT.) HPL-BICEN (5:44-9:33PM). Mild, sl. damp. CHG. OF PLANS! (Planned to do Comet Machholz from W-LIP, figuring I'd acq. Saturn eventually. Upon arriving discovered lots of strollers, so decided to do Bicen where I'd acq. S. alot sooner than W-LIP. Once set-up, w/S. not up yet, tried for C.M., but w/o success. Settled on Pleiades till S. appeared. Was unhappy w/it, but it worked, even tho some were out of view field. Also did Betelgeuse.) SATURN (After what felt like interminable, anxious straining, I spotted it at 6:25PM, 41-mins. after set-up. It put on its usual good show. Not having it on my mind before leaving home, I was sans my Hubble photo and stickers. Nevertheless, it worked ok.) UNPLEASANTNESS (No real trouble, but had to deal with 3-4 groups of semi-roudy inner-city young men.) HH (Under thr pressure of lots of lookers, I felt like it was more of a job than a pleasure!). \$130.22 (\$34.09/hr.) BRIEF VISITS: Marion, Vallerie K.)
- 8 1/08/05 (SAT.) DRY RUN TO HPL. Reasonably clear sky. However, fairly cold wind at Bicen, as well as fairly light passerby traffic. Could have set-up at East Lip for Comet Machholz, but decided getting a decent view was conjectural, plus Sat. would not have appeared for +/-1.5 hrs. Finally, had thought that if I wanted to do some astronomy tonight, could go to Masemore Rd. and photograph comet. Came home!
- 9 2/01/05 (TUE.) DRY RUN TO HPL. Clear, cool (42°F). Scene discouragingly bleak. Couldn't make myself set-up. SATURN (From W-LIP cleared WTC at 6:13PM.) HH (Even tho didn't set-up, felt like I was reconnecting with my real self. Was therapeutic!)
- 8 1843) 2/05/05 (SAT.) HPL-W.LIP (5:52-10:40PM). Mild; great sky. SIRIUS (briefly...scintillatin dramatically in colors!). SATURN (Acq. 5:55PM. Good as it gets. Mostly at 166X. 4 moons.) STICKERS (Having forgotten to make more, ran out 1/2-way thru evening.) Lots of families w/kids. COMET MACHHOLZ (Mentioned by looker who saw it naked-eye in Tenn. at very end of evening. After a false start, found it. A very dull glow!) HH (In very good form, except had to force myself to stick it out!). \$236.15 (\$49.20/hr.!) C. MACHHOLZ (Located between Cas and Cam, mag. 5. Had prepared ahead and found it "by the numbers".) CHEERLEADERS (Had lots of young, girl cheerleaders in town for a competition.) 1:05AM (Going to bed. Am staggeringly tired!)
- 9 1844) 2/06/05 (SUPERBOWL SUNDAY) HPL-W.LIP (5:50-7PM). Questioned going because of game, guessing it would be very quiet, with maybe some drunk fans. However, sky was so good for most of the day, decided had to go! However, at set-up time haze began moving in. Scene slow at start and got ever slower. Quit because feeling a bit isolated, as well as thickening haze. SATURN (Enthusiastic lookers!). \$39.00 (\$33.33/hr.)
- 8 1845) 2/12/05 (SAT.) HPL-W.LIP (6-10AM). Accompanied by PLW, who gave out the stickers. Cold-ish. Near glove temp. Great sky. SATURN (Sharp. 3-moons.) SIRIUS & M42 (1X each) TRIPOD (Raised as Sat. moved toward zenith.) TELESCOPE (Good collimation holding. Lots of families/kids. Lots of enthusiastic lookers! \$182.14 (\$45.54/hr.)
- 9 2/15/05 (TUE.) DRY RUN TO HPL. (Accompanied by PLW.) Sunny, 60°F all day; increasing haze late afternoon. Given the mild temp. and the idea that the haze might dissolve at sunset, went down. Didn't setup, but watched sky for a while. The 7-d. Moon came and went in haze, eventually Saturn appeared, but given the slow scene, didn't.
- 8 1846) 2/19/05 (SAT.) HPL-W.LIP (5:35-9:20PM). +/- 32°F ; great sky. Accompanied by PLW, who gave out stickers and recruited lookers. 11-d. MOON (Tycho region at 166X. Good!) SATURN (A lookers saw 4 moons.) M42 (1X). PRESIDENTS DAY HOLIDAY WEEKEND (A looker said she was told this is the busiest family weekend of the year!) \$162.86 (43.43/) PLW (Took +/-6 digital photos of me w/lookers at scope. Am hoping to use several in my AACC talk, 4/9.) VISIT (Lester Linaburg, his wife Valerie, and their son. Lester had a career in accountancy and now works for JHU in an AIDS project.)

TOTAL THIS PAGE = \$750.37

TOTAL THIS YEAR = \$750.37



Not for Distribution

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- 8 1847) 2/25/05 (FRI.) HPL-W-LIP (6:15-8:16PM). +/-30 w/cool breeze; clear. Bleak scene upon arrival, but crowd picked up, and I had a fairly steady stream of lookers...but not enough to keep me from quitting because of the cold. SATURN (Sharp! 2-moons.) LOOKERS (Had 1 bunch of rough young men, but did good with them and other kids!) \$41.20 (\$20.40/hr.)
- 9 1848) 2/26/05 (SAT.) (HPL-W-LIP (6-9:07PM). 32° w/ NO breeze. Much better than last night! Clear. Busy start, followed by a quiet time, than ok again. SATURN (Acq. "by the numbers" before it was vis. to eye. 3-moons.) A few Craft Show lookers. \$110.20 (\$35.32/hr.)
- 9 1849) 3/5/05 (SAT.) HPL-MID W-LIP (6:00-9:30PM). 35°F. Busy scene. LIGHTS (Brighter lights in the clusters on poles. Not alot more hinderance, but aggravating for me.) HH (Very hot! Very articulate w/explanations!) SATURN (Acq. at sunset. Thanks to great sky, v. sharp image. 3-moons.) JUPITER (Spotted low over ship as I was packing-up. Could have acq. +/-9:20PM.) ST. LOUIS (leaving tmw. for a week with PLW. I hope I'm not missing v. many good weather nights! Was a bit reluctant about going out tonight for fear somethin untoward would happen to mess up my travel plans, but it was fine.) \$168.36 (\$48.10/hr.)
- 9 1850) 3/15/05 (TUE.) HPL (6-8:07PM). STINTS (150 to go to my tentative retirement at 2000.). 1st. stint following 8-days in STL & Chicago w/Phyllis. 38°F. Pristine sky. Breezy. 5-d. MOON SATURN (2-moons). HPL (Slow scene.) \$3945 (For fun. Nice!) \$37.12 (\$17.51/hr.) LIGHTS (The new, bright lights are taking some of the pleasure out of my Hpl. telescoping.) VISIT (Sally, from the Science Center. Friendly...enjoyed her look at Saturn.)
- 9 1851) 3/18/05 (FRI.) HPL-MID-W-LIP (6:12-10:53PM). Hi clds. which were threatening at ss dissolved. Good sky. Mild. HPL (Suprisingly busy scene. Had numerous lookers w/families from veterinarians' convention.) HH (Hard work...felt more like a job than fun!) 8-d. MOON (Fine, but Copernicus not yet vis.) SATURN (A crowd pleaser!) JUPITER (1st time this yr. Acq. 9:50PM, but could have sooner had I noticed it.) \$155.09 (\$33.12/hr.)
- 8 1852) 3/29/05 (TUE.) HPL (6:20-9:38PM)....after a long seige of rain dsys. Mild, clear. HPL (Spring break...busy...lots of families w/young kids. Took me by surprise!) SATURN (A looker saw 4 moons!). JUPITER (Spotted 7:20PM. Mucky for a while, then good. 2+2.) HH (In good form!) Scene slow by quitting time. \$110.34 (\$33.44/hr.)
- 9 1853) 3/30/05 (Wed.) HPL (6:39-9:30PM). Clouds all day, then taken by surprise clearing late afternoon. Great sky. SATURN (excellent,) JUPITER (1+3. Great!) Not as many families as last night. ENTHUSIASTIC YOUNG BOY (was 1/2 packed up when a father-son arrived, the latter showing great interest in looking thru scope. Set-up again...feeling I had a responsibility to do so.) No \$5 contribs, unlike last night. \$88.71 (\$31.13/hr.)
- 8 1854) 4/04/05 (MON) HPL (7:35-9:57PM DST). This afternoon was Oriole's opening game. This eve. NCAA basketball championship game. SCENE (Moderately busy at start, then rapid drop off. Spent 30min. + w/no lookers. Happily, a slight rush toward end, incld. a \$10 contrib.) SATURN (2 moons) JUPITER (3, then 4. Great!) \$67.08 (\$28.30/hr.)
- 9 1855) 4/05/05 (TUE.) HPL (7:28-10PM DST). Mild. Great sky till clouds moved in. Semi quiet scene but fairly steady stream of lookers. HH (In VERY GOOD head, with STRONG voice. Really enjoyed my hawking responsibilities!) SIRIUS (For a few mins. till I figured Sat. was ready.) SATURN (Has looked better.) JUPITER (1 + 3.) QUITTING TIME (Started packing up at 9:45 because of clouds. But people kept coming. Looked at Rusty Scup. sign and Jupiter w/no moons thru clouds!) 18MM ORTHO (Tried it on Sat. at start. Must have been good, as had significantly more non-believers than usual!) \$86.72 (\$34.28/...incl. a \$20 & \$10)
- 8 1856) 4/8/05 (FRI) HPL (7:45-11:06PM). Mild. Good sky. POLAR ECLIPSE (Late start due to obsvs. at home with "Sunscope" of a 41-min. duration eclipse, accompanied by some neighbor kids. Cloudy most of day and didn't expect to see it. Just at eclipse time, however, sky cleared.) SATURN (Very good. 2 moons.) JUPITER (3-moons. Great!) HH (In a lousy mood most of the day, but at Hpl. mood lifted, and I came on strong!) HPL (Pretty busy scene! Lots of famlies/kids, out-of-towners. Lots of enthusiastic lookers.) \$157.55 (\$47.03/hr.)

TOTAL THIS PAGE = \$1,022.37

TOTAL THIS YEAR = \$1,772.74

59
 4/9/05(SAT)Talk for ANNE ARUNDEL COMMUNITY COLLEGE ASTRONOMY CLUB(7:30-9PM). Auspices Dr. Beth Hufnagel (brhufnagel@acc.edu), who'd found me in Hpl. and invited me to be the Club's quarterly speaker. (Dr. H. could not attend talk. In her absence, I was greeted by member John Kline, johnkline@navy.mil, who treated me to supper at the China Buffet. Talk titled CAN YOU SEE THE FLAG ON THE MOON. Attendance = 65....their best ever. (Talk, with photo of astronaut & flag pub. in the Annapolis Capital.) I spoke and showed slides for maybe 1 1/4 hrs.. Received a very strong round of applause at conclusion. Had prepared very intensely, accumulating lots of Moon info and assembling an 80-slide show. Audience incl.'d a numbers of smark, young children who asked good q.'s. John Sanford's 30-min. Ori slide was a big hit, as was my 3/4 hr. circumpolar and aurora shot. Talk given in auditorium with tiered seating and a projector I operated remotely. Following talk we adjourned to the college observatory for obsv.'s of Jupiter, Saturn, and M-42. HH(This is probably one of my best talks, if not THE best!) HONORARIUM \$300.00

Rec. 4/20/05 CK# 0144064

- 8 1857)4/10/05(SUN)HPL(7:30-10:03PM). V. mild. Gd. sky. Fairly busy scene. Accompanied by PLW, who recruited lookers & dispensed "I Saw..." stickers. SATURN(Acq. 10-mins. before ss.) JUPITER(4, then 3 moons) 2-d. MOON(V. thin. A few craters.) Lots of families with kids. HH(Good head and energy!) VISIT(Phillip, a pro wedding photographer from Va., who took many photos (B&W) and said would e-mail some.) \$98.14 (\$38.49/hr.)
- 9 1858)4/11/05(MON)HPL(7:30-9:50PM). Clear, but only fair seeing. Uncomfortably cool breeze. Accompanied by my able assistant, PLW. 3-d. MOON(Beautiful! People liked.) SATURN(2-MOONS.) JUPITER(2, then 4 moons) VISIT(Michael Reitzig & family.). \$59.43 (\$25.51/hr.)
- 8 1859)4/14/05(THU)HPL(7:40-9:02PM). Clear, but strong cold wind, which began upon arrival. Quit early because of wind. Accompanied by PLW. PARKING PROBS.(Loading dock jammed up. Went back to Security Of. to park in Gallery but was denied permission. Ret. to l.d. and parked along wall, but almost immed. a docj slot opened. Then, right a quitting time, a Hpl. cop came and said car had to be moved for dumpster truck. PLW moved car while I packed up Tmw. must talk to office about parking in Gallery garage!) 6-d. MOON(Great!) SATURN. JUPITER. Ok traffic, even w/cold wind. Several generous contribs. \$48.25 (\$35.48/hr.)
- 9 1860)4/15/05(FRI)HPL(7:25-10:45PM). V. clear. Wind early, calm, wind late. Assisted by PLW. 7-d. MOON(Lots craters. Great! SATURN(Its usual self.) JUPITER(1+3 close. Spectacular. MISITS(Jay of Stadium School & son, Sam. Terry of Old Goucher Fair.) HH(Despite consider-bicycling w/PLW today, in good shape!) QUIP("I haven't lost a patient yet. I should be a brain surgeon...just before a kid fell off the milk crate!) \$114.62 (\$34.42/hr.)
- 8 1861)4/16/05(SAT)HPL(7:30-10:07PM). V. clear, but more cold wind. Assisted by PLW, her last night of this visit. 8-d.MOON(At 160X, some lookers blown away by view!). SATURN(Sharp. It's usual self.) JUPITER(1+3. GREAT!). SCENE(Moderately heavy crowd. Julio and break dancers in Amphitheater.) VISIT(A member of the Sacramento Sidewalk Astronomers. www.svas.org.) \$107.27 (\$40.99/hr.)
- 9 1862)4/17/05(SUN)HPL(7:25-10:09PM). Sans PLW, who left today for Atlanta. SKY(Hazy start, with gradual clearing. Mild temp. Finally, no cold wind!) 9-d. MOON(Tycho region. Copernicus just coming into view.) JUPITER(2+2. Fine!) SATURN. LOOKERS(Fast start, followed by rapid slowdown. A goodly no. of children.) \$84.22 (\$30.85/hr.)
- 9 1863)4/18/05(MON)HPL(7:22-10:32PM). Mild. V.G. sky. 10-d.MOON(Used polarizer till 7:48 ss. Tycho region...great!). SATURN. JUPITER(2+1+stripes.) HPL(Steady stream of lookers. Some families/kids, but mostly adults.) VISIT(The Cotters.) \$94.23 (\$29.79/hr.) HH(This makes five night in a row. I'm beginning to feel like I wearing the "Red Shoes"! When will it stop! VISIT(2 Napalese men.)

119
 TOTAL THIS PAGE = \$ 906.16

TOTAL THIS YEAR = \$2,678.90

MASON & DIXON & THE COMING TRANSIT OF VENUS

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- 8 1864) 4/20/05(WED)HPL.(7:30-9:58PM). Warm (80°F). Adverse weather rpt., but clear enough to keep going till above time. "Sucker hole" situation for last 30-min. 12-d. MOON (Polarizer ineffective. Tycho region. N. end of terminator the best spot.) SATURN. JUPITER(2+2). BERET(A costume trademark. Lost, prob. on walk back to car. Need another!) HH(Between the sucker holes, foreign lang. speakers, little kids, a line of lookers, it was a very hectic night!) VISIT(Telescopist from Boston.) \$76.98 (\$31.20/)
- 8 1865) 4/25/05(MON)HPL.(7:42-9:55PM). First doable sky in 5-days. Semi mild. SATURN(Acq. 10-min. before ss.) JUPITER(Great! 2+2; close. FOOD EMERGENCY(Was having a "low blood sugar" attack as I arrived. Apparently the beans-rice-corn stew I had late afternoon wasn't adequate. Got a hotdog at Johnny Rockets before setting up.) SCENE(Fair number of strollers. Got more than avg. no. \$5 contribs.) \$81.50 (\$36.76/hr.)
- 9 4/26/05(TUE)HPL.(6-7:30PM). Annual street performers meeting, called by management.
- 9 1866) 4/27/05(WED)HPL.(7:40-10:15PM). Mild. Great sky. JUPITER(Due to misalignment, acq.'d before Saturn. No moons at first. Later, 1+3. GREAT SCENE!) SATURN(Fine. Titan nearby. HH(In good form.) LOOKERS(Some very enthusiastic.) \$77.39 (\$30.00/hr.)
- 9 1867) 5/01/05(SUN)HPL(7:40-9:36PM). Mild w/cool breeze. Good sky. HH(In bad mood which really didn't lift. Plus, early-on had lots of pushy, obnoxious people. Plus, for some reason could NOT find either J or S till I spotted them by eye. Was an upsetting experience!) JUPITER(4 on right. Great!) SATURN(2-moons.) \$44.12(\$22.86/hr.)
- 8 1868) 5/4/05(WED)HPL(7:46-10:11PM). Cool(wore Bean jacket over sweater). Cloudy all day, then late afternoon clearing. HH(Feeling a bit depressed...voice weak.) ALIGNMENT (Again, excessive trouble finding Jupiter before ss. Moved tripod several times before acq. it.) JUPITER(3, then 4. Great!) SATURN(Look smaller....73% of its Jan. size. By 9:45PM image degrading noticeably. Nevertheless, still a hit w/lookers.) VISIT (Wayne, the retarded kid from Ednor Rd. Is huge. Remembered Eve.) LOOKERS (Great variety: students/teachers from Ala., fasteners convention, M&T bankers.) \$78.66(\$32.60/)
- 5/7/05(SAT)THE OLD GOUCHER FAIR, auspices Libby, Terry(11AM-2PM). Was reluctant to attend, knowing it would be a pretty quiet scene...plus there were only a few, miniscule sunspots. I interacted with only a few people, several of whom I might have facilitated their interest in astronomy. Later in the afternoon I took Frank, Eve, Michael, Thomas, Ricky and Marty Sommers to an Oriole game. NO HAT.
- 8 1869) 5/8/05(SUN)HPL(7:58-10PM). Mild. Grt. sky. Accompanied by Thomas Heyn, who spent a good amt. of time watching Mike Rossman perform but also handed out stickers for me. I couldn't tell if he enjoyed the evening or not. Following stint, we went out for pizza and a sub. JUPITER(1+3. Great!) SATURN(Ok.) Lots of lookers but lots of no-pays. HH(Feeling reasonably ok.) \$66.01 (\$32.52/hr.)
- 9 1870) 5/9/05(MON)HPL(7:51-10:11PM). Mild. Good sky. Accompanied by Thomas and his Baltimore friend, Ricky. They reported having a real good time. They tossed balls around, helped me a little, and just sort of ranged around the area. ALIGNMENT(Problem finding Jupiter before ss continues. Took 3 realignments of tripod till I got it. Is really disappointing!) JUPITER(3+1. Great!) SATURN(A bit smallish. By 9:30PM degrading image.) VISIT(Katie and Janet...neighbors.) HH(In good head, despite a long day of family activities, incl. lunch at the Heyn's.) \$79.70 (\$34.21/hr.) VISIT(Tony, Old Goucher Fair organizer & MC, who was very pleased I'd shown up.)
- 9 1871) 5/10/05(TUE)HPL(7:53-10:00PM). Sometimes cold wind. Ok sky. ALIGNMENT(Better. Sighted diagonal corners of square.) JUPITER(2+1. Great!) SATURN(Good at first, then deterioration.) HPL(Relatively quiet scene. Very slow start, then good traffic, then slow. VISIT(Bob Feldman, friend of John's, w/his wife.) \$52.22 (\$24.63/hr.) 2-d. MOON!

TOTAL THIS PAGE = \$ 556.58

TOTAL THIS YEAR = \$3,235.48

- 8 1872) 05/11/05 (WED) HPL (7:50-10:20PM). Sl. adverse wthr. rpt., threatening clouds at start, then clearing. Unfortunately, poor seeing. SCOPE (I'm worried that dec. lock may soon lose its grip, and there's no play left in tightening screw.) CHANGE OF PERCEPTION (Rather than seeing myself in Hpl. as an artist or performer, because of being there so much I'm now perceiving myself as being a regular fixture of the place, as one of its permanent features.) Busy scene, tonight! 3-d. MOON (Langrenus). JUPITER (2+1. Stripes diminished by bad seeing.) SATURN (So-so.) VISITS (Repeat lookers here for Bently (software) meeting. Will, JHU photographer. He took photos of me & lookers and said to stop by for copies.) \$79.77 (\$31.91/hr.) Hard work! AIR POLLUTION (While moored to take on riders, the water taxi "Indominable"'s motor puts out a huge amount of exhaust fumes. I'd like to somehow make the company fix the motor.)
- 9 1873) 05/12/05 (THU) HPL (7:51-9:29PM). Sl. adverse wthr. rpt, some clds. at start, clearing, then shut down by clouds. ALIGNMENT (Improvement. For past week might have been eyeballing wrong diagonal on bricks!) 4-d. MOON (w/polarizer before ss.) JUPITER (3+1. Nice.) SATURN (Smallish.) Pretty good traffic. A.P. (Indominable putting out blue smoke, but it was blowing away from promenade.) \$48.93 (\$30.02/hr.) VISIT (An ebullient woman, who said she lives in S. Balto., and who said to me, "You have quite a reputation around town!")
- 8 1874) 05/16/05 (MON) HPL (7:57-10:40PM). Intermittent hi clds. Cool. Slow scene, but steady stream of lookers. Accompanied by PLW (Played a joke on me by getting a cute woman to tell me I was cute and who asked me for my tel.#. I told her, "Go see that woman over there," not knowing that PLW had set her up in the first place.) 8-d. MOON (Impressive.) JUPITER (2 + 2 + background star.) SATURN (At first behind clouds. Then tracked it almost to roof top.) Many enthusiastic lookers. \$68.75 (\$25.28/hr.)
- 9 1875) 05/17/05 (TUE) HPL (7:43-10:12PM). Sl. cool. Great sky! 9-d MOON (Tycho + sunrise on Copernicus. Awesome!) JUPITER (The most sensational I've ever seen it! 2 close on left and 1 close on right, plus shadow. With great sky & close moons, used 165X, which I rarely do. One looker remarked, "That's the most beautiful thing I've ever seen. I'll never forget it.") SATURN (Pretty good.) PLW (Did a good job recruiting lookers and giving out stickers.) Lots of enthusiastic lookers. \$67.25 (\$27.11/hr.)
- 8 1876) 05/18/05 (WED) HPL (7:57-10:13PM). Mild. HI haze at start, then clear, then more haze. Accompanied by PLW. 10-d. MOON (Tycho, Jura Mts./Plato.) JUPITER (4, then 3. Fine!) SATURN (Never looked for it... maybe was in haze whole night.) VISITS (Valerie K and Joe. A man who'd bought a H-B photo from me.) Medium slow night. \$44.05 (\$19.41/hr.)
- 9 05/19/05 (THU) HPL. DRY RUN. Accompanied by PLW. Went hoping clouds would allow, but they didn't. Would have been a stressful "sucker hole" situation. Watched M. Rossman.
- 8 1877) 5/26/05 (THU) HPL. (7:50-9:41PM). Pleasant eve., but too many clouds. Quit after tiring of working w/sucker holes. ALIGNMENT (Maybe OK again, my having re-set dec. disc. by putting scope on tripod at home.) JUPITER (Acq.'d 1st try 1/2-hr. before ss. 4, then 3. Nice.) SATURN (Ok for a brief while.) Lots of no-pays. \$40.90 (\$22.07/hr.)
- 9 1878) 5/27/05 (FRI...MEM.DAY WEEK-END) HPL-BICEN. (8:03-10:45PM). Mild. Cloudless. PARKING (some resistance from guard, but in Gallery. Marva needs to aprise them of rules.) JUPITER (3 close on L, 1 close on R. Great!) SATURN (Just once.) \$82.37 (\$30.51/hr.) HH (Could has stayed longer but was tired and bored.) JUPITER (Found "by the numbers". Used polarizer for 1st 10-mins.)
- 8 1879) 5/28/05 (SAT) HPL-BICEN. (7:58-11:02PM). Mild. OK sky. HH (Maybe thanks to decent night's sleep and afternoon nap, I was in good head and hi energy!) JUPITER (w/polarizer, 25 min. before ss. Then 1+3. Great!) Saturn (For 5-mins.) HPL. Extremely busy scene. Many enthusiastic lookers. Used all J stickers! H.S. grads Dallastwn., PA. \$132.50 (\$43.30/)

TOTAL THIS PAGE = \$ 564.52

TOTAL THIS YEAR = \$3,800.00

- 8 1880)5/29/05(MEM.DAY SUNDAY)HPL-BICEN(7:59-11:20PM). Adverse w. rpt. Brief hi clds., then clear. Awesome number of people in HarborplAndean band set up next to me...was a bit overwhelming for a while. As listeners and dancers assembled, sound was muffled. JUPITER(4 on R. Fine!) HH(In good shape...able to sustain gd. energy.)\$160.63(\$47.95/SATURN(Did not do even once. Had no requests.)
- 8 1881)5/31/05(TUE)HPL-W.LIP(7:52-10:20PM). Mild. Hi clds. early, then clear. JUPITER(Acq. 1st try...28 mins. before ss. 2 moons w/polarizer.)SATURN(Several times. Disappeared 10PM. Lackluster evening. Many no-pays. \$46.01 (\$18.70/hr.)
- 8 1882)6/04/05(SAT)HPL-BICEN(8:13-10:10PM). SKY(Cloudy day, then late afternoon clearing. Clouds again +/-10PM. Could have waited them out but decided to use them as a pretext to leave.) BIKE RIDE(+/-15-20mi. ride with Jim P. for the opening of the Gwynns Falls Bike Trail. Since it was cloudy, didn't expect to telescope. We had steamed shrimp + beer at Cross St., then sat on Fed. Hill bench while J. smoked a cigar. Gr-time for us both! Tried to take a 45-min. nap afterwards but was restless.) JUPITER(1+3. Great!) REMARKABLE EVENING!(Despite strenuous day, I was in a very good head. Articulate! Took Al stool, which I used once. Lots of very friendly, enthusiastic lookers. Visited by 1/2-doz. tall, clean-cut, courteous young men who were Marines. I was impressed by their appearance, demeanor. I wished them good luck. A woman who lo-at J. got very excited and began talking enthusiastically about how great God is. I responded that nature puts on a great show, but she insisted it was "God's show"! Lots of families with very young kids. Busy scene!) \$96.42 (\$49.45/hr.)
- 8 1883)6/05/05(SUN)HPL-W-LIP(8:10-10:16PM). Clear. Warm-sl. humid. PARKING(Approaching Light St. spotted good spot on street and took it rather than gamble on spot in garage.) UNPLEASANT EVENING!(Thanks to a loud, 15 member, brass jazz band that arrived after I'd started setting-up. I struggled w/it as long as I could, then packed-up.)JUPITER(4 on right. BIG surprise! Nice!!). SATURN(Several times at 80X. Almost finished for season.) SCENE(Lots of families w/small kids which, on top of the loud music, really strained my patience and stamina. Sun. must be family nite!) \$83.90 (\$40.01/hr.)
- 8 1884)6/12/05(SUN)HPL-E.LIP(8:08-10:28PM). Intermittent clouds. Warm. Accompanied by my valuable assistant, PLW, who chatted up lookers and gave out J stickers. 6-D.MOON. JUPITER(1+3. Fine!) Lots of foreign lookers: Pakistan, Viet Nam, Iran, Russia, Estonia, Afghanistan, India, Hispanic. An Iranian woman mumbled prayers as she looked at Jupiter, then the Moon. Busy night. Lots of kids. \$78.80 (\$33.82/hr.)
- 8 1885)6/14/05(TUE)HPL-E.LIP(8:08-10:34PM). Warm. Shorts-t-shirt weather. Hazy, great sky. Accompanied my trustworthy asst., PLW. 7-d. MOON(Great!). JUPITER(1+triangle of 3. Wonderful.) Busy scene. Good 60's music in Amphitheater. \$65.09 (\$26.71/hr.)
- 8 1886)6/15/05(WED)HPL-W.LIP(8:18-9:58PM). Warm. Clear, then clouds, clear, then shut down by clouds. Too bad, because Moon & Jupiter close and both putting on good show! Accompanied by PLW. Several of last night's lookers returned expressing great enthusiasm. Large family from Singapore. 8-d. MOON (Tycho. The start of sunrise of Copernicus.) JUPITER(2+2). \$45.76 (\$27.40/hr.)
- 8 1887)6/16/05(THU)HPL-W.LIP(8:05-11:01PM). Comfortable, w/sl. breeze. Great sky. 9-d,MOON (Tycho, Copernicus, sunrise on Jura Mts. 80X & 165X.) JUPITER(1+3. Fine. Accompanied by able assistant, PLW. She's getting better all the time! COUNTRIES(Kuwait, Iran, Vietnam.) \$104.12 (\$35.41/hr.)
- 8 1888)6/18/05(SAT)HPL-BICEN.(8:20-11:02PM). Warm. Clear. PLW's last night this trip. She's really learning the ropes! 11-d. MOON(Tycho region, Plato region. Ok.) JUPITER(Only Calisto for 1/2's of eve., then another came from behind. Concentrated on "stripes".) \$83.50 (\$30.93/hr.)

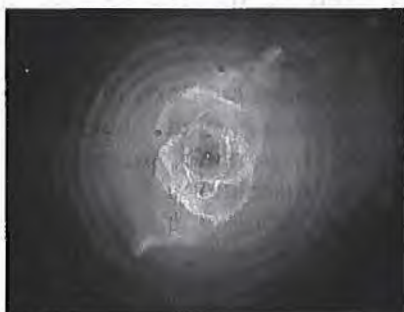
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TOTAL THIS PAGE = \$ 764.23

TOTAL THIS YEAR = \$4,564.23

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Staring across interstellar space, the alluring three thousand light-years from Earth. A class Cat's Eye (NGC 6543) represents a final, brief the life of a sun-like star. This nebula's dying produced the simple, outer pattern of dusty clouds shrugging off outer layers in a series of regular formation of the beautiful, more complex inner

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- 8 1889)6/21/05(TUE)HPL-W.LIP(8:18-11:02PM). Warm. Hazy. SOLSTICE + FULL MOON. SUNSET 8:36PM. JUPITER(Acq. before moons vis., then 1 + 3. Image diminished by closeness to lights.) 14-d.MOON(Rose 8:44PM. First glimpsed at 9:10PM looking very pale and pink just left of Domino sign. When it rose higher and brightened, framed Tycho region. Lookers liked alot!) HPL(Busy scene. For a while had a line of +/-15! Almost everybody paid! ALBIREO!(Once, just for the heck of it.) \$89.63 (\$32.79/hr.)
- 9 1890)6/23/05(THU)HPL-W.LIP(8:20-10:51PM). Mild. Gd. sky. Delayed 10-min. by clouds. JUPITER(2 + 2. Fine.) ANTARES(As a break from J. Briefly. Lookers liked!) Lots of families. Most lookers seemed to have paid, incl. 2 5's and a \$10! VISIT(Dancers Evelyn and Becka.) \$85.65(\$33.99/hr.) VISIT(John, a Gandy Dancer regular & family.)
- 9 1891)6/24/05(FRI)HPL-E.LIP(8:42-10:47PM). Late start due to haze. It thinned at sunset but never totally left. Warm. Should have worn short pants. JUPITER(4 on left. Luster diminished by haze. Quit when moons got too dim for my liking.) V-S-M conj. low in NW. A looker had clipping describing it. I gave it a try for her, but no luck, due to haze, Verizon bldg. HH(Not in great mood. Hard work!) \$71.00 (\$34.09/hr.)
- 6 7/01/05(FRI). DRY RUN 3/4's way to Hpl. Turned back by gathering olds., adverse rpt.
- 8 1892)7/02/05(SAT)HPL-BIGEN.(8:47-11:25PM). Warm. Late start waiting for puffy clouds to dissolve. JUPITER(2+2. 36.7"...83% of its opp. dia. 80X for most of night. Image get-mushy +/-10:30PM.) ALBIREO(Once, for budding amateur from Cleveland.) VISITS(Eve & fam. in town. Were supposed to visit after crab supper in Fpt. But they never showed up, disappointingly.) Lots of enthusiastic lookers. HH(Good energy.)\$100.90 (\$38.22/) PARKING(Officer Fleet said is ok for me to park in Gallery garage any time I want. Just tell security that he said so.)
- 8 7/03/05(SUN). DRY RUN. Sky double. Deterred by huge crowd...the tremendous effort it would have required from me. Then, a juggler was in my Bigen spot. Since the Andeans were in the Amphitheater, I could have gone there, but felt overwhelmed by crowd. Finally, today rec. a nice cash Father's Day gift from Eve & F. which removed \$ pressure
- 9 1893)7/06/05(WED)HPL-W.LIP. (8:24-11:02PM). Hazy, muggy. Lots of people. Had to compete w/fairly loud music. JUPITER(2+2. Ok.) HH(Bored. Not all that happy about being there. Maybe getting red of Jupiter! Ready for Albireo!!) \$77.73 (\$29.52/hr.)
- 7/10/05(SUN)BUFFALO GAP DANCE CAMP, WVA.(8:30-10PM). "English-American" 3-day get-away with Phyllis. Did not announce, but set up 3" in eyeshot of eve. dance. A nice number of passerby lookers...say 30. Used 40mm (23X) as finder and 12mm RKE(76X) for obsv. JUPITER(2+2. Little, but "stripes".) 5-d MOON(good craters.) No hat.
- 8 1894)7/20/05(WED)HPL-W.LIP.(8:10-11:03PM). Warm. Good sky. First opportunity after a week of cloudy skies. JUPITER(1+2. Till +/-10pm.) MOON(A few hours before full. Beautiful rise 8:37PM. Mostly Tycho region at 80X. Few edge craters.) Lots leaving as a large family of Indians(east) arrived as I was half-way packed up. VISIT(Jeff Hettleman family before I was fully set-up.) \$78.17 (\$27.14/hr.) Lots of kids. Hard work!
- 9 1895)7/23/05(SAT)HPL-BIGEN.(8:15-11:25PM). Ok sky. Comfortably warm. Bolivians left as I was setting up. JUPITER(Lost 10-min. due to align. prob. 2+2. "Stripes not v. sharp... maybe due to seeing or lowness. Anyhow, most lookers impressed. Hit treeline 10:32PM, exactly when Moon rose!) 17-d MOON(Rose beautifully crimson! Used 40mm K, through which entire Moon vis. Impressive! Why has it taken me so long to realize I should use this eyepiece on full and near-full moons?) VISIT(An astro couple from Centerville, Va who gave me a pizza slice.) Busy scene and night. Lots kids! \$97.10 (\$30.63/hr.) ALBIREO(Several times while Moon was in clouds. Lookers liked!)VENUS(1X for look.Blob!

TOTAL THIS PAGE = \$ 600.18

TOTAL THIS YEAR = \$5,164.41

- 8 1896) 7/26/05(TUE)HPL-E.LIP(7:58-10:11PM). VERY HOT, VERY STICKY! Ok sky. JUPITER(Lost 10-15 mins. unable to find. Poor alignment! 3+1. Due to ball game lights, moons got less & less bright. Gave up at 9:55PM.) ALBIREO(Briefly.) Because of heat, rather than work Albireo, I packed up. \$57.07 (\$25.79/hr.) Lots of families/kids. VISIT (Warren, Sally's special ed. tutee from some yrs. ago. Looks good. Working in Sears Whse.)
- 9 1897) 8/3/05(WED)HPL-E.LIP(8:02-10PM). SS 20:18. FINDERSCOPE(Way off the mark, delaying Jupiter acq. for at least 10-mins.) JUPITER(4, then 3. Ok. Gave up on at 9:30PM.) ALBIREO(For 30-mins. It works ok.) HR(Getting out was v.g. therapy! \$27.00 (\$13.71/hr.) Lots of big families who only contributed one dollar!
- 8 1898) 8/04/05(THU)HPL-E.LIP(8:02-10:00PM). SS 20:16. HOT-HUMID-STICKY! Hazy sky. Noisy steel drum band made recruiting lookers difficult. ALIGNMENT(Excellent...finally!) JUPITER(1+3. Gave up on 9:25PM.) ALBIREO(Diminished by haze.) Several huge families! \$35.96
- 8 8/14/05(SUN) HPL. DRY RUN. Accompanied by PLW. (From Rehoboth, early Fri. AM, in 1-hr. we spotted 5 Perseids in a bright, hazy sky.) Last night, having just returned from Rehoboth, didn't have go power to go out. 8-d. Moon was good, however, despite hazy sky. Expected a repeat, tonight. Disappointingly, tonight Moon never came thru adequately. Too bad a dry run, because would have been sunrise on Copernicus!
- 8 1899) 8/15/05(MON)HPL-E.LIP(7:35-10:35PM). Breeze, sl. sticky. Intermittent haze. Accompanied by able assistant, PLW, who talked up lookers and handed out stickers & mnemonics. 9-d.MOON(Prob. w/haze, esp. at start. Tycho featured.) JUPITER(Didn't expect to do, but there it was while Moon was blocked by haze. Held till 9:05PM. 3 on R. Nice!) ALBIREO(Once.) ALTAIR(Once.) HPL(Pretty busy scene. Lots of large families!) \$80.01 (\$26.67/)
- 9 1900) 8/17/05(WED). COUNTING DOWN TO #2000 AND/OR 20-YEARS. NOW INTO 18-YEARS & NINE MONTHS. Ws-LIP(8:38-10:22PM). Late start due to attending a Cindy Sheehan ^{anti-Iraq war} inspired vigil at corner of Pratt & Light Sts. Accompanied by PLW, who handed out planets mnemonics, songs. JUPITER(v. briefly. 2+2) 11-MOON(Tycho and edge crater at 80X. Very nice.) VISIT: A man who asked how long I've been doing this and who said he looked thru scope at Saturn in around 1990. He was a pvt. at Ft. Meade and had no money but, he said, I let him look for free. Tonight, he was back with his family. His two little boys looked at Moon thru scope. He paid a couple of bucks, this time. \$57.01 (\$32.76/hr.) VISIT: A large family who'd been at the anti-war vigil. Adjourned to wine & choc. cake party at home w/PLW.
- 9 1901) 8/20/05(SAT)HPL-BICEN.(8:17-11:10PM). Sticky warm. Somewhat hazy sky. PARKING(Jamed up scene at L.D., but I lucked out and got spot.) SCOPE(Needs attention...collimation, dec. scales.) ARCTURUS(1X, before sighting Jupiter.) JUPITER(V. low. 1+1.) 14-d.MOON(Rose 8:48PM. Acq. 9:03PM. Hazy start w/gradual improvement. Alternated bet. whole Moon @ 44X and edge craters @ 166X. Lookers impressed.) EMERGENCY VEHICLES(Early in stint about 8 of various types decended on Hpl., driving onto Promenade thru my space. One fire eng. came frighteningly close to brushing against scope!) MARS HOAX(For several months the public has been under the impression that Mars is about to be so close to Earth that it will look as big as the full Moon! Several times a night for the past few months I've had to dissuade people of this belief. What's happened is that Mars' 8/03 passby, in which it looked as big as the full Moon at 75X, has gotten shifted to this year. The public is unaware of the 75X fine print, as well!) INTELLIGENT DESIGN(This afternoon I e-mailed a letter to the Sun w/my take on I.D. based on my telescoping experience. Coincidentally, tonight I had a lady looker to excitedly assured me that God made the Moon!) VISIT: Bunny Rise with a man friend, Dan. Dan was an enthusiastic looker. \$66.64 (\$23.06/hr.)
- 9 1902) 8/21/05(SUN)HPL-E.LIP(8:10-11PM). Mild. Unsticky. Gd. sky. SCOPE(At home, reset dec. scales, finder, cleaned objective.) ARCTURUS(Couldn't find by "numbers". When acq. in finde couldn't get into main scope!) JUPITER(Briefly. 2+1. Fuzzy. Lost 8:40PM). ALBIREO(For most of stint. Lookers not real enthusiastic. I didn't recruit.) 15-d.MOON(Acq. 10:02P rising over stern of Constellation. Big craters on M. Crisium edge. MARS HOAX(Lots of inquiries about when Mars would be seen.) MARS(Spotted low in NE as unloading car around 11:45PM.) \$56.81 (\$20.07/hr.)

TOTAL THIS PAGE \$ 380.50

TOTAL THIS YEAR \$5,544.91

- 8 1903)8/24/05(WED)HPL-E.LIP(7:52-10:28PM). Great sky. Mild. ALIGNMENT(Pretty gd. after 1 shift.) ARCTURUS(Once.) VENUS(Twice, briefly.) JUPITER(Terrific...finally. 1+3. Expecting not to do it, was going to leave stickers home but, happily, chg.'d mind at last moment. Lost behind Hyatt at 8:35PM.) ALBIREO(Most lookers seemed satisfied. Req. lots of energy to explain it before they look!) LOUD MUSIC(A Rolling Stones type band in Amphitheater, making it hard for passersby to hear me recruiting.) JUPITER-VENUS(Are heading for a 9/2, 1.4° conj. Great sight tonight, with Jupiter above the Hyatt and V. to lower right bet. Hyatt & Verizon bldg. Maybe take camera tomorrow!) \$42.51 (\$16.37/)
- 9 1904)9/01/05(THU)HPL-E.LIP(7:32-11:10PM). Ok sky. Sl. warm, sl. sticky. HURRICANE KATRINA (Being acutely aware of the human disaster occurring in New Orleans & vicinity, I decided to contribute tonight's contribs. to disaster relief. On my hat I put a sign saying HURRICANE RELIEF CONTRIBUTIONS HERE!. Also, I told lookers that any \$\$ contributed would go to hurricane relief. Collected \$76.94, which included a \$20 contrib, which I will send to a relief org.) VENUS-JUPITER CONJUNCTION(Set-up early hoping to show it to lookers, but it was kind of a bust. Couldn't find Venus until a looker pointed it out. Then, expecting it to be v. close to Venus, couldn't find Jupiter! Eventually got them both in finder. They were alot more widespread than I was imagining. Between 3 & 8:05PM to +/- six photos of them over the Promenade/Hyatt, at which point they sunk behind the Hyatt. J was alot dimmer than V!) ALBIREO(Main feature till 10PM.) URANUS(Before leaving decided to take a stab at Uranus...and found it! From then till 11:10PM I show it to occasional lookers, as well as working on scope collimation. Uranus will be a welcome relief from Albireo!) CONCLUSION(The last Thursday I was out took in \$35.96, so tonight's contribs could have been a signification increase over what might have been. Mailed Ck.#879 for \$76.94 to The Salvation Army, 615 Slaters Lane, Alexandria, VA 22313.)
- 8 1905)9/12/05(MON)HPL-W.LIP(7:10-10:37PM). Great sky. Warmish. First stint since leaving 9/4 to visit PLW in StL and then going w/her to Chicago, where we took in a Rolling Stones concert. The concert was memorable, but once is enough for me. I was both impressed and appalled by the extend of the infrastructure, human & material, required to support the concert, which was but a one night stand! 9-d. MOON(Wonderful, with still some sunrise on Copernicus. Used both 80X & 166X, mainly.) ALBIREO (Once.) URANUS(4 times, thanks to excellent alignment.) Should have quit around 10PM but was enjoying self. \$77.17 (\$22.37/)
- 8 1906)9/13/05(TUE)HPL-W.LIP(7:05-10:35PM). Gr. sky, the sl. haze. HH(Somewhat depressed all evening, maybe because worrying about PLW's problem w/me. On phone today she sounded v. detached.) SCOPE(Have been putting it off, but dec. latch needs serious attention.) 10-d. MOON(I bounced around between Tycho and Jura Mts. regions. Used all magnifications. URANUS(Problem finding. Why? Failed 4 out of 7 tries.) Many enthusiastic lookers. A Hartford Co. couple who have been occasional lookers, after looking thru scope tonight went to Discovery Channel and bought an 80mm Go-to refractor! VISIT(Pres. of Burlington, VT Astro. Soc. who really liked what I was doing and contributed \$20.) \$84.62 (\$24.16/hr.)
- 8 1907)9/18/05(SUN)HPL-W.LIP(6:68-10:45PM). V.Gd. sky. BAD STARS!(Started 12-min. before ss figuring would do a daytime star till Moon rose. However, couldn't find either a Boo or a Lyr. V. frustrating. Shifted tripod many times to no avail. Decided to simply wait out Moon, due to rise 7:38PM. However, I misjudged its rising azimuth and did not acq. it till 27-mins after it rose, as it was blocked by ship! As people approached asking what's to see, I simply told them am waiting for Moon to rise. Happily, ISS flew over bet. 8:08 and 8:13, and I entertained some passersby with it.) 15-d. MOON(Nice! Edge craters near M. Crisium. Used 50X, 80X, 166X alternately. Lookers enthusiastic.) URANUS(4-times, havin' finally gotten aligned. Both I and lookers enjoyed it. Gave out stickers.) ALBIREO (Just once.) MUSIC(Rolling Stones style band in Amphi. Great!) HH(Despite discouraging start, I got into the swing of thing and felt great. Lookers v. appreciative!) \$80.32 (\$21.25/) Figuring from when Moon acq.'d, it was \$33.89/hr. BALDON MAN CHARLIE(He worked next to me for a while and was really busy. He said it's rare someone doesn't pay. He said he'd be working all day, so I'm guessing he took in 2-3 hundred dollars!).

TOTAL THIS PAGE \$ 284.62

TOTAL THIS YEAR \$5,829.53

- 8 1908)9/19/05(MON)HPL-W.LIP(7:25-10:05PM). Ok sky, then some clds. ALBIREO(2nd try. Set up scope real high anticipating Albireo till Moon rose.) URANUS(2 or 3 fruitless tries. Why?) 16-d.MOON(Acq. 8:50PM. Lowered tripod for it. M. Crisium edge very good.) VISIT(Ray Villard, who hung out for a while.) BARRY(Got an insight into his personality. From 100' away I could hear him talking endlessly to his buddies. I shouted at him, "Barry, you talk so much you're causing global warming." His buddies laughed. A min. later he confronted me in a rage, saying if I insulted him again in front of his friends he'd dump my telescope in the water. I said to him, "Where's your sense of humor?", but he didn't hear me. So, whatever else is going on in Barry, he definitely has an infantile anger syndrome and NO sense of humor.) CITY PAPER (A man came along who said his wife worked for City Paper. He asked me to keep it a secret, but that CP is doing an article on me!) QUITTING TIME(Quiet scene but steady groups passing by. Prob. could have stayed longer but was getting a little itchy.) \$47.22 (\$17.75/hr.)
- 8 1909)9/21/05(WED)HPL-W.LIP(7:13-11PM). Mild. Great sky. ARCTURUS(1st try in twilight.) B CYG (1st try.) URANUS(Acq. 8:24PM, low in E. Kind of dim at acq. but brightened up nicely as it got higher.) 18-d. MOON(Acq. 9:55PM. Briefly, as it rose to left of WTC then disappeared behind it. QUITTING TIME(Tried to quit at 9:55PM, but people kept arriving asking for a look!) VISITS(Myra & Buzzy Hettleman, who were having a carryout supper in the Amphitheater. They enjoyed B Cyg. Bought me a cup of choc. icecream.) (Bob, a mem. of Rochester astro club, Kodak retiree, owner of a 7" refractor. Was pleased to find me and amazed I was able to acq. Uranus!) \$52.32 (\$13.84/hr.)
- 8 1910)9/22/05(THU)HPL-W.LIP(7:20-10:10PM). EQUINOX 6:23PM. Warm, sl. hazy sky. ALBIREO(1st try. URANUS(Several tries. Had lowered tripod to better accommodate lookers, which may have screwed alignment. Brightness diminished by haze. Didn't recruit for it. \$37.22 (\$13.11/)
- 8 1911)9/27/05(TUE)HPL-W.LIP(7:07-9:35PM). Great sky. Sl. cool. Wore long pants/long sleeve shirt/beret. ALBIREO. URANUS(Lowered tripod to better accommodate lookers, which prob. threw off alignmt, because had great trouble finding. Too bad, as a woman was waiting anxiously to see it but never did. Showed her B Cyg instead. \$28.00 (\$11.38/hr.)
- 8 1912)9/30/05(FRI)HPL-W.LIP(7:20-11:10PM). Coolish. Gd. sky. CONFUSION!(Started on B Cyg but soon tired of it. Lowered tripod and went to Uranus. After a while decided image was not so good, so raised tripod and returned to B Cyg. From then on, alternated between them.) MARS((Came from behind WTC 10:43PM but then played hide-&-seek with ship mast and ropes. Cleared ship 11:10PM. Was a big, orangish ball with vague shading. Am hoping orange filter will improve image. STICKERS. Gave out first, new "I Saw Mars! 2005-06 Opposition Harborplace". VISIT(Max Heppner & Shaina) \$78.55 (\$20.46/hr.)
- 8 1913)10/01/05(SAT)HPL-BICEN.(7:18-11:02PM). Mild. Gd. sky but so-so seeing. WORK(Is BRUTALLY hard work. The variety of people, sizes of people, fuzzy objects, focusing q.'s, lights, trucking equipment there, getting parked, unloading at home, etc, etc. Though the money sustains me, it is an awful amt. of work for what I get!)*VENUS(Spotted by a looker! Low in SW. Gibbous. Poor seeing...was twinkling a bit! So-so collimation.) ALBIREO(Last night I inadvertently let a looker leave w/my photo which, I guess, he thought I was giving to him. Made new copy today, then forgot to take it! Same w/star maps...forgot to take Oct. ones.) MARS!(Acq. 9:21PM. Used 166X w/orange-red filter. Some vague shading. Lookers OK with it, esp. since I first hyped it w/a Hubble photo. M&I(Per a request, failed to find it after 5 minutes of searching.) \$83.63 (\$22.42/hr.) *(+ xeroxing all the handouts!)
- 10/02/05(SUN) Nice day, leading into beautiful evening. Put stuff in car and headed for HPL. Then remember the Elian Gonzales interview on 60 Minutes which, when I first heard about it, I decided I'd stay home for. Instead, 1 mi. out, I turned around, came home, & phoned Phyllis, asking her to listen and to give me her impression. Headed back to HPL. The closer I got the more daunting the effort to set up began to feel, and, thinking about the E.G. interview, came home again. Called PLW to tell her what happened. My main regret about not telescoping tonight is that I'll miss working w/the Sun. nite family/kids crowd Also have been thinking should quite B Cyg & Uranus and stick w/easier objects--Mars, Moon

TOTAL THIS PAGE = \$ 326.94

TOTAL THIS YEAR = \$6,156.47

THE STRAIGHT DOPE

BY CECIL ADAMS

I'VE JUST FINISHED READING ABOUT HOW researchers have concluded that Mars was never warm based on analysis of a meteor—found on Earth. More distantly you'll remember that they were debating whether a fossil of a living organism had been found in a martian meteor found in Antarctica. My question: How do they know these meteors came from Mars? Are they labeled? Have they found meteors from other planets that they recognize? Why waste all this money and time on the space program if there are rocks from these planets just lying around Earth?

KENT, BIRMINGHAM, ALA.

The rocks were found on Earth, Kent, so they're meteorites, not meteors. (Meteors are space rocks that fry in the atmosphere; meteorites are the remnants that make it all the way down.) Once you get that straight, try chewing on this: Scientists think the Martian meteorites came from Mars because—I realize the nontechnical mind won't find this entirely persuasive—they couldn't plausibly have come from anywhere else.

The Martian meteorites—34 have been identified to date—are collectively known as the SNC (pronounced "snick") group. The letters stand for three related categories of geologically unusual meteorite: shergottites, the prototype of which fell in 1865 near the town of Shergotty in India; nakhlites, named for a rock that dropped on Nakhdia, Egypt, in 1911; and chassignites, so called because of the specimen that landed in Chassigny, France, in 1815.

For years it was assumed that the SNC meteorites were hunks of asteroid like pretty much every other space rock. Then in 1979 geologists Hap McSwain and Ed Stolper advanced the seemingly barmy thesis that the meteorites had come from Mars based on the following logic: 1) the SNC stones were igneous, i.e., volcanic; 2) all examples then known had solidified 1.3 billion years ago or less; 3) only planet-sized bodies still had volcanoes going that late in the game—Earth's moon cooled off roughly 3 billion years ago, and asteroids chilled shortly after their creation roughly 4.5 billion years ago; 4) of the two planets that might reasonably be said to be within a stone's throw of us, Venus' strong gravitational pull and thick atmosphere make it an unlikely launching pad for meteors; so 5) that pretty much leaves Mars.

Persuaded? McSwain's fellow rock jocks initially didn't buy it either. But then other researchers analyzed the minute bubbles trapped in a shergottite meteorite, which presumably were a trace of the atmosphere of the rock's home planet. The noble gases in the bubbles (argon and such, which being noble don't charge over time and so are a sort of planetary fingerprint) precisely matched those in the Martian



atmosphere as sampled not long before by the Viking landers.

A pivotal question remained: What launched the pieces of Martian rock into space? A monster meteorite strike was the obvious answer, but some objected that the energy of such an impact should have turned the future SNC meteorites into glass or vaporized them altogether. Two developments helped blunt that argument. The first was theoretical work demonstrating that a percentage of impact debris would (OK, could) survive ejection into space relatively unscathed, and the second was the discovery of a lunar meteorite in Antarctica in 1982. (That find, incidentally, addresses your question about whether meteorites from other planets have been discovered. Answer: yes, if you count the moon. We know the Antarctic meteorite came from the moon because it matched samples brought back by the Apollo astronauts.) If a celestial chip shot can blast rocks off the moon, the thinking went, they can get blasted off Mars, too.

At this point you may be saying, This is not a story I'd care to run past a judge. Maybe not, but it seems to have carried the day in the scientific community. (You understand I'm omitting a lot of corroborative technical detail.) That's more than can be said of the claim that one Martian rock contains fossils of stuff that once was alive. According to McSwain, nobody believes this now except its original proponents.

That brings us to your last question: If we've got the rocks, why go into space for more? Couple reasons: 1) With all respect to the geniuses who thought it up, some of us would like a little proof of this cockamamie theory, e.g., an actual Mars rock for comparison. (Conceivably a sophisticated probe could do the analysis on Mars and radio back the results.) 2) Because most Martian meteorites are relatively young, and the interesting stuff on Mars happened earlier OK, maybe the odds of there having been Martian life way back when are sluff. If it happened, though, wouldn't you want to know? *

Comments, questions? Take it up with Cecil on the Straight Dope message board, www.straightdope.com, or write him at the Chicago Reader, 11 E. Illinois St., Chicago, IL 60611.

September 14, 2008

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ELUCIDATING

ERSHED READING ABOUT HOW researchers have concluded that Mars was never warm based on analysis of a meteor found on Earth. More distantly you'll remember that they were debating whether a living organism had been found in a martian meteor found in Antarctica. My question: How do they know these meteors came from Mars? Are they labeled? Have they found meteors from other planets that they recognize? Why waste all this money and time on the space program if there are rocks from these planets just lying around Earth?

IL ADAMS

DOPE

- 8 1914)10/05/05(WED)HPL-W-LIP(7:10-9:28PM). Warm. Threatening clds. early, then clear. ALBIKEO(For 1st hr.) URANUS(Since it was well aligned, left tripod hi and found it fairly quickly. W/hyping, lookers seemed satisfied. I advertised it by saying, "Have a look at the 7th planet from the Sun, Uranus!" VISIT(?? Schluderberg, a Harford Co. Astro member. Had never before seen Uranus.) \$34.77 (\$15.12/hr.)
- 8 1915)10/15/05(SAT)HPL-BICEN(6:37-10:10PM). Clear, but poor seeing. Assisted by PLW, who handed out blurbs, incl. the MARS FACTS one she composed. TOUGH WORK!(Windy, loud music nearby, nearly full Moon, collimation off, usual focusing challenges, etc.!) 12-d.MOON(Tycho & edge craters. Bounced around between 80X & 136X. Latter prob. better. Forgot 40mm.) MARS(Acq. 8:20PM. Yellowish-oringish dot. No Distinguishable features. Challenging to make meaningful to lookers!) VISIT(Steve...of Steve & Steve at JHU computer lab...with wife Kathleen celebrating 11th wedding anniversary. Gave them colored in orange "I Saw... Mars!" stickers.) \$90.57 (\$25.51/hr.)
- 8 1916)10/17/05(MON)HPL-W-LIP(6:50-9:36PM). Great sky. Moderate temp. Assisted by PLW. VENUS (Spotted by PLW. For +/-10 mins. "Half moon".) B Cyg(Briefly.) URANUS (+/-15 min.) FULL MOON(Alternated bet. 50X and 166X....a good way to go. Used moon filter on 50X) Not a busy scene but steady traffic. Few families. \$46.97 (\$16.96/hr.) MARS(Acq. 9:27PM, then went behind ship. One looker, then gave it up.)
- 8 1917)10/18/05(TUE)HPL:To acq. Moon & Mars sooner, set-up +/-125-ft. down Promenade. Was a good spot...it worked! (7:58-9:53PM). Late start because decided to skip B Cyg and Uranus and wait for Moon & Mars. On way stopped in Chas. Vil. thinking would acq. Moon sooner there. Bleak scene so, at PLW's urging, continued on to Hpl. Since Moon would not be vis. from W-LIP for +/-1 hr., moved down promenade. 15-D MOON(Great! Lots of edge craters, plus Tycho.) MARS(Some shading which, to me, looked like the left Hubble image in my Mars photo, which included Sirtis Major.) \$36.00 (\$18.85/hr.)
- 8 1918)10/23/05(SUN)HPL-down Promenade, even a little past the Hard Rock Cafe sign(7:56-9:07PM) Cool. OK sky but poor seeing, till shut down by clouds. Assisted by PLW. MARS(Sometimes near decent; sometimes like thru running water.) Some enthusiastic lookers.\$22(\$18.53/) Lookers from Uzbekastan, England, Australia, India,:Russia.....
- 7 1919)10/29/05(SAT)HPL-BICEN(7:28-10:22PM). Wanted to locate further north on Promenade but view blocked by huge, beautiful Norwegian "tall ship". Clear, cold. Wore longjohns. Needed gloves. Fingers stiffening. A sympathetic woman looker gave me her knit gloves! MARS(Really tough. I wish it'd go away! Mushy image low. Occassional clear image when higher, but never steady. Dark region vis. At its closest +/-11PM--43.1M miles.) EYE-PIECES(Used mostly 166X. Mars acceptable at 80X. Put Lee Filters light salmon and apricot filters in my two 90mm's, however couldn't get a fair assessment due to poor seeing.) VISITS(Steve & Linda Dallmus. Steve is an ex-employee of John's. Met them at Frm's. Mkt. and told them I'd be doing Mars in Hpl., and they showed up! Suzanne Lebovit, with whom I went out for an Irish Coffee! and beer. Passery Rbt. Ginsburg.) \$70.29 (\$24.26/hr.)
- 7 1920)10/30/05(SUN)HPL-BICEN(6:20-8:04PM EST). Sunset 5:08PM. Had to use Bicen., as tall ship still present. Leaves Fri.(ugh!). Pretty slow scene. Excellent sky. MARS(A bit mushy when low, but impovement as it rose. By 25-30° up was pretty decent at 166X...for Mars!. Still better at 166X than higher mags.) SCIENCE CTR.(Adjourned to there. I don't think Mars looked much different thru its 8" Clark' than my scope!) \$29.00 (\$16.67/hr.)
- 7 1921)11/03/05(THU)HPL-PROMENADE(6:40-8:30PM). Mild. V. good sky. TALL SHIP(Was sailing away as I arrived! Would have enjoyed seeing it leaving the pier.) MARS(Pretty good for Mars, even when low. Used ND filter throughout evening.) Slow scene. Probably should have skipped tonight to save my juices for the week-end! \$21.15 (\$11.56/) Lots of no pays!

TOTAL THIS PAGE = \$ 350.75

TOTAL THIS YEAR = \$6,507.22

MARS
PART
AUGUST-SEPT
2003
BALTIMORE



MARS
PARTY
AUGUST-SEPTEMBER
2003
BALTIMORE MD.



171%

- 8 1922)11/05/05(SAT)HPL-BICEN(6:03-10:18PM). Mild. Dewy. Sl. hazy. Ok seeing. HOTDOG(Forgot to eat supper, and arrived on verge of a low blood sugar attack. Enlisted a looker to get me a hotdog. It really helped!) MARS(Mostly at 166X w/ND filter. Went to 220X for a short while, then dropped back. Just a pale smudge in S. hemi. Nearly ran out of stickers!) VISIT(Physician-amateur astro from Tennessee here for a conf. Was good company.) SC.CTR. SCOPE(Several lookers said my Mars better than...) HH (Hi energy. Able to keep up with heavy traffic. Finally had enough and quit.) \$118.88 (\$27.97/hr.) MOON-VENUS(Great pairing in SW but inviz. from Bicen. Mentioned by a few lookers.)
- 8 1923)11/06/05(SUN)HPL-BICEN(5:47-7:30PM). V. mild. Temp. low 80's today. Looming clouds and scattered shwrs. forecast. Dodged clds. w/5d. Moon and Mars. At one pt. started packing up, then it cleared and I set-up again. Quit when mostly clouds. Hard rain while driving home! 5d. MOON(Lockers liked alot.) MARS(Really mushy. Grey shading barely there.) Good traffic. Good number of contributors. \$46.48 (\$27.02/hr.)
- 7 1924)11/07/05(MON)HPL-W.LIP(5:52-8:52PM). Cool. Sl. hazy, then great sky. HH(Today--all day--not depressed. Felt great. Hi energy, strong voice, sharp wit! Would that I were this way every day!). ACCIDENT(As I was pointing out Mars, a women walking with a group took a hard fall off the lip as she was looking up. There was alot of concern among her friends. When she got up and said she'd be alright, I gave her an "I Saw...." sticker, which got laughs from the group.) 6d. MOON(Great. Stayed on it till Mars. Went back to it while Mars entangled in ship mast & ropes.) MARS(AT OPPOSITION! 220X w/ND filter. Not much to see, but prob. as clear as can get in my scopes.) B Cyg(1X for lookers who's seen Mars & Moon.) \$40.00 (\$13.33/hr.)
- 8 1925)11/11/05(FRI)HPL-W.LIP(6:31-10:10PM). VETERANS DAY HOLIDAY(Lots of families from NJ and PA.). Cool. Ok seeing. 10d. MOON(Till Mars past ship rigging. Tycho & Jura Mts. Impressive.) MARS(Wore me down trying to get it focused for everybody...and still not that much to see. I wish it would go away! Ran out of "I Saw.." stkr.) \$108.27 (\$29.66/hr.)
- 7 1926)11/12/05(SAT)HPL-W.LIP(5:10-9:43PM). CONCLUSION OF MY 18TH YEAR OF STREET TELESCOPING! Cool but comfortable. Great sky. Good seeing. 11d. MOON(Bounced around with 50X, 80X and 166X. Highlighted Plato and Tycho.) MARS(Now 1.6 million mi. farther than closest. 220X, except for 80X with very little kids. Part of my schitdw/Hubble photo: "This part is dust covered and this part is exposed rock. Thru the scope, if the focus is perfect, you should see a grey smudge on the bottom half which is the rocky area." I think most looker incl. little ones, glimpsed the grey smudge.) Lots of families with LOTS of kids. I felt I worked very well with them!) \$193.35 (\$42.49/hr.)
- 8 1927)11/19/05(SAT)HPL-W.LIP(5:39-9:09PM). Cool--fingerless gloves temp. Clear w/intermittent clds. Semi-quiet scene but steady traffic. Could of worked longer but ran out of stickers! On other hand, by time got hm. sky overcast. MARS(Acq. 5:51PM. Given it's moved out 4 mil. mi. since closest, still doable. "Grey" areas evident. Mainly 166X/ND filter. Noticed that thin clds. enhanced gray area, meaning a more than 30% reduction filter might work better.) 18d. MOON(Rising L of WTC but in thick clds.) \$91.70 (\$26.20/hr.) P.S. This is 1st stint of 19th year. Off to a good start!
- 7 1928)11/20/05(SUN)HPL-W.LIP(4:55-7:30PM). Cool-mild. Gd. seeing. Some lookers following Ravens-Steelers game (R's won). Early start to do Venus and catch an ISS flyover. VENUS(Distinctly crescent. Brought in a few \$\$). Held for +/-15-min.) ISS(17:27:36 flyover.Max. 60°. Ha a dozen lookers. Also some \$\$.) MARS(No much to see. Really want to give it up!) FINDER SCOPE(Way off for a few night, but got it collimated w/scope.) \$37.59 (\$14.57/hr.)

TOTAL THIS PAGE * \$ 636.27

TOTAL THIS YEAR = \$7,143.49



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ISS - Visible Passes

| Home | Info. | Orbit | Prev. | Next | Help |

Search Period Start: 12:00 Saturday, 29 October, 2005
 Search Period End: 1:1:00 Tuesday, 08 November, 2005
 Observer's Location: Baltimore (39.2900°N, 76.6130°W)
 Local Time: Eastern Daylight Time (GMT -4:00)
 Orbit: 345 x 348 km, 51.6° (Epoch 28 Oct)

NEW! Click on the date to get a star chart and other pass details.

| Date | Mag | Starts | | | Max. Altitude | | | Ends | | |
|--------|------|-------------------------------------|------|-----|-------------------------------------|------|-----|-------------------------------------|------|-----|
| | | Time | Alt. | Az. | Time | Alt. | Az. | Time | Alt. | Az. |
| 29 Oct | 2.4 | 20:15:38 | 10 | SW | 20:15:40 | 10 | SW | 20:15:40 | 10 | SW |
| 30 Oct | 1.0 | 18:05:55 | 10 | S | 18:07:54 | 17 | SE | 18:08:14 | 17 | ESE |
| 31 Oct | -0.9 | 17:29 <u>18:29:12</u> | 10 | SW | 17:32 <u>18:32:03</u> | 63 | SE | 17:32 <u>18:32:10</u> | 62 | SE |
| 01 Nov | 0.8 | 18:53:43 | 10 | WSW | 18:55:57 | 33 | WNW | 18:55:57 | 33 | WNW |
| 02 Nov | -0.8 | 16:42 17:42:40 | 10 | SW | 17:45:33 | 66 | SE | 17:48:08 | 12 | ENE |
| 02 Nov | 2.5 | 19:19:03 | 10 | WNW | 19:19:36 | 13 | NW | 19:19:36 | 13 | NW |
| 03 Nov | 0.5 | 18:07:09 | 10 | W | 18:09:54 | 35 | NNW | 18:11:39 | 17 | NNE |
| 04 Nov | 1.7 | 18:32:27 | 10 | WNW | 18:34:22 | 16 | NNW | 18:35:05 | 15 | N |
| 05 Nov | 0.5 | 17:20:29 | 10 | W | 17:23:10 | 34 | NNW | 17:25:52 | 10 | NE |
| 06 Nov | 1.6 | 17:45:45 | 10 | WNW | 17:47:38 | 16 | NNW | 17:49:31 | 10 | NNE |

Developed and maintained by Chris Peat, Heavens-Above GmbH
Please read the updated FAQ before sending e-mail.

Hosted by DLR/GSOC

NOT FOR

- 7 1929)11/25/05(FRI)HPL-W.LIP(5:26-6:54PM). Cold(+/-27°F). Day after T.G. Previous same night, in 2001, was v. busy...\$183. Weather was mild, and J-S-Moon were all on stage. Scene to night was v. quiet, and only a receding Mars was available. There was a steady stream o passersby, but w/big gaps between them. Could have continued to have lookers, but it wa cold, and I was getting bored. MARS(Now +/-50 million mi. farther than on 10/29 and +/-2.7" smaller = 75% in area. Nevertheless, "grey" regions vis. with good focus.@ 166.6X w/ND 30% filter.) EXCITEMENT!(As I was packing up, several boisterous derelicts were confronted by the police right next to scope.) Due to cold hands, only gave out stickers...no mæmonics, etc. \$27.32 (\$18.59/hr.)
- 8 1930)11/26/05(SAT)HPL-W.LIP(4:39-6:10PM). Cold(+/-40° +/wind chill, but I was tolerably comfortable.) Shut down by clds. despite good weather rpt. Too bad, because would have been a decent stint. \$\$ SNITCH(I dropped my guard for an instant and had +/- \$5 grabbed from hat by some little, innercity kids after they'd looked thru scope. Will incl. in total but deduct as a SP expense.) VENUS(Started early expressly for V. 33.5"; obvious crescent. Dist. 46.5 M mi. Held till 5:35PM.) MARS(Too bad clds. came, as seeing good and "grey" areas, prob. Syrtis Maj., fairly obvious.) \$37.44 (\$24.63/hr.)
- 7 1931)12/10/05(SAT)HPL-W.LIP(4:43-7:57PM). Cold(+/-32°F). Clear, adequate seeing. Santa Claus House in business. A good number of families with bright kids. Accompanied by my excellent assistant, PLW. VENUS(Held for +/-45min. Nice crescent, 37M miles.) 9-d. MOON(Co-pernicus still w/sl. shadow. Tycho region.) MARS(15.3" and 56.6M miles. Looks alot dimmer than at op. Still showing some "shading".) Quiet scene but constant traffic. \$ 76.69 (23.74/hr.)
- 7 1932)12/18/05(SUN)HPL-AMPHITHEATER(4:02-6:10PM). First time in Amphi. in yrs. Intended to use E.Lip, but the artist guy was there. For Venus, Amphi turned out to be a good viewing location. Good sky. Mild, the hi 30'sF. Except for Santa House line, was a slow looking scene. Lots of no-pays, including kids who visited from S.H. line w/o parents. VENUS(+/-46" oresent. Acq. on very first try. 80X. Held till it hit roof.) MARS(Dimmer and more red now. Decided not to fool with it.) \$35.38 (\$16.53/hr.)

TOTAL THIS PAGE \$ 176.83

TOTAL THIS YEAR = \$7,320.32

868 YEAR

STREET CORNER EXPENSES -- 2005

| | |
|--|-----------------|
| 1/02/05 SP 14-sides planets mnemonic Kinkos) | \$ 1.18 |
| 1/02/05 SP 14-sides January '05 star map (JHU) | \$ 0.98 |
| 1/03/05 STA WHITE-OUT (Staples) | \$ 0.96 |
| 1/03/05 POST mail Feb. reqs. to Hpl. | \$ 0.37 |
| 1/13/05 SP 1-copy "Credo" for AACC talk (Kinkos) | \$ 0.08 |
| SP 1/18/05 17-sides for AACC talk (Loyola) @ \$0.08/ea. | \$ 1.36 |
| SP 2/2/05 1-side e-mail from Beth Hufnagel(Loyola) | \$ 0.08 |
| SP 2/5/05 20-sides 2/05 sky maps (4 = \$0.34 + 16 = \$1.12) | \$ 1.46 |
| 2/5/05 SP Frankie in Hpl. | \$ 5.00 |
| 2/06/05 SP 55-sides SC handouts (47 JHU @ 7¢ + 8 Kinkos @ 8¢) | \$ 3.93 |
| 2/14/05 POST mail March requests to Hpl. | \$ 0.37 |
| 2/20/05 STA 25% of Mt. Wash. B.S. bill | \$ 9.85 |
| 2/21/05 SP 5-sides download mats. for 4/9 talk (Loyola) | \$ 0.40 |
| 2/24/05 SP 2-sides March sky map (Loyola) | \$ 0.16 |
| 2/26/05 SP 26-sides (Kinkos) + 36 sides (JHU) SC handouts | \$ 4.70 |
| 2/26/05 SP Frankie in HPL | \$ 5.00 |
| 3/5/05 POST mail Apr. req. to Hpl. | \$ 0.37 |
| 3/16/05 SP 9-sides handouts for AACC talk (Kinkos) | \$ 0.76 |
| 3/16/05 POST mail handouts to AACC | \$ 0.60 |
| 3/20/05 SP 2-sides for talk (Loyola) | \$ 0.16 |
| 3/20/05 SP 2-packs (1000ea.) "self adhesive notes" for Hpl. handouts (Staples) | \$ 6.72 |
| 3/22/05 SP 16-sides SC handouts (Kinkos @ \$0.08375/ea.) | \$ 1.34 |
| 3/25/05 SP 6-slides for AACC talk of 4/9/05 (JHU) | \$ 25.20 |
| 3/25/05 SP 1-side for AACC talk (JHU) | \$ 0.07 |
| 3/30/05 SP 2-sides download 4/05 starmap (Loyola) | \$ 0.16 |
| 4/1/05 SP 10-side April star map (JHU) | \$ 0.70 |
| 4/1/05 SP 3-slides for AACC talk of 4/9/05 (JHU) | \$ 12.60 |
| 4/6/05 STA Mt. Wash. Bike Shop | \$ 16.60 |
| 4/6/05 SP 10-sides SC handouts (JHU) | \$ 0.7 |
| 4/7/05 STA Mt. Wash. Bike Shop | \$ 1.2 |
| 4/7/05 SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 4/9/05 SP 22-sides SC handouts (Kinkos) | \$ 1.85 |
| 4/9/05 SP 30-sides SC handouts (JHU) | \$ 2.10 |
| 4/15/05 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 4/16/05 SP Frankie in HPL | \$ 5.00 |
| 4/17/05 SUBS Sidewalk Astronomers membership (ck#860) yr. 2005 | \$ 15.00 |
| 4/17/05 POST mail in May schedule reqs. | \$ 0.37 |
| 4/17/05 SP Frankie in Hpl. | \$ 3.00 |
| 4/18/05 SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 4/18/05 SP Frankie in Hpl | \$ 3.00 |
| 4/20/05 SP Frankie in Hpl. | \$ 3.00 |
| 4/21/05 SP 36 sides SC handouts (JHU) | \$ 2.52 |
| 4/25/05 STA Food emergency (Johnny Rockets) | \$ 4.00 |
| 4/27/05 SP Frankie in HPL | \$ 3.00 |
| 4/28/05 SP 28-sides SC handouts @ \$.084/ea. (KINKOS) | \$ 2.35 |
| | PAGE = \$150.40 |

SP = \$100.66

STA = \$ 32.66

POST = \$ 2.08

SUBS = \$ 15.00

PAGE = \$150.40

STREET CORNER EXPENSES -- 2005

| | | |
|---------|--|----------|
| SP | | |
| 5/4/05 | 2-sides May '05 star map (Loyola) | \$ 0.16 |
| 5/8/05 | SP Frankie in Hpl. | \$ 3.00 |
| 5/11/05 | SP 40-sides SC handouts (JHU) | \$ 2.80 |
| 5/11/05 | SP Frankie in Hpl. | \$ 3.00 |
| 5/14/05 | 3-sides SC handouts (JHU) | \$ 0.21 |
| 5/16/05 | SP Frankie in Hpl./ | \$ 4.00 |
| 5/18/05 | SP Frankie in Hpl. | \$ 3.00 |
| 5/29/05 | SP 34-sides SC handouts (JHU) | \$ 2.38 |
| 5/31/05 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 6/01/05 | SP 8-sides (Kinkos) + 20-sides (JHU) | \$ 2.07 |
| 6/6/05 | POST mail astro. league ballot | \$ 0.37 |
| 6/6/05 | SP 2000-post-it notes for SC handouts (Staples) (\$0.0047/ea.) | \$ 9.43 |
| 6/8/05 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 6/13/05 | SP 20-sides SC handouts (Kinkos) | \$ 1.60 |
| 6/17/05 | SP 25-sides SC handouts (JHU) | \$ 1.75 |
| 6/23/05 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 6/25/05 | SP 18-sides SC handouts (Kinkos) | \$ 1.51 |
| 6/29/05 | SP July '05 star map (JHU) | \$ 0.14 |
| 6/30/05 | SP July '05 star map (Loyola) | \$ 0.16 |
| 7/01/05 | SP 20-sides July star map (JHU) | \$ 1.40 |
| 7/16/05 | POST mail Aug. reqs. to Hpl. | \$ 0.37 |
| 7/20/05 | SP Frankie in Hpl. | \$ 3.00 |
| 7/22/05 | SP 24-sides for Hpl. handouts (JHU) | \$ 1.68 |
| 7/22/05 | SP 22-sides for Hpl. handouts (Kinkos) | \$ 1.85 |
| 7/25/05 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 8/04/05 | SP 12-sides SC handouts (Loyola) | \$ 0.96 |
| 8/05/05 | SP 2-sides SC sign JUPITER (JHU) | \$ 0.14 |
| 8/7/05 | POST mail Sept. Hpl. requests | \$ 0.37 |
| 8/14/05 | SP 4-sides 8/05 star maps (Loyola) | \$ 0.32 |
| 8/15/05 | STA bike repair (Mt. Wash. #389694) | \$ 10.60 |
| 8/15/05 | SP Frankie in Hpl. | \$ 3.00 |
| 8/16/05 | SP 20-sides mnemonic (Kinkos) | \$ 1.68 |
| 8/16/05 | SP 12-sides August star amp (JHU) | \$ 0.84 |
| 8/17/05 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 8/22/05 | SP 12-side SC handout (star map) (JHU) | \$ 0.84 |
| 8/24/05 | SP Frankie in Hpl. | \$ 3.00 |
| 9/12/05 | SP 1-color cpy. Albireo (Kinkos) + 1-Sept. sky map (JHU) | \$ 0.96 |
| 9/12/05 | SP Frankie in Hpl./ | \$ 3.00 |
| 9/13/05 | SP Sept. star map 2-Loyola + 20-sides JHU | \$ 1.56 |
| 9/13/05 | SP Frankie in Hpl. | \$ 3.00 |
| 9/17/05 | SP SC handouts 18-sides (Kinkos + JHU) | \$ 1.43 |
| 9/18/05 | SP 15-side Mars sticker art (Kinkos) | \$ 1.26 |
| 9/19/04 | SP 12-sides Sept. star amp (JHU) | \$ 0.84 |

| | | | |
|--------|---------|--------|----------|
| SP = | \$71.01 | PAGE = | \$ 82.72 |
| POST = | \$ 1.11 | | |
| STA = | \$10.60 | | |
| PAGE = | \$82.72 | | |

| | | |
|----------|---|----------|
| 9/20/05 | STA 1/2-pt. 190 proof alcohol for lens cleaner (Eddies Liquors) | \$ 5.24 |
| 9/21/05 | SP 8-sides add'l Mars sticker art (Kinkos) | \$ 0.68 |
| 9/21/05 | SP Frankie in Hpl. | \$ 4.00 |
| 9/22/05 | SP 4-sides SC handouts (Loyola) | \$ 0.32 |
| 9/26/05 | SP 1-"I Saw...MARS! rubber stamp (Baumgartex) | \$ 19.95 |
| 9/29/05 | SP 2-sides MARS sticker original (Kinkos) | \$ 0.17 |
| 9/29/05 | SP 2-sides OCTOBER STAR MAP (JHU) | \$ 0.14 |
| 9/29/05 | SUBS renewal of S&T thru 2/07 (Sky Publishing Corp.) | \$ 32.95 |
| 9/29/05 | POST mail S&T renewal check | \$ 0.37 |
| 10/01/05 | SP 1-color cpy. of Albireo page for SC (Kinkos) | \$ 0.90 |
| 10/01/05 | SP 20-sides October star map for SC handouts (JHU) | \$ 1.40 |
| 10/02/05 | SP 14-sides SC handouts (Kinkos) | \$ 1.18 |
| 10/04/05 | STA stamp pad ink for post-its handouts (Staples) | \$ 1.92 |
| 10/12/05 | SP Copy & laminate Albireo star map and picture (Kinkos) | \$ 2.33 |
| 10/19/05 | STA orange pencil for coloring Mars stickers (Utrecht) | \$ 1.04 |
| 10/28/05 | SUBS Observers Handbook 2006 (S&T) | \$ 28.45 |
| 10/28/05 | SP 5-sides SC handouts (Kinkos) | \$ 0.42 |
| 11/03/05 | SP 16-sides Nov. star map (JHU) | \$ 1.12 |
| 11/08/05 | SP 59-sides SC handouts (Kinkos) | \$ 4.97 |
| 11/10/05 | POST mail requests to HPL for Dec. | \$ 0.37 |
| 11/11/05 | SP Frankie in HPL | \$ 5.00 |
| 11/12/05 | SP 23-sides SC handouts (JHU) | \$ 1.71 |
| 11/12/05 | SP Frankie in Hpl/ | \$ 5.00 |
| 11/18/05 | SP e-mails ref. Celestial Searchers talk Sea (JHU) | \$ 0.35 |
| 11/20/05 | SP Frankie in HPL | \$ 3.00 |
| 11/21/05 | SP 4-copies for overhead transparenc preparation (JHU) | \$ 0.28 |
| 11/21/05 | SP 4- overhead transparencies for coming talks (JHU) | \$ 2.00 |
| 11/23/05 | SP 2-copies Dec. star map (JHU) | \$ 0.14 |
| 11/26/05 | SP 2-sides Mars blurb (JHU) | \$ 0.14 |
| 11/26/05 | SP Money snatched from hat by gang of young innercity kids. | \$ 5.00 |
| 11/28/05 | SP 7-copies for StarDoc talk (JHU) | \$ 0.45 |
| 11/28/05 | SP 2-overhead transparenc for StarDoc talk (JHU) | \$ 1.00 |
| 12/01/05 | SP 32-sides SC handouts @ \$0.084/ea. (Kinkos) | \$ 2.69 |

STA = \$ 8.20
 SP = \$ 64.38
 SUBS = \$ 61.40
 POST = \$ 0.74
 PAGE = \$ 134.72

PAGE = \$ 134.72

S U M M A R Y

| PAGE | SP | STA | SUBS | POST | PAGE |
|------|----------|---------|---------|---------|----------|
| 1. | \$100.66 | \$32.66 | \$15.00 | \$ 2.08 | \$150.40 |
| 2. | 71.01 | 10.60 | -- | 1.11 | 82.72 |
| 3 | 64.38 | 8.20 | 61.40 | 0.74 | 134.72 |
| YEAR | \$236.05 | \$51.46 | \$76.40 | \$ 3.93 | \$367.84 |

M I L A G E

1/05 thru 8/31 = 644 miles X \$0.405 = \$260.82
 9/05 thru 12/05 = 224 miles X \$0.485 = \$108.64
 TOTAL = 868 miles = \$369.46

2006

Not for Distribution

- 8 1929) 1/12/06(THU) AMPHITHEATER (So I could hold rising 13-d. Moon on left side of WTC) 5:07-7:08PM. Mild, dampish. Not a totally slow scene, but my loc. was too far from line of foot traffic. 13-d. MOON (Tycho and edge craters.) MARS (Several times, mainly in order to give out stickers. Now 10.7" dia. No detail. To eye is looking more red!) M45 (Sort of nice at 50X.) \$16.20 (\$8.06/hr.) HH (Felt ok. Can still do it!)
- 72 1/19/06(THU) POTOMAC GEOPHYSICAL SOCIETY MEETING AT FT. MYER, ARLINGTON, VA. (7-9PM). AUSPICES BY GALVIN (703-569-9187). +/-20 attendees. Talk in three parts: 1) "The Geomagnetic origins of Baltimore's Street Grid"...overhead projections, 2) "Flag On The Moon", plus another dozen slides, 3) most often asked questions. Cy was very pleased with my presentation. However, I was displeased in that I felt I was not in control of myself...that the show was running me, not vice versa. It's as if my IQ dropped significantly during the presentation. I don't like that feeling at all! Before the talk we had drinks and a chicken dinner. I drove to New Carrollton and took Metro to Rosslyn, where Cy met and returned me. \$\$: For some reason I was expecting a \$45 honorarium. However, Cy informed me I was mistaken and there was none. Given my preparation expenses and travel, this turned out to be an expensive event for me!
- 7 1/27/06(FRI) DRY RUN TO HPL. Cool (38F), great sky. SATURN (At '06 opposition. Rose at 5:22PM. I arrived at Promenade 6:40PM, thinking Sat. would appear from behind WTC around 7PM. Wrong! Would prob. have been 7:45PM. Could have moved southward a bit, but insufficient passersby to warrant setting up. Adjourned to Sc. Ctr. scope. Ret. to HPL 8:30PM. Enough passersby to probably justify setting up, but just didn't feel like it.) MIKE (Young man, with his wife, who greeted me as Dr. Heyn and said he's been in the astronomy class I taught to middle sch. kids at the Sc. Ctr. in the early '90's. He had fine memories of the class!)
- 7 1930) 1/28/06(SAT) HPL, DOWN PROMENADE NEAR J. PAUL'S (6:45-10:05PM). Sl. adverse rpt. but pristine sky. Mild-cool 42°F. SATURN (Good as it gets! 4-moons...Titan-8.4, Rhea-9.7, Enceladus-11.8, Tethys-10.3. 133.3X only. Lots of enthusiastic lookers. A few doubters.) HH (In good form. After a while my right leg began aching a little.) \$144.47 (\$43/34/hr) FRANKLIN CRAVER III (Homeless alcoholic in Hpl. Gave him xerox blow-ups of his and homeless buddy's photo in 1/07/06 Sun.)
- 8 2/03/06(FRI) DRY RUN TO HPL. Accompanied by PLW. Arrived +/-7:45PM. Looked doable when leaving home but was cloudy when we ar. Hpl. Left scope in car and visited Promenade. Mild temp. Enough strollers present to have warranted setting up. Too bad we didn't, because we have a "Saturn Facts" blurb composed by PLW and me which we wanted to start handing out. Adjourned to J.Pats Pub for Irish music. While there, sky cleared sufficiently to have allowed setting up!
- 7 1931) 2/24/06(FRI) HPL-W.LIP (6:45-9:23PM). 31° w/wind chill. However, I was dressed ok. Clear. SATURN (Titan-Rhea, 9.7-Dione, 10.4). Not crowded but pretty steady stream of passersby. \$62.00 (\$23.54/hr.!))
- 8 1932) 3/04/06(SAT) HPL-W.LIP (6:27-9PM). 37°F w/strong wind chill. Still, a good number of people out, esp. early. SATURN (2 moons easy, .166X except for little kids. Lots of amazed lookers! Gave out "I Saw..." stickers and blurb.) 5-d Moon (Several times. Good!) HH (In good head, felt physically up to the job!) \$95.50 (\$37.45/hr.!) VISIT (Janet, a Wed. night dancer from yrs. ago, with her two small children and ex-dancer husband.)
- 7 1933) 3/10/06(FRI) HPL-W.LIP (6:30-10:17PM). 60°'s! Sl. hazy but great sky. Many people out... like summer! 9-d MOON (Occasionally. Tycho region at 165X. Lots craters!). SATURN (165X Good as it gets. Equatorial band, Cassini Div., 3-moons. Lots of awestruck lookers!) Began leaving, but people kept coming. Had pulled plug so used 80X. Lookers still very impressed. \$181.54 (\$47.99/hr.)

TOTAL THIS PAGE = \$499.71

TOTAL THIS YEAR = \$499.71

- 12 3/17/06 CITY NEIGHBORS CHARTER SCHOOL FIFTH GRADE "SUPER SCIENCE SLEEPOVER!!!" Auspices teacher Peter French (410-254-8718). 7:00-10:15PM. 20+ students and some parents. Slide show with improvised, greyish corkbd. as screen... worked ok. Fwd. & rev. projector buttons not working so had to move slide tray by hand, which might have detracted from show quality a little. Nice kids. Showed some curiosity. HH(I felt I lapsed into a too academic personality, which I don't like!) Peter stopped show after Polaris star trails slide, and we adjourned to parking lot. I set up scope, and everybody looked at Saturn. For convenience sake, used 80X. Gave out stickers. With show gave out sky maps, 20 Hubble photos, 10-Parco, 2-Handy-Hand. \$100.00 On way home stopped by Mike Potter's, only to discover he'd just inadvertently "fried" his electronic camera and other telescope components!
- 8 1934)3/18/06(SAT)HPL-W.LIP.(6:50-9:45PM). Cold. 35° with almost constant ^{gold} wind. Rugged! Nevertheless, a steady stream of lookers. SATURN(Ok. 3 moons on right. Lots of very impressed lookers. 166X mostly.) VISIT(John Gracik, a nice young man from the Coast Guard cutter tied up along side Promenade, who hung around for a while. I invited him to go for a beer, and we adjourned to J.Pats.) SHUTTING DOWN(As often happens, the more I wanted to pull the plug and leave, but busier I got. Took ½ hr. to finally leave!) \$103.96(\$35.60/hr.)
- 7 1935)3/19/06(SUN)HPL-W.LIP(6-7:33PM). Not as cold nor windy as last night. Many fewer strollers at set-up time than I expected. There were more by 7PM, but then number fell and place began looking bleak. Pulled plus! SIRIUS & SATURN(Started early to maximize business. ss = 6:17PM. First looked for Sat. but couldn't find it. Found Sirius, confirming good alignment. Then acq. Sat., maybe 5-min. before ss. Impressive in twilight!) \$47.43 (\$30.60/hr.)
- 8 1936)4/09/06(SUN)HPL-W.LIP(7:13-9:55PM). Cool, cloudless. Moderately busy scene. First sortee since returning from Mediterranean eclipse cruise with PLW, FH, EO, TH, CH, & PL. It was a great experience. Following cruise, PLW and I spent 5-days in Tuscany. 11-d. MOON>Show whole Moon photo than close-up, then concentrated on Tycho region @ 166X. It worked!) SATURN(Acq. 3-min. before ss. Lots of doubters. 2-moons.) VISITS(Barry. A man with a green laser, who shined it across water for me. Why did he have it?) \$82.48 (\$30.55/hr.) VISIT(A woman who had a Jupiter sitcker and was pleased to add Saturn to her collection!)
- 7 1937)4/10/06(MON)HPL-W.LIP(7:27-9:28PM). Cool, comfortable. Gd. sky. Fairly busy scene early, then slowed down. Could have stayed longer but had enough. 12-d. MOON(Briefly at start, then intermittently. Tycho region @ 166X.) SATURN(Acq. at ss. 3-moons. A good number of enthusiastic lookers.) A good # of families/kids. \$54.69 (\$27.07/hr.)
- 8 1938)4/11/06(TUE)HPL-W.LIP(7:36-9:28PM). Cool. Haze at ss, which rapidly cleared. 13-d. MOON (Intermittently. Aristarchus region at 166X.) SATURN(2 or 3 moons.) V. brisque business at start, with everybody paying. Evening turned somewhat unpleasant by visits by numer-groups of thuggy young men who push & shove, have never heard of Saturn, and who don't believe it's real. Quite early, not wanting to deal with any more like them, plus a strong, cold wind had started up. VISIT(Meagan Shook.) \$63.72 (\$34.07/hr.)
- 7 1939)4/13/06(THU)HPL-W.LIP(7:35-8:55PM & 9:03-9:10PM). Busy scene(Easter week-end build-up.) Warm 75°F. Great sky at start, but then intermittent clds. Shut down at 8:55PM, but opened-up again when a big hole appeared. However, it didn't last long. SATURN. 15-d MOON(Briefly, as it rose over ship.) Lots of families/kids. \$55.05 (\$37.78/hr.) HH(Tough work, but I really feel good about the educational side of it! Also, the positive reaction of my lookers is a real upper!)

57
TOTAL THIS PAGE = \$408.33

TOTAL THIS YEAR = \$908.04



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Binocular Messier Club - Appendix A

Binocular Messier Club Chair:

Mike Benson

Appendix A:

If you are uncertain as to which Messier objects to observe, or who need a formal program to follow, we have included Appendix A and Appendix B for your use. Appendix A lists the appropriate Messier objects that can be observed with that size binoculars between 20MM and 50MM in diameter, and is divided into three categories: Easy, Tough, and Challenge objects. Easy objects are large and bright in the field of view, and are easily located. Tougher objects are smaller and require identifying the fields around them with the help of some sort of star chart. Challenge objects are those that are small and faint, sometimes requiring averted vision and pinpointed exactly on a good star atlas to identify.

You will notice that in the small binocular category, 42 objects are classified as easy and 34 as tough. The point is that with the right binoculars, no matter what their size, shape, condition, or cost, can do serious observing. To prove that point, all 76 objects (Easy, Tough, and Challenge) can be observed with a pair of 7x35 Tasco binoculars purchased at Wal-Mart for \$19.00.

For a printable version of this list, [click here](#)

Appendix A - 7x35, 7x50, and 10x50 Binoculars

I. Easy Messier Objects:

2, 3, 4, 5, 6, 7, 8, 10, 11, 12, 13, 15, 16, 17, 18, 22, 23, 24, 25, 27, 29, 31, 34, 45, 46, 47, 48, 50, 52, 55, 67, 92, 93, 103.

- 8 1940)04/15/06(SAT. Easter eve)7:34-11:53PM. Mild. Good but sl. unsteady sky. Accompanied by Suzanne Lebovit, who gave out "I Saw..." stickers. Very busy scene. SET-UP TIME (Took 27 mins. from sign-in to "Hav-A-Look!", which is prob. typical.) LOCATION(W.LIP. However, sl. daunted by crowd size, briefly considered Promenade below Phillips.) SATURN(Sl. mushy image. Many doubters, still.) JUPITER(Spotted above ship 10:05PM. Acq. 10:50PM. Exciting to have it back! 4, then 3 moons.) 17-d. MOON(Below Jupiter). HH(Demanding work, but I held up ok. Gave out LOTS of literature.) \$200.35 (\$46.48/hr.)
- 7 1941)04/17/06(MON.)7:28-9:27PM. HPL-W.LIP. Mild. Good sky, then intermittent clds. Decided to pull plug rather than deal with them. SATURN(Acq. 15-min. before ss.) Fairly busy scene. HH(Didn't have my "heart" in it tonight.) \$50.03 (\$25.27/hr.)
- 8 1942)04/18/06(TUE)HPL-W.LIP(7:34-9:58PM). Gorgeous night. Mild, no wind. Good sky. Cloudless SATURN(acq. 10-min before ss. 2-moons. Many doubters.) JUPITER(Acq. 9:40 rising from behind ship. 3-moons.) HH(Felt like I was doing good work.) \$78.86 (\$32.90/hr.)
- 7 1943)04/19/06(WED)HPL-W.LIP(7:33-10:25PM). Perfect weather, tho sl. unsteady sky. Cloudless. SATURN(Acq. 11-min. before ss. Got a \$10 contrib before ss! Two moons. Sl. mushy image. JUPITER(3+1. Lookers impressed.) Lots of enthusiastic lookers! \$98.86 (\$34.48/hr.)
- 8 1944)04/23/06(SUN)HPL-W.LIP(7:36-7:52PM). Heavy clouds in S during set-up. Found Saturn, had two no-pay lookers, and, as clouds approached Saturn, decided was time to leave. Once home, a thunder storm started. VISITS(Several from people who remembered me from Fell's Pt.) \$ NONE
- 7 1945)04/24/06(MON)HPL-W.LIP(7:31-10:07PM ss 7:53PM). Mild. Good sky. SATURN, JUPITER. VISITS(Malcolm Willet & wife Pat; Rosemary from anti-war days.) \$80.04 (\$30.78/hr.) SATURN PHOTO(A Dutchman got a pretty descent shot thru scope at 166X.)
- 8 1946)04/27/06(THU)HPL-W.LIP(8-10:54PM.) Delayed start due to both misalignment & clouds. Ok sky, but mid-eve. had to ping pong between S & J because of clouds. SATURN. JUPITER (Acq. +/-9:05PM from behind Constellation ship.) 1st day of the 4-day Volvo Ocean Race Waterfront Festival. Lots of people. Crowd seemed different, somehow. VISIT(Dave Eberhardt, early on.) \$95.07 (\$32.78/hr....not so good, seeing got 2 \$10 contribs.)
- 7 1947)04/28/06(FRI)HPL-W.LIP(7:45-11:02PM.) When I arrived, Hypnotic was beating his drums v. near my spot. I asked him to move, which he eventually did. V.gd. sky. Busy scene. Sudden strong, cold wind for 20m starting at 10PM. Trouble keeping my papers/money from blowing away! Lots of enthusiastic lookers. Lots of families. SATURN(2 moons) JUPITER (Gave out J blurbs for 1st time.) \$142.38 (\$43.37/hr.)
- 8 1948)04/29/06(SAT)HPL-W.LIP(7:45-11:10PM.) Incredible crowd when I arrived...almost scary. Great sky at start; fair seeing later. Cold wind at 9:30PM which persisted till end. SATURN(2 moons.) JUPITER(4, then 3.) 2-d.MOON(Nice.) VISITS: Michael Greene. ??(woman) Patterson who had recruited me for Oregon R. Leonids night talk.) HH(In very top form-- both in articulation and energy level. Good, since there were many kids! \$143.51(\$42.00/ VISIT(Richard Pembroke, Jr.) Kathleen Fineghan, Irish dancer. Frank Roylance, briefly.)
- 7 1949)04/30/06(SUN)HPL-W.LIP(7:40-10:15PM) Cool wind & unsteady sky early, then ok. Volvo race boats gone. Much small crowd than prev. few nights. 3-d. MOON. SATURN. JUPITER. HH(In good shape, still!) VISIT(John Strosacker, briefly.) \$82.50 (\$31.94/hr.) CHARLES THE BALOON MAN(As I arrived he was packing up. I asked him why. He said he's tired, that he'd done 1,400 balloons today. I asked how he keeps count. He said there're 100/pk ans he used 14 pks. If he gets \$1/per, that's \$1,400.00/day! That news made me feel like a royal chump for a while, but the excitement of my routine snapped me out of it.)
- 8 1950)05/01/06(MON)HPL-W.LIP(7:38-9:42PM) Cool. Ok sky. Lackluster night--slow scene compared to prev. nights. 4-d. MOON. SATURN(Big trouble finding, due to misalignment. JUPITER (V. briefly at end of stint.) \$41.74 (\$20.16/) How to improve my contribs batting avg.?

TOTAL THIS PAGE = \$1,013.34

TOTAL THIS YEAR = \$1,921.38 (5/1 last yr. = \$2,992.38)

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The Evening Sky Map

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SKY MAP SHOWS HOW THE NIGHT SKY LOOKS
EARLY MAR 9 PM
LATE MAR 8 PM

SKY MAP DRAWN FOR: A LATTER OF 45° NORTH ABOUT 5° SOUTH FOR LATITUDES UP TO 35° NORTH OR SOUTH OF THIS

The constellation Auriga represents the driver of a horse-drawn chariot. The center of the map is the part of the sky directly overhead (zenith) and the outer circle is the horizon. Celestial objects are located between the zenith and the horizon. From northern latitudes, stars appear to rotate around the polar axis. Stars in the northern sky are doing now, so the compass direction that appears along the bottom of the map is the same as the direction that you face. Begin by using the sky map to find a bright star pattern in the sky. Instructions: The sky map shows the entire night sky from horizon to horizon as it is the night sky.



- 5 Moon very near the Pleiades at 15h UT (evening sky).
- 6 Moon near Mars at 6h UT (evening sky). Mag. +0.8.
- 6 First Quarter Moon at 20:16 UT.
- 9 Mars 7.2° N of Aldebaran at 2h UT (evening sky). Mag. +0.9.
- 9 Moon near Pollux at 20h UT (evening sky).
- 10 Moon near Saturn at 20h UT (evening sky). Mag. -0.1.
- 11 Moon near Beehive cluster at 1h UT (evening sky).
- 12 Mercury at inferior conjunction with the Sun at 3h UT. Mercury passes into the morning sky. Not visible.
- 12 Moon near Regulus at 23h UT (evening sky).
- 13 Moon at apogee (farthest from Earth) at 2h UT (distance 406,278 km; angular size 29.4').
- 14 Full Moon at 23:35 UT. Called the "Sap Moon", "Crow Moon" or "Lenten Moon". Penumbral eclipse.
- 17 Moon very near Spica at 11h UT (morning sky). Occultation visible from Hawaii, Peru and Ecuador.
- 19 Moon near Jupiter at 10h UT (morning sky). Mag. -2.3.
- 20 Spring or vernal equinox at 18:25 UT. The time when the Sun reaches the point along the ecliptic where it crosses into the northern celestial hemisphere marking the start of spring in the Northern Hemisphere and autumn in the Southern Hemisphere.
- 21 Moon very near Antares at 3h UT (morning sky). Occultation visible from South Africa and east Brazil.
- 22 Last Quarter Moon at 19:11 UT.
- 26 Moon near Venus at 3h UT (morning sky). Mag. -4.4.
- 27 Moon near Mercury at 19h UT (morning sky). Mag. +1.0.
- 27 Mercury 1.5° NNE of Uranus at 23h UT. Mags +1.0 and +5.9.
- 28 Moon at perigee (closest to Earth) at 7h UT (359,167 km; 33.3').
- 29 Total Solar Eclipse visible from parts of Brazil, northern Africa, and eastern Europe. Partial phases visible from much of Africa and Europe. Greatest totality (4 min 7 sec) occurs at Chad-Libya border at 10:11 UT.
- 29 New Moon at 10:15 UT. Beginning of lunation 1030.

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STARS TWINKLE, BUT PLANETS (SATURN, MARS) USUALLY SHINE WITH A STEADY LIGHT.

Star Magnitudes: 1 0 1 2 3 4

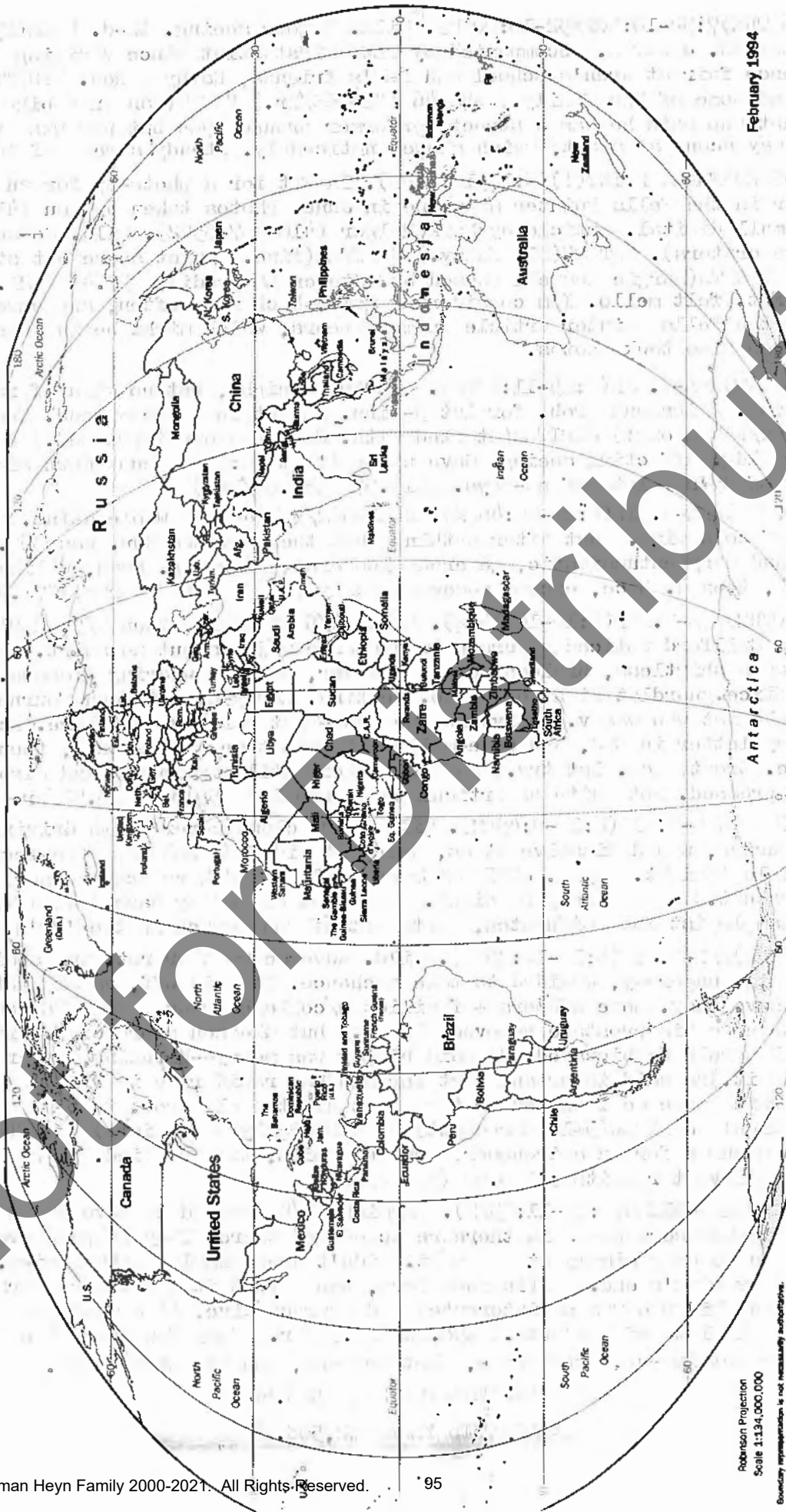
Symbols: Galaxy, Double Star, Variable Star, Diffuse Nebula, Planetary Nebula, Open Star Cluster, Globular Star Cluster

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- 7 1951)05/09/06(TUE)HPL-W.LIP(7:52-10:00PM). Mild. V.poor seeing. 12-d. MOON(Tycho region.) SATURN. JUPITER. Accompanied by PLW. First stint since visiting NYC w/PLW for science fair at Aren's school and PLW's friends, Kathy & Ron. VISIT(Dominick Murray and some of his family.) \$52.46 (\$24.63/hr.) VISIT(Man on a bike wearing a baloon hat who said he was a street performer around 1984 but now wks in vaccines.) Fairly busy scene at start, which slowed noticeably. Steady stream of lookers, however.
- 9 1952)05/10/06(WED)FELLS POINT(!)(8:11-10:32PM). In FPT for a photo-op for an article on me to appear in the Fells Pointer magazine in June. Photos taken by Lou (410-732-8232) with a small digital. Article by Mark Walker (410-287-8572). Mild. So-so seeing. 13d. MOON(edge craters). SATURN(Sl. fuzzy.) JUPITER(Fine.) Quiet scene but steady stream of lookers. VISITS(Margie Roswell passed by. Steven Lampredi!) \$50.49 (\$21.49/hr.) HH(Be-back in FPT. felt mello. I'm considering going back more often, and especially around the time the Fells Pointer article on me appears, which might be in June.) Accompanied by PLW, who also took photos.
- 8 1953)05/20/06(SAT)HPL-W.LIP(8:15-11:10PM). Preakness night, but no sign of race goers. Mild Fair seeing. Alignment prob. for 1st 5-mins. HH(Not in a great head. Would have been more fun w/PLW along!) JUPITER(Started with. 2+2. Lookers impressed.) SATURN(Being lower over bldg. affecting seeing. Gave up on it at 10:10PM, took down sign, and went to J.) Lots of \$5's + lots of no-pays. \$113.57 (\$38.89/hr.)
- 8 1954)05/21/06(SUN)HPL-W.LIP(8:20-10:46PM). SEEING(2/5 Used 80X whole stint.) Hesitated to go because of cold wind. Went after nothing that the previous Sun. was \$82.50. Good think because had many enthusiastic, generous lookers! HH(In v.g. head, unlike last night. JUPITER(3, then 4. Nice, except somewhat mushy.) SATURN(80X works!)\$79.59 (\$ 41.09/hr.
- 8 1955)05/23/06(TUE)HPL-W.LIP(8:10-10:16PM). Mild. 4/5 at start, then 3/5. SEMI-NUDE LADY(Driving down Guilford noticed a person in distance w/jeans but no shirt. As I got closer saw it was a shirtless, braless woman. However, she was wearing glasses. Reported her to Hpl police.) AGU(1st night of Balto. meeting. Early-on met John Fournelle, a U. of Wisc. geologist who was v. active in the anti-Viet war movement here. Actually, he'd spotted my letter in EOS, and we e-mailed at that time.) JUPITER(3, then 4 moons on same side. Great! Acq. 1st try.) SATURN(Lookers still impressed and disbelieving.) HH(Sl. depressed. Not quite as articulate as usual.) \$59.80 (\$28.52/hr.)
- 7 1956)05/24/06(WED)HPL-W.LIP(8:10-9:45PM). Mild. High cloud cover while driving down which, I was figuring, would dissolve at ss, which it did 75%. ALIGNMENT(Perfect last night and terrible tonight. Why?). JUPITER(Great! 3+1. Could have acq. sooner, except for poor alignment.) SATURN(Only by sight. Lost when dimmed by haze.) VISIT(Many AGU'ers, incl. seismologist Ines Cifuentes, a student of Bob Kovach in the '70's.) \$51.86(\$32.82
- 8 1957)05/25/06(THU)HPL-W.LIP(8:10-10:25PM). Mild. Adverse weather rpt. and semi-hazy sky, but with AGU mtg. underway, decided to take a chance. It paid off, as sky got fairly good, plus I was v. busy. Some AGU'ers + families w/college grads. PROSTATE(Had a looker who is here to have his prostate removed. PSA 5.3 but Gleason score of 7. Frightened me int thinking I should be biopsied. He said biopsy was messy--bleeding, several wks. to recover from it. He said important part for him was rapid rise in PSA.) ALIGNMENT(V.G., finally, which made me feel better than last night! Only prob. tonight was my pretty girl fixation!) JUPITER(3+1. Grreeaat!) SATURN(Mostly 80X. Nice!) VISIT(A man saying he'd been a nurse for an astronomer, Armand? Spitz, till he died. Might have been the planetarium inventor Spitz?) \$80.63 (35.88/hr!)
- 8 1958)05/27/06(SAT)HPL-BICEN(8:10-11:35PM). Warmish. 5/5. Forced to move 50' @ 45-min. into stint by breakdancers who said theywere scheduled there. They helped/move. JUPITER(Was so great and so easy simply stayed w/it. Didn't even display Saturn sign.) SATURN(Briefly toward evening's end.) HH(In good form, tho I felt it was v.hard work!) VISIT(A 12-yr. old black kid who was so interested and appreciative, it almost brought tears to my eyes. Gave him lots of handouts.) \$98.26 (28.79/hr.) Very few over \$1 contribs. VISIT(While setting-up, Greg Pease, photographer, and his wife Kelly.)

TOTAL THIS PAGE \$ 586.66

TOTAL THIS YEAR \$2,508.04



Robinson Projection
 Scale 1:134,000,000
 Boundary representations are not necessarily authoritative.

February 1994

802228 (R00352) 2-94



- 8 1959)05/28/06(MEMORAIL DAY SUNDAY)HPL-BICEN(8:20-11:13PM.)Big crowd. Sky 4/5. ALIGNMENT (Terrible prob. finding J before ss. Why? Very upsetting.) HH(Intense, difficult stint I was tired from having visited SWEBO Fest and drunk 2 beers. Plus, lots of large families. Several very good kid lookers, but still not a good stint for me.) JUPITER(4 then 3, then 4, as IV passed behind J's S pole.) 1-d.MOON(V. briefly. Lookers liked.) SATURN (As a break from J.) \$108.87 (\$37.71/hr.)
- 8 1960)05/30/06(TUE)HPL-W.LIP(8:10-10:05PM) Warm, thickening then thinning haze. SKY 3/5. 3-d. MOON. JUPITER. SATURN. Fairly quiet scene. HH(In short pants.) \$32.85 (\$17.11/hr)
- 7 1961)05/31/06(WED)HPL-W.LIP(8:04-10:25PM). Warm. Uniformly hazy sky. Less quiet scene than last night. 4-d. MOON(Fine!) JUPITER(3+1. Awesome!) SATURN(Smallish.) VISIT(A woman her for a genetics conf. who took photos of Moon thru scope and me w/scope which she said she would be using in her presentation.) \$41.00 (\$17.45/hr.)
- 7 1962)06/16/06(FRI)HPL-E.LIP(8:30-11:18PM). Mild. Hazy at first, then clear. JASON(while unloading met Jason, who used to date Chris Braly's daughter, Marian, and who fixed my Honda's ignition switch, and who is now a street performer. I didn't recognize him at first, but he knew me.) BALTIMORE EXAMINER(Interviewed and photographed by Ron Cassie for art. 443-257-3390.) JUPITER(3+1. Fine!) SATURN-MARS(In finder about .6° sep.) SATURN. Busy night! \$119.12 (\$42.54/hr.) TRIP(1st stint since having left town on 6/2 w/ Lorinda on her drive to Denver and having stopped over with PLW till 6/13.)
- 06/17/06(SAT)LINNEA ANDERSON'S BACKYARD PARTY CELEBRATING HER DAUGHTER ANNA'S COLLEGE GRADUATION. LINNEA WON MY SERVICES WITH A \$50.00 SILENT AUCTION BID AT A BFMS FUND RAISER FOR MUNURAZI. 1518 Roundhill Rd.(21218). Because of trees, there was no poss. of using backyard, so set-up on nearby street corner. Maybe 25-30 enthusiastic lookers from party. JUPITER. SATURN-MARS(0.6° sep.). M13, 24 COM, 95 HER, a SCO. Polar aligned with magnetic compass. 9-11:15PM.
- 8 1963)6/18/06(SUN)HPL-E.LIP(8:30-10:35PM). Warm. Clear. Busy scene. JUPITER(3+1). SATURN (briefly). HH(Feeling less and less enthusiastic about telescoping. Having to work harder to muster the energy req. to meet the public's needs.) VISIT(Joan Jacobs, her son, and his wife and the 2 children, 7 & 9. Joan stayed with me for the whole evening.) \$75.75 (\$36.37/hr.)
- 7 1964)6/20/06(Tue)HPL-E.LIP(8:20-11:18PM). Warm. 3/5 seeing. Big Baptist convention in town which produced many lookers. TRAVEL TIME(From leaving home to ready for looks = 43 min. METEOR(Several lookers rpt'd seeing a bright green meteor mid evening.) JUPITER(1+3. Sl. mushy due to poor seeing.) SATURN(Briefly. Poor image.) HH(Having trouble maintaining the old enthusiasm. Is my self-image changing vis a vis telesc?)\$96.12 (\$32.36/hr.)
- 8 1964)6/21/06(WED)HPL-E.LIP(8:30-10:30PM). Warm. 3.75/5. SOLSTICE 8:26AM. BALTIMORE EXAMINER (My photo on front page, short art. inside. Some, but little mention by lookers.) JUPITER. SATURN(Once.) Fairly busy scene. HH(In good head, prob. thanks to Examiner photo/art. + Iraq letter in today's Sun. 1st good head for awhile!) \$63.41 (\$31.71/hr.)
- 7 1965)6/22/06(THU)HPL-E.LIP(8:20-10:30PM). Sticky.4/5 seeing. CLOCK DRIVE(Tracking motor not working. Used 80X only and manually adjusted for motion. As soon as I got home started working on the prob., fearing the worst. Turned out that the male plug connecting the inverter to the battery had come apart and the fuse had fallen out, which, once I discovered it, was a simple fix. Whew!) JUPITER(80X and drifting, like in the old days before I got the battery/inverter. Only 2 moons! Also a star which looked like a moon.) VISITS(Lots of Baptist conventioners. RON CASSIE and his girlfriend.)\$62.00 (\$28.57/)
- 8 1966)6/30/06(FRI)HPL-E.LIP(8:40-10:40PM). Rain last 8-days! Warm. Start delayed by clouds. Shut down by clds. 3/5. HH(Feeling little enthusiasm for job.) 5-d.MOON. JUPITER(3+star, then 4+ star. Io shadow disc. by looker.) VISIT(German guy who looked thru scope "20 yrs. ago" in Fpt. Elderly Black woman who reported buying a \$3 scope at Goodwill after looking thru mine. Said she could see Moon's craters. Gave her star map and told her to find Jupiter and its moons!) \$85.21 (\$42.61/hr.)

TOTAL THIS PAGE = \$ 684.33

TOTAL THIS YEAR = \$3,192.37

- 7 1967)7/01/06(SAT)HPL-BICEN.(8:24-11:13PM). Warm. 3.5/5. Had to talk over Rennie and his Andean music, which took extra energy. Busy. HH(Rose to the occassion and stayed energized and up-beat.) RETIREMENT(Had thought that, beside reaching stint #2,000 or 20-yrs., someone coming along saying he/she got a PhD because of looking thru my scope would be a good moment to retire!) 6-d. MOON(Before ss with polarizer.) JUPITER(Nice. 4 moons + a 4th mag. star above on right and a 10th mag. between Io/Europa on right.) Lots of enthusiastic lookers, incl. enthusiastic kids. \$125.01 (\$44.33/hr.)
- 8 1968)7/03/06(MON)HPL-E.LIP(8:17-8:40PM). Clear late afternoon but possibility of storms in forecast. Clouds approaching at set-up, but hoping they'd dissolve at sunset, I went ahead. Played sucker holes w/Moon. Suddenly, a light rain started. I rushed to pack-up and left. FIRST TIME have ever been rained on at all! 8-d. Moon.\$11.00(\$28.21/hr.... included a \$5 contrib.)VISIT(The daughter of a JHU astronomy prof. Her name is Capella.)
- 7 1969)7/06/06(THU)HPL-E.LIP(8:15-10:41PM). Mild.3.75/5. Busy scene. HH(Tired driving down, but I rose to the occassion. Nevertheless, with so many children, plus a constant line of people, it's a tough job!) 11d.-MOON(Tycho region @ 135X. Lookers impressed!) JUPITER (2+2 + star. Great!) \$80.26 (\$33.03/hr.)
- 8 1970)7/07/06(FRI)HPL-BICEN...to escape loud music at Amphi.(8:18-11:16PM). Pleasant...low hum. 3.5/5. HH(Fairly depressed whole evening...maybe because I've lost the exhibitionist, show & tell need and its often just a job. Also a downer is the challenge of having to deal with so many little children. Also large families. I much prefer ones & twos.) ISS-SPACE SHUTTLE(Fly-by at 9:12, SSW. Had been alerted by PLW, but apparently it had been mentioned on local TV, and several people inquired about it. A lot of people gathered around to watch. They passed below the Moon and faded out in the SSE.) 12.d-MOON(Tycho region still good.) JUPITER(3, then 4, then 3. Ok.) VISIT(Diane Davis, Esq., who introduced herself as being dir. of Md. Lawyers for the Arts at the time of my case. I told her what happened with Mello and the dismissal.) \$87.75 (\$29.58/hr.) VISIT(Andre Papentonio, wife Cathy, & NM friend. Andre said he got a call from Donna Keck saying that Bill O'Connor is failing, in his last moments from his cancer.)
- 7 1971)7/09/06(SUN)HPL-W.LIP...to catch the rising Moon(8:26-11:06PM). HH(Feeling somewhat uninspired; not appreciating the constant flow of lookers, and esp. the small children among them. Felt like hard work.) JUPITER(Started w/polarizer. 3+1+mag 5 star). 14-d-MOON (Rose red. Used 50X at first, then 135X on few avail. edge craters.) \$83.07 (\$31.11/hr.) Touch & go w/clouds on drive down, but sky cleared decently after sunset.
- 9 1972)7/11/06(TUE)FELLS POINT(9:11-9:35PM). With art. on me in the July "The Fell's Pointer", thought I should occasionally show my face down there. However, as art. title "Night-Watchman Brought Heavenly Bodies to Broadway", implying I'm history there, I no longer feel as obligated to set-up in Fpt. Nevertheless, except for a 25-min. struggle to park, I enjoyed being there and may go back occasionally. Might have had a decent \$\$ night had clouds not disappeared Jupiter! JUPITER(Set-up late waiting for clouds to go. 1+3. Nice. "5th" moon now directly above J.) Adjourned to Maggie Moos'. \$8.00 (\$20/hr.)
- 10 1973)7/16/06(SUN)HPL-BICEN.(8:21-10:52PM). Intended to do Fpt., but it looked too quiet, so drove to Hpl. PLW(Accompanied by "Mrs. Astronomer, who was very helpful w/handouts and chatting up lookers.) 4.5/5. Hot but not oppressive. JUPITER("Two strips of bacon on an egg," according to a lady looker. 4 on L + 2 backgrounders. Great!)\$81.25 (\$32.28/hr.)
- 9 1974)7/17/06(MON)FELLS PT.(8:15-10:04PM). W/PLW. Again, Water Taxi pking spt. avail. 4.7/5 at twl. Breezy at start, then sticky.hot. A number of lookers had seen Fells Pointer art. JUPITER(4, then 3. Good!) VISIT(Steve Shulhoff & family. Jay.) \$40.25 (\$22.15/hr.) Incl. a \$10 and several \$5 contribs, so not all that busy a night.

TOTAL THIS PAGE = \$ 516.59

TOTAL THIS YEAR = \$3,708.96

- 10 1975)7/19/06(WED)FELLS PT.(8:20-9:59PM). Accompanied by PLW. Ok start, but then passing clouds and, suddenly a very strong wind lasting +/-1hr. Removed dew cap to steady scope. Busy scene at first, which rapidly became a slow scene. Shut down by increasing haze. JUPITER(1+3. 3/5 image.) VISIT: Tony & Bonnie from J.Pats scene. Ramone, who used to visit at Rotunda, who's a fencer and, at age 80, lives in Westminster Hse. \$33.60 (\$20.36/hr.) PARKING(Long wait for opening, which was spotted by PLW and who relayed info to me via a man.) MISC(PLW ran all the way to N end of sq. to capture one of my handouts which blew away in the wind. A young woman reported having my comet card and said, "I'm a fan of your's!")
- 8 1976)7/23/06(SUN)HPL-BICEN.(8:20-10:25PM). With PLW...last night till she lvs. for STL. Nice sky. Mild. JUPITER(4/5, then 3/5. 3 moons, then 4). \$70.45 (\$33.87/hr.)
- 10 7/29/06(SAT)FELLS PT.(2:30-2:45PM). STREET PERFORMER LICENSE AUDITIONS. I nailed Saturn photo to a tree +/-140' away and invited lookers. A few thought it was the real Saturn! Saturn fill practically the whole field, so should have put it further away. A variety of other performers, including a puppeteer, contortionist, a digerydooist, and many singers. VISIT (Buster of Fpt., who contributed \$1. HAT = \$2.00
- 7 1977)7/29/06(SAT)HPL-BICEN(8:10-10:30PM). Hot, humid, hazy. SS 8:23PM. JUPITER(3+1. Never a good image. Began w/3/5 and degraded to 1.5/5.) 4-d. MOON(low). HH(Unhappy w/Jupiter view, which sapped my enthusiasm. Also, routine seemed more than ever like hard work!) VISIT(Marty Taylor's daughter & friends celebrating her 21st.) \$80.30 (\$34.46/hr.) HH STAMINA(I must have lots of it. I came home from the audition dead tired, had a small supper, layed down for 45-mins., and headed for Hpl., where I did not feel physically overwhelmed.) HH(More and more I'm thinking I've accomplished my mission--whatever it's been!--and that I don't necessarily have to educate the public anymore. I've done what's humanly possible, and there's nothing wrong with leaving it be...letting it go.)
- 9 7/30/06(SUN)Fpt. DRY RUN--CLOUDS DID NOT THIN AT SUNSET.
- 8 1978)7/31/06(MON)HPL-W-LIP(8:03-10:10PM). Hot-humid-semi-hazy. 6-d.MOON(Pretty impressive.) JUPITER(3+0. 2.9/5 image. Bothered by light for last hr.) BAD ACTORS(Had a gang of big young men early evening who were pushing, shoving, fighting, and eyeing hat. No harm done, but I felt stressed out for an hour after they left.) Lookers more impressed with Jupiter than I was! \$61.73 (\$29.16/hr.)
- 10 1979)8/01/06(TUE)HPL-W,LIP(8:08-10:10PM). First went to Fpt., but it looked too bleak, so went to Hpl. Hot-Humid-Increasing Haze. Heat wave. Balto. temp. today 99°F. 7-d. MOON (Impressive!). JUPITER(3+1. Diminished by haze & lights, which caused me to quit, even tho people around.) 15MM OCCULAR(Dropped, putting it sl. out-of-round, but still usable.) \$38.85 (\$19.07//)
- 7 1980)8/02/06(WED)HPL-E.LIP(8:08-9:59PM). Hot & sticky...felt like being in a rain forest! STINT #1980(If #2000 is to be some kind of shifting down point, I can now feel it getting close!) 8-d. MOON(Nice, esp. the N hemi with Plato.) JUPITER(1+3. Ok for a while, then diminished by haze, so gave it up.) Some nice families. \$38.62 (\$22.68/hr.) HH(Had some of my old enthusiasm back tonight! Not particularly staggered by the heat/humidity.)
- 8 1981)8/05/06(SAT)HPL-BICEN(8:07-11:03PM). Clear. Not as hot as last few stints. An amazing number of Spanish speakers and Indians (East)! Some large families who didn't contribute sufficiently! 11-d. MOON (Tycho region.) JUPITER(3+1.) HH(Feeling not very inspired. Seem to be winding down in anticipation of #2,000.) \$91.91 (\$31.37/hr.)
- 1982)8/06/06(SUN)FELLS PT.(8:20-10:09PM). Chose Fpt. because I was feeling tired and not ready for the long handtruck push and intense crowds at Hpl. NEW CONTRIBUTIONS SIGN ON HAT(As suggested by PLW, "YOUR CONTRIBUTIONS ARE WELCOMED!" Although Hpl. would have been a better test, I think it worked ok, plus I felt comfortable with it.) Warmish. Intermittent clds. 12-d.MOON (Tyco region) JUPITER(4, then 3) HH(Very tired & depressed.) \$33.77 (\$18.55/hr.) VISIT(Steve Lampredi, who stayed most of eve. and to whom I gave a ride home. Various old Felle Pointers.)

TOTAL THIS PAGE = \$ 451.23

TOTAL THIS YEAR = \$4,160.19

- 7 1983)8/08/06(TUE)HPL-W.LIP(8-10:28PM). Good sky, comfortable, not humid for a change. JUPITER(w/polarizer at start. 1+3. Nice. Held till 10:15PM) FULL MOON(Really full! Used 50X w/filter, offset toward Tycho end.) The new contributions sign on hat seemed to work fine in HPL, it first time there. HH(Pushed myself a bit to seem enthusiastic.) Fairly busy scene. Old standards singer, Jim, in Amphthi. \$62.57 (\$26.77/hr.)
- 8 1984)8/09/06(WED)HPL-W.LIP(8:03-10:37PM). Comfortably warm. 4/5 sky. JUPITER(4 on the R. Pretty spectacular. Appreciated by a number of lookers.) 15-d.MOON(A few limb craters.) TIMING(Began losing J as Moon rose from behind ship.) NO PAY?(An upper class family w/ a teenage girl who I was told had a spec. int. in astro. I went all out for her, giving her a copy of everything. As they walked away I felt they did not contribute anything, leaving me w/a sinking, powerless feeling. Wanted to run after them but couldn't leave scope. This is not that rare an occurrence. I should figure out how to make sure these kind of people pay something!) \$59.40 (\$23.14/hr.) B CYG(for one looker)
- 7 1985)8/11/06(FRI)HPL-BIGEN.(8:04-10:50PM). Mild. 4.5/5 sky. Accompanied by Alin, who chatted up waiting lookers. JUPITER(1+3. Nice!) 16-d. MOON(Rose as J setting. W/Alin's help, moved scope 15' northward to get an unobstructed view. Lots of limb craters. We adjourned to Burkes for beer. Alin feeling pretty bad about is new wife leaving him be- of his being upset about his leaving Magda and child Bianca. \$67.34 (\$24.37/hr.) JUPITER FACTS(At last min. discovered was out of them, so stopped at Kinkos on way down to make more.) HH(V. depressed all day, but suddenly became v. animated at scope! It felt good.)
- 8 1986)8/12/06(SAT)HPL-BIGEN.(7:57-11:17PM). Accompanied by my competent assist, PLW, who did a great job giving out stickers, etc. and chatting with lookers. 4.5/5 sky. JUPITER(2+2. Great! Held till 10:30PM.) COLLIMATION(Performed on A Boo while J was behind corner of highrise. Really improved image.) 17-d. MOON(Acq. 10:30PM. Lots of craters. Well appreciated by lookers.) ALBIREO(Once.) Nice mixture of people. Had a line for almost whole evening. HH(In good head. Plenty of energy, enthusiasm.) \$135.28 (\$40.58/hr.)
- 7 1987)8/13/06(SUN)HPL-BIGEN.(7:50-10:24PM). With PLW. Sl. warm. 3.75/5 sky. JUPITER(1+3; Followe it till it got too mushy for good view.) ANTARES(For 5 -min while J behind corner of high rise.) THE SIZE OF OUR WORLD pictures(4-pages in two laminations showing comparative sizes of planets, Sun and stars. Very colorful graphics. Worked well.) Pretty busy scene. Constant line. A couple from Nepal. Lots of families. \$101.57 (\$39.52/hr.)
- 8 1988)8/18/06(FRI)HPL-BIGEN.(7:57-9:05PM). Going good, then shut down by clde. 1st night back after 4-days at Rehoboth w/PLW, and where we coincidentally met John, Sally and their whole family. We celebrated J&S's 50th wed. anni. at supper, 8/15. Accompanied by PLW. JUPITER(2+2. Nice.) \$31.20 (\$27.61/hr.)
- 7 1989)8/21/06(MON)NEW VENUE--PROMENADE ON W. SIDE OF POWERPLANT...OUTSIDE FRONT DOOR OF ESPN ZONE.(7:43-9:40PM). This is one of the spots opened up for licensed str. performers, my being one since I auditioned. This afternoon I checked it out w/Powerplant security and was given an OK. Jupiter's being short lived from Amphitheatre area, I decided to try here rather than Fpt., thinking it might be more lucrative, which it was! JERRY REITZIG (Feeling nervous about starting a new venue, and PLW's having returned to StL today, I invited JR to join me, which he did. He juggled and worked the crowd while I telescoped. It was a good combo. Unfortunately, he had to lv. at 9PM.) JUPITER(4 on left. Nice. Seeing never real good, and I quit when I felt it was too mushy, even the lookers might have liked it. J season about over!) PARKING (Parked as usual in Hpl. garage. A long but tolerable push to new venue.) HH(Energized!) \$70.30 (\$36.11/hr.) MARS HOAX(For the past few weeks have been getting +/-10/night inquires about big Mars is going to look in the sky sometime soon. They are due to that Mars hoax email that pops up every few years. It is totally incredible how many people see this thing! I tell them its an urban rumor.)
- 8 9/13/06 (WED) Roundtrip to Abel Wolman Bldg. to pick-up street perform license.

TOTAL THIS PAGE = \$ 527.66

TOTAL THIS YEAR = \$4,687.85

- 7 1990)9/17/06(SUN)HPL-BIGEN.(7:15-9:45PM) Good sky. Bad start. Lost +/-20-30 mins. Jupiter behind bldg. and couldn't find B Cyg. Why? Alignment seemed ok. JUPITER(1+3. Even at 80X lookers liked it. Had to let it go at 8:45PM.) B CYG(Briefly, after J.) URANUS(After 3 tries. I like it because it's at a better angle and more explainable than B Cyg. Gave out stickers.) STINT(1st in nearly a month due to combination of bad weather and a week's visit w/PLW in StL. It was visiting a star party there which made me realize I could still do J from BIGEN.) VISITS(8-10 astronomers from an Astronomical Soc. of the Pacific mtg. taking place at the Hyatt. All were enthused about my effort!) \$47.29 (\$18.92/hr.)
- 8 1991)9/18/06(MON)HPL-W.LIP.(7:24-8:00PM). Shut down by clouds.BAD NIGHT!(Spent 1/2-hr. trying to find B Cyg, thanks to poor alignment + having been 1hr. off in my MTT calculation. All the while was accompanied by Ralph Aeschliman, an astronomer here for the ASP mtg. I kept my cool inside was feeling frustrated and embarrassed.) ARCTURUS(Briefly, while trying to get aligned.) ALBIREO(Briefly, before clds. came.) VISIT(Ralph Aeschliman, a planetary cartographer attending the ASP mtg. Ray Villard.) \$1.00! (\$1.67/hr.) Adding insult to injury, most of my B Cyg lookers consisted of a large group of roudy students.
- 7 1992)9/20/06(WED)HPL-W.LIP(7:11-9:22PM). Good sky. Sl. cool (wore long pants). ALIGNMENT(Big problem, again, finding B Cyg, maybe because tripod legs are so far extended in order to raise scope for B Cyg. Otherwise, lookers were ok with it.) URANUS(Acq. 8:30PM. I hyped it as best I could. The stickers helped lookers feel satisfied.) \$45.53 (\$20.79/hr.) VISIT(Warren, Sally's old pupil, with his girlfriend. A very nice young man. He is work-in fiber optics for Verizon.)
- 8 1993)9/21/06(THUR)HPL-W.LIP(7:14-9:20PM). Good sky. Mild. MISERABLE STINT!(Even tho I got a \$20.00 contrib. Couldn't find Uranus...or if I found it, I didn't recognize it. Spent a miserable hour looking, while potential lookers were coming and going.) VEGA(One 1st try.) B CYG(No trouble finding.) VISITS(Mare Cromwell with a little advertising card for her book "If I Gave You God's Phone #". A baseball fan from Highlandtown who hung around most of the night and recruited lookers. He'd been with the "Free The Birds" protestors at today's baseball game. \$29.19 (\$13.90/hr....reflecting Uranus problem!)
- 8 1994)9/25/06(MON)HPL-W.LIP(7:11-9:20PM). SET-UP(41-mins. from home was in business.) Good sky. Mild. ALIGNMENT(Acq. both B Cyg and Uranus first try...finally!) Slow scene. B Cyg (After first finding A Lyr.) URANUS(Acq. 8:25PM. Has passed ship lights. It is sl. below and just to E of bright star Lambda Acq. Collimated on L. Acq.) URANUS BLURB(1st stint with it. Gave out several. Compiled by PLW and me. Good job!) \$26.00 (\$12.09/hr.)
- 8 1995)9/26/06(TUE)HPL-W.LIP(7:17-9:40PM). Sl. hazy sky. Mild. Wore my white ducks with blue beret. Good costume! HH(In good head. Animated, with strong voice.) ALIGNMENT(Not as gd. as last ngt., but pretty good.) B CYG(1st try after checking out a LYR.) URANUS(Acq. 8:20PM, on 2nd try, and thanks to using Lambda Aqr as hop star. I used picture to great advantage. Gave out +/-8 blurbs.) \$47.00 (\$19.69/hr.) NO COINS!
- 7 1996)9/27/06(WED)HPL-W.LIP(7:24-9:51PM). Mild. Good sky. 5-d. MOON(Had forgotten about it and arrived too late to do it.) ALBIREO(1st. try.) METEOR(One passerby midevening reported seeing a bright, disintegrating meteor moving W to E in S, mid-evening.) URANUS(2nd. try.) VISITS(Frank Shoemaker, a CA amateur, who enjoyed my act. Pat, a pretty, young Dallas woman here on business. She visited last night also. She had somebody take our photo w/her digital and said she'd e-mail it. To pretty Romanian girls to whom I gave Alin's name.) HH(In pretty good head.) \$46.51 (\$18.98/hr.) VISIT(Woamn St. Timothy's science teacher to whom I gave all my stuff.)
- 8 1997)9/29/06(FRI)HPL-E.LIP(7:06-10:08PM). Mild. Good sky. Fairly busy scene. HH(In good head. Wore wh. ducts, "You are..." shirt.) 7-d.MOON(Terrific @ 80X. Lost 8:59PM & regained briefly 15-min later.) URANUS(Couldn't find.) ALBIREO(It worked pretty well.) VISIT(Alice Kriener, who said she was in my early 90's Sc. Ctr. class and really liked it. She remembered alot we did. She's "bought" an acre on the Moon in Mare Figorus and asked if she could see it. I found the Mare for her! Visit also from pres. of the Cold Spring Assoc. who asked if I could talk to his gp. I asked \$100.) On the MOON witnessed sunrise on Ptolemaeus. Awesome! \$84.85. (\$28.00/hr,

TOTAL THIS PAGE = \$ 327.37

TOTAL THIS YEAR = \$5,015.22

THE



SUN



RAVENS GO PRIME TIME

RAVENS @ BRONCOS Tonight, 8:30 p.m., ESPN, Ch. 13, 1090 AM, 97.9 FM
ESPN TREATS MONDAY NIGHT FOOTBALL LIKE SUPER BOWL >>> RICK MARSE, GAMEDAY

MARYLAND

Street star



ELIZABETH MALBY (SUN PHOTOGRAPHER)

Herman Heyn, Baltimore's street-corner astronomer, focuses his telescope on the colorful double star Alberio. Last night marked the 2,000th session under the stars for Heyn, who spent his first night at what he considers his calling Nov. 13, 1987. He enjoys serving as a guide to passers-by at Harborplace.

'GETTING THERE' COLUMN DEBUTS

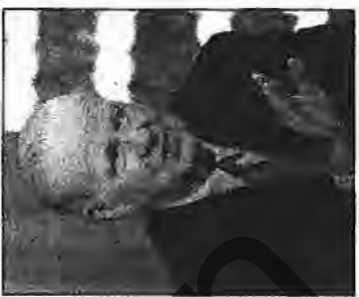
MICHAEL DRESSER WRITES ABOUT COMMUTING ISSUES

MARYLAND

Private schools

IRAQ PANEL CHIEF HINTS AT CHANGE

Baker urges direct talks with Iran and Syria



(NEW YORK TIMES NEWS SERVICE)

WASHINGTON // James A. Baker III, the Republican co-chairman of a bipartisan panel reassessing Iraq strategy for President Bush, said yesterday that he expected the panel would depart from Bush's repeated calls to "stay the course," and he strongly suggested that the White House enter direct talks with countries it has so far kept at arm's length, including Iran and Syria.

7 1998)10/01/06(SUN)...YOM KIPPUR)6:34-9:32PM. Sl. adverse weather rpt. but great sky. 9-d. MOON (ss at 6:47, so started with polarizer. Moon as good as it gets--terminator just past Copernicus and Tycho. Mainly 80X. Lookers impressed.) B Cyg & URANUS(Once, for a single looker. Perfectly aligned so acq. both on 1st try.) VISITS(Lookers from Ethiopia, Nigeria, the Congo.) HH(In good head...which seems to be the rule lately!) HPL(Very busy scene for 1st hour, after which crowd thinned noticeably.) \$97.57 (\$32.93/hr.) HPL-W.-LIP

8 1999...on the cusp!)10/02/06(MON)7:15-9:32PM. Delayed start due to clouds. Slow scene but pretty steady traffic. Mild. 10-d. MOON(Tycho region. Mainly 80X but sometimes 166X. After 15-min. clds. returned but stayed only 10-min. Otherwise, good sky.) URANUS(Once for an enthusiastic looker...a candle maker here for the Natural Products Show. Found 2nd try, hopping from Lambda Aqr.) VISITS(A Dutch couple who contributed \$7 for a family with 7 kids who said they had no money. Bob & Marilyn Clark, from the peace movement days, w/friends.) HH(Very tired and a bit depressed, but kept the show up to speed!) \$55.24 (\$24.20/hr.)

10/03/06(TUE)6:15-7:30PM) BROWNIE TROOP MEETING AT WAVERLY ELEM. SCH. IN HOWARD CO. I'd seen a req. on the HAL list serve for a speaker at Waverly Elem. Thinking it was the one two blks from my house, I responded positively. Then I learned it was in Howard Co. but decided to go ahead anyway. Auspices Monica Wilson (410-750-6806). About a dozen 10-yr. olds Evening started with Ms. Wilson's failed attempt to make constellation projectors with oatmeal cylinders, after which I presented. Described astronomy as a physical science, explained Pluto's new status, explained dif. moon & planet. Then showed Moon slides, polaris, and Orion slides, and then Valentina Tereshhkova. Short q. session. Kind of enjoyable. Clouds didn't allow our looking at the Moon through Mr. Wilson's telescope. Cathy Hallam, a den mother, took a great photo of me w/the brownies, which she emailed to me.

7 2000!(10/08/06(SUN)6:40-9:50PM. Great sky! #2000!(1st stint was 11/13/87 in Falls Pt. Except when I look at old logs, I don't have a strong sense time and don't remember individual stints very well. It's just something I've been doing. To announce the event to passerbys I mounted a large #2000! sign on front of scope and pinned a 2"x6" one onto my "You Are Here!" sweat shirt. A few, but not a whole lot of people asked what it meant. Thanks to my e-mail prodding of Frank Roylance, the Sun Bent photographer Liz Malby, who took shots for 1/2-hrs or so. Hopefully, they'll be in the paper this week. I'd say the sign and badge made for a good photo-op! Late this afternoon Leah brought me a big slice of congratulatory pumpkin pie. Whether reaching this milestone will in any way change my practice remains to be seen!) ALIGNMENT(Good! Vega on 1st try, Tripod initially set high for Albireo. Later I lowered it for Uranus.) HPL-W.LIP. TIDE(Very high! Set-up further into Promenade hoping it wouldn't reach me, which it didn't.) ALBIREO(Tired of it by 8:15, lowered tripod and went for Uranus. Turned out was blocked by overhead cable, Back to A. with low tripod. Lookers seemed not to mind.) URANUS(8:25..Gave out lots of stickers & blurbs.) HH(In good spirits, though during afternoon I was a bit nervous about coming celebration. Voice strong.) VISITS (Kate Newman Zohr with her and husband Moson's relatives. She contrib.'d \$20!) \$89.88(\$28.42/#2000!(As it sinks in, I'm feeling strengthened and energized by it, like I've accomplished something substantial...something to really celebrate, to feel proud of. Despite the monumental expenditure of energy...the loading, the unloading, the lifting, etc., I don't feel especially worn out. Still, in my head maybe I'm ready to step back a little and stop feel-like I have to go out at every opportunity...on every good night! Might go English dancing tomorrow night, even if the sky is good!

2001 10/09/06(MON)HPL-W.LIP(6:40-8:37PM). Mild, great sky, BAD NIGHT!(2/3'rds of lookers no contribs. Got disgusted enough to pack-up early.) SUN PHOTO(A photo from last night in today's Md. Section. +/-5 passerbys commented on it.) ALBIREO then URANUS(Left tripod hi, which seemed to be ok. Used 80X a bit, which makes it alot brighter.) HH(No contribs put me in an angry mood. Should have taken last night's advice to myself and gone dancing!)\$18.97(\$1468/) LIGHTS(Ones along Lip went out 7:15PM! Got pretty dark. Could see Albireo naked eye!) VISIT(Jean, once a CASC member. Gave her a ride home to Charles Village.)

TOTAL THIS PAGE = \$ 261.66

TOTAL THIS YEAR = \$5,276.88

Uranus 1781 Wm. Herschel 182

Uranus was the first planet to be discovered, rather than simply being observed in the night sky, and its presence was a huge shock to contemporary science. It is now known that earlier astronomers including Flamsteed had also charted Uranus - which can just be seen as a naked-eye object - and failed to register it as a planet. Uranus takes 84 years to orbit the Sun - it is still fewer than three Uranus years since we found out about it - and has an average distance of 19AU from the Sun. Uranus is one of the giant gas planets, 15 times as massive as the Earth and 52,000km in diameter. Its day of 16 hours is the oddest in the solar system, since the axis of Uranus's rotation is at 98(deg) to the plane of its orbit. This means that Uranus is in effect rotating 'backwards.' Explanations for this behaviour must cope with the fact that Uranus's large satellites Miranda, Ariel, Umbriel, Titania and Oberon orbit the planet exactly in the plane of its equator. Uranus also has a system of ten dark, narrow rings extending out to 51,200km from the planet, discovered in 1977 by observers in an airborne observatory high in the Earth's atmosphere. Our knowledge of Uranus was expanded vastly in 1986 by a flyby of the planet by the US spacecraft Voyager 2. Its images show Uranus as a planet almost bare of the spectacular cloud features found on Jupiter and Saturn. Uranus has a magnetic field comparable in strength to the Earth's, tilted steeply both to its angle of rotation and to its orbit. Voyager 2 also revealed ten small satellites orbiting closer to Uranus than the five satellites previously known, some of which seem to have a role in shaping the ring system. Uranus also has an extensive magnetospheric system. Uranus's atmosphere seems to be dominated by hydrogen, helium and methane, and there are also more complex molecules like acetylene. Below the clouds, Uranus may have an icy mantle (possibly including solid ammonia) and perhaps a rocky core. The planet has a density of about 1.2gm/cc

Urey, Harold Clayton (1893-1981)

US chemist who worked extensively on chemical problems of astronomical significance. He discovered Deuterium, for which he won the Nobel Prize in chemistry, and worked widely on the chemistry of meteorites and other solar system objects

Ursa Major

The constellation of the Great Bear in the northern hemisphere. Includes the very conspicuous star grouping called the Plough in Britain and the Big Dipper in North America, two of whose stars, the pointers, show the way to the Pole Star.

(Genitive is Ursaë Majoris)

Ursa Minor

Constellation of the Little Bear in the northern hemisphere, including the Pole Star, (Polaris or Alpha Ursae Minoris and the Northern celestial pole)

Utopia Planitia

Plain on the surface of Mars where the landing craft of the US space probe Viking 2 landed to make observations in 1976

UV

See ULTRAVIOLET

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Massive rift v. exploration

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Vega²

Pair of Sovi

- 8 2002)10/13/06(FRI)HPL-W.LIP(6:30-9:34PM).Great sky, COLD(40°F. Hands stiffened.) HH(Have decided to be more relaxed about the money and to not get upset over non-contribs. I felt better about tonight as a result.) ALIGNMENT(Something really wrong....probably misread the brick square corners. They can be an optical illusion. Some trouble finding B Cyg and LOTS of trouble finding Uranus. Finally found it by first aligning on Fomalhaut. Prob. spent +/-1 hr. on the problem.) B Cyg. URANUS. Semi-slow scene. \$27.50 (\$8.98/hr.) COMET SWAN(In BOO, mag. 6.5. Was prepared to find it but is blocked by Legg Mason Bldg.)
- 7 2003)10/15/06(SUN)HPL-W.LIP(6:42-9:04PM). Great sky. BILL O'CONNOR(This afternoon attended his memorial service, where was among the speakers. Bill died 8/28.) ALIGNMENT(Big problem again. Is really disconcerting, as my act depends on my being able to find objects I can't see. Maybe the brick square I'm eyeballing is off? Back home I checked the dec. angle of the eq. wedge and found it noticeably off. Corrected.) ALBIREO AND URANUS(Finding them was sometimes very difficult.) \$33.65 (\$14.20/hr.)
- 8 2004)10/18/06(WED)HPL-W.LIP(6:38-7:11PM). Despite "clear tonight" W. rpt., shut down by clouds. Mild enough for white pants. ALIGNMENT(EI perfecto! Am guessing the baffling problem of the past 2 nights was because I had misaligned the declination wedge.) VEGA & B CYG (Both on 1st try. Nice!) HH(Bad mood. Depressed. Made no effort to recruit lookers. Part of reason may be my unhappiness about having to have dental work. Also, am running out of steam with B Cyg and Uranus.) \$1.00 (\$1.81/hr.) Beside solving the alignment problem, another good thing which happened tonight was a woman passerby who saw the Sun picture congratulating me on my #2000!
- 7 2005)10/21/06(SAT)HPL-W.LIP(6:35-9:31PM). Mild. Great sky. ALIGNMENT(Perfect. Allowed hopping between B Cyg & Uranus at will!) HH(Very upbeat!) HANDOUTS(Forgot plastic envelope with sky maps. For a few mins. felt a bit lost, but then pulled myself together.) B Cyg & Uranus (Could have stayed later but tired of feeling like I was squeezing blood from a turnip!) VISITS(Richard Pembroke, Jr. Pam, the pretty accountant from TX, who hung out quite a while and took photos last visit.) \$53.25 (\$18.11/hr.)
- 8 2006)10/30/06(MON)HPL-W.LIP(5:20-7:35PM). Clear but sometimes shaky seeing. Mild, but still needed heavier sweater. Quit early, partly because was cold, partly due to slow scene. Day before Halloween but not one costume seen. 1st EST stint. 7-d.MOON(Sunrise on Copernicus. Also Tycho & Plato. Mostly at 166X.) \$25.91 (\$11.52/hr.) HH(Bored.)
- 7 2007)11/02/06(THU)HPL-W.LIP(5:36-8:35PM). Clear & cold. Even w/good sweater & "Bean" jacket was cold. Enough traffic to have stayed longer, but was driven to shut down by combination of cold and attention deficit disorder...boredom. NSTA CONVENTION(Nat. Science Teachers Assoc Caught me by surprise and short of handouts. Many NSTA lookers.) 10-d.MOON(Mostly at 135X, back & forth between Tycho and Plato regions.) \$51.07 (\$17.14/hr.) DEW CAP(To help scope cool down left it off at start and then left it off. Got idea that scope looked more scope-like w/o it. Clearly, leaving it off did not adversely effect "hat". Used it once for a photo op. Maybe will leave it off next stint and see how it goes.)
- 8 2008)11/03/06(FRI)HPL-W.LIP(6:22-8:40PM). Partly thin clds. Cold(34°F). Was dressed ok, but should have used fingerless glvs. rather than fingerless mittens. HH(In v.g. head. Left due to cold and boredom.) DEW CAP(Didn't use, which seemed ok.) 11-d. MOON(Tycho region, mostly at 80X, w/side trips to Aristarchus region.) More NSTA lookers. VISIT(Bob and Lisa of Astro-Go in Phila., here for NSTA.) \$51.04 (\$22.22/hr.)
- 7 2009)11/05/06(SUN)HPL-BICEN(5:15-7:15PM). Accompanied by PLW. We're leaving tmw. for week in A'dam. Cool. Clear, but approaching clds. at quit time. Slow scene but steady traffic. LAST STINT TO END 19TH YEAR OF STREET TELESCOPING, 1ST BEING 13 NOV. '87 IN FELLOES PT. FULL MOON RISING(Appeared from behind Hd. Rock Cafe sign-smokestacks. Use mostly 40mm with filter. Emphasized Tycho. Lookers liked view. Many + comments.) VISIT(Jason, an NPR Story Corps worker, who took my photo for pos. posting on www.storycorps.net.) \$35.55 (\$17.78/hr.)

TOTAL THIS PAGE = \$ 278.97

TOTAL THIS YEAR = \$5,555.85

STREET CORNER EXPENSES -- 2006

| | | | |
|------|----------|---|----------|
| SP | 01/05/06 | 12-sides January '06 star map (JHU) | \$ 0.84 |
| SP | 01/06/06 | 5-sides mats. for 1/19/06 talk (Kinkos) | \$ 0.84 |
| SP | 01/07/06 | 7-sides mats. for 1/19/06 talk (Kinkos) | \$ 0.59 |
| SP | 01/09/06 | 2-transparencies for 1/19 talk (JHU) | \$ 1.00 |
| SP | 01/12/06 | 7-sides copies for 1/19 talk (JHU) | \$ 0.49 |
| SP | 01/02/06 | 2 B&W + 1-COLOR transparencies for 1/19 talk (JHU) | \$ 1.75 |
| SP | 01/17/06 | 15-emails from Cy Galvin w/instructions for talk (JHU) | \$ 0.70 |
| SP | 01/17/06 | 1-slide for talk (JHU) | \$ 4.56 |
| STA | 01/19/06 | RT New Carrollton-Rosslyn on DC Metro for tonight's talk | \$ 6.35 |
| POST | 01/20/06 | mail parking cd. + req. for honorarium to Cy Galvin | \$ 0.39 |
| | 01/01/06 | HAL membership 2006 | \$ 25.00 |
| STA | 01/26/06 | Back-up eyeglasses holding cord | \$ 3.00 |
| SP | 1/29/06 | 20 sides SC handouts (Staples) @ 6¢ ea. | \$ 7.86 |
| SP | 1000 | 2x3 post-its for Saturn stickers (Staples) | \$ 0.39 |
| POST | 02/13/06 | mail requests March to Hpl. | \$ 1.33 |
| SP | 0226/06 | 19-sides SC maps and Saturn blurbs (JHU) | \$ 2.31 |
| SP | 03/05/06 | 33-sides SC maps and Handy Hand handouts (JHU) | \$ 2.69 |
| SP | 03/11/06 | 32-sides SC handouts (Kinkos) | \$ 2.92 |
| SP | 03/11/06 | 42-sides " " (JHU) | \$ 4.41 |
| SP | 03/16/06 | 63-sides handouts for Peter French talk (JHU) | \$ 0.84 |
| SP | 03/19/06 | 12-sides SC handouts (JHU) | \$ 1.33 |
| SP | 04/09/06 | 19-sides April starmap (JHU) | \$ 1.68 |
| SP | 04/10/06 | 24-sides SC handouts (JHU) | \$ 1.68 |
| SP | 04/11/06 | 24-sides SC handouts (JHU) | \$ 0.32 |
| SP | 04/13/06 | 4-sides SC handouts (Loyola) | \$ 1.96 |
| SP | 04/14/06 | 28-sides SC handouts (JHU) | \$ 5.00 |
| SP | 04/15/06 | Frankie in HPL | \$ 1.68 |
| SP | 04/16/06 | 24-sides SC handouts (JHU) | \$ 4.00 |
| SP | 04/17/06 | Frankie in Hpl. | \$ 9.93 |
| SP | 04/18/06 | 1000 Post-It Notes (Staples) | \$ 4.00 |
| SP | 04/18/06 | Frankie in Hpl. | \$ 1.68 |
| SP | 04/19/06 | 24-side SC handouts (JHU) | \$ 1.85 |
| SP | 04/19/06 | 22-sides SC handouts (Kinkos) @ \$0.084 | \$ 0.56 |
| SP | 04/19/06 | 8-sides prints-outs of Jupiter Facts drafts (JHU) | \$ 2.00 |
| SP | 04/23/06 | 25-sides SC clippings for Mark Walker of the Fell's Pointer(Loyola) | \$ 2.07 |
| POST | 04/24/06 | mail clippings to Fella Pointer | \$ 0.07 |
| SP | 04/24/06 | 1-side ISS flyovers (JHU) | \$ 0.18 |
| SP | 04/28/06 | 3-sides Jupiter blurbs (Staples) | \$ 0.16 |
| SP | 04/28/06 | 2-sides June star map (Loyola) | \$ 5.00 |
| SP | 04/28/06 | Frankie in HLP | \$ 2.94 |
| SP | 04/29/06 | 42-sides SC handouts (JHU) | \$ 5.00 |
| SP | 04/29/06 | Frankie in Hpl | \$ 1.50 |
| STA | 04/30/06 | 1-bottle of water for Hpl. stint | \$ 4.00 |
| SP | 04/30/06 | Frankie in Hpl | \$ 1.05 |
| SP | 05/20/06 | SC handouts 15-sides (JHU) | \$ 0.21 |
| SP | 05/20/06 | STA 3-sides Harborplace documents (JHU) | \$ 5.00 |
| SP | 05/20/06 | SP Frankie in Hpl | \$ 0.77 |
| SP | 05/21/06 | SP 11-sides SC handouts (JHU) | \$ 4.00 |
| | 05/21/06 | SP Frankie in Hpl | \$ 0.24 |
| | 05/23/06 | SP 3-sides info from Talia Vazqyez (Loyola) | |

STA = \$ 10.85
 POST = \$ 2.85
 MEMBERS = \$ 25.00
 SP = \$ 99.42
 PAGE = \$138.12

PAGE \$138.12

STREET CORNER EXPENSES -- 2006

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|--|----------|
| 5/9/06 SP Frankie in Hpl. | \$ 4.00 |
| 5/26/06 SP Post-it notes (Staples) | \$ 6.61 |
| 5/27/06 SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 5/27/06 SP Frankie in HPL | \$ 5.00 |
| 5/28/06 SP 17-sides SC handouts (Kinkos) | \$ 1.43 |
| 5/30/06 SP 22-sides SC handouts (Kinkos) | \$ 1.85 |
| 6/16/06 SP 17-sides SC handouts (Loyola) | \$1.36 |
| 6/17/06 SP 20-Sides SC handouts (JHU) | \$1.40 |
| 6/15/06 STA typewriter ribbon (Ken & Ray, Inc.) | \$1.67 |
| 6/21/06 SP Frankie in Hpl. | \$5.00 |
| 6/22/06 SP Frankie in HPL. | \$5.00 |
| 6/23/06 SP 24-sides SC handouts (JHU) | \$1.68 |
| 6/28/06 SP 2-sides July star map (Loyola) | \$ 0.16 |
| 7/2/06 SP SC handouts 20-sides (JHU) = \$1.40. 4-sides (Kinkos) = \$0.34 | \$ 1.74 |
| 7/7/06 SP 24-sides SC handouts (Kinkos) | \$ 2.02 |
| 7/9/06 SP Frankie in Hpl | \$ 5.00 |
| 7/10/06 SP 24-sides SC handouts (Kinkos) | \$ 2.02 |
| 7/17/06 SP 31-sides SC handouts (JHU) | \$ 2.17 |
| 7/24/06 LICENSES (ck.#925 Dir. of Finance for Str. Performer license tryout) | \$ 25.00 |
| 7/24/06 POSTAGE mail above check | \$ 0.39 |
| 7/24/06 LICENSES 6-copies form and Walker letters re above event (Loyola) | \$ 0.48 |
| 7/25/06 SP 1000 post-its = \$8.39 + 1-black foambd. = \$3.42 | \$ 11.81 |
| 7/27/06 SP-26 side (handouts for 7/29 performer license tryout) JHU | \$ 1.82 |
| 7/29/06 STA 6FPT. parking for audition) | \$ 3.00 |
| 7/30/06 SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 7/31/06 SP Frankie in HPL | \$ 5.00 |
| 8/02/06 SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 8/03/06 SP 9-sides SC handouts (JHU) | \$ 0.63 |
| 8/06/06 SP 27-sides SC handouts (Kinkos) = \$2.27 9-sides ibid (JHU) = 0.63 | \$ 2.90 |
| 8/10/06 SP 14-side SC handouts (JHU) | \$ 0.98 |
| 8/12/06 SP 25-sides SC handouts (Kinkos) | \$ 2.10 |
| 8/13/06 SP 46-sides SC handouts (Kinkos) | \$ 3.86 |
| 8/13/06 SP 2-laminations "Size Of Our World" graphics (KINKOS) | \$4.18 |
| 8/18/06 SP 6-sides SC license mats. (Loyola) | \$ 0.4 |
| 8/20/06 SP 32-sides SC handouts (JHU) | \$ 2.24 |
| 8/26/06 SP 13-sides new mnemonic (Kinkos) | \$ 1.0 |
| 8/28/06 SP 2-sides Sept. star amp (Loyola) | \$ 0.1 |
| 8/31/06 SP 10-side Sept. star map (JHU) | \$ 0.7 |
| 9/03/06 SP 10-sides Sept. star map (JHU) | \$ 0.7 |
| 9/18/06 SP 5-sides street performer license materials (JHU) | \$ 0.35 |
| 9/18/06 SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 9/21/06 SP 3-sides Uranus blurb mats. (JHU) | \$ 0.21 |
| 9/24/06 SP 17-side Uranus blurb mats. (Loyola) | \$ 0.56 |
| 9/25/06 SP 8-sides star map (JHU) | \$ 0.56 |
| 9/25/06 SP 5-sides Uranus Facts handout (JHU) | \$ 0.35 |
| 9/26/06 SP 8-sides SC handouts (Loyola) | \$ 0.64 |
| 9/29/06 SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 10/01/06 SP 36-sides SC handouts (JHU) | \$ 2.52 |
| 10/02/06 SP 9-sides SC handouts (JHU) | \$ 0.63 |
| 10/05/06 SP 8-sides #2000 button art (Kinkos) | \$ 0.67 |

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|----------|------------|
| STA | = \$ 4.67 |
| POST | = \$ 0.39 |
| SUBS | = ----- |
| SP | = \$ 97.60 |
| LICENSES | = \$ 25.48 |
| PAGE | = \$128.14 |

PAGE \$128.14

STREET CORNER EXPENSES -- 2006

| | | |
|----------|--|----------|
| 10/08/06 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 10/12/06 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 10/21/06 | SP 24-sides SC handouts (Kinkos) | \$ 2.02 |
| 10/31/06 | BOOKS 1-Observers Handbk. 2007 (S&T) | \$ 29.45 |
| 11/01/06 | SP 2-sides Nov. star map (JHU) | \$ 0.14 |
| 11/03/06 | SP 46-sides SC handouts (JHU) | \$ 3.22 |
| 11/24/06 | SP 21-sides SC handouts (JHU) | \$ 1.47 |
| 11/25/06 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 11/26/06 | SP 1-color copy for SC (Pleiades) (Kinkos) | \$ 0.89 |
| 11/26/06 | SP 37-sides SC handouts (JHU) | \$ 2.59 |
| 12/02/06 | SUBS 1-year THE SIDEWALK ASTRONOMER (CK #942) | \$15.00 |
| 12/22/06 | MEMBERSHIP Howard Astronomical League for '07 (ck#948) | \$25.00 |
| 12/22/06 | POSTAGE mail HAL membership | \$ 0.39 |
| 12/02/06 | POSTAGE mail The Sidewalk Astronomer sub | \$ 0.39 |
| 12/23/06 | SP Frankie in HPL | \$10.00 |

PAGE \$ 94.06

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| STA | = | ---- |
| POST | = | \$ 0.78 |
| MEMBERS | = | \$25.00 |
| SP | = | \$23.83 |
| BOOKS | = | \$29.45 |
| PAGE | = | \$94.06 |

| | <u>PAGE 1</u> | <u>PAGE 2</u> | <u>PAGE 3</u> | <u>YEAR</u> |
|----------|---------------|---------------|---------------|-------------|
| STA | = \$ 10.85 | \$ ----- | \$ ----- | \$ 10.85 |
| POST | = \$ 2.85 | \$ 0.39 | \$.78 | \$ 4.02 |
| MEMBERS | = \$ 25.00 | \$ ----- | \$ 25.00 | \$ 50.00 |
| SP | = \$ 99.42 | \$ 97.60 | \$ 23.83 | \$220.85 |
| SUBS | = \$ ----- | \$ 4.67 | \$ 15.00 | \$ 19.67 |
| LICENSES | = \$ ----- | \$ 25.48 | \$ ----- | \$ 25.48 |
| BOOKS | = \$ ----- | \$ ----- | \$ 29.45 | \$ 29.45 |
| PAGE | = \$138.12 | \$128.14 | \$ 94.06 | \$360.32 |

2007

Not for Distribution

- 8 2013)01/06/07(SAT)HPL-W.LIP(5:20-8:10PM). Shut down by clds. V. mild. OK sky. HH(With no Moon nor bright planet, didn't feel very good about setting-up. However, once I forced myself to do it, I was galvanized...hot!). PLEIADES(Set tripod high for it. I hyped it very well. It elicited a "WOW!" from many lookers...even very young ones!) M 42 (Briefly, but too low for optimum view.) SIRIUS(Was ok, but M45 better.) VISITS (Mona Keemer from the WIA; Mary Louise, dancer, and husband John.) \$60.40 (\$21.27/hr.) Gave out 10 maps. I think I'll start giving them out liberally, as they're much appreciated.
- 8 02/03/07(SAT) DRY RUN TO CHECK OUT RISING SATURN(rising time 5:51PM). 6PM Twinkling Venus over Hyatt. From Bicen was +/-15° above horizon. Only a bare amt. of stroller at Bicen. Relatively light crowd in pavillions. SATURN(Spotted 6:25PM rising above Acquarium from Bicen. Is in Leo, sl. NW of Regulus. Walking N on promenade, could have acq. from infront of J.Paul's sign by 6:35PM. However would have been 1-2 hrs. before acq. from W.LIP.) Cold but not windy. People out, but barely enough.
- 7 2014)02/11/07(SUN)HPL-J.PAUL'S(6:52-7:56PM). 3LF.Encouraged and accompanied by PLW. Clear. SATURN(Acq. as it was rising above colored lights of ship C. Nice. 2 easy + 1 hard moons. Few, but enthusiastic lookers.) ISS(Tipped off by Royslance column. +/-5 excited watchers. \$11.62 (\$10.96/hr.). Quite a few no-pays. Looking very quiet when left.
- 8 2015)02/24/07(SAT)HPL-J.PAULS(5:45-8:20PM). Cool. Ok at first but steadily increasing haze. Accompanied by Alin Tolea with his 3.5" refractor. He did the 7d-Moon, while I did Saturn. He'd forgotten his, so I lent him my diagonal, which caused me to have to twice raise my scope as Saturn rose higher. Lots of families with enthusiastic kids. VISIT (Stafano, a German astronomer visiting JHU for a week.) PHOTOS(Alin brought a digital camera and took a photo of my showing Saturn photo to lookers which I can use with the "Using Photographs at the Telescope" art. for the Street Corner Astronomer magazine. BURKES(Alin and I adjourned there for burghers & beer.) \$68.40 (\$26.51/hr.) VISIT(Kai, who used to work for Moore Printing when I was a regular customer.)
- 7 2016)02/28/07(WED)HPL-J.PAULS(6:07-7:15). Coolish...gloves not needed. Great sky! Very slow scene. Almost didn't set up. 11-d MOON(Tycho region.) SATURN(2-moons, Cassini Div., fine at 165X.) By 7:15PM hardly anyone in sight. Packed up. \$13.73 (\$12.15/hr.)
- 8 2017)03/02/07(FRI)HPL-J.PAULS(6:07-10:00PM). Mild. Good sky but poorseeing. Pretty busy scene. HH(Slightly depressed. Trouble w/voice projection. Didn't much want to be there.) MOON(Almost no craters, + poor seeing. Only a few times.) SATURN(OK @ 135X. Lots of very surprised lookers. 2 moons.) TOMORROW NIGHT'S TOTAL LUNAR ECLIPSE AT MOONRISE(Lots of people aware of it, + I announced it to others, saying I'll be here, weather permitting.) \$113.60 (\$29.28/hr.)
- 7 2018)03/03/07(SAT)HPL-4/3'S-WAY DOWN PROMENADE TOWARD SC. CTR.(6-7:10PM). NIGHT OF THE MOONRISE TOTAL LUNAR ECLIPSE! Beautiful day till mid-afternoon, when cloudbegan rolling in. I would not have gone down, except that Royslance's 3/2 Sun art. said I'd be in Hpl. First set-up a bit S of Phillips but using Moon's +6.9 deo. discovered it would be behind the Raddison Hotel. With help of Kevin Cleary, and his 2 children, there thanks to art., packed up and moved southward. Moon rose in full eclipse at 5:56PM. Between then and ecl end at 6:58, we NEVER saw the Moon! Thanks to some sucker holes was able to show a few lookers Saturn and Sirius. For the last 1/2-hr. sky totally socked in. Not sure how many people at my loc. due to art. but heard that Sc. Ctr. obsv. very crowded (also no Moon). VISITS(Kevin Cleary & kids, Leah, who tried hard to be helpful w/lookers. She'd parked on St. V's lot and walked over, so I drove her back to her car. A couple w/a young child who said I'm in their wedding album, their having visited my scope when they were engaged and took a photo of me! Fritz Kleinhaus, prof. of physics and astro., here for a biophysics conf, who hung out last night and returned tonight. Fritz & I adjourned to J.Pats for supper and a fun talk on our shared astro interest. Paula, a woman across the bar took numerous digital photos of us talking, saying she found us fascinating. We asked her to put them online.) CONCL.:(A crazy but really fun night!)\$17.00 (\$14.53/hr.)

TOTAL THIS PAGE = \$284.75

TOTAL THIS YEAR = \$284.75

8 03/09/07(FRI) DRY RUN TO HPL. All the way down I was telling myself that except for the money, which I may not need that badly, I didn't want to set-up. Also, because of a cool wind and 35°F temp, I was imagining the kind of bleak scene which triggers my early childhood abandonment fear...a fear of being left alone. (Actually, I never really feel it when I'm set up on a bleak night. It's more in my imagination as I'm driving down.) I arrived at the parking garage to discover it totally jammed by a huge tractor trailer. Rather than make the extra effort to go to the Loading Dock for parking, given how I was feeling, I came home.

8 2019)03/11/07(SUN)HPL-BIT N OF J. PAULS(7:20-9:01PM 3-WK EARLY START OF DST VOTED BY CONGRESS AS A SUPPOSED ENERGY-SAVING MOVE.) Cool but gloveless. Pretty busy scene for a while, maybe thanks to today's St. Pat's Day parade. Fine sky. SATURN(Casinni Div., 2 moons. lots of doubters!) HH(Bored. Seemed like just a job.) \$68.54 (\$40.56/hr.!))

7 2020)03/13/07(TUE)HPL-IBID(7:32-9:38PM) Delayed start due to fence sitting over clouds. Mild. Pretty busy scene. Seeing: 2-3/5. HH(To my surprise, I was really energized, with good voice projection and clever lines, like "let your conscience be your guide".) SATURN(Because of sometimes mushy seeing, used 80X quite a bit. Most lookers are just as thrilled as with higher X's, maybe because the image is alot brighter.) VISITS: Dayrl Mason and Richard Pembroke, downtown for BAS mtg. Richard hung out for a good while and seemed fascinated with my routine and lookers.) \$64.29 (\$30.57/hr.!) VISIT: A young woman geophysicist, new in town, who's specialties are volcanism and earth quakes. She seemed interested in my work and took my e-mail address.

8 2021)03/20/07(TUE)HPL-IBID(7:30-8:25PM) Clear, cool, eventually a strong, cool wind. Busy scene on arrival, but it steadily turned bleak. Given the scene and wind, decided to pull plug in less than an hour out. Encouraged by first contrib. being \$5 and a 2nd \$5 a little later, but that wasn't good enough to stay longer. SATURN(80X, then 135X. Nice.) PARKING(Loading dock full of cop cars. Headed for Light St. but took an opportune space on the street.) \$23.57 (\$25.62/hr.)

022)03/25/07(SUN)HPL-IBID(7:15-8:12PM). Accompanied by PLW. Clear, then intermittent olds, then shut down by olds. 7-d MOON(First obj.) SATURN(80X only. Titan above it noticed by several lookers on their own.) THE CROWD(Almost immediately inundated by a large number of people, some believers and some not. This situation continued almost the whole stint. Lots did not contribute.) \$23.41 (\$24.64/hr.) PARKING(Some kind of new routine in Loading Dock. Parking pass being given, garage door being kept closed, guard unsure whether to let me park or not. Had to convince her.) NEW "TONIGHT-- SATURN/MOON HAV-A-LOOK!" SIGN(The old one was getting floppy from being bent. Made identical, fresh-looking new one with help of PLW.)

8 2023)03/29/07(THUR)HPL-IBID(7:27-10:12PM). With PLW. Semi-mild. Great sky! 11-d.MOON(Tycho. 80X and 136X.) SATURN(3-moons! Lots of awestruck lookers, especially at 80X. Titan on left and a 4th mag. star on right. Nice framing! Peak night in HPL...few no-pays. VISIT(John Miller of the Amateur Astronomers Assoc. of Princeton, here for a convention of research library librarians...of whom had many lookers. John's group does alot of public work and he was extremely impressed with my work. Asked if I'd come to P. to give a talk. Said what I'm doing is "very rare". \$63.02 (\$22.91/hr.)

7 2024)03/30/07(FRI)HPL-IBID(7:36-10:32PM). Semi-mild. Great, then good sky. W/PLW, who gave out stickers, chatted-up waiters, and picked up money from hat. She also took some digital photos. 12-d. MOON(Tycho region. Lookers very impressed!) SATURN(2-moons + star. Mostly at 80X but a few times at 220X. Many thrilled lookers.) VISITS: Again, John Miller. James Starr, h.s. chem teacher, New Paltz, NY, who has a 10" dob. Dancers Barbara & McGregor and Susan Taylor & husband Bob.) PLW to photos. \$110.90 (\$37.85/)

53
TOTAL THIS PAGE = \$ 353.73

TOTAL THIS YEAR = \$ 638.48

- 8 2025)4/02/07(MON)HPL-W.LIP(7:31-10:25PM). V.G. sky. Warm. The night of Passover + the college basketball final game bet. Fla. St. & Ohio St. Expecting a slow scene but was v. busy. Many families w/kids on spring break. Sometimes felt almost overwhelmed by quantity and challenges of lookers...esp. the kids. SATURN(2-Moons). FULL MOON(several times by req. No craters!) HH(Not a happy camper!) \$102.89 (\$35.52/hr.)
- 7 2026)4/03/07(TUE)HPL-W.LIP(7:40-8:53PM). Despite adverse weather rpt., clear sky, but strong cold wind, which drove me to quit early. It's really hard to have two perfect nights in a row! Removed dew cap to reduce buffeting of scope by wind. SATURN(Used 18mm Or., which boosted mag. to 111X. To me it looked alot bigger than 80X. This lens produces a superb image. Lookers impressed.) Skipped WIA monthly board mtg. but left my treasurer's rpt. at front desk of the Y, having e-mailed several members it would be there. \$29.45(\$24.20/ Will use the 18mm Or. as a way to stay w/low power but make image a bit larger. On low power Saturn image is nice and bright.
- 8 2027)4/10/07(TUE)HPL-W.LIP(7:40-9:53PM). Good sky. Cool, but no wind. First weather break in a week and maybe the last for a few days. Surprisingly busy scene! An 80-piece Catholic high school orchestra playing as I set-up, making setting-up a pleasure. National Catholic Educators Assoc. convention. 8,000 members. Had many convention lookers, mostly women Still spring break time, so had many families with kids as well. TRACKING MOTOR(It conked out around 9PM. Realized it after several lookers said they didn't see anything and through find I saw Saturn had moved leftward. I hope a battery re-chg. will solve prob.! SATURN(Nice. 2-moons.) \$97.14 (\$43.95/hr.!) FIREWORKS(Around 8:45PM, for some reason, a big display from a barge +/-100-yds out in the river.) HH(Somewhat depressed, meaning had to strain to keep my energy level high enough to deal w/my lookers.) TRACKING MOTOR(After an overnight battery rechg., it worked again. Whew!...last night it was totally dead
- 7 2028)4/13/07(FRI)HPL-W.LIP(7:40-10:15PM). Great sky. Cool, but gloveless. Perfect alignment. HH(Tiptop shape. Hi energy, enthusiastic, strong voice, articulate. Was depressed last time by not having a good BM in several days...obsessing on it. Things working well, now!) TRACKING MOTOR(After 24-hr. bat. chg., working fine.) Semi busy scene. No Catholic teacher but plenty of families w/kids. Gave out LOTS of "souvenirs". SATURN(Great. 3-moons. Mostly at 111X.) Could have stayed longer but getting bored. \$81.97 (\$31.77/hr.)
- 8 2029)4/20/07(FRI)HPL-W.LIP(7:55-11:15PM). Mild. Great sky. Moon & Venus prominent in W. sky. Took photos w/digital of people looking thru scope at Moon, at least one of which looks pretty good. Very busy, ROUGH(!) stint. Often felt overwhelmed. Part of problem was trying to back-and-forth from Moon to Saturn. 3-d. MOON (Often used as Saturn proof!) VENUS a blobby gibbous.) SATURN(Great, esp. during twilight. 3-moons. Lots of doubters.) HH(In good head but after a while felt very taxed.) VISITS(David Thomas, lawyer from dance scene. Maria Knoll, a Johns Hopkins researcher, whose photo I took and who gave me her card so I could mail her a print.) \$139.64 (\$41.90/hr.) VISIT(Rev. Kendall, on the way home in S. Balto. from his Aquarium job. I showed him Sat. at 220X. \$10 contrib. PARKING(As I signed out, the security woman told me there's no more parking in the Loading Dock, and the blue parking signs will no longer be given for Light St. She said there is to be some other arrangement. I have no idea what to expect tomorrow night!)
- 7 2030)4/21/07(SAT)IBID.(7:50-11:42PM). Good sky, tho sl. hazy sometimes. PARKING(I asked politely, and security lady let me park in Loading Dock. Whew!) SCENE(So mobbed I felt scared and contemplated going home. Feeling compounded by a roudy kid who was eyeing my contrib. hat, even before had set up. However girded myself and set up.) 4-d MOON(Started on, then to Sat. Back to Moon in slow moments as "double feature".) SATURN(2-moons. Used 80X for last hr., as it has 99% success rate compared to 111X's +/-80%. Nobody complained about tiny image!). HH(Challenging stint, but not as pressured as last night. I stayed in good form throughout, tho for last hour wanted desparately to leave but couldn't because lookers kept arriving! Am amazed at my stamina!) \$20 CONTRIB(1st in memory...by an Englishman who kept saying he was extremely impressed by my work. Took digitals which he said would e-mail to me.) \$208.63 (\$53.91/hr...an all-time record, or close to it!)

TOTAL THIS PAGE = \$ 659.72

TOTAL THIS YEAR = \$1,298.20

STREET CORNER TELESCOPE LOG-- 2007

- 8 2031) 4/22/07(SUN)HPL-W.LIP(7:36-10:10PM). Great sky. Mild. Fairly busy scene. 5-d MOON (Began w/polarizer before sunset. Sunrise on Theophilus, Cyrillus & Catherina. So incredible I skipped Saturn and stayed on Moon for long time!) SATURN(As usual, fine. I saw one moon.) Lots of families, kids. PARKING(No prob. Security woman had little kid w/her, to whom I gave star map and mnemonic.) HH(Bit tired but ok.)\$93.69(\$36.46/) COLLIMATION(After stint check a Leo and found it disappointing. Collimated w/effort.)
- 2 **2032) 4/29/07(SUN)SHERWOOD GDNS.(1-2:50PM)."SUNSCOPE" SOLAR PROJECTOR. Accompanied by Eta Kushner, who I invited since she'd never seen S.G. and since I felt I owed her a favor in return for serving me several Passover meals. SUN(One sizable spot which enhanced viewers' interest and, as well, my patter. Also numerous passing clouds to add excitement.) "THE AIRPLANE" STORY(Gave out +/-6 copies of revised version. Next time will do so alot more liberally.) PHOTOS(Eta used my digital to snap me and scope with lookers. I also took shots of her and me with the tulips.) VISITORS(Jeff Hettleman & family with a Black Lab puppy which I suggested they name Sunspot.) NO HAT
- 7 2033) 4/29/07(SUN)HPL-W.LIP(7:40-10PM). Good sky. Busy stint, almost till end. 12-d. MOON (Tycho & sunrise craters. Decent view. Stayed on it for 1st +/-20-mins., till a looker asked for Saturn.) SATURN(3-moons. To most lookers it looked unreal, so I guess my collimation last stint worked ok. I just hope it hold for a while!) VISITOR (Ken Strong & daughter.) \$84.40 (\$36.22/hr.) PARKING(OK...Loading Dock)
**4/30/07 Sunspot barely, if at all naked-eye thru #14 welder's glass.
- 8 2034) 5/04/07(FRI)HPL-W.LIP(7:45-10:23PM). Great sky. HH(While setting up felt like I really didn't want to do this anymore. However, once I got started, the public's enthusiasm combined with seeing how much good I was doing with children reminded me of what a unique, worthwhile experience this is!) VENUS(Adequate size gibbous. Lookers liked. I noticed a plane heading toward it and invited a lookers to watch it pass Venus through the finderscope. He did and was terifically excited by the sight!) SATURN(3-moons. Lots & lots of doubters, telling me I did a real good collimation the other night! Most 11X; sometimes 80X.) VISIT(Alin with new girlfriend, Allie, also an astronomer.) TRAFFIC(Fairly busy, but had a 1/2-hr. period with ABSOLUTELY NO lookers. Don't recall that happening before. Lots of no-pays.)\$71.85(\$27.32/)
- 7 2035) 5/06/07(SUN)HPL-W.LIP(7:42-9:32PM). Great sky. Cool breeze(Needed a heavier sweater!.. Left a bit early because was cold.) VENUS(For +/-15 min. at start.) SATURN(2-moons. As usual, some doubters.) VISITS(A Goddard astronomer, JHU grad, who knew me from FPT. Brazilian man who wanted to see Polaris. Couldn't eye it but got it for him in scope, whereupon he made a \$5 contrib. An British woman & her +/-10 yrs. old, very bright and interested son. I went all out for him! I asked her if she was here with the queen, and she said she was. When I expressed doubt, she said it's true! Jose, an amateur from Puerto Rico.) Lively night! \$50.19 (\$27.38/hr.)
- 8 2036) 5/08/07(TUE)HPL-W.LIP(7:45-10:36PM). Great sky. Mild. HH(Tip, tip top form. Hi energy, articulate, strong voice...partly because took last night off!) ALIGNMENT(Off at start. Rotated tripod 3X before getting approx. right.) VENUS(Briefly.) SATURN(3-moons. Good.) CLEO(Convention of Laser & Electronic Optics...many lookers from among them...happily!) VISITS(Richard Pembroke, who stayed for +/-1 hr.)\$95.14 (\$33.38/hr.) SMOOTH TEAZIE(A group of +/-10 black "duop" singers who has come strolling along the Promenade the last two Sun. nights signing as they walk. Thinking they were definitely Hpl. performer material, I called Carmel & Kristin Monday and gave them an enthusiastic recommendation. Call tonight on my TAM from their member, Steve, saying they're scheduled to audition Fri., 3-5PM and thanking me profusely for my recommendation. This gave me a very good feeling! I hope to attend their audition.)

TOTAL THIS PAGE = \$ 395.27

TOTAL THIS YEAR = \$1,693.47



Yuri's Night DC
7-11pm
April 12, 2007

FEATURING

Dr. Alan Stern
NASA Associate Administrator, Science Mission Directorate
Principal Investigator, Pluto New Horizons Mission

Music by
To the Moon
DJ Rebirth



Russian Cultural Centre

Vodka Bar

Space-Themed Contests & Giveaways

Map of Russian Cultural Centre

Press Release

TICKETS

[online ticket sales have ended]
\$10 at the door
(\$5 with student ID)

LOCATION

Russian Cultural Centre
1825 Phelps Place NW
(Just up Connecticut from the Dupont Circle Metro- Red Line)



Click to view the flyer



SPONSORS

- 7 2037)5/09/07(WED)HPL-W.LIP(7:43-10:30PM)Mild. Terrific sky, then occassional sl. turbulence. ALIGNMENT(For a change very good...finally!) HH(Not as up as last night. Maybe 2 nights in a row is, psychologically and/or physically, too much for me.) CLEO(Still alot of conventioneer lookers.) VENUS(1st 10 mins...till found Sat.) SATURN(For 1st 90-mins. as good as it can ever get in my scope. 165X. Eventually it degraded a bit. 2-moons. Many doubters. Unplugged tracker for some.) \$93.48 (\$33.63/hr., incl. a \$10 contrib.)
- 8 2038)5/11/07(FRI)HPL-W.LIP(8:15-10:33PM). Warm & humid. Good sky. Delayed start due to hi clouds of the sort that dissolve after sunset, which they eventually did. HH(Having ridden bike to Hpl this afternoon to see Smooth Teaze tryout, was unsure had stamina to bounce back tonight. Glad I went, because I felt ok. and was pretty busy. Every little bit helps, right!) SMOOTH TEAZE(Steve said they'd try out in Amphitheatre from 3-5PM, but they weren't there. I saw them tonight, and it turns out they were at Bicen. He said it went well.) SATURN(Lots of non-believers. Titan looked brighter than usual, maybe by 1 mag.! Mostly 135X) \$93.38 (\$40.60/hr.) No CLEO lookers tonight.
- 7 2039)5/13/07(SUN)HPL-W.LIP(7:50-10:00PM). Mild. Good sky. VENUS(Briefly.) SATURN(Wasted time trying to acq. too soon. Otherwise, fine. 1-moon + star. VISITS(Jack, Loyola librarian. Very reticent to look, but did with coaxing. Veronica, who announced herself as my neighbor at 726 E. 36th, with family.) \$81.92 (\$37.75/hr.)
- 8 2040)5/15/07(TUE)HPL-W.LIP(7:38-10:25PM). Pleasant. Occasional wind. Accompanied by competent assistant, PLW. VENUS(Almost half. Lots of no-pay lookers. 20-mins.) SATURN(Acq. by scanning w/main scope +/-8:05PM. One moon. Lots of wowed lookers.) VISITS(4 young college stdns. from Va. Really interested. Hung around, took photos. An Iraqi couple. Really glad Bush got rid of Saddam, but thing now really bad. In U.S. 3-yrs. +/-18 5th graders from Brandeis School in NY. All very enthused by Sat. Upon my urging, most contributed \$1. Young man in wheelchair who, after alot of adjusting on my part, got to see Sat. 2 from American Samoa, one in navy uniform.) \$88.39 (\$31.68/hr.)
- 7 2042)5/21/07(MON)HPL-W.LIP(7:50-10:15PM). Pleasant. Less than optimal seeing. Accompanied by my valuable assistant, PLW. 5-d. MOON(Great!). VENUS(Almost 1/2.) SATURN(Lost time trying to find. Diminished by sl. haze. Sl. unsteady image. 1-moon.) First stint upon returning from a week-end visit to Eve & fam. w/PLW. Drove up with "sunscope" hoping to join Tom McIntyre on "street", but weather didn't allow. *Instead, we met for snacks and conversation at the Metropolitan Museum of Art. VISITS(Lookers from Saudi Arabia, Nepal, and two British landscape architects. Also, a return visit by Pam from Va., this time w/her boyfriend, Hector.) \$68.55 (\$28.33/hr.)
- 4 2041)5/20/07(SUN)Prospect Park, Brooklyn, NY, Audobon Nature Ctr. & Boat Hse.(Noon to 3:30PM) "Sunscope". First public stint outside of Balto. One small spot. Disappointingly light traffic in this part of park. Gave out +/-5 "Airplane" stories. Enjoyable. NO HAT.
*Tom and I intended to telescope together for the First Int'l Sidewalk Astronomy Night, organized by the S.F. Sidewalk Astronomers but were foiled by the weather.
- 8 2042)5/22/07(TUE)HPL-W.LIP(8:03-10:00PM). Mild. Sl. hazy sky. PLW chatted lookers and gave our handouts, stickers. 6-d. MOON(Awesome!) VENUS(A few times.) SATURN(1-moon. Some non-believers.) VISITS(V. enthusiastic looker who owns Pro-stylz Barber Shop, Bronx, NY. Lisa, the Unicycle Lady who reports she's moved to L. Italy.) \$73.14 (\$37.51/hr.)
- 7 2043)5/23/07(WED)HPL-W.LIP(7:58-10:22PM). Mild, sl. wind. Seeing 3/5. Greatly assisted by PLW. 7-d. MOON(Startlingly good.) SATURN(Sl. mushy but very ok for lookers. 1-moon.) Fairly busy scene. A young woman who remembered scope from FPT. A man who said he's seen my write-ups in the Sun and City Paper. \$79.14 (\$32.98/hr.)

TOTAL THIS PAGE = \$ 578.00

TOTAL THIS YEAR = \$2,271.47

- 8 2044) 5/25/07(FRI)HPL-W.LIP(8:08-11:16PM). Warm & humid. Hazy...trouble seeing Saturn naked eye. PLW(Back in STL. Could have really used her help tonight!) Very busy. Lots of low and no-pays. Many families. 8-d. MOON(Sunrise on Copernicus...terrific! Lookers very impressed at 136X.) SATURN(1-moon...barely) Busy scene, especially toward end, with many prom goers. HH(I feel that pain from the ingrown callus on my right foot is draining my energy a little bit.) HANDOUTS(Low on all. Need to do a big xeroxing job tomorrow. Actually, wouldn't mind if its cloudy tomorrow night!)\$108.96 (\$34.73/hr.) JUPITER!(Spotted +/-15° up in SE while packing up. Could have scoped, had I known earlier it was up.) BUTTON(Maybe wearing a "Your Contributions Are Welcomed" button would help reduce the number of no and low pays?) CRESCENT MOON-VENUS CONJUNCTION OF MAY 19th(People still asking about and remarking on. Next one June 17 & 18.)
- 7 2045) 5/26/07(SAT)HPL-BICEN.(8:30-9:09PM). Late start waiting for haze to clear. Shut down by thick clouds. However, by the time I got home sky had improved, though still some-hazy. Couldn't see Saturn through it. A mob scene in Hpl. As crowded as I've ever seen it. Felt crazy setting up a telescope in such a place. Just blocked out crowd and did it! Crowd at Bicen not as thick as at Amphthi. 9-d. MOON(Tycho region.) VISIT(A couple here for medical physicists conf. who looked last night and wanted to again, tonight. They said alot of people at convention were talking about me today!) HH(Despite mixed feeling about going out, once set up I was in very good head!)\$13.00 (\$20.00/hr.)
- 8 2046) 5/29/07(TUE)HPL-W.LIP(7:53-10:16PM). Mild, comfortable. Great sky. HH(Avg. mood. Not great.) VENUS(For starters.) 12-d. MOON(Tycho & edge craters. ok.) SATURN(Very sharp. 1-Moon.) JUPITER!(Acq. 9:38PM rising above bow of ship. 3+1. Welcome back!) VISIT(Max Hepner, wife Shana, and their large family.) \$64.06 (\$26.80/hr.)
- 7 2047) 5/30/07(WED)HPL-W.LIP(8:10-10:22PM). Mild, sl. humid. Fine sky. ALIGNMENT(Off at start. Couldn't even find Venus! Several rotations of tripod fixed it. Final = the 3° cant.) HH(A bit depressed whole stint. Voice a bit weak. Enthusiasm lacking.) VENUS (½ disc.) 13-d.MOON(Edge craters @ 136X. Lookers liked.) SATURN(Good. Lots of surprised lookers.) JUPITER(Acq. +/-9:45PM. 1+3 moons.) \$58.74 (\$26.74/hr.)
- 8 2047) 5/31/07(THU)HPL-W.LIP(8:11-9:45PM). Warm, sl. humid. Thick haze over w. half of sky during setup, which I figured would dissolve at sunset. It did a bit, but then reformed, forcing me to shut down. VENUS(½-"moon".) FULL MOON RISING("Blue Moon!" but very crimson. Tycho region at 80X.) SATURN(80X and 110X due to haze.) JUPITER(Briefly.) HH(No hesitation about going. Good head and voice.) \$49.30 (\$31.40/) Incl. a \$20 contrib. from a man from Montana who said he has a C-10 which is a big job to haul outside and who said, "Keep up the good work!"
- 7 2048) 6/06/07(WED)HPL-W.LIP(8:08-11:05PM). Mild. Great sky. HH(Just couldn't shake a sl. depression, which cramped my style somewhat.) VENUS(Sl. less than ½.) SATURN(Acq. +/-8:40PM. Sharp! Wowed lookers.) JUPITER(Acq. +/-9:15. Sl. mushy. 3, then 4 on right.) ISS(Spotted 9:13P. Passed nearly overhead. Had a lg. crowd of excited watchers.) VISITS (Howard Bond, of STScI, w/friends. Howard wrote me a complimentary note after one of my newspaper arts. I sent him a Hale-Bopp cd. in return which, tonight, he said he really liked.) \$101.91(\$34.55/hr.)
- 8 2049) 06/07/07(THU)HPL-W.LIP(8:30-10:45PM). Late start waiting for clouds to dissolve. Warm, sl. sticky. HH(More depressed than last night. Maybe I'm really bored with this, that it's lost its novelty, is too routine?) VENUS, SATURN, JUPITER(1+3). HUG(A 5-yrs. old boy was so happy with seeing Saturn that he gave me a hug!)\$59.55 (\$26.47/hr.)

TOTAL THIS PAGE = \$ 455.52

TOTAL THIS YEAR = \$2,726.99

- 7 2050) 06/09/07(SAT)HPL-W.LIP(8:10-11:01PM). Warm. Great sky, which soon degraded to fair seeing w/ intermittent clouds. Very busy. Line of 10-15 people for alot of the evening. HH(Thanks to a 2-d. rest, in good head, with lots of energy. Good thing, because would have been torture otherwise!) VENUS(45° elongation. Till could acq. Saturn.) SATURN(Sometimes blocked by clds. "Set" 11PM.) JUPITER(When Sat. in clds. 3+1. Lookers liked. Sl mushy seeing.) \$141.19 (\$49.59/hr.) HH(Continuing...this stint required max. stamina. which, it seems, I am still able to muster, although I don't especially welcome this kind of night...except for the money, of course!) Could have sure used PLW
- 8 2051) 06/11/07(MON)HPL-W.LIP(8:12-10:24PM). Confusing weather rpts. By eye sky looked doable so, instead of Engl. dancing, I went for it. Warm. Ok sky. ALIGNMENT(As have done many times, after acq. Venus, fine tuned alignment.) STREET PERFORMER BADGE(1st night wearing one I made by xeroxing my card and inserting it into a name tag holder. Nobody commented on it, but I used it once as an authority to prove Saturn to a doubter.) VENUS (Sl. crescent.) SATURN(Titan in almost same position as on I Saw...sticker.) JUPITER (1+2, .Mushy. Only 1 eq. belt.) UNPLEASANTNESS(Lots of jitory innercity young people.) HH(Sl. depressed; not real bad.) \$58.83 (\$26.74/hr.) A SKEPTIC! (I overheard a young lady after looking at Saturn remark to her friends, "That's why, in my astronomy, course I stopped believing in Christianity." I gave her a copy of my "First Things Considered" City Paper letter of 21 Feb. '96. After reading it and glancing at Tom Tomorrow's cartoon, she said, "This is exactly how I am thinking." It was gratifying!)
- 3 2052) 06/16/07(SAT)LINNEA ANDERSON GRADUATION PARTY FOR DAUGHTER DORIAN, 1518 Roundhill Rd. (8:45-11:10PM). Lots of puffy clds late afternoon which disappeared at sunset, result in a great sky. Tonight was a repeat performance of last year's party for sister Anna. Set up on nearby corner. Compass to polar align. Lots of enthusiastic lookers. VENUS, then SATURN. Packed up everything and moved across street to do JUPITER. It was great, with all 4 on the left. Packed up +/-10:30PM, joined the party inside and announced the ISS-SHUTTLE fly-over due at 23:06:45. Returned to corner with at least a doz. people. While it was predicted to be a +0.7 mag. event, thanks to the Shuttle's being attached, as well as add'l solar panels, it got really bright...maybe mag. -5 or 6!. Party-goers were much excited by it, and I was glad I stayed around for it. \$100.00
- 7 2053) 06/17/07(SUN)HPL-W.LIP(8:08-10:20PM). Sl. hazy; warm, sl. humid. ALIGNMENT(Just not getting it right on first try. Happily, can use Venus to fine tune.) VENUS(Sl. crescent.) 2-d. MOON(+/-15° W. of Venus. Slim, but nice in scope.) SATURN(Wasted alot of Venus-Moon time trying to find it too early. Due to haze, never saw it naked eye nor titan thru scope.) JUPITER(2+2). HH(In good shape but a bit terrified by never ending line of 15-20 eager people. Committed myself to maintain req. energy level.) \$93.16 (\$42.35/hr.)
- 8 2054) 06/18/07(MON)HPL-W.LIP(8:28-10:12PM). Late start due to late afternoon clouds indecision. Warm, hazy, sl. sticky. COLLIMATION: From Venus I quickly saw it was necessary, especially if Saturn was to look good. Fortunately, it only req. a few tweaks.) VENUS (Briefly.) 3-d. MOON(V. good...nice and sharp after collimation.) SATURN(Diminished brightness, but lookers liked.) JUPITER(3+1. Uninteresting due to haze.) PLANETARY ARRAY(W to E, VENUS, MOON, SATURN in a 20° long line.). \$58.84 (\$34.01/hr.) HARD WORK!
- 7 2055) 06/20/07(WED)HPL-W.LIP(8:01-10:58PM). Mild, clear, 3.5/5 seeing. Disorganized stint... especially due to visitor, Walter Hipkins, who took numerous digital photos thru scope. Coincidentally, I had my digital w/me and joined in with him. Probably lost some looker because of this. Never even hung Saturn sign. 5-d. MOON, VENUS, JUPITER, SATURN. ISS, w/Shuttle trailing it appeared in NW 21:20. Had gathered lg. crowd for it, for which it was an exciting experience! Hipkins (Walter & Bernadette, 410-378-3164; newwaldo@hotmail.com) live in Cecil Cty and asked if I'd come to an Aug. party w/scope. I said it's possible and asked \$100. \$67.66 (\$22.96/hr.) VISIT(A family of four from Greenland... a first! I think the husband said they were Danish.)

TOTAL THIS PAGE = \$ 519.68

TOTAL THIS YEAR = \$3,246.67

The Evening Sky Map

FREE* EACH MONTH FOR YOU TO EXPLORE, LEARN & ENJOY THE NIGHT SKY.

Sky Calendar - June 2007

Moon very near Antares at 0h UT (midnight sky). Occultation visible from South and Central America.

Full Moon at 1:04 UT. The full Moon of June is called the "Rose Moon", "Flower Moon" or "Strawberry Moon".

Moon near Jupiter at 11h UT (midnight sky).

Mercury at greatest elongation, 23° east from Sun (evening sky) at 10h UT. Mag. +0.6, low in the west-northwest after sunset.

Jupiter at opposition at 23h UT (mag. -2.6). The best time to observe the largest planet in the solar system.

Last Quarter Moon at 11:43 UT.

Moon near Mars at 18h UT (morning sky). Mag. +0.8.

Moon at perigee (closest to Earth) at 17h UT (363,780 km; 32.9').

Moon near the Pleiades at 13h UT (morning sky).

Venus near Beehive cluster (M44) at 15h UT (evening sky). Mag. -4.3.

New Moon at 3:13 UT. Beginning of lunation 1045.

Moon near Beehive cluster (M44) at 7h UT.

Moon very near Venus at 15h UT (evening sky).

Mag. -4.4. Occultation visible from N.E. North America (daytime), Europe, and S.W. Asia.

Moon very near Saturn at 8h UT (evening sky).

Occultation visible from Asia (day) & Japan. Mag. +0.6.

Moon very near Regulus at 23h UT (evening sky).

Occultation visible from W. & S. North America.

June solstice at 18:11 UT. The time when the Sun reaches the point farthest north of the celestial equator marking the start of summer in the Northern Hemisphere and winter in the Southern Hemisphere.

First Quarter Moon at 13:15 UT.

Moon near Spica at 12h UT (evening sky).

Moon at apogee (farthest from Earth) at 14h UT (distance 404,540 km; angular size 29.5').

Moon very near Antares at 8h UT (evening sky). Occultation visible* from E. Australia, New Zealand, and southern South America.

Full Moon at 13:49 UT. The second Full Moon this month!

All times in Universal Time (UT). (USA Eastern Summer Time = UT - 4 hours.)

NORTHERN HEMISPHERE JUNE 2007

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS

EARLY JUN 11 PM

LATE JUN 10 PM

SKY MAP DRAWN FOR A LATITUDE OF 40° NORTH AND IS SUITABLE FOR LATITUDES UP TO 15° NORTH OR SOUTH OF THIS

Use a Magnifying Glass to Locate the Constellation

The Big Dipper is an easy to recognize asterism in the constellation Ursa Major.

The elongated constellation Boötes (The Herdsman) depicts a man hearding a bear (Ursa Major).

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- Symbols**
- Galaxy
 - Double Star
 - Variable Star
 - Diffuse Nebula
 - Planetary Nebula
 - Open Star Cluster
 - Globular Star Cluster

- Star Magnitudes**
- 0
 - 1
 - 2
 - 3
 - 4

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- 8 2056)6/22/07(FRI)HPL-W.LIP(7:43-11:35PM). Cloud scare early, then great sky. HPL MANAGEMENT PROBLEM(As was setting up, along came Carmel, a street performer manager. She objected to my setting up on W.LIP, saying I was supposed to be at Bicen. I said have been setting up here since '92. She got threatening, saying there are new rules and that the policing of the Promenade has been turned over to a private concern, implying I could get into trouble! I will keep setting up at W.LIP when I want and hope they'll be no trouble.) 7-d. MOON(Awesome at 165X. Sunrise on Archimedes.) VENUS(Briefly. First night out with new VENUS FACTS, composed by PLW and me and word processed by her. Gave out all 15 copies on hand. V "set" behind bldg. 10PM.) SATURN(Fine. Set 10:14PM.) JUPITER(1+4. Great, except mushy image. Is problem scope, me, or seeing?) FRANKIE(Showed up for 1st time this yr. Seems to be doing well w/VA Hosp. job.) \$173.37 (\$4.88/hr.)
- 7 2057)6/23/07(SAT)HPL-BICEN(8:09-10:27PM). Delayed start due to haze, then partly hazy sky throughout. 8-d. MOON, VENUS, SATURN(diminished by haze), JUPITER(3+1. Ok) VISITS(A couple who know Tom Heyn from visits to daughter in Cincinnati. Peter Eckels, the telescope maker, who I haven't seen for yrs. Said is going to Stellafane w/Mike Potter. Alex, who intruded himself as the guy who brought the binocs to my astronomy night course at JHU yrs. ago. Is now a shock trauma doc.) HH(Quit early due to a combination of sl. hazy images and being sick & tired of dealing with the public. Needed a break!) From the start, a busy night. \$91.04 (\$39.58/hr.) ((wk. = \$484.07)) FIREWORKS(Early eve. a fireman looked and asked if I knew there were to be fireworks tonight. I said I didn't whereupon he pointed to a low barge a few hundred feet out. They commenced at 9:10PM and lasted +/-10 mins. I don't know what the occasion was for them, if any. Crazy scene!)
- 6 6/24/07(SUN) DRY RUN TO HPL.Prediction of clds. by mid-eve., but was ok when I left home. However, by 3/4's way there they rolled in, covering whole sky.
- 8 2058)6/26/07(TUE)HPL-W.LIP(8:04-10:58PM). Adverse weather rpt., but cloudless sky. Humid, hazy. 3/5 seeing. 11-d. MOON(Tycho region.) VENUS(Briefly.) JUPITER(4, then 3. 2/5 seeing till near end of stint.) RIGHT FOOT(Over the last week or two the callus on the ball has become more and more painful, both in Hpl and elsewhere. The discomfort is continuous and disconcerting. Must address it.) \$74.09 (\$25.55/hr.)
- 7 2059)6/30/07(SAT)HPL-BICEN(8:45-11:19PM). Delayed start due to clouds, the do-able sky. VENUS-SATURN(Sat. 0.8° above Venus. Nice pair in finder but couldn't get both at once in main scope, even at 50X. Started on V and then concentrated on S till clouds came again.) FULL MOON RISING(Nice at 50X.) JUPITER(4 close on left. Exciting! When it got too close to a light, I enlisted a looker to help me move scope. Good play, since then was able to stay on J for most of rest of stint.) PHOTOS(W/my digital got ok shots of V-S through finderscope and J with moons at 80X. Am getting the hang of it, tho still room for improvement.) VISIT(Bill Harvey and friends.) \$78.11 (\$30.43/hr.) Hard work!
- 8 2060)7/01/07(SUN)HPL-BICEN(8:25-9:28PM). Thin cld. at start, then shut down by thicker ones. VENUS & SATURN(Sat. .45° north of Venus. V image ok, but S image mushy due to low alt.) Lots of no-pays and jumpy kids. Not a fun night! \$20.80 (\$19.81/hr.) SATURN(This is close to the end of my Saturn Season '07, which began Feb. 11th.)
- 7 2061)7/06/07(FRI)HPL-BICEN(8:14-11:12PM). Great sky. Pleasant, light breeze. Accompanied by PLW, who tried out her carpenter apron w/pockets idea for dispensing facts blurbs. "I think it's helpful," she says. VENUS(Nice crescent.) JUPITER(3+1. Great, especially after I collimated scope. I blamed initial mushiness on seeing when it the scope! Even greater at 136X.) SATURN(Briefly. Dull, but wowed lookers.) VISITS(A number of goes to the Int'l Conf. of Muslim Women.) \$96.09 (\$32.35/hr.)
- 8 2062)7/09/07(MON)HPL-E.LIP(8:11-10:11PM). Clear but hazy sky. Hot...heat wave! Last night we made a count, and tonight was PLW's 51st telescope stint! VENUS(At start, then intermit. till 9:45PM). JUPITER(Acq. 8:40PM. 2+2. Nice. VISIT: (Lily, fellow worker from my Md. Sc. Ctr. days. Now a masters in public health.) \$43.08 (\$21.54)

TOTAL THIS PAGE = \$ 576.58

TOTAL THIS YEAR = \$3,823.25

13 07/11/07(WED)MARK CHALKLEY'S TSU ENGLISH AS A 2ND LANGUAGE CLASS(1-2PM). 6-students present. Introduced astronomy as a science. Gave the Greek origins of the word: astron. "star" nomos "law, system of laws". Named various sciences (astronomy, geology, biology) and their practitioners (astronomer, geologist, biologist). Students had very limited grasp of Eng. I explained my film camera briefly. Gave short (eclectic) slide show, which went over pretty well. Q&A session, including "What is a black hole?"(Mark had to help me understand Q's.) Accompanied by PLW, who said it was a good presentation. Gave out star maps and photo how-to. HH(In good head. Thought it went well.)HONOR.\$100.0

7 07/12/07(THU). DRY RUN TO HPL. Despite "clear" weather rpt...clouds. Accompanied by PLW. Would have been her 52nd stint had clouds allowed. We sat on bench for a while watching strollers and treated ourselves to a cup of chocolate chip ice cream.

8 07/14/07(SAT) DRY RUN TO HPL. Another "clear" weather rpt., but clouds present late afternoon persisted. Stayed at Bicen till 9PM. Spotted V once but never J. PLW returned to STL today.

7 2063)07/18/07(WED)HPL-E.LIP(8:10-9:10PM). Hot, sticky & hazy. Fairly busy scene. Lots of families w/young kids. 4-d. MOON(Nice, when not too hazed out. Lookers impressed.) VENUS(Couldn't find "by the numbers". Spotted it 5-min. before setting behind bldg. Nice crescent.) JUPITER(Couldn't find it by sweeping and not by eye, either. Never saw it. Had to take down J sign as people kept asking to see it.) Shut down by clouds. VISIT(Joan Jacobs, who asked about the Perseids. Will e-mail info.) \$22.40 (\$22.40/hr.) PHYLLIS' CARPENTER'S BELT(Wore it but found pockets kind of small. Couldn't remember which pocket held which handout.)

8 2064)07/23/07(MON)HPL-E.LIP(7:51-10:25PM). Mild, clear but poor (2/5) seeing. HH(Not sure I wanted to be there, but rose to the occasion. I feel like have lost alot of my "show & tell" need.) 9-d. MOON(Started on w/polarizer 25-min. before ss. Sunrise on Copernicus!) VENUS(Once. Very crescenty. Didn't last long.) JUPITER(3+1. Nice, ex-mushed up by poor seeing.J 4.2° nearly due N of a Sco.) Lots of families/kids. \$77.56 (\$30.22/hr.)

7 2065)07/25/07(WED)HPL-E.LIP(8:16-11:03PM). Warm, sticky. 4/5 seeing, but had to play sucker holes mid-evening. HH(In good head...up for the occassion.) 11-d MOON(Good. Tycho area plus edge craters W of Plato. Lookers impressed.) JUPITER(Classic array of 2+2. Stripe fairly easy...called orange by some lookers.) VISITS(A number of fireman here for a convention. TRIANGLE(Moon beneath J with a SCO to its right.) \$85.12 (\$30.62/hr.)

8 2066)07/26/07(THU)HPL-E.LIP(8:10-10:45PM). Warm & sticky. Clear (4/5). HH(In good form, except for callus prob. on R. foot. Uncomfortable talking to and from set-up spot... walking like am a bit crippled. Will try my new Reeboks next time.) VENUS(Setup a little early hoping to see it, but no luck. Must have set behind bldg.) 12-d. MOON (Tycho region still excellent.) JUPITER(4 on right. Really nice.) VISITS(Again, good # of fireman & their famlies.) \$99.00 (\$38.37/hr) FIRST TIME EVER(Unloading my contributions hat at home, I discovered there was absolutely NO loose change. I could hardly believe it!)

7 2067)07/31/07(TUE)HPL-E.LIP(8:15-10:45PM). Clear. Warm. Accompanied by Thomas Heyn and his friend, Ricky, who pushed handtruck to and from garage for me, then they ranged around HPL. Visited later by Frank Heyn and Elsbeth, who came to town Monday for 6-days. JUPI-TER (2+2. Good.) Busy night. Good contribs. \$98.15 (\$39.26/hr.)

8 2068)08/02/07(THUR)HPL-E.LIP(8:10-10:40PM). ss 8:18PM. Clear, but sl. hazy. JUPITER(1+3 + background star. Nice!) VISITS(Frank, Elsbeth & Thomas. F&E took photos.) HH(In good head & energy, despite a rigorous day. Yesterday, we drove to Cape Henlopen St. Park, where we met Sally & John.) \$80.39 (\$32.16/hr.)

TOTAL THIS PAGE = \$ 562.62

TOTAL THIS YEAR = \$4,385.87

The Evening Sky Map

FREE! EACH MONTH FOR YOU TO EXPLORE, LEARN & ENJOY THE NIGHT SKY

Sky Calendar - June 2007

Moon very near Antares at 0h UT (midnight sky). Occultation visible from South and Central America.

Full Moon at 1:04 UT. The full Moon of June is called the "Rose Moon", "Flower Moon" or "Strawberry Moon".

Moon near Jupiter at 11h UT (midnight sky).

Mercury at greatest elongation, 23° east from Sun (evening sky) at 10h UT. Mag. +0.6, low in the west-northwest after sunset.

Jupiter at opposition at 23h UT (mag. -2.6). The best time to observe the largest planet in the solar system.

Last Quarter Moon at 11:43 UT.

Moon near Mars at 18h UT (morning sky). Mag. +0.8.

Moon at perigee (closest to Earth) at 17h UT (363,780 km; 32.9').

Moon near the Pleiades at 13h UT (morning sky).

Venus near Beehive cluster (M44) at 15h UT (evening sky). Mag. -4.3.

New Moon at 3:13 UT. Beginning of lunation 1045.

Moon near Beehive cluster (M44) at 7h UT.

Moon very near Venus at 15h UT (evening sky). Mag. -4.4. Occultation visible from N.E. North America (daytime), Europe, and S.W. Asia.

Moon very near Saturn at 8h UT (evening sky). Occultation visible from Asia (day) & Japan. Mag +0.6.

Moon very near Regulus at 23h UT (evening sky). Occultation visible from W. & S. North America.

June solstice at 18:11 UT. The time when the Sun reaches the point farthest north of the celestial equator marking the start of summer in the Northern Hemisphere and winter in the Southern Hemisphere.

First Quarter Moon at 13:15 UT.

Moon near Spica at 12h UT (evening sky).

Moon at apogee (farthest from Earth) at 14h UT (distance 404,540 km; angular size 29.5').

Moon very near Antares at 8h UT (evening sky). Occultation visible from E. Australia, New Zealand, and southern South America.

Full Moon at 13:49 UT. The second Full Moon this month!

All times in Universal Time (UT). (USA Eastern Summer Time = UT - 4 hours.)

NORTHERN HEMISPHERE JUNE 2007

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS

EARLY JUN 11 PM

LATE JUN 10 PM

SEE HOW MOON FOR EARLY AND LATE JUNE DIFFERS. A LATITUDE OF 40° NORTH AND IS SUITABLE FOR LOCATING UP TO 15° NORTH TO 15° SOUTH OF THIS

From northern latitudes, stars appear to rotate around the North Celestial Pole (NCP).

THE BRIGHT STARS Vega, Altair and Deneb form the Summer Triangle.

Job's Coffin is the name given to the box-shaped asterism in the constellation Delphinus (The Dolphin).

Almost directly overhead lies the small but distinctive constellation Corona Borealis (The Northern Crown).

The Big Dipper is an easy to recognize asterism in the constellation Ursa Major.

The dashed constellation boxes (The Hermap) depicts a man hearing a bear (Ursa Major). THE CENTER OF THE MAP IS THE PART OF THE SKY DIRECTLY OVERHEAD (ZENITH) AND THE OUTER CIRCLE IS THE HORIZON.

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STREET CORNER TELESCOPE LOG -- 2007

- 7 2069)08/11/07(SAT)HPL-BICEN(8:05-10:50PM). Clear (3/5 seeing), warmish. Accompanied by my lover Phylli Weber, who handed out handouts, picked up money. JUPITER(Acq. by"the numbers. Used polarizer initially. ss 8:02PM. 4 moon, then 3 + star. Lookers awed by it. Dropped behind bld. at 10:45PM.) ALBIREO(For 2 mins. at end.) RED SOX BASEBALL FANS(Many in for today's game, possibly because tkts. too hard to get in Boston. Many had a look. Sox won 6-2.) Busy night. HH, kept up with it, tho w/effort.\$109.34(\$39.76/)
- 8 *2070)08/17/07(FRI)HPL-E-LIP(8:01-10:40PM). Sl. hazy(2.5/5), warm. Assisted by PLW. 4-d.MOON (Low, sl. mushy, but ok.) JUPITER(1+3. Sl mushy. Bad time w/ clouds mid-eve. Shut down at 9:32PM, but then decided to stick it out. Sky cleared, then trouble w/ lights forced final quit.) ISS-SHUTTLE (Briefly, in the NNW.) \$64.52 (\$24.39/hr.)Lots of no-pays.
- 7 2071)08/18/07(SAT)HPL-BICEN(8:40-9:07PM). Late start due to clds., then shut down by clds. PLW's 54th stint! 5-d. MOON(Undoable due to clds.) JUPITER(1+3. Nice, while it lasted! Some lookers exclaimed how beautiful it was!) Adjourned to Dizzy Issies.\$14.04(\$30.99/)
- *VISIT(Middleton Evans, who said he's including his photo of me in his forthcoming Baltimore photos book.)
- 8 2072)08/24/07(FRI)HPL-E.LIP(7:59-9:19PM). Warm, sticky. Sl. hazy at start, then shut down by clds. 12-d.MOON(Tycho region. Nice.) JUPITER(2+2). Lots of families/kids. HH(With so many kids, felt stressed trying to get it right for all.) \$42.90 (\$32.01/hr.) HH(While driving down, I felt depressed, that I would rather not setup tonight. Setting up, I felt like I was just going through the motions. However, as soon as I started engaging with the public I felt ok...except the pressure of keeping up with the flow of lookers was unpleasant and tiring.)
- 7 2073)08/27/07(MON)HPL-E.LIP, but i sq. north to keep J above lights.(7:55-10:28PM) 3/75/5. Warm, sl. sticky. HH(In good head. Hard work, esp. w/so many little children. Every time I see a bunch of their eager faces, I feel an "oh, no" shock run through me!) JUPITER(1st try. 3, then 4. Mostly at 80X due to atmospheric.) Night of the full Moon, but it never rose above ship. Total lunar eclipse at 5:50AM tomorrow, which I mentioned to lots of lookers. BATTERY(Died a few mins. into stint. I hope it re-charges ok!) B Cyg(once, for man knowlegeable on constels.) \$106.58! (\$41.80/hr.)
- 8 2074)08/28/07(TUE)HPL-E.LIP...ibid(7:30-9:38PM) Warm, sl. breezy. LUNAR ECLIPSE(Arose 5AM to view it from D.H. Pk. Lake. Leaving hse., partial looked beautiful, but by time I reached lake clds. had moved in and show was over. Got little sleep last night but managed to recuperate enough to telescope tonight. Eclp. was yet another astrobummer experience!) JUPITER(Acq. 13-min. before ss. 1+3. Fine!) NO PAYS(Lots, by people who looked as if they could well afford to contribute. I confronted one man, asking if he was a subprime loan victim. He just smiled, shrugged, and walked away.) VISIT(Lucy Hoopes daughter.) \$50.33 (\$23.60/hr.) BATTERY(OK, after 18-hr. recharge.)
- 7 2075)08/29/07(WED)HPL-E.LIP...ibid(7:38-10:16PM) V.G. sky. Warm. JUPITER(3+1. Acq. early, but polarizer didn't improve image.) 17-d.MOON(Briefly. M. Crisium edge fantastic!) VISIT(Young man who just today recv'd. his astronomy Ph.D. from JHU and had never before seen Jupiter in a telescope!) VISIT(Alin and a new friend Heather. Arrived when I was 1/2-way packed up. Showed them J, after which Alin insisted we look at moon, which was rising above ship. We relocated scope and did Moon...also for several passerby lookers.) HH(In good head. Still, is hard work!) \$58.86 (\$22.30/hr.)
- 8 2076)08/31/07(FRI)HPL-E.LIP...Ibid(7:34-10:48PM)Comfortable. Great sky. HH(Dragged myself there but got into the swing of it.) JUPITER(1+3. Lookers impressed. BOTTOM STRIBE MAY BE RETURNING! Near lights 9:18PM. Image degrading 10:10PM. Would have lost by +/- 11PM.) \$118.22 (\$36.60/hr.) Hard work!

TOTAL THIS PAGE = \$ 564.79

TOTAL THIS YEAR = \$4,950.66

- 7 2077) 09/01/07 (SAT) HPL-BIGEN. (7:25-9:28PM). Semi-mild. Great sky. JUPITER (3 in evenly spaced straight line on right. Terrific! Hit hirise at 9:28PM.) Intense night. Had a line (more like a crowd!) most of evening. Lots of families/kids. I had to work really hard to keep up with volume of lookers. At one point I felt staggered and wanted to sit down for a minute to catch my breath, but I kept going anyway! FOCUS (Recently, it seems like more and more people are using the "astigmatic" focus. Don't know why...is strange. Am considering making it the main focus, then going to the "normal" if necessary. VISIT (A young teenage Black girl who seemed very interest in astronomy and wanting to get a scope. I sensed a extra special determination in her!) HH (I felt I did an extra effective educating job tonight...really went all out!) \$107.59 (\$52.48/hr.) Tomorrow night go to the Milam's annual Deck Buster party, then on Mon. to St. Louis for a week w/PLW. QUITTING TIME (After loosing J, I contemplated waiting for Uranus and/or the Moon, or whether to give myself some TLC and leave. I choose the latter, partly because some clouds were starting to drift in from the west.) VISIT (Middleton Evans, who stopped to chat and then took two photos of me with scope.)
- 09/02/07 (SUN) KURT & CATHY MILAM'S DECK BUSTER BACKYARD PARTY (25th ANNUAL!). JUPITER (Was feeling despondent about taking scope to party, believing Jupiter would be totally blocked by trees and that I'd have to do Albireo. However, working with my "boy scout" compass, I ascertained that it would be in a break in the trees for at least an hour. Using compass and level, set up in far corner of yard, getting a perfect alignment. Needed to move tripod 3 times, but held it for at least an hour. Lots of appreciative lookers. Gave out stickers, lots of which fell onto the grass. Parked a block away, but then was able to take a spot right at driveway. Was helped in unloading and loading by two different men. Hard work but, after all, was glad I did it. NO HAT. DEW CAP (Left it at home but next year should take it.) Maybe 1/2 of the 100 attendees had a look. Accompanied by Cathy Budd, who followed me there in her car and left before I did. Lots of appreciative lookers! FOCUSING (Continuation of more lookers using "astigmatic" focus than "normal" focus. Maybe will have to start with the "a" from now on and go to the "n" if necessary. Strange development!) Otherwise, hard work. How long can I keep doing it
- 8 2078) 09/13/07 (THUR) HPL--FOOT OF E. RAMP, FROM WHERE JUPITER WOULD NOT BE BOTHERED BY LIGHTS (7:15-7:47PM). Hi clouds gathering late afternoon but chanced it. Good start, the clds. First stint since spending a week w/PLW in STL. JUPITER (Acq. 1st try at sunset. 1+3, close in. Great!) Goodly number of strollers. VISIT (Cotters). \$8.00 (\$15.09/hr.) PARKING (There was no sign-in sheet. Guard lady said not nec. to give ID cd. When I asked for a parking permit, she said, "That's alright. I know you have a white wagon. What's happening")
- 7 2079) 09/15/07 (SAT) HPL--IBID (7:20-10:16PM). WEATHER (Sl. fallish. Wore long pants, "You Are Here" sweatshirt, beret.) PARKING (No sign-in book. Took my ID cd., filed it alphabetically in a box, and gave me a wallet-size parking pass. A bit scary!) SKY (Bad clds. at start, which cleared +/- 8:25PM. V. poor seeing.) 4d-MOON (Briefly thru sucker holes.) "Set" 7:40PM.) JUPITER (Thru bad suckerholes till 8:25PM. Mushy image, but 4 on right. Lookers impressed! Set behind Hyatt 9:58PM.) ALBIREO (Raised tripod; briefly.) HH (Good energy, but kept telling myself "this is really crazy" and feeling estranged from scene.) \$73.66 (\$25.05/hr.)
- 8 2080) 09/16/07 (SUN) HPL--IBID (7:05-8:40PM). Mild. Had to play sucker hole w/Jupiter & Moen most of eve. METEOR BLIMP (w/Moon & J in clouds, started on it...hovering over football game.) 5-d.MOON (Great, when not in clds.) JUPITER (Seeing sometimes 1/5. Otherwise 2+2. Rarely a sharp image.) ALBIREO (1X for woman astrophysics major from U. of Md.). VISITS (UM astrophysic maj. & boyfriend. a family from CUBA! Man said he arrived in '95 as boat refugee.) HH (Confusing evening, esp. since I'd forgotten Jupiter Facts!) \$24.25 (\$15.28/hr.)
- 09/17/07 (MON) HAL STAR PARTY, MILLER LIBRARY (7-9PM). Clear, then clds. toward end. Ok alignment w/mag. compass. Jupiter & Albireo. Really wanted to do Uranus but was too busy to take time to find it. Challenging (tough!) stint because of so many families/kids. NO HAT.

TOTAL THIS PAGE = \$ 213.50

TOTAL THIS YEAR = \$5,164.16

- 7 2081) 09/18/07 (TUE) HPL--FOOT OF E. RAMP (7:07-9:25PM). Mild. Seeing 3/5. Clear. 7-d. MOON (awesome!). JUPITER (2+2. Nice. Sl. mushy image.) Slow scene. \$34.70 (\$15.09/hr.) BUNGEE STRAP (Unknownst to me, the blue one holding the dew cap fell off as I was pushing the handtruck to Hpl. I parked it, retraced my path, and spotted it in the middle of Pratt St. Retrieving it, I discovered one of the hooks had been crushed closed, rendering it unusable till I repaired it.)
- 8 2082) 09/21/07 (FRI) HPL--IBID (6:57-8:55PM). Warm. V. nice sky, then shut down by clouds. 10-d. MOON (Tycho region, sunrise on Jura Mts. Nice!) JUPITER (2+2 close. Nice!) Busy scene but little interest. I in no mood to recruit, maybe because of relationship problems w/PLW. \$35.72 (\$18.16/hr.) IN THE SHADOW OF THE MOON (Documentary movie on the Apollo program which I saw this afternoon at the Senator. I found it so inspiring, uplifting...showing human beings at their most creative, humble, intelligent and perceptive that I was teary all the way through it. Am thinking I should make up a handout about it for my lookers.) "BALTIMOREHENGE" (On way home drove E. on Balto. St. looking for a City Hall camera angle for the 9/29-30, 267° sunset. Balto. & Chester Sts. looked good, but standing in the middle of Balto. St. w/traffic is conjectural!)
- 7 2083) 09/22/07 (SAT) HPL--IBID (7:12-10:21PM). Warm & sticky. 3/5 seeing. 11-d. MOON (In ship's rigging at first. North rim & Tycho region. Lookers awed.) JUPITER (1+3. Good! Lost at 9:40PM) Busy night. Could have stayed longer w/Moon but was tired. \$97.94 (\$31.09)
- 8 2084) 09/23/07 (SUN) HPL--IBID (7:05-9:40PM). V. comfortable. 4/5 seeing, transparent sky. JUPITER (3+1. V. nice. Low alt. degrading image.) 12-d. MOON (N & S "poles". Great.) Semi quiet scene. HH (A bit bored, but maintained necessary energy.) URANUS (Acq. once on 1st try but failed on 2nd try for looker. Green dot!) \$58.12 (\$22.47/hr.)
- 7 2085) 09/24/07 (MON) HPL--IBID (7:17-9:57PM). Sl. late start, as I parked a few mins. to listen to Iranian Pres. Ahmadinejad's Columbia U. talk, alot of which was nebulous philosophical rambling. However, I thought his answers to q's about Palestine & atomic development were reasonable. HH (Mostly, a slo night. I sat on ledge and enjoyed the nice weather. Scene was pretty quiet. I pulled the plug at 9:12PM and suddenly got busy. Plugged in and stayed another 45-mins, which incl.'d a \$10 contrib. This has got to be among the world's most unusual jobs and craziest experiences!) LOCATION (Thinking it was an either-or situation, I debated Jupiter or the Moon. On PLW's recommend I went for the former, but it turned out that I could do both afterall.) 13-d. MOON (Still good edge craters. Sometimes did Pythagoras @ 220X.) JUPITER (3+1. 4/5 seeing allowed 135X most of evening.) URANUS (Found 1st try. Earned 1st \$\$ on it this season! Gave stickers.) \$58.77 (\$22.01/hr.) VENUS (Am asked several times a night, "What's that big, bright light in the morning sky?" Of course it's Venus which, currently, is at greatest brilliancy -4.3. I checked it out early 9/25, and it really looks as "huge" as my lookers describe it!)
- 8 2086) 09/25/07 (TUE) HPL--IBID (7:10-9:32PM). Warm. Clear, but 3.5/5 seeing. Slow scene. 25-min. till 1st looker! 14-d. MOON (1-d. till full. A few edge features. Some Chinese lookers said was the "Autumn Moon", a Chinese holiday when "moon cake" is consumed.) JUPITER (3+1. 80X only.) URANUS (Briefly at end.) Lots of no and low pays. HH (Occasionally feeling a bit depressed about Elsbeth's cancer affliction.) \$51.80 (\$21.95/hr.)
- 2 10/13/07 (SAT) WAVERLY VILLAGE EVENT AT OLD YORK & 32ND ST. (10:30-1:PM). Clear. Seeing 2.5/5. ELSBETH (1st time telescoping since back from A'dam where I attended E's passing away from cancer. She died in-hospital, having chosen euthanasia as her only escape from excruciating pain. She died on 10/02 and was buried 10/06. A wonderful life was lost.) VENUS (8"-SCT. Polar aligned with magnetic compass and acquired it on 1st try. Had lookers in bunches...maybe 50. Gave out Venus blurbs and mnemonics.) HH (It felt good getting back to what I do best.) GETTING THERE (Because 33rd St. would be blocked by marathon runners, I took car early to Giant lot, walked home, and walked back to take it to event loc.) NO HAT (Monring Sunday asked what I chg'd. to talk to a group. I quoted \$150.00 which, she said, was "just right".

TOTAL THIS APGE = \$ 337.05

TOTAL THIS YEAR = \$5,501.21

STREET CORNER TELESCOPE LOG -- 2007

- 7 2087)10/14/07(SUN)HPL--IBID(6:27-9:15PM). Mild. 3.75/5 3-d.MOON(Ok. Lost 6:51PM). JUPITER (3+1. Higher than I expected. Held for 1h31m. Fuzzy due to lowness. 80X only.) URANUS(Nice. I hype by showing the rensse.com picture and saying that while its alot smaller in the scope the color's the same. It works. People like! Gave out stickers & "facts".) HH(Felt a bit bored and challenged by families with kids, but I kept my energy level up.)\$87.48(\$31.24/)
- 8 2088)10/15/07(MON)HPL--IBID(6:32-9:10PM). Mild. Hi, thin clds. early, then clear. 3.5/5. 4-d.MOON(Ok. Lost 7:25PM). JUPITER(Nice. 2+2. Good def. early, then fuzzied-up. Lost 8:23P) URANUS(Acq. 8:26PM. Lookers liked...understood.) VISIT(Kendall) \$52.56 (\$19.91/hr.) HH(Not putting much effort into recruiting passersby...maybe because J's image not so great.) Alternately, I'm getting tired of keeping up the energy level necessary to meet & greet the public
- 7 2089)10/17/07(WED)HPL--IBID(6:25-9:09PM). Like summer! 2.9/5 6-d.MOON(Impressive, tho degraded by atmospheric.) JUPITER(1+3. J blurry but moons ok. Lookers liked.) URANUS(Hard to find for some reason.) VISITS(DAVE, a military apprentice photographer who took photos of me w/scope and Moon thru scope. Said he'd e-mail to me. DRUNK MARINE, who said he was heading back to Iraq on his 4th tour. I asked him what he thought would happen there. His response was that if all the people walk by right then were Iraqis, he'd kill them all because he couldn't trust them. SMITTY the photographer, who gave me 2 prints of photos of Phyllis and me he took in Aug....really great shots!) \$64.70 (\$23.70/hr...thanks to a \$20.00 contrib!)
- 8 2090)10/20/07(SAT)HPL--IBID(6:40-10:10PM) Accompanied by PLW, back in town for 11 days. Her stint #55! Mild, then sl. cool. Great sky! 9-d.MOON(Tycho-Copernicus. 80-165X. Great Moon. Lookers impressed.) JUPITER(Fuzzy. 4, then 3.) URANUS(Briefly...several times.)\$94.00(\$26.83/)
- 7 2091)10/21/07(SUN)HPL--W-LIP(6:17-8:52PM) PLW's 56th time. V. Mild. Great sky. 10-d.MOON(Mainly Tycho area @ 166X, but also sunrise on Jura Mts. For a time I gave lookers a "trip on the Moon", starting them at Jura and slowly bringing them down to Tycho. They liked.) JUPITER (Very briefly. Fuzzy...3 moons.) URANUS(Once, for Steve & Amanda Cunningham. Found on 3rd try.) VISIT(Steve & Amanda Cunningham, to whom I sent an e-mail invite earlier today. Steve, who looks great and seems to get around ok, is two months off of a double lung transplant! I learned this when I met him yesterday at the Fmr.'s Mkt.) \$76.99 (\$29.73/hr.)
- 8 2092)10/27/07(SAT)HPL--Promenade, nearly to end of Phillips(7:05-9:53PM) PLW's 57th stint. Sl. chilly. V. clear, 3.75/5. URANUS(1st try!). JUPITER(Spotted by PLW coming from behind high-rise. 2+2. Nice. Held till 7:45PM.) 16-d. MOON(Acq. 7:50PM. Great! Lots of edge craters.) COMET HOLMES(Acq. 8:55PM over WFC. Bright fuzzball. Lg. nucleus surrounded by coma. Used sig made by PLW "Tonight A Comet HAV-A-LOOK!" This is PLW FIRST comet! VISITS(Lookers from Tibet, Afghanistan, El Salvadore...lots of Spanish speakers. Two Spanish speaking Balto. City Policemen, originally from Puerto Rico. Some enthusiastic youngsters.) \$59.00 (\$21.07/hr.)
- 7 2093)10/29/07(MON)HPL--V.Sl. south on Promenade(7:12-8:25PM) Great sky. PLW's 58th stint. Very slow scene, plus what passersby there were showed no interest in being invited to see a comet! COMET HOLMES(First try! Is in Perseus. Big fuzz ball w/ebb star at 2 o'clock dim one at 9 o'clock, and another visible through comet! 40mm K = 50X. Great scene.) *URANUS (Searched but could not find. Why?) Sl. cool. Wore winter jacket. \$6.00 (\$4.92/hr.) *Comet bright enough to see in finder from Hpl!
- 10 2094)10/30/07(TUE)HPL--IBID(7:38-9:15PM). First drove to Fpt. feeling a need for a change of venue. However, v. bleak scene so went to HPL. Great sky. PLW's 59th stint. COMET HOLMES(Big trouble finding, maybe because, on PLW's recommendation, I moved scope further onto Promenade leading to an alignment problem. Comet didn't seem quite as bright as last night. It had a star-like nucleus...somewhat hard to see but there, nevertheless. Some enthusiastic lookers. Upon arriving home, comet looked sl. dimmer from front steps than last night.)\$27.00 (\$14.44/ VISITS(A woman who was very excited about comet because her maiden name was Holmes. Another woman was excited to learn that my name is Herman, because all the men in her family are named Herman, she said.)

TOTAL THIS PAGE = \$ 467.73

TOTAL THIS YEAR = \$5,968.94

STREET CORNER TELESCOPE LOG -- 2007

- 7 2095) 11/01/07 (THU) HPL--sl. south on Promenade (7:04-8:58PM). Mild. Sl. hazy. ALIGNMENT (Again setup a yard into Promenade. Misaligned, loosing up to 15-min. finding comet. Now I realize P. points due N, so now I will align accordingly.) COMET HOLMES (Dimmer than before, prob. due to haze. 1-semi bright star very near for focusing. Could see naked eye at home. Thru binocs looked bigger & sl. dimmer than last night.) CONFUSION! (First lookers were a mother with a 5-yr. old boy. I picked him up, but he couldn't see anything. Decided to do a straight thru look, lost comet in process, and couldn't quickly find again. Mother put \$3 in hat and left, saying they'd be back. An hr. later decided to go for Uranus. 30-secs. later they reappeared. Happily, found comet quickly, but in process diagonal w/25mm Or. fell out and hit the bricks pretty hard, possible putting a small chip in lens. The kid prob. didn't see comet, but mother & father did. I gave them a mnemonic & comet article.) COMET ARTICLE (The Oct. 31 SUN had an article on the comet by Frank Roylance which mentioned my experience in Hpl. w/the public's reaction. I reduced it to get two per sheet and began handing it out tonight.) ALIN (Will take lens holder to him tomorrow to have new hole drilled and/or get a new screw.) \$18.00 (\$9.47/hr.) Bleak sc.
- 8 2096) 11/03/07 (SAT) HPL--1bid (7:03-9:55PM) Cool. Sl. hazy. COMET HOLMES (Spent 52 futile mins. looking for it till I gave up. Problem? Maybe a combo of haze and comet's dimming as it expands. While looking, bantered with Scott & Malissa, a couple at a Big Kahuna outdoor table. They asked me what I'd like to drink. I chose burbon on the rocks, which they got for me...afirst! They eventually saw Uranus, tho not the comet.) URANUS (Acq. 7:55PM after alot of trying. Dec. ¼° low. Once acquired, thanks to how I hype it, it works well...at 166X.) COMET (Finally acq. 9PM. Looked bigger & dimmer. I didn't feel real good about it, and at 9:39PM went back to Uranus.) HH (Despite problems, I felt happy & energetic. Tomorrow night will probably do Uranus first.) \$42.85 (\$14.93/hr.) (Yr. = \$6,011.79.) THIS STINT MARKS THE END OF MY 20TH YEAR OF STREET TELESCOPING, THE FIRST STINT HAVING OCCURRED IN FELL'S POINT ON NOVEMBER 13, 1987.
- 7 2097) 11/23/07 (FRI) HPL--1bid (5:16-7:02PM) Good sky. Cold (32°F. Adequately dressed...but barely. 14-d. MOON (Essentially, full, w/just a few craters under Tycho. Bounced around w/eye-pieces. Settled on 80X centered on Tycho region. Needed moon filter badly.) URANUS (For myself, briefly.) Quit early due to quiet scene + tough moon to show. \$18.70 (\$10.63/) START OF MY TWENTY-FIRST CALENDAR YEAR!
- 10 11/28/07 (WED) HPL--UPPER LEVEL W. OF AMPHI. (7:05-8:20PM). Semi-cool. THIS STINT AT REQUEST OF STSci PUBLIC OUTREACH PERSON, MARY ESTACION (410-338-4510, estacion@stsci.edu). AIM WAS TO INTERVIEW MEMBERS OF PUBLIC ON THEIR IMPRESSIONS OF MARS. (EXACTLY WHY, I DO NOT KNOW!). MARY WAS WITH A PHOTOGRAPHER, ED. THEY FOLLOWED ME DOWN AND I GOT THEM PARK- IN THE GARAGE. WE ARRIVED 5:15PM, WHEREUPON I DECIDED WE NOT SET UP TILL MARS WAS ABOUT TO APPEAR. WE IDLED TIME AWAY WITH COFFEE & PIE. WENT BACK TO GARAGE FOR SCOPE & THEIR STUFF. AFTER SCOUTING TO A GOOD SPOT, SET UP. BY NOW, SKY WAS COMPLETELY CLOUDED OVER...LOOKED IN VAIN FOR a AUR and a LYR. STILL, WE WAITED FOR MARS, WHICH NEVER APPEARED! DURING OUR TIME THERE, MARY MANAGED TO INTERVIEW 3 GPS OF PEOPLE, WHICH SEEMD TO SATISFY HER. WE PACKED UP AND HEADED HOME. AT HOME I SPOTTED MARS EASILY THU CLDS! GOOFY NIGHT...TOTALLY! HAT ON TRIPOD BUT NO LOOKERS. FOUND \$0.25 ON PROMENADE.
- LOSS OF BRIEFCASE W/SKY MAPS, PHOTOS, ETC. Tues. afternoon discovered it wasn't in the green milk crate. Was disbelieving and devastated, because I wanted the stuff in it for my STSci stint. Looked, and looked, and looked for it in my house. Called HPL L&F, but not there. Thinking prob. left it at HPL Fri. night, detoured there when bringing Chloe home from airport, but not there. Today (Wed.) made a big, ^{90%} successful push to recreate.
- 7 2098) 11/30/07 (FRI) HPL--S. on Prom. (7:27-9:22PM). Clear, 35°F. EVE OF ARMY-NAVY GAME. Fairly busy scene-I guess alums w/families. MARS Acq. 7:33PM. Same bad image I remember from '05. No fun for me! Didn't recruit at all. However, thanks to my hyping, most lookers satisfied...so maybe should have recruited. Asked lookers to try to see whittish shade on top edge...snow cap. Insult to injury...bad seeing!) 2 big navy ships along Prom. Utilized gap between them. Pleiades (Once, by req.) \$27.88 (\$14.52/hr.)

TOTAL THIS PAGE = \$ 107.43

TOTAL THIS YEAR = \$6,076.37

- 8 2099) 12/08/07(SAT)HPL--S. on Prom.(7:05-8:58PM). Semi-cool; damp. Decent sky. PLW's #60. MARS(Vis. above bldg. 6:45PM. Image improved as it rose and by 8:30PM was sometimes half decent, with polar cap and vague shading vis. at 135X. I hyped it pretty well with Hubble photo, and most lookers liked it.) VISITS(Kendal & wife. Magda Tolea with her parents from Romania and her and Alin's daughter, Bianca. A photographer named Hermano, who took photos of me and PLW and said he'd e-mail.) Could have worked longer but dampness was no fun. \$39.87 (\$21.10/hr.)
- 7 2100)12/14/07(FRI)HPL--Promenade E. of Amphi.(6:18-8:27PM). +/-34°F. Ok sky. Bleak scene but steady stream of passersby. WEATHER(Tonight was a window-of-opportunity in a long seige of bad weather.) 5d. MOON(3 good craters which lookers appreciated.) MARS(Came from behind Pratt St. Pavillion and lasted +/-1hr. before hitting WTC. Sharp, round image but next to no detail.) Lost Moon & Mars simultaneously and packed up. VISITS(Lots of enthusiastic young girls, to whom I gave many handouts.) GEMINIDS(Peaked tonight. Several lookers asked about. One saw a bright one from HPL!) \$32.22 (\$14.99/hr.)
- 15

TOTAL THIS PAGE = \$ 72.09

TOTAL THIS YEAR = \$6,148.46

Year = 725 miles

| | | |
|----------|---|----------|
| 01/03 | 2-sides January star map (JHU) SP | \$.14 |
| 01/04 | 2-typewriter ribbons (Ken & Ray, Inc.) STA | \$ 3.33 |
| 01/05 | SP 1-pk. post-it notes (Staples) (= \$0.00839/ea.) | \$ 8.39 |
| 01/06 | SP 20-sides Jan. starmap (JHU) | \$ 1.40 |
| 01/24 | STA White-Out (Staples) | \$ 1.00 |
| 01/26 | MEMBERSHIP IDA (1-yr.) (by telephone/credit card) | \$ 30.00 |
| 01/31/07 | SP 2-sides Feb. '07 starmap (Loyola) | \$ 0.16 |
| 02/24/07 | SP 12-sides Feb. star map (JHU) | \$ 0.84 |
| 02/28/07 | SP 23-sides SC handouts (JHU) | \$ 1.61 |
| 03/02/07 | POST Mars look invitation to Prof. Cotter | \$ 0.39 |
| 03/02/07 | SP 21-sides March star map (JHU) | \$ 1.47 |
| 03/09/07 | SP 12-sides March star map (JHU) | \$ 0.84 |
| 03/12/07 | SP 5-sides SC handout (JHU) | \$ 0.35 |
| 03/20/07 | SP 5-sides SC handouts (JHU) | \$ 0.35 |
| 03/30/07 | SP 38-sides SC handouts (JHU) | \$ 2.66 |
| 04/02/07 | SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 04/03/07 | SP 26-sides SC handouts (JHU) | \$ 1.82 |
| 04/12/07 | SP 38-sides SC handouts (JHU) | \$ 2.66 |
| 04/18/07 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 04/21/07 | SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 04/22/07 | SP 38-sides SC handouts (JHU) | \$ 2.66 |
| 04/22/07 | STA water bottle for Hpl. stint (Hotel) | \$ 1.50 |
| 04/23/07 | SP 1-pk (1,200 ea.) Post-its (Staples) | \$ 8.39 |
| 04/24/07 | SP 6-sides materials from Harborplace (JHU) | \$ 0.42 |
| 04/26/07 | POST mail mats. to Hpl. | \$ 0.37 |
| 04/30/07 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 05/04/07 | SP 12-sides SC handouts (May starmap) (JHU) | \$ 0.72 |
| 05/07/07 | SP 30-sides SC handouts (JHU) | \$ 2.10 |
| 05/10/07 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 05/12/07 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 05/14/07 | SP 30-sides SC handouts (JHU) | \$ 2.10 |
| 05/16/07 | STA 6-bungee straps (Dollar Store) | \$ 2.19 |
| 05/22/07 | SP 20-sides SC handouts (Staples) | \$ 1.26 |
| 05/26/07 | SP 43-sides SC handouts (JHU) | \$ 3.01 |
| 05/27/07 | SP 8-sides SC handouts (Airplane story) (JHU) | \$ 0.56 |
| 05/28/07 | STA bike brake cable (Mt. Washington) | \$ 1.40 |
| 05/30/07 | SP 1-pk (1,200) post-its (Staples) | \$ 8.39 |
| 05/31/07 | SP 28-sides SC handouts (JHU) | \$ 1.96 |
| 06/07/07 | SP 28-sides SC handouts (JHU) | \$ 1.96 |
| 06/11/07 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 06/11/07 | STA 3-side "HARBORPLACE Street Performer" name tags (JHU) | \$ 0.21 |
| 06/18/07 | SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 06/18/07 | POST mail Jupiter Facts to PLW for correction | \$ 0.41 |
| 06/19/06 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 06/21/07 | SP 30-sides SC handouts (JHU) | \$ 2.10 |
| 06/22/07 | SP 1-side Venus blurb (Loyola) | \$ 0.08 |
| 06/22/07 | SP Frankie in Hpl. | \$ 7.00 |
| 06/23/07 | SP 56-sides SC handouts (JHU) | \$ 3.92 |
| 06/29/07 | SP 6-sides Jupiter blurb sheets (JHU) | \$ 0.48 |
| 07/01/07 | SP 4-sides SC handouts (Kinkos) | \$ 0.34 |
| 07/01/07 | SP 29-sides SC handouts (JHU) | \$ 2.03 |
| 07/02/07 | SP 2-sides 7/07 starmap (LOYOLA) | \$ 0.16 |

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|--------|-----------------------|---------------|
| SP | = \$ 80.31 + \$ 75.45 | = \$ 155.76 ✓ |
| STA | = \$ 9.63 + \$ 8.11 | = \$ 17.74 ✓ |
| MEMBER | = \$ 30.00 + \$ 25.00 | = \$ 55.00 ✓ |
| POST | = \$ 1.17 + \$ 0.41 | = \$ 1.58 ✓ |
| BOOKS | = \$ --- + \$ 30.90 | = \$ 30.90 |
| STARS | = \$ --- + \$ 78.95 | = \$ 78.95 ✓ |
| | \$ 121.11 + \$ 218.82 | = \$ 339.93 |

PAGE TOTAL = \$121.11

725 miles x \$0.485 = \$351.63

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|---|---------------|
| 7/08/07 SP 25-sides SC handouts (JHU) | \$ 1.75 |
| 7/09/07 SP 23-sides SC handouts (JHU) | \$ 1.61 |
| 7/10/07 SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 7/11/07 SP 45-sides handouts for Chalkley talk + SC (JHU) | \$ 3.15 |
| 7/14/07 STA "invisible blue" pencil (Utrecht) | \$ 0.67 |
| 7/24/07 SP 19-side SC handouts (JHU) | \$ 1.33 |
| 7/27/07 SP 37-sides SC handouts (JHU) | \$ 2.59 |
| 8/2/07 SP 16-side SC handouts...8/07 star map (JHU) | \$ 1.12 |
| 8/03/07 SP 34-side SC handouts (JHU) | \$ 2.38 |
| 8/10/07 SP 1200 post-it notes for SC handouts (Staples) | \$ 8.39 |
| 8/10/07 STA Wite-out (Staples) | \$ 1.50 |
| 8/17/07 SP 15-sides SC handouts (JHU) | \$ 1.05 |
| 8/17/07 SP Frankie in Hpl | \$ 5.00 |
| 8/18/07 SP 11-sides SC handouts (Kinkos) | \$ 0.95 |
| 8/18/07 SP 41-sides SC handouts (JHU) | \$ 2.87 |
| 8/21/07 SP 2-side Sept. star map (Loyola) | \$ 0.16 |
| 8/28/07 SP 25-sides SC handouts (JHU) | \$ 1.75 |
| 8/31/07 SP 27-sides SC handouts (JHU) | \$ 1.89 |
| 9/01/07 SP 9-sides SC handouts (JHU) | \$ 0.63 |
| 9/02/07 SP 19-sides SC handouts (JHU) | \$ 1.33 |
| 9/15/07 SP 28-sides SC handouts (JHU) | \$ 1.96 |
| 9/17/07 SP 2-sides SC handouts (JHU) | \$ 0.14 |
| 9/23/07 SP 39-sides SC handouts (JHU) | \$ 2.73 |
| 9/26/07 SP 23-sides SC handouts (JHU) | \$ 1.61 |
| 9/28/07 STA battery for wrist watch (Greenmt. Loan & Jewelry) | \$2.50 |
| 10/09/07 SP 4-sides Oct. star map (JHU) | \$0.28 |
| 10/10/07 SP 16-sides SC handouts (Oct. star map) (JHU) | \$ 1.12 |
| 10/11/07 SUBS Physics Today + AUG membership (cr. card) | \$ 46.00 |
| 10/12/07 SP 5-side SC handouts...Venus blurb (JHU) | \$ 0.35 |
| 10/15/07 SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 10/17/07 SP 1200 post-it notes (Staples) | \$ 8.92 |
| 10/20/07 SP 15-sides SC maps (JHU) | \$ 1.05 |
| 10/21/07 SP 26-sides SC handouts (JHU) | \$ 1.82 |
| 10/21/07 SUBS renew Sky & Telescope | \$32.95 |
| 10/22/07 SP 37-sides SC handouts (JHU) | \$ 2.59 |
| 11/01/07 SP 13-sides SC handouts...Comet Holmes (JHU) | \$ 0.91 |
| 11/02/07 SP 16-sides SC handouts... (Ibid) (JHU) | \$1.12 |
| 11/02/07 STA 1-screw for eyepiece holder (Falkenham) | \$ 0.56 |
| 11/03/07 SP 21-sides SC handouts (JHU) | \$ 1.47 |
| 11/06/07 SP 3-sides Moon & Mars facts (Loyola) | \$ 0.24 |
| 11/28/07 SP 42-sides SC handouts (JHU) A recreation of those in my lost folder. | \$ 2.94 |
| 11/28/07 SP laminate moon photos (Kinkos) | \$ 2.09 |
| 11/30/07 SP SC handouts-17 (JHU) | \$ 1.19 |
| 12/05/07 BOOKS Observer's Handbook 2008 (S&T) Cr. Cd. | \$30.90 |
| 12/05/07 MEMBERSHIPS HAL, due 1/01/08 (ck.#993) | \$25.00 |
| 12/05/07 POSTAGE mail membership ck. | \$ 0.41 |
| 12/08/07 SP 25-sides SC handouts (JHU) | \$ 1.75 |
| 12/14/07 STA masking tape & scotch tape (Office Depot) | \$ 2.88 |
| 12/18/07 SP 4-sides Mars Facts (JHU) | \$ 0.28 |
| 12/20/07 SP 3-sides MARS FACTS handouts (JHU) | \$ 0.21 |
| STA = \$ 8.11 | |
| SUBS = \$ 78.95 | |
| BOOKS = \$ 30.90 | |
| MEMBER = \$ 25.00 | |
| POST = \$ 0.41 | |
| SP = \$ 75.45 | |
| PAGE = \$218.82 | PAGE \$218.82 |

2008

Not for Distribution

- 8 2101) 01/18/08 (FRI) HPL... Prom. E. of Amphi. (6:02-9:15PM). Fingerless glv. temp. Great sky, then shut down by clouds... timely, because I wanted to quit. Fairly busy scene, tho long stretches of no lookers. HH in very good head. lld. MOON (Tycho area, mostly @ 135X. Lookers awed!) MARS (10° E of Moon and at almost same dec., letting me simply swing back & forth. NEW APPROACH: I didn't attempt to get lookers to see any detail. Showed them Hubble photo, saying it's going to be tiny in my scope, but it will be round, orange and, plus there is a pretty star just to its upper right, so you'll see something not in the photo. Everybody seemed pretty pleased with their Mars look!). M42 (7:35PM... had just clear ship. For myself. Nebula not visible.) \$53.30 (\$16.55/hr.)
- 7 2102) 02/02/08 (SAT) HPL... Big Kahuna spot (5:50-8:30PM). Mild, sl. damp. Clear. While waiting for Saturn... SIRIUS (once). MARS (A few times.) M42 (Main obj. till Sat. Hi in SE and pretty good till interference from a light. Used photo to good advantage. Enjoyable!) SATURN (New season for it. Acq. 7:52PM just R of Hard Rock Cafe sign. Murky but lookers enjoyed. Titan vis. Gave out stickers, "facts". Might have acq. sl. sooner from J. Paula location.) VISITS: Mick, a travel agent from Australia; Donald, boss of Advance Printers, who does my cards, with wife and friends. Might have put \$1.00 in hat... after the \$1000's I've paid him!) Lots of no-pays. \$30.54 (\$11.44/hr.) Quit when Sat. went be-ship's mast. Still strollers around, and I could have waited it out, but had enough. M42 (Advertiaed it by inviting passersby to "Hav-A-LOOK at some pretty stars." Once Sat. rose, I was pretty energetic in recruiting. Acq'd 37-min. after 7:15PM rising time.)
- 02/03/08 (SUPERBOWL SUNDAY). Overcast. Even if clear prob. wouldn't have worked, as ref. to '06 and '05 suggested that without Moon or Saturn, it would have been a v. slow night
- 02/08/08 (FRI) HPL. DRY RUN. Semi-mild temp. and ok sky, but kind of bleak scene... plus I felt a little depressed. Sat on bench for a while but couldn't get myself to setup. Saturn wouldn't have been decent till +/- 8:15-30, and I just didn't want to wait that long for it. After 1/2-hr. went back to car and packed it in.
- 8 2103) 02/16/08 (SAT) HPL... J. Paul's (5:57-8:35PM). Mid-30's w/sl. cool breeze. Great sky. 10-d. MOON (Tycho region. Lookers awed. 135-65X. Jura mts. impressive.) M42 (Several times while awaiting Saturn.) MARS (High overhead, but did not scope, Gave out blurbs.) SATURN (Acq. 6:55PM Murky at start but great by 8:05PM. Lots of "It's not real!" reactions! 2-moons.) SPACE SHUTTLE/ISS (Bright flyover +/- 6:40PM. Recruited +/- dozen lookers.) VISITS (A family of Algerians.) PLW (#61. Gave out blurbs, stickers. Enjoyed herself!) SHOES (Reboks with hiking socks + orthotic. Comfortable, tho slightly cold feet) HH (Articulate, hi energy... despite having received on Fri. a Gleason score of 6 on my prostate biopsy. Felt physically good.) \$83.86 (\$31.89/hr.)
- 2 2104) 02/20/08 (WED) 3120 ST. PAUL ST... TOTAL LUNAR ECLIPSE (9:12-11:14PM). Cold (hi 20's), clear. Snow falling into early evening. Mixed rpts. on TV weather... Ch2 saying would not clear till midnight. PLW's #62. She gave out many Saturn stickers. Teamed with Alin Tolea, who was accompanied by his new friend, Jessica. Nice Roylance eclipse art. on front page this morning's Md. Sec. saying I would be in 3100 blk. St. Paul at 9PM... weather permitting, putting pressure on me to go out if there was any Moon visible. By 8:30PM sky was v. clear and we headed over. Got good parking spot and set up. A.T. arrived a few mins. later. He did the Moon with a small refractor while I did mostly Saturn. After a slow start, we had a constant flow of lookers looking thru both scopes. Most probably JHU students. Many were flabbergasted by Saturn (2-moons). Half-dozen there having seen F.R.'s art. on line. VISITS (Vaughn Vigil, Gerry Bell.) Vaughn and several others attempted photos thru scopes. I took some shots plus scope ones, some of the latter impressive. All and all, a cold but exciting evening. Fingers so stiff needed help taking apart scope! VISIT (A Linnea Anderson daughter, who said she'd definitely e-mail photos from last June's graduation party!) \$23.13 (\$11.39/hr.) LOADING UP (Front steps and walk were icy enough that we sanded them to prevent a spill.)

TOTAL THIS PAGE = \$190.83

TOTAL THIS YEAR = \$190.83

STREET CORNER TELESCOPE LOG -- 2008

- 7 2105)03/01/08(SAT)HPL...J PAULS'S(6:49-8:09PM). 34°F + cool breeze.CLOTHING(Prob. should have worn my "HABAND" coat. Wore fingerless mittens...ok, but try leather glvs. next time. Feet OK with big socks + orthotic + Reabocks.) SATURN(Looks delayed +/-15-min. due to clds. Sat. 10° up when sighted. Poor seeing, so used only 80X. Nevertheless, lots of thrilled lookers. Titan just below ring. Nice!) \$24.89 (\$18.71/hr.). CLOUDS (25% of stint blocked by clds, which finally drove me to quit...despite a pretty good crowd for a cold, breezy night.Actually, weatherwise it was a pretty nasty night for telescoping. However, I'm in great physical shape, was withstanding it tolerably well, and could have kept going, except for being discouraged by clouds.)
- 8 2106)03/02/08(SUN)HPL...IBID(6:23-8:11PM). 37°F, no breeze...very tolerable. SATURN(Sl. delay in acq. due to misalignment. Began w/18mm Or. Gives a great image but is susceptible to ambient lights. Switched to 15mm. Great image. Gaps evident. 2-moons.) BIZARRE SCENE(As I was setting up, there was a young man in a skin-tight, gold costume prancing around on the promenade, throwing bread crumbs to pigeons and posing for photos...mainly w/women. He was being cheered on by a few young men. Possibly he was a MICA student on assignment? Happily, he left just as I was ready to start!) SHUTDOWN(Started shutting down at 8PM, as scene was v. quiet, but then lookers arrived, incl. a group that contrib'd \$10.00!) \$54.15 (\$30.08/hr.)
- 7 2107)04/02/08(WED)HPL...AMPHITHEATER...1st time in years!(7:42-9:18PM). Accompanied by"the dynamic P. Weber...skill extraordinaire!"(#63). 1st stint in a mo., having spend 15 days visiting Kenny Heyn & family in Andorra, compounded by weather probs. ALIGNMENT (The 3° rotation worked perfectly in the Amphi. Acq. both Sirius & Sat. on 1st try. Cool wind at start which, happily, disappeared soon. SIRIUS(Briefly for alignment.) SATURN(Titan immed. below, + 2 other moons. Ring tilt still good. Mostly 135X.) VISITS(Nigerian, Germans, Brits...) \$42.05 (\$26.28/hr.)...despite a sparse scene. NEW PITCH TECHNIQUE(Thanks to PLW. I noticed she was asking passersby, "Would you like to look at Saturn?", whereas I was kind of demanding, "Have a look at the rings of Saturn!" I sensed that PLW's approach was definitely more effective than mine.)
- 2108)04/10/08(THU)HPL...W.LIP(7:45-8:15PM). Warm. Shut down by thickening clds. Too bad, as there were lots of strollers and I was getting pretty good interest. 4-d.MOON, (Lookers impressed even when hazy image!) SATURN(No luck trying to find it "by the numbers"). PARKING(For now we're to use the loading dock. Ugh!) \$14.00 (\$28.00/hr.)
- 7 2109)04/15/08(TUE)HPL...AMPHI(7:35-9:25PM). Mild, clear, but only moderate seeing. 9-d MOON(Mainly Tycho but also Jura Mts. 135X). SATURN(Acq. before sunset "by the numbers." 2-moons. Most lookers wowed...with Moon, too.) SCENE(Had heavy interest right from the start, with most people paying. A good number of families w/kids on spring break.) PARKING(Tonight, back in big dock.) VISIT(Marius, a JHU student and he woman friend. We recognized each other from the MSEL.) \$74.56 (\$40.52/hr.!)
- 8 2110)04/16/08(WED)HPL-AMPHI(7:30-9:52PM). Semi-mild. Great sky. 10-d. MOON(Tycho region, +northern terminator. Lots of "wows".) SATURN(V. sharp. Maybe 3 moons. Lost time because of poor alignment.) Lots of no-pays. Also, a long slow stretch. \$66.85 (\$28.24/)
- 7 2111)04/17/08(THU)HPL-W.LIP(7:31-10:25PM). Mild. Great sky. 11-d.MOON. SATURN(Time lost over alignment prob. Sometimes at 220X) Extremely busy...lots of families/kids. Tough stint! \$95.82 (\$33.04/hr.) TRIPOD(Tired of dealing with sticking leg. Will call Meade about buying a new leg.)
- 8 2112)04/18/08(FRI)HPL-W.LIP(7:58-11:16PM).Delayed start...hi thin haze.Mild. 12-d.MOON(A few times.) SATURN(Because image was so bright & pretty, used 80X for 1st 45-mins. No-body complained. Then 135X. 2-moons.) VISITS(Dancer Charlie & son, Mike.) HH(Intense stint. Lots of kids. Ran out of stickers. Need a break!) \$139.63 (\$42.31/hr.) SCIENCE CTR.(Had a woman looker who said my image of S. better than Science Ctr.'s.)

TOTAL THIS PAGE = \$511.95

TOTAL THIS YEAR = \$702.78

The Evening Sky Map

FREE! EACH MONTH FOR YOU TO EXPLORE, LEARN & ENJOY THE NIGHT SKY.

Sky Calendar - March 2008

- 3 Moon near Jupiter at 2h UT (morning sky).
- 3 Mercury at greatest elongation, 27° west from Sun (morning sky) at 1h UT. Mag. +0.1. Very low in the east-southeast about 30 minutes before sunrise.
- 5 Moon very near Mercury at 15h UT (morning sky).
- 5 Moon very near Venus at 20h UT (morning sky). Daytime occultation visible from North America and Cuba.
- 7 New Moon at 17:14 UT. Start of lunation 1054.
- 10 Moon at perigee (closest to Earth) at 22h UT (366,298 km; 32.6°).
- 12 Moon near the Pleiades at 18h UT (evening sky).
- 14 First Quarter Moon at 10:46 UT.
- 15 Moon near Mars at 3h UT (evening sky). Mag. +0.5.
- 16 Moon near Pollux at 13h UT (evening sky).
- 17 Moon near Beehive cluster (M44) at 15h UT (evening sky).
- 19 Moon near Regulus at 7h UT (evening sky).
- 19 Moon near Saturn at 13h UT (evening sky). Mag. +0.3.
- 21 Spring or vernal equinox at 5:48 UT. The time when the Sun reaches the point along the ecliptic where it crosses into the northern celestial hemisphere marking the start of spring in the Northern Hemisphere, and autumn in the Southern Hemisphere.
- 21 Full Moon at 18:40 UT. The full Moon of March is called the Sap Moon, Crow Moon or Lenten Moon.
- 23 Moon near Spica at 14h UT (evening sky).
- 24 Mercury 0.97° from Venus at 14h UT (20° from Sun, morning sky). Mags. -0.3 and -3.9. Favors S. Hemisphere skywatchers.
- 26 Moon at apogee (farthest from Earth) at 20h UT (distance 405,092 km; angular size 29.5').
- 27 Moon near Antares at 10h UT (morning sky).
- 29 Last Quarter Moon at 21:47 UT.
- 30 Moon near Jupiter at 19h UT (morning sky).

All times in Universal Time (UT). (USA Eastern Standard Time = UT - 5 hours.)

Save On Recommended Products

- STAR ATLASSES & PLANSPIERES
 - BOOKS FOR SKYWATCHERS
 - STAR CHARTS & ASTRO POSTERS
 - 2008 ASTRONOMY CALENDARS
- <http://skymaps.com/store>
- All sales support the production and free distribution of The Evening Sky Map.

Star Magnitudes

- 1
- 0
- 1
- 2
- 3
- 4



NORTHERN HEMISPHERE MARCH 2008

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS

EARLY MAR 9 PM
LATE MAR 8 PM

NOTE: 1 Hour for daylight savings
SECRET BEHIND FOR A LATITUDE OF 60°
NORTH AND 15° SOUTH
SUITABLE FOR LATITUDES UP TO 15° NORTH OR SOUTH OF THIS

- 7 2113)04/23/08(WED)HPL-AMPHI(7:47-10:17PM). Mild. Sl hazy sky. SATURN(Wasted 16-mins. finding it. Sharp image, 1-moon. Mostly 135X.) TRIPOD(Seems problem leg is a bit oval. Rotated to a certain point, it becomes manageable, tho still no fun. Put tape with spot at bottom of leg to indicate proper point.) VISIT(Roy Santana, an Airforce photographer w/a big camera. Said in Iraq he carries a camera and a gun. Said Iraq a lose-lose situation. Took nice photo of me and also some of Saturn thru scope. Said would e-mail them.) \$54.25 (\$21.70/hr.)
- 8 2114)04/24/08(THU)HPL-W.LIP(7:57-10:12PM). Warm; Sl hazy sky. SATURN(5-mins. to acq. 2-moons. lots of doubters. Am thinking I should try to get Mayor Dixon to give me a certificate attesting to the truth of what people see in my scope. May actually try! VISIT(Roy Santana. Was too busy to talk much, but he helped me by taking \$ out of hat for me!) HH(Really dragging late afternoon, but in peak shape for stint!) \$93.22 (\$37.29/hr.)
- 7 2115)05/01/08(THU)HPL-W.LIP(8:07-10:27PM). Cool wind. Ok sky between occassional clouds, which slightly delayed first look. SATURN(Nice at both 80X and 135X. Titan on left. Lots of amazement!) VISIT(Jeffrey Spindel & wife Nicki from NYC, here to purchase a pair of guinea pigs. Both very enthusiastic about my telescope. Tipped \$10 even before clouds cleared! Returned a little after 10PM and got good looks. Took photos and promised to email some.) STRESSFUL NIGHT(Undecided as to whether to go for +/- 1hr, then decided if I stayed home and it cleared up I'd be PO'd at myself. Real iffy sky as I setup, which eventually cleared for the most part. Around 9:30PM lots of clouds and began packing up, but lots of people kept arriving and then the clouds moved away. HH feeling a bit depressed and not in top form.) \$71.72 (\$30.78/hr.)
- 8 2116)05/02/08(FRI)HPL-W.LIP(8:09-10:37PM). Warm. Hazy, w/intermittent clouds. SATURN(1st try. 1-moon. 80X when in thin clds.) SMOOTH TEAZE(In 8PM slot. VERY loud at first. Gave me a copy of their new CD for my help in getting them signed on as Hpl performers.) Toward end lots of no-pays, causing me to pack-up. \$78.12 (\$31.63/hr.) CHINESE WOMAN (Was very excited by her look at Sat. lastnight, and returned tonight. Is a very close observer, because tonight she exclaimed, "The moon has moved!", which gratified me alot. LADY W?NO FEET IN WHEELCHAIR(She wanted badly to see Saturn. After a few mins. of maneuvering her, I got her to see it, after which she contrib'd \$5.00!)
- 7 2117)05/04/08(SUN)HPL-W.LIP(8:02-9:58PM). Pleasant. Great sky! SATURN(Mostly at 165X. 3-moons at 80X. Lots of doubters.) Surprisingly slow scene. Few families. Too bad, as I was rested and in top form! TRIPOD(Because of chronic, sticking leg problem, have purchased a replacement tripod via Alin thru ASTROMART for \$60.00. However, have now finally(!) overcome problem and am sorry am getting replacement!) \$43.52 (\$22.43/hr.)
- 8 2118)05/05/08(MON)HPL-AMPHI(8:04-10:15PM). Sweater weather; sl. hazy. SATURN(Again, alignment prob. Is very wearing. Just checked and found polar angle way off! 2-moons. Lots of doubters. Mainly 135X.) MARS(Once. V. tiny.) \$41.44 (\$19.01/hr.) Busier scene than L.N.
- 7 2119)05/06/08(TUE)HPL-W.LIP(8:25-10:41PM). Pleasant. Sky 3.75/5. INDECISION(Drizzling slightl as I loaded car. Attended start of WIA mtg., then started out for HPL. Felt worn down from today's biking ride plus inadequate rest. Turned car around 3or 4 times before deciding would be clear and that I'd feel bad staying home, so decided to go. Once in action felt none the worse for wear during fairly busy stint!) SATURN(1st try. Sl. mushy. Looker saw 3 moons at 80X.) \$45.52 (\$20.14/hr.) Going dancing tomorrow night!
- 8 2120)05/10/08(SAT)HPL-W.LIP(8:02-11:07PM). Sweater; Seeing 3/5. 5-d.MOON(Great! Many lookers awestruck!) SATURN(Sl. mushy, tho many lookers doubtful. Collimated, thinking it would help, but it didn't. 1-moon.) LOOKERS(Pretty steady stream most of stint. Took in six \$5's and a \$10!) HH(Sl. depressed but carried on ok.) Lots of families.\$127.78 (\$41.35/)
- 8 2121)05/13/08(TUE)HPL-W.LIP(8:24-10:37PM). Mild. Sky 4.5/5. PARKING SNAFU!(Told to use Calvert St. garage entrance. Drove around blk. and stupidly drove into PAID PARKING garage. Cost me \$10 when I left!) 8-d.MOON(Great...not yet Copernicus.) SATURN(1-moon.) VISIT(Guy who does demos for Sc. Ctr. in schools. 'R. Pembroke.) \$89.77 (\$40.44/hr.)

TOTAL THIS PAGE = \$ 645.34

TOTAL THIS YEAR = \$1,348.12

- 8 2122)5/22/08(THU)HPL-W.LIP(8:31-10:25PM). Delayed for 9-d. by nasty weather! Cool(wore winter jacket.) Seeing 4.5/5. Quiet scene but steady interest. Almost everybody paid! Accompanied by "volunteer assistant" Phyllis Weber (Time #64.) ISS(Brilliant flyover 9:30-9:35PM. +/-dozen enthusiastic watchers.) SATURN(Great! 2-moons.) VISIT(Rev. Kendall.). Very few families. HH(In good head...great being back!) \$69.80 (\$36.47/hr.) VISIT(Barry. Told PLW his father died 6-mos ago, that his mother sold everything, moved into an apt., leaving B. w/no place to go. PLW said he had the odor of a street p
- 8 2123)5/24/08(SAT)HPL-BICEN(8:27-9:58PM). Nice start, then shut down by "suckerhole" type clds. ISS(20:40-20:44...disappeared behind WTC. We gathered a good crowd, which I photoed.) My valued assist, PLW's #65th stint.) SATURN(4.5/5. 1-moon. Lots of excited lookers, as well as doubters. Lots waiting for clds. to part who were disappointed.) \$54.48 (\$35.84/5/25/08(SUN...MEM. DAY WEEK-END)721 E. 36TH ST.(8:30-9:15PM) Eve & family in town. Blue sky day, then late afternoon haze. Eve wanted to come to Hpl. on way to NYC, but I couldn't decide whether to go or not...1) because I was worried about where they'd park and 2)because I was afraid the would'nt see anything. Waffled for an hour, and decided not to go. At ss haze thinned (as I suspected it would!). Since Eve & fam. were going to stop here for Aren's present, decided to setup in front of house. SATURN(2 moons. Lots of neighborhood kids lookers + Eve and family. Gave out lots of stuff.) No hat.
- 8 2124)5/28/08(WED)HPL-W.LIP(8:20-11:08PM). Cool; clear. Sometimes sl. mushy seeing. Lots of no-pays at start were compensated for later on. SATURN(Mainly 135X. 2-moons. Lots of doubters.) VISIT(Many lookers attendees of Bentley Computer conf. Jen, wife of on, hung out a long time taking photos while waiting for husband, Colin, to leave conf. She said she'd e-mail some.) HH(Felt draggie leaving hse. but great during stint.) ALIGNMENT(3-tries to get it. Was able to easily find i CNC.) \$107.92 (\$38.54/hr.) YANKEES VS. ORILES(Following game had some New York lookers.)
- 8 2125)5/29/08(THU)HPL-W.LIP(8:33-10:58PM). Mild. Sl mushy seeing. HH(Sl. depressed...having to force my patter. Is 2 stints in a row too much like work?) SATURN(1-moon + backgrd. star. Most lookers impressed. One looker determined to photo it w/his digital. Was pleased enough by 2 blurry images to contrib. \$15.00!) VISIT(Rowan Wormsdorffer, who worked at AFSC in the 60's.) \$90.96 (\$37.59/hr.) Fireworks toward FPT +/-9:00PM.
- 8 2126)5/31/08(SAT)HPL-BICEN(8:34-10:42PM). Warm, humid(some dew!). SATURN(Ok at start, then a long, aggravating "sucker hole" situation. I stuck it out, figuring from experience sky would eventually improve. It did, till a big cloud came, and I packed it up. Too bad, as there were people waiting to look.) Busy scene. Lots of families/little kids. HH(In good form. Despite my prostate c. worry and sometimes aches I wonder if caused by it, w/telescope I always feel in tiptop physical shape. Same on bike, Maybe the hip and left chest aches I feel elsewhere are imaginary!) VISIT(Man who was in one of my JHU-SSIP classes and who is now an administrator.) \$77.92 (\$36.58/hr.) PARKING (Calv. St. entrance working out well, as guards open/close door expeditiously.) VISIT(Photographer Smitty, who have known since FPT days, who's taken many pix of me. Was using a walker. I asked his wife what's wrong. Shesaid "he's 91 yrs. old," which surprised me. W/effort, he snapped a pix of his wife and me.) Boston Red Sox in town.
- 8 2127)6/02/08(MON)HPL-W.LIP(8:34-10:42PM). Warm. 4.5/5, then hi haze. SETTING-UP(More inter-in looking as setting up than I ever remember! However, many left while waiting for me to find Saturn.) SATURN(Great view for a while, then dimmed by hi haze. Used 80X alot. Seems to make no difference in terms of looker amazement!) HH(Tiring of th~~e~~ routine. I wish I'd find some else using my expertise and which pays!) PARKING(Lots of big trucks blocking Calv. St. entrance. Used South St.) Red Sox lookers! \$65.38(\$30.70/)
- 10 6/05/08(THU)DRY RUN TO FELLS PT. HPL loading dock too jammed w/big trucks. Decided not to use paid pking, as sky was too iffy to guarantee money to leave. Drove to FPT. 2-d.MOON coming and going in clds. After 45-min. decided not to set up, even tho had an ideal parking spot. Also, kind of slo scene compared to HPL. Choc. Sunday! Home.

TOTAL THIS PAGE = \$ 466.46

TOTAL THIS YEAR = \$1,814.58

STREET CORNER TELESCOPE LOG -- 2008

- 8 2128) 6/06/08 (FRI) HPL-W.LIP (8:41-10:57PM). Warm, hazy. PARKING (Dock again jammed w/trucks, however I was helped in getting parked by the security police head, who is always friendly toward me. Trucks there to load furniture bought at auction from an accounting firm closing its office.) 3-d. MOON (Nice!) SATURN (Due to haze, I never saw it w/ my eyes, however was ok in scope. As haze thickened, dropped to 80X.) HH (In v.g. head. Not enough supper and began to feel weak and like I might pass out! Packed up, even though potential lookers present.) Lots of no-pays! \$68.34 (\$30.11/hr.) ISS (Missed a good flyover because distracted by lookers. In future must stick a note on tripod!)
- 8 6/07/08 (SAT) HPL. Driving down saw a big bank of clouds in SW. Nevertheless, parked and pushed scope to Bicen, but didn't set up. Cloud cover steadily increased. Then a wind developed, there was lightening in the distance, rain droplets began falling, so I quickly pushed scope back to dock and called it an evening... another DRY RUN! Too bad, because there would have been a nice Moon, + an ISS-Shuttle flyby!
- 8 2129) 6/08/08 (SUN) HPL-W.LIP (8:30-10:35PM)...felt more like 3-hrs. than 2!) Good sky, 4/5. Hot & sticky. MISS WICKER (This afternoon rec. call from stepdaughter saying she passed away June 5th. PLW and I visited her last Xmastime, and now am sorry I didn't contact her since then. Mem. serv. July 8.) PARKING (Dock doors not opening due to electric failure. Told to park Light St. dock...tight squeeze for space!) SYZYGY (Moon, Sat., a Leo in a tight triangle, making it easy to swing Sat.-Moon.) 5-d. MOON (Great!) SATURN (mostly 165X.) HH (Good head.) ISS/SHUTTLE (Bright flyby 9:31PM. Gathered a good number of observers.) \$70.09 (\$33.70/hr.)
- 8 2130) 6/09/08 (MON) HPL-W.LIP (8:15-10:37PM). Uncomfortably humid. Good sky. ALIGNMENT (Lost at least 10-mins. acq'ing. Saturn.) 6-d. MOON (Lots of craters bottom half. Lookers impressed.) SATURN (135-165X. 1-moon.) VISITS (Lookers from Sleep Convention.) \$63.43 (\$26.76/)
- 8 2131) 6/11/08 (WED) HPL-W.LIP (8:10-11:33PM). Mild (humidity gone!). Sky again clear enough to start on Moon 23-mins. before sunset. 6-d. MOON (Great, but not yet Tycho, Copernicus.) SATURN (Right down to roof of Verizon Bldg. 1-moon.) JUPITER! (BIG SURPRISE! Acq. 11:15 PM. Just as I was telling some lookers we'd see it in July, I spotted it rising thru the ropes over the bow of the Constellation. Bright, 4-moons.) PARKING (+/- 9:15PM a guard appeared, telling me I had to move car as was blocking a truck. I persuaded her to stay w/scope and raced to dock, only to find that truck had parked ok. Whew!) HH (In good head. Kept telling myself this is what I do best in life.) \$125.46 (\$37.12/) JUPITER-SAT. (Just as I'm loosing latter, former appears. Perfect timing!) STICKERS (Today discovered York Rd. Staples no longer carrying 2"x3" Post-its on which, for 20 yrs., have been using for "I Saw...! handouts! Need alternative source or method.)
- 8 2132) 6/12/08 (THU) HPL-W.LIP (8:17-10:34PM). Warm & sl. sticky again. Good sky. SLEEP (Big trouble falling asleep last night and wasn't able to fully recuperate today. Drove down feeling a bit bummed out, however was ok at scope.) 7-MOON (Tycho region + sunrise on Eratosthenes.) SATURN (1-moon.) SCENE (Early on have lots of gruff innercity young men, most of whom doubted moon thru scope was real. No fun!) \$86.90 (\$37.95/hr.)
- 8 2133) 6/13/08 (FRI) HPL-W.LIP (8:14-11:15PM). Comfortable, sl. hazy. 8-d. MOON (Tycho. Copernicus in full sunlight. Jura Mts.) SATURN (Titan barely vis.) Busy stint, w/lots and lots of no-pays. VISIT (Neighbor Janet. Wanted me to watch 3 shopping bags. We put 2 in the scope box, while she kept one. Gave her ride home.) STICKERS (Supply low. Gave only to children. Today ordered 7-pks. from Staples by phone = \$59.21. BIG MISTAKE. Realized tonight I'm comfortable giving only to children and so need alot less than 7-pks!) HH (There must be an easier way I can make a buck!) \$77.27 (\$25.59/hr.) (Wk. = \$423.15)
- 8 2134) 6/21/08 (SAT) HPL-BICEN (8:58-10:53PM). Adverse weather rpt but ok, tho hazy sky. ACCOMPANIED BY COCKY HOEK AND PLW (#66). Lots of no-pays at start. SATURN (Good image but Titan marginal due to haze.) ARCTURUS (A few times after loosing Sat.) \$65.52 (\$34.30/hr.)

TOTAL THIS PAGE = \$ 557.01

TOTAL THIS YEAR = \$2,371.59



STREET CORNER TELESCOPE LOG -- 2008

- 8 2135) 6/24/08 (TUE) HPL-W.LIP (8:45-10:48PM). Comfortable. Great sky. Accompanied by PLW (#67) and Cocky Hoek (#2). ARCTURUS (To ck. alignment after some tripod moves. Perfect!) SATURN (Early on as good as it gets. 220X briefly, then 165X, 135X. Took right down to Verizon Bldg.. 1-moon.) JUPITER (Just before losing Sat. 1+3+stripes. Fine!) Very busy stint, w/constant stream of lookers. \$62.06 (\$30.27/hr.)
- 8 2136) 6/26/08 (THU) HPL-W.LIP (9:45-10:40PM). Late start due to having supper w/Cocky, PLW, and LH at the Indian restaurant in the Ambassador...not worth the \$\$! Hazy and very humid. SATURN (Trouble eyeballing it thru haze. 135X, then 80X, till it was hazed out.) JUPITER (Spotted 10:15PM, acq. 10:25PM. 1+3. Stripes. Held till clouded out.) PLW (#68). \$19.21
- 8 *2137) 7/02/08 (WED) HPL-W.LIP (9:00-11:24PM). Warm but comfortable. Sky 4/5. a BCC (To check alignment after unable to find Sat. Was perfect.) SATURN (Big trouble finding, the 2° too high. Fair image, no moon.) JUPITER (Great! 1+3, stripes.) BATTERY (Died 1/2-hr. into stint...I hope from being uncharged!) Used Jupiter stickers. \$74.14 (\$30.89/hr.)
- 30 ((7/02/08 Drove to Chesapeake Interlink in Owings Mills to dl. artwork for flier for my Sat. night, Burt Banks party gig. Received my \$100.00 retainer fee.))
- *Regulus & Mars about 0.79° apart...a nice sight for lookers thru finder scope!
- 32 2138) 7/05/08 (SAT) BURT BANK'S 85th BIRTHDAY PARTY, CAVES VALLEY GOLF CLUB (6:45-11PM). Cloudy, w/rain threatening. Spotted tree w/a light on its base, tacked on Saturn photo, and placed scope +/-200' away, on edge of party. Left legs collapsed, put on dew cap, used 50X. I touted image as real. Half of lookers believed. Gave out "Come Outside & HAV-A-LOOK!" fliers printed by Randy Chase on my direction. Maybe 1/4 of attendees looked thru scope. I wanted to announce my presence, but couldn't get myself to do it. I was there per Randy Chase (410-363-1976), an employee of Burt Banks at Chesapeake Interlink. CVGC is an extremely posh place, w/a great no. of walthelp per guest. I had some hors d'Oeuvres and 2 drinks. Acquaintances at party: Ann & Sammy Kahan, Jack Baylin, Buddy Kaufman, HH (Given the clouds problem, the strategizing req. to set up at such a place, the lack of interest of party-goers, I am hesitant to take any more party stints!) \$200.00
- 8 2139) 7/07/08 (MON) HPL-W.LIP (8:40-10:23PM). Warm. Good sky. 4-d MOON (Took the lead from a derelict and began saying, "We can still see craters because the Moon has no weather." I've been saying it has no atmosphere.) SATURN (Briefly. Ok image.) JUPITER (3+0. "Stripes prominent.) VISIT (Mike, a young man who's doing computer work at Bloomberg on an all-sky survey. Vince Spena, of Harrah's Hotel in Atlantic City, who invited me to stay at the hotel for free anytime.) \$49.00 (\$28.65/hr.) Felt good to be back in HPL!
- 8 2140) 7/08/08 (TUE) HPL-W.LIP (8:47-11:00PM). Warm, sl. sticky. Adverse forecast but good sky. Day of Miss Wicker's memorial service at Charlestown. I spoke Garrison JH connection and how we reconnected thru my telescope. She was a remarkable person! Accompanied tonight by Dominick, 12-yrs. old across the street neighbor. 5d.-MOON (Great!). SATURN (No Titan.) JUPITER (2+1. Stripes.) Challenging night. Lots of no-pays. \$53.20 (\$23.96/hr.) There's got to be easier ways to make \$53.20!
- 8 2141) 7/10/08 (THU) HPL-W.LIP (8:22-11PM). Nice night. Great sky. 7-d.MOON (Very nice!). SATURN (Lost time searching for it. Used mag. compass to align, hoping it would be helpful, but it wasn't. Trouble finding Sat. "by the numbers" continues! Lost 9:38PM.) JUPITER (2+1. Stripes prominent.) HH (Depressed...prob. because am getting tired of being at the mercy of no-pays, especially the ones I really work hard for!) \$64.99 (\$24.68/hr.) SATURN & MARS (Nice, close paring in finderscope. Showed to some lookers.)
- 8 2142) 7/11/08 (FRI) HPL-W.LIP (8:28-11:44PM). Warm but comfortable. Sl. hazy. Juggler Brian Rudo's PA system uncomfortably loud and hard to talk over! 8-d.MOON (Tycho region @ 135X. S.R. on Copernicus just beginning.) JUPITER (2+2. Nice.) HH (I relaxed about no-pays and felt alot better!) a Sco & B Sco (For a cpl. who stuck around a long time.) \$76.40 (\$23.65/hr.)

PAGE TOTAL = \$ 599.00

YEAR TOTAL = \$2,970.59

STREET CORNER TELESCOPE LOG -- 2008

- 2143) 7/12/08 (SAT) HPL-BICEN (8:39-11:15PM). Warm. Hazy sky. 9-d. MOON (Tycho region good. Used 80X and 135X. Undecided on which lookers liked best.) JUPITER (Acq. delayed by haze. 0+4. Bands prominent.) INDIANS (Mid-eve. cruise ship w/hundreds of Indians docked nearby. An aroma of Indian cuisine wafted from it. As the passengers debarked, dozens of them decended on my telescope. I enjoyed working with them, as most seemed genuinely interested. The kids were great, and most paid a dollar to look. Gave out lots of literature. HH (5th stint this wk. Tired, but forcing myself to perform. Mercifully, shut down by cloude, otherwise might have gone on another 45-mins!) \$88.97 (\$34.22/hr). No \$5 bills!
- 2144) 7/14/08 (MON) HPL-W.LIP (8:20-11:13PM). Warm. Good sky. HH (Somewhat depressed and having to force myself to perform adequately. Prob. is I'm not sleeping well and feeling tired.) 11-d. MOON (Tycho region, then N. edge. Lookers liked.) SATURN (Acq. by hopping off of a Leo. Acq. 8:55PM) JUPITER (2+2. Sl. unsteady, but lookers liked.) \$65.30 (\$22.62/hr.) MEETING (Informed early eve. of meeting of comet, asteroid, and meteor astronomers at the Raddison Hotel. Was unaware than any visited scope.)
- 2145) 7/15/08 (TUE) HPL-W.LIP (8:20-11:20PM). Great sky. Comfortably warm. 12-d. MOON (Tycho region, edge craters. 80X) JUPITER (3, then 4, then 3. Lookers liked!). COMET CARDS (Took some and put up little sign advertising them thinking attendees of the Asteriods, Comets, Meteors Conference would buy some. Sold 2, but to regular lookers.) HH (Having gotten sufficient rest, I was in good shape...though feeling the demand of the work.) VISITS (Alin & Jessica. Alin's grant has run out and he's out of a job! Iranian artist ??, who invited me to put my cards in her gallery.) Lots of small kids! \$94.18 (\$31.39/)
- 2146) 7/16/08 (WED) HPL-W.LIP (8:25-11:04PM). Great sky. Sl. sticky. 13-d. MOON (A few hours till full. Absolutely magnificent w/40mm K. + moon filter. Finally, I've solved the challenge of the full Moon!) SATURN (1X, thanks to perfect alignment...for a chg.!) JUPITER (2+2... classic!) HH (In top form, but feeling overwhelmed by press of business, the steady output of energy req.'d. Despite the uniqueness of the job, I may be somewhat bored with it. It's different people every night, but the routine...the patter...stays the same. How do Broadway actors w/long running shows do it night after night?) COMET CARDS (Sold 4!...to regular, working class types.) \$77.43 (\$29.25/hr.) Another thing that's getting to me about this job is the lifting & hauling. The equip. is getting heavier & heavier!
- 2147) 7/17/08 (THU) HPL-W.LIP (8:47-11:10PM). Late start due to haze and sl. late moonrise. Eventually great sky. Hot & sticky. 14d. MOON (Very full. Rose beautiful crimson. 50X + filter.) JUPITER (2+2. "Stripes" good. Many lookers ask if can see Red Spot. Not yet this season.) ASTRO MEETING (Finally had lookers from it, because they'd attended ball game. Had some friendly conversations.) HH (Top shape...articulate, energetic.) PARKING (Just as was packing up a cop arrived saying had to move car because was blocking someone. Rushed to get back to car, only to find nobody being blocked. Is 2nd time this has happened!) COMET CDS. (Sold 5, gave away 1 for \$10 contrib.) \$66.84 (\$27.97/hr.) SATURN (Have let it go. Set-up tonight strictly for Moon and Jupiter. Will see Saturn again from Hpl. in January 809.)
- 2148) 7/18/08 (FRI) HPL-W.LIP (8:45-11:35PM). Great sky. Warm. V. busy scene! PLW's #69. JUPITER (Moons "classic" 2+2. Good "stripes". Favored it over Moon.) 15-d. MOON (Nice @ 50X. + filter. Some edge craters.) ISS (5 1/2-min., bright flyover beginning 9:48PM. Good crowd of watchers at scope, including a family from NY which waited around 1/2-hr. for it. PLW got juggler Brian Rudo to announce ISS to his Amphitheatre audience, who saw it well. Got photo ISS over WTC.) HANDOUTS (Neglected to make xeroxes and ran out of Jupiter Facts, star maps. early.) VISITS (A Liberty H.S. grad, now at Umd, who said his HS teacher was a fan of mine and encouraged him to write a paper about me. Teacher had saved articles on me, and he wrote paper based on them. I gave him a comet od. on which I wrote a personal greeting which he said he'd show to his old teacher. Three young boys from Melville who asked, "Don't you fix bikes?" Said they were there looking for girls.) PLW noticed there were very few no-pays tonight! \$114.45 (\$40.40/hr.) COMET CDS. (2).

TOTAL THIS PAGE = \$ 507.17

TOTAL THIS YEAR = \$3,477.76

STREET CORNER TELESCOPE LOG -- 2008

- 08/11/08 DRY RUN TO HPL WITH PLW. Would have been first stint since leaving on 07/19 for an 18-d. Holland America cruise of the N. Atlantic region. Cruise left from Rotterdam and ended in Boston. We spent a day w/Frank & Thomas in A'dam before boarding ship. We had a nice time.
- 2149) 08/12/08 (TUE) HPL-W.LIP (8-10:57PM). A few clds early, then great sky. PLW's #70! 12-d. MOON (V. good @ 50X w/filter.) JUPITER (All 4 moons close on left. Good "stripes". Lots of interest but not many "oohs and ahs".) VISITS (A woman cousing of Rick Stein. Richard Pembroke.) Busy scene. Lots of no-pays early on. \$68.44 (\$23.20/hr.)
- 2150) 08/16/08 (SAT) HPL-BICEN (8:10-11:27PM). PLW's #71. Great sky. Comfortable temp. HAT SNATCH! (It finally happened! +/-10:45PM I looked down to see two hand pulling at our contributions hat. They ripped it off the tripod and ran away with it, spilling bills, coins, and the scope wrench along the way. PLW took off after them, but they speeded up when they saw her. Fortunately, she couldn't catch-up w/them! Happily there was very little \$\$ in the hat, and we probably retrieved more than half of it. After catching our breath, we placed the hat on the footlocker and continued business as usual, neither of us being too unnerved. Later, as we left Hpl. we noticed an unusually large crowd of rough looking inner-city youths lounging in the Amphitheater and 1/2-dozen police nearby. We reported our experience to one of them, who replied that they've had +/-40 "incidents" tonight. Next morning I was able to repair hat for continued use.) FULL MOON RISING (Was exactly full at 5:16PM. No edge craters till +/-10:45PM. 50X Lookers impressed!) JUPITER (1+3, then 0+3. Good stripes. Nice! VISIT (Moroccan lookers.) \$93/86 (\$28.88/hr.) SNATCH (Due to its isolation, am contemplating no longer using Bicen. May mean no more Sat. nights till end of summer Amphitheater concerts.) Lots of families w/good kids! THOUGHTS: Maybe I'm the Michael Phelps of street telescoping. Phelps seems to have been born with all the attributes necessary for his swimming prowess. I seem to have been born with the perfect attributes for street telescoping--stamina, physical strength, and agility, show biz psychology, love of activity, etc.! MONEY: It is very gratifying to entertain and educate the public with my astro knowledge and telescope, but it is a hard and stupid way to try to earn a living!
- 2151) 08/17/08 (SUN) HPL-W.LIP (8:03-10:42PM). Sl. haze then great sky. MUSIC (Loud swing band at Amphitheater but not wanting to brave Bicen, set-up anyway. Suffed kleenex in ears. Happily, it stopped around 8:45PM.) JUPITER (1st try. 1+3. Lookers awed!). VISITS (Frankie and Barry. 1st time for both in a long time.) Thanks to many families with small kids, it was a VERY challenging stint, requiring an all-out effort! \$96.76 (\$36.51/hr.) 17d. MOON (1X.) PLW back in St. Louis. Could have really used her tonight! REPAIRED HAT (Worked fine. Discovered rings for hanging sign missing...only casualty of last night!)
- 08/18/08 (MON) HPL. DRY RUN. Arrived to find a large bank of clds. in the south which was about to swallow Jupiter.
- 2152) 08/19/08 (TUE) HPL-W.LIP (7:56-9:17PM). Semi-busy scene. Steady succession of lookers. Good amt. clds. at start, which I figured would dissolve at ss. However, they increased, forcing me into a "sucker hole" situation. Finally tired of it and packed-up. JUPITER (3+1+2 backgrounders.) VISITS (Venezuelan woman, who I asked how she's doing with Chavez. She gave a slight moan!) \$23.40 (\$17.30/hr.) SOLD 2 COMET CDS.
- 2153) 08/20/08 (WED) HPL-W.LIP (7:31-10:37PM). Great sky. Pleasant temp. VENUS-MERCURY CONJ. (Set up early to try to see it. Caught V just as setting behind bldg. but never saw Merc.) JUPITER (1+3+3 stars. Fabulous!) B Cyg (1X). HH (In good shape.) \$71.75 (\$23.15/)
- 2154) 08/21/08 (THU) HPL-W.LIP (7:46-10:10PM). Fantastic sky! Ibid temp. SCOPE (Holding collimation v.well for weeks!) ALIGNMENT (Perfect when corner-to-corner on eqs.) JUPITER (3+1+3 stars. Best have ever seen it! 135X) HH (v.g. head!) \$68.21 (\$23.93/hr.)

TOTAL THIS PAGE = \$ 422.42

TOTAL THIS YEAR = \$3,900.18

Extra excitement tonight!

STREET CORNER TELESCOPE LOG -- 2008

- 2155) 08/22/08(FRI)HPL-W.LIP(8:07-11:40PM). Good sky, comfortable temp. IN ALL MY 21 YRS., THIS WAS MY TOUGHEST STINT! JUGGLER BRIAN RUDO PERFORMING WITH AWFUL VOICE AND HIS PA SYSTEM SO LOUD IT WAS MAKING ME DIZZY. THEN THERE WAS A STEADY, STRONG WIND BLOWING MY PAPERS AROUND AND SHAKING THE SCOPE SO MUCH I REMOVED THE DEW CAP FOR A WHILE. FINALLY, I WAS EXTREMELY BUSY, WITH LOTS OF FAMILIES W/SMALL KIDS. MID EVENING I STARTED TELLING MYSELF I BE A MASCOHIST TO SURVIVE THIS JOB! TOWARD END THE BALL GAME LET OUT AND I HAD A PARTICULARLY HEAVY INFLUX OF FAMILIES WITH SMALL KIDS WEARING YANKEES OUTFITS...ALOT OF THEM W/BASEBALL GLOVES. THEY WERE ALL CUTE AND BRIGHT, BUT CHALLENGING! JUPITER(2+2, 2+0, 3+0 + star. Nice, but not quite like last night!) \$138.30 (\$38.99/)
- 2156) 08/24/08(SUN)HPL-W.LIP(7:45-10:34PM.) Good sky, 1bid temp.. RESPITE(After strain of previous night decided needed a break. Also, seeing what happened last Sat., was not anxious to return to Bicen just yet. Yesterday I realized just how beat up my body felt and how much I needed a rest. after so many intense stints! As it turned out, might not have gone anyway, due to early eve. clde.) JUPITER(2+2. GRS transit 9:30PM. Looked white and hard to see...nothing to invite lockers to see. Maybe should be renamed Gr. White Spot!) CONTRIBS(A \$20 + a \$10 and several \$5's! . Yankees still here. I think some of the generosity was from New Yorkers.) \$134.15 (\$47.57/hr! 3 cds...2 being giveaways. AMPHITHEATER(2 different musical gps. For a chg. AMPS not full blast. Nice!)
 08/31/08(SUN)KURT & CATHY MILAM'S 26TH ANNUAL "DECK BUSTER" PARTY(7:50-10:40PM) V.G. Sky. JUPITER(1+3. All lockers greatly appreciated it. To keep it simple, used only 80X...also, because collimation seemed sl. off. Based on stickers dispensed, has +/- 100 lockers. Had prepared handouts, but due to press of lockers, gave out next to nothing.) SCENE(Lots of addendees, many of whom welcomed me, having looked thru scope previous years.) ALIGNMENT(Visited site 3-d. ahead to check out angles w/compass. Got north pretty good, but set up too far west, which forced me to move east twice to keep J from disappearing behind tree. Finally let it go around 10:10PM.) HH(Was well rested and was able to keep up ok.) PARKING(Parked blk. away and used handtruck.) ALBIREY (After loosing Jupiter. Lockers liked it.) NO HAT HH(Definitely a challenging st
- 2157) 09/01/08(MON...LABOR DAY. Didn't go to STL because, after a 3-wk cruise, was not yet ready to travel.) Great sky. Sl. warm. Busy scene at start which, by 8:30PM was rapidly thinning. JUPITER(Nice. 0+4, 0+3. Good "stripes".) HH(Felt I could handle things alot more smoothly in Hpl then last night!) \$73.36 (\$36.86/hr.) (7:38-9:37PM.) 1-cd.
- 2158) 09/02/08(TUE)HPL-W.LIP(7:33-9:20PM). Ok sky. Warm/sticky. Slowest looking scene at set-up time have seen in a long time! JUPITER(3+1. Good.) LOUD MUSIC(Amphitheater singer/strummer uncomfortably loud. Asked him to "turn it down a notch." He did! \$40.52(22.76/)
- 3-eds.
- 2159) 09/03/08(WED)HPL-W.LIP(7:27-9:25PM). Slow scene. Good sky. Warm, sl. humid. JUPITER (1+2, then 1+3. GWP "white" transit 8:PM.) \$30.85(\$15.66/) Should'a gone dancing! Maybe tonight was especially slow because VP candidate is speaking tonight at the Republican convention and people stayed home to hear her.
- 2160) 09/04/08(THU)HPL-W.LIP(7:27-9:55PM). Good sky. Warm, sl. humid. Night of McCain acceptance speech. Slow scene at start, which improved for a while. 5-d. MOON(Setting over Light St. Bldg.) JUPITER(Fine. Classic 2+2, but wide. Lockers liked.)\$77.62 (\$31.43/)
- NEW TECHNIQUE(As I invited passersby to Hav-A-Look!, I actually pointed up at Jupiter, calling their attention to it. I felt doing this aroused their curiosity.)
- 2161) 09/07/08(SUN)HPL-W.LIP(7:06-9:25PM). Clear, but 3.5/5. 8d.MOON(Started 21m before ss. Terminator craters.) JUPITER(1+2. Moon shadow in top stripe, 1st spotted by lockers.) COMET CDS(5 sold before setup. Man spontaneously began saying how much he enjoyed HB from a ship, seeing both "the white and blue tails." I showed him the cd., whereup he bought 5. Is from TN. Said he might get more for Xmas cds.) \$100.16 (\$43.17/hr.)
- 6-CARDS.

TOTAL THIS PAGE = \$ 594.96
 TITAL THIS YEQR = \$4,495.14

STREET CORNER TELESCOPE LOG -- 2008

- 8 2162) 09/08/08 (MON) HPL-W.LIP (7:22-8:55PM). Ok sky, then haze, then shut down by clds. Warm. 9-d. MOON (1st. QT. Tycho, but not yet Copernicus.) JUPITER (1+3). HH (Early evening like hadn't recovered from last night and contemplated cancelling. However, once got setup and in business felt fine.) \$38.89 (\$25.09/hr.) 1-COMET CD.
- 8 2163) 09/10/08 (WED) HPL-W.LIP (7:17-9:30PM). Seeing 3.5/5. Clear. Comfortable. 11-d. MOON (Tycho region. Invited lookers to cruise by turning dec knob.) JUPITER (2+1. Sl. mushy image.) VISITS (2 Goddard astronomers, who said they send lots of people my way.) \$65.56 (29.53) CLOUDS (Arrived suddenly at 9:25PM and shut me down by 9:30PM.)
- 8 2164) 09/17/08 (WED) HPL-W.LIP (7:14-9:50PM). Sky 4.5/5. Pleasant. 7-d. absence due to clds. TRACKING BATTERY (Died +/- 9:15PM. I hope it will rechg. ok!) CONTRIBUTIONS (1st was \$5 and the next \$20... plus another \$20 later! No financial melt down here!) SMOOTH TEES (In Ampth. from 8:30PM. Asked them to keep vol. down, but they didn't. Made it alot more difficult for me to talk to and hear my lookers.) JUPITER (2+2, then 1+2. GRS. Lookers liked!) \$107.61 (\$41.39/hr.) VISITS (Lookers from Turkey & Lithuania... all 3 of the later having blue bags with just bought lap tops.) 5-comet cds.
- 10 2165) 09/18/09 (THU) CITY PAPER'S ANNUAL BEST OF BALTIMORE PARTY, MUSEUM OF INDUSTRY (6-10PM). Cool breeze but good sky till clds. rolled in right at quitting time. What a scene! Many more attendees than I imagined... mostly 20's and 30's somethings. Ran through 100 Jupiter stickers half way through. Had a steady line for at least 2-hrs. Hard work! Everybody very appreciative. Was amazed at how little astro knowledge most displayed. HH (Wore white ducks, white shoes, black "You Are Here!" t-shirt, which was good costume for occasion. Unfortunately, my voice was a bit weak, forcing me to strain to be heard.) LOCATION (Big cement patio near water's edge. I was right in the midst of alot of attendees.) BATTERY (Thanks to a 20-hr. chg., it worked fine.) ALIGNMENT (By compass. Way off initially but eventually got it right. Able to spot Jupiter before could see.) JUPITER (2+2 evenly spaced. Lookers both curious about arry and impressed.) HAT (Sans "contributions welcomed" card, sat it on case with handouts in it. Nevertheless it attracted contribs. Next time will put it on tripod, probably w/o card.) STINT (Very tough, but one of my most unusual ones. All things considered, I feel I handled it perfectly! FEE \$200+HAT \$26 = \$226.00 (\$56.50/19-d. MOON (Acq. +/- 9:15PM rising. Back & forth w/J till clds. blocked it.)
- 9 2166) 09/21/08 (SUN) HPL-E.LIP (7:11-9:43PM). E.LIP thinking Jupiter would avoid lights longer, but it didn't. Soon will have to move back to nr. benches. 4.5/5. Pleasant. HH (Day of JF Expw. bike ride, which I rode to from hm. Felt good scoping, having gotten 2 hr. afternoon nap.) SCENE (Surprisingly busy.) JUPITER (0+4+star. Neat!). Lots of no-pays! VISIT (Guy from across str. to whom I gave a box of matches.) \$82.83 (\$32.61/hr.)
- 8 2167) 09/23/08 (TUE) HPL-E.LIP (7:18-9:58PM). Sky 4.75/5. Sweater weather. HH (In very good head... animated... having fun.) JUPITER (2+2, then 2+1. Fine! By 9:40PM considerable glare from lights. Still, image good. However, is time for a move.) \$20.00 CONTRIB. (From an obviously unfortunate man who said he's homeless. I tried, but he refused to take it back, saying God told him to give it to me because of what I'm doing. I'm lucky God didn't tell him to stick a knife in me, or whatever! Not good!) HPL (Slow scene, but had a good flow of enthusiastic lookers + lots no-pays.) \$99.17! (\$37.14/)
- 8 2168) 09/29/08 (MON) HPL-E. BENCHES (7:20-9:10PM). V. Slow scene. Also Rosh Hashanah eve. Sky 4.4/5. Pleasant. JUPITER (2+2+star. Good. Could hold till +/- 11PM from this spot.) PLW's #72. VISITS (Homeless, Per PLW "pathetic". Said has been scared by the oral abusiveness of his father. Living behind flw. shop Pikesville.) \$28.12 (\$15.28/hr.) NAT. NEWS (This is the day that Congress rejected Bush's \$700 billion Wall St. bailout!) VISIT (Manzar Rassouli, gallery owner, who again asked me to bring in some of my cds., which I will.)

TOTAL THIS PAGE = \$ 648.18

TOTAL THIS YEAR = \$5,143.32

STREET CORNER TELESCOPE LOG -- 2008

- 2169)10/11/08(SAT)HPL-E.BLENCHES(6:45-10:15PM).V.busy scene early! Mild/cool. Seeing 3.5/5. PLW's #73. JUPITER(4+0, then 3+0. Clarity somewhat poor most of eve. Lookers impressed.) 12-d.MOON(Tycho + nearby terminator. Nice!) HH(Good energy. Layed back approach.) Lots of young clps. Lots of families w/kids. \$115.13 (\$32.89/hr.) + 4-comet cds.
- 2170)10/12/08(SUN)IBID(6:30-9:30PM).Busy scene early; a bit bleak looking for last hr., though we did some good business. Mild. Sky 5/5 after sunset, then 4/5. JUPITER(1+2. terrific image, early.) ADHESIVE SEALANT COUNCIL(Last night had a looker, Jerry Marinzulich, a chemist attending convention of said mfg. org. He was very enthusiastic w/his looks at J and Moon and said he's send lookers tonight. I posted a small sub-sign on my J sign saying, "JUPITER WELCOMES ADHESIVE SEALANT COUNCIL MEMBERS...HAV-A-LOOK!" However, no members showed up which, from past convention exp., didn't surprise me.) VISIT(Kevin, a teacher in one of my JHU SSIP classes.) \$69.00 (\$23/hr.) 2-comet cds.
- 2171)10/13/08(MON...COLUMBUS DAY)IBID, BUT 1SQ. MORE INTO PROMENADE(7:05-8:58PM). Mild. Surprisingly busy scene. Seeing 5/5, then 3.75/5. 14-d. MOON(Just short of full. Sl. haze.) PLW's #75 WOW! JUPITER(2+2, wide. Gradually diminished by haze, which eventually shut us down.) BOOZE(3 women sitting at an M&S Grill outdoor table came down to look thru scope. They were so pleased that they came back with a white wine and Mohito for us!) ADHESIVE SEALANT(1-looker, finally!). \$58.64 (\$31.03/hr.)
- 2172)10/14/08(TUE)HPL IBID(6:55-9:50PM). Considerable clds. on drive down but with such a pleasant eve. decided to go for it. Eventually saw Jupiter through thin clds. and set up. Lasted 20-mins, then bad clds. Lasted at least 1/2-hr., at which point J became a "sucker hole obj., then clear. J(2+2. Nice.) FULL MOON(Eventually appeared from behind WTC. Great at 50X w/filter!). VISITS(Many lookers from 22,000 strong National Parks & Recreation Council convention. Enthusiastic lookers!) PLW #76 \$47.53(\$16.33/)
- 2173)10/15/08(WED)HPL-IBID(7:15-9:47PM.)Warm; sl. humid. 4/5. JUPITER(4+0, then 3+0. As get-low, somewhat mushy. Used 80X only.) 16-MOON(L side of WTC. Lots of craters on left edge. Beautiful @ 50X + filter!) PLW's #77. VISITS(A few from National Parks & Rec. Assoc. convention. Two French astronomers here for conf. on "age of stars" at Hubble.) \$68.35 (\$26.98/Hr.) 3-comet cards. As the Moon was rising from behind the WTC, we could have stayed longer, but both of us were too tired.
- 2174)10/19/08(SUN)HPL-IBID(6:21-8:19PM). Finally cold weather, 44°F. Fingers sl. numb at end. Seeing 4.5/5. PLW back in St. Louis. Slow scene at start; absolutely bleak at end. Stayed till Ampith. musicians quit. VENUS(L of Hyatt till 6:50PM. Twinkled!) JUPITER(Spot in CL at 1st look...a pale, white oval. 1+2, 1+3, 0+3. Lookers impress!) ROSE MAN(Asked me to chg. a \$20. When I replied I didn't have it yet, he screamed and hollered at me, "In all the time you've been here, you've never done me a favor!" Fact is, I never remember his asking a favor of me!) VISIT(Rabbi Levi Druk, carrying a 2X2 w/leaves attached and a lemon, inviting passersby to recite a Sukkos prayer. I thanked him for his mail and did the prayer thing with (for!) him.) \$44.42 (\$22.55/hr.) Sold 1-comet cd. 57-575,746-39
- 2175)10/20/08(MON)HPL-IBID(6:29-9:10PM). 48°F...alot more comfortable. Seeing 4.9/5, but degraded to 3/5. ALIGNMENT(Since realizing that a diagonal from corner to corner across the brick squares is true N, have acq.'d Jupiter 1st try for weeks. Yet, am still amazed at seeing it 1st try!) SCENE(Bleak from start, yet knots of people appeared periodically. HH(In good shape...hi energy.) JUPITER(1+3. Good for +/- 2-3 more weeks, then Uranus!) CLEVELAND MONTESSORI SCHOOL(Noticed a gang of +/-50 students passing by and, knowing they prob. wouldn't pay, invited them to Hav-A-Look!, which they did. J at 80X. Gave teacher 1-copy of some handouts and a big batch of stickers. \$57.13(\$21.24/)Incl.a\$20! HPL ARTIST(I asked how long he's been here. He said 25yrs., that he auditioned and is official.)

TOTAL THIS PAGE = \$ 460.20

TOTAL THIS YEAR = \$5,603.52

STREET CORNER TELESCOPE LOG -- 2008

- 2176) 10/22/08 (WED) HPL-E. BENCHES (6:41-9:05PM). 43°F...fingerless glvs, scarf, "Bean" jacket, thick socks. 3.5/5. V. slow scene at start, then a pick-up. JUPITER(3+1+shadow.) URANUS(Found for myself but then couldn't later for a looker. Ugh!) B CYG(2X for 1 ers.) HH(Late start due to hesitation.) PAINTER MAN(Complained that my shouting at passersby was causing them to turn my way and to not notice him! I said would try to be aware of it.) SMOOTH TEEZEE(Arrived 8:30PM. GREAT group!) \$30.00 (\$12.50/hr.)
- 2177) 10/23/08 (THU) IBID(7:05-8:50PM) 45°F...milder. 4/5. Late start due to picking-up Chloe at train sta., it being 1-hr. late. V. slow scene, which picked-up gradually. Shut down by clds. JUPITER(1+3, then 1+2.) URANUS(Couldn't find. Why?) HH(Bored) \$26.53(\$15.16/)
- 2178) 10/26/08 (SUN) IBID(6:15-8:45PM). Mild. 3.75/5. Fairly busy scene at set-up which slowed considerable within a ½-hr. JUPITER(1+3 close. Nice.) URANUS(After several tries. Was just where it was supposed to be. 1 grp. of lookers.) ROWDY KIDS(Besieged by 6-8 inner city, 8-12 yrs old. Pushed, shoved, grabbed at everything, threw candy at me. I stayed cool, but it was definitely NOT fun.) \$38.26 (\$15.30/hr.)
- 2179) 10/30/08 (THU) IBID(6:30-8:37PM). Cool but comfortable. OK scene at arrival, which quickly got bleak. Nevertheless, there were knots of passersby every 1-min. or so. JUPITER(2+2. "Stripes pretty evident.) VENUS(1X on request.) B CGY(1X for enthusiastic looker. HH (If am there just for the \$\$, on a slow night can get pretty bored.) \$33.58 (\$15.84/)
- 10/31/08 (FRI: HALLOWEEN!). Mild w/great sky. However, was apprehensive about setting up in HPL, fearing vandalism to scope by a gang of marauding kids. Drove down/wo scope to check out scene. Busier than previous few nights. Except for a group of 2-doz. anarchist types carrying a CAPITALISM GIVES US THE CREEPS banner who arrived from Fpt., there was little sign of Halloween while I was there-7:40-8:15PM. Prob. could have set-up. Before deciding not to, made up black on orange signs saying TONIGHT HALLOWEEN ON JUPITER HAV-A-LOOK! and same for URANUS. Too bad I didn't get to use them! As hyped up as they were, the large anarchist groups would have been a pain at the telescope!
- 2180) 11/07/08 (FRI) IBID(5:07-10:04PM). Mild, some dew. Sky 5/5! Week's delay due to weather. V. busy scene till near end. Almost like mid-summer! Busy start, but then a long dead time mid-eve. 9-d. MOON(Great, esp. thanks to good seeing. Copernicus past SR but still w/an interior shadow. 80X & 220X.) JUPITER(2+2. Its clarity reminded me how good scope is w/good seeing!) Lots of lookers attempting to photo Moon...several got ok shots. 3-C.cds. VISITS(Elianne Ramos, writer, who wants to do story on me. Frank Pratkan.) \$102.64(\$20.74/ URANUS(During dead time tried to acq., thinking sign would attract attention. However, try as I may, couldn't acq. it. Why?) B CYG(1X, then subsequent failures.)
- 2181) 11/10/08 (MON) HPL-IBID(5:20-6:50PM). Cool-38°F. 4/5. ALIGNMENT(Fine tuned, allowing me to acq. B CYG; URANUS...v. close to a noticeably dimmer than 5.6 mag. 96 Aqr; and CHAPLE'S ARC?...3 doubles, the pair on the R having the brightest star.) 12-d MOON (Tycho + terminator craters.) JUPITER(1+3. Nice!). SCENE(Quite slow, but almost always a few strollers in sight. Quit due to slowness.) BUBBLE LEVEL(Lost it!) \$8.00(\$5.33/)
- 2182) 11/23/08 (SUN) HPL-IBID(5:05-6:37PM). Cold. Wore cold weather gear. PLW's #78. JUPITER (3+1, then 2+1. Good image at start which gradually deteriorated. To the upper left of Venus, making a nice pair.) URANUS(Acq. w/effort, then back to J.) ISS(Made a low pass-by in the NW. PLW alerted Santa and his helpers in the Santa House, who came out to see it. PLW said one helper was esp. excited because she listens to the radio chatter from the ISS.) VISITS(Barry, who talked non-stop and was a real bother to both PLW and HH.) \$19.00 (\$12.34/hr.) BOO STORE(Driving away we noticed a letter out on Barnes & Noble's sign. After supper at home, we drove back with camera for a shot to send in to City Paper's "Whose Responsible" feature.

TOTAL THIS PAGE = \$ 258.01

TOTAL THIS YEAR = \$5,861.53

STREET CORNER TELESCOPE LOG -- 2008

- 8 2183) 11/29/08 (SAT) HPL-E. BENCHES (4:51-6:37PM). Semi-cool. PLW's #79. Adverse clds. forecast but nice sky at leaving time, so we went for it. Shut down by clds. which suddenly appeared. JUPITER-VENUS CONJUNCTION (J just a few deg. above V...a great, shiny pair! Scoped on J. 1 on L, 2 close together on R. Poor seeing, starting because scope not cooled down ahead, then due to J's lowness. Nevertheless, most lookers were impressed. This was about the last J stint this season.) CHILDREN (Many families with an incredible number of 5-yr. olds and below. I gave each my all, but it was no fun. Can sympathize a bit more w/Tom McIntyre who excludes sub-12 yrs. kids!) \$46.50 (\$26.27/hr.) This was the second stint beginning my 22nd year of street telescoping!
- 9 12/03/08 (WED) DRY RUN TO HPL. Tho the painter man was there, the scene looked too quiet for me to setup. Extra milage due to Greenmt. Ave. traffic jam. Too bad, because great sky w/6-d.Moon!
- 10 2184) 12/05/08 (FRI) FELS PT (6:34-9:59PM). Low 30's, no wind. Feet my weakest link. FP (There on invitation of Jason Sullivan of the FP Development Corp which tonight sponsored a shopping event. Was not looking fwd to going, but having immediately found a good parking spot, my morale improved. Setup south of kiosk. Fairly constant flow of passersby, alot more middle class than Hpl. A few remembered me. +/- 8PM a band played Xmas carols on the Square.) HH (In very good head...having fun...not unhappy about being back in Fpt.) 8-d.MOON (Just short of 1/4. Lookers impressed. 80X.) VISITS (Greg, the musician, with wife. Not playing any more, he said. Jay. Jason Sullivan.) SOLD 20 COMET CDS (I worked hard at it, showing lookers the card up close.) \$60.15 (\$17.64/hr.)
- 8 2185) 12/07/08 (SUN) HPL-E. BENCHES (5:25-6:52PM). 32° w/wind gusts. Despite the cold, a confluence of factors made me go: good sky & Moon, 8-PM Ravens game, good ISS flyover, possibility of reaching \$6K mark, prob. the only decent night this week. CLOTHING: 2-hats+ good sweater+vest+scarf+Harband coat+longjohns+jeans+heavy socks over regular ones+ Reeboks+both prs. fingerless glvs. Weakest link the jeans...should have worn wool pants. Otherw survived pretty well! SCENE: Pretty good traffic during setup, then got slower, til ly fans walking briskly to game. Should have been there earlier (ss = 4:44PM). Could have survived longer, but too little intetest in me. JUPITER (Intended to only do Moon, but after pointing out V & J to 1st looker, she req'd to see it. Put scope on it and was amazed to see all 4 moons in a tight line on one side! Immediately decided to tout J and forget Moon. It stayed good almost to roof. All lookers very impressed!) MOON (Tycho region.) ISS (89° flyover at 6PM. Had only 2 lookers at scope; neither impressed. However, later a group of earlier ones passed by, one of whom excitedly rpt'd seeing the ISS!) Did not tout cards...too cold. \$19.25 (\$13.28/hr.)
- 10 2186) 12/13/08 (SAT) Fpt. (6:15-9:23PM). 32° Clear. Fpt figuring would acq. Moon earlier than in HPL. MR was 5:49PM, but still it was excruciatingly slow coming into view. Infact, I first setup mid-sq. but, after 15 min., broke down scope and moved to SW corner sidewalk. Finally acq. +/- 6:40PM. JUPITER (1+3. Low, murky image. Before I moved scope.) MOON (1-d. past full. Edge craters near Crisium. Was this was an especially close perigee, I used 80X rather than 50X. Lookers impressed.) TRAFFIC (Kind of a slow scene but a steady stream of lookers. Lots of groups pd. only \$1.00.) VISIT (Stephen Lampredi, who hung out for a long while. Gave him a comet cd.) \$44.67 (\$14.27/hr. Ugh!) Sold 13 comet cds., a few of which I gave away to multi-buck contributors. VISIT (Helen, woman living on Bond St. who said she has a C-5 she uses on her deck and who is a science writer journalist.) PARKING (Lucked out w/a nearby spot, but had to pay \$2/parking fee.) SKATEBOARDERS (1/2-doiz doing their thing on the marble bench and giving me some lip. After looking a Jupiter thru the scope their attitude improved considerably!)

TOTAL THIS PAGE \$ 170.57
 TOTAL THIS YEAR = \$6,032.10
 86 stints = \$70.14/ea.

45
 .95 = 777 miles

SC EXPENSES -- 2008

| | | |
|----------|--|--------------------|
| 1/12/08 | SP 19-sides SC handouts (JHU) @ \$0.07/ea. | \$ 1.33 |
| 1/25/08 | SP 6-sides SC handouts JHU) | \$ 0.42 |
| 2/02/08 | SP 26-sides SC handouts (JHU) | \$ 1.82 |
| 2/18/08 | SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 2/20/08 | SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 2/28/08 | SP 4-sides March star map (JHU) | \$ 0.28 |
| 3/01/08 | SP 10-sides March star map (JHU) | \$ 0.70 |
| 4/02/08 | SP 12-sides April star map (JHU) | \$ 0.84 |
| 4/08/08 | SP 10-sides Apr. star map (JHU) | \$ 0.70 |
| 04/15/08 | SP 3-sides SC handouts (JHU) | \$ 0.21 |
| 04/15/08 | SP 4-sides HPL schedule form (JHU) | \$ 0.28 |
| 04/16/08 | SP 29-sides SC handouts (JHU) | \$ 2.03 |
| 04/17/08 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 04/18/08 | SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 04/24/08 | SP 26-sides SC handouts (JHU) | \$ 1.82 |
| 04/28/08 | SP 1200 Post-its (Staples) | \$ 9.00 |
| 05/04/08 | SP 37-sides SC handouts (JHU) | \$ 2.59 |
| 05/05/08 | SP 6-sides SC handouts (Loyola) | \$ 0.48 |
| 05/06/08 | SP 13-sides SC handouts (JHU) | \$ 0.91 |
| 05/13/08 | SP 29-sides SC handouts (JHU) | \$ 2.03 |
| 05/13/08 | FEES Parking at HPL. | \$10.00 |
| 05/23/08 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 04/28/08 | EQUIP 1-Meade Tripod(John T. Varn, 3905 37 th Ave SW Unit B, Cedar Rapids, IA 52304 | VIA PAYPAL \$60.00 |
| 05/28/08 | SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 05/29/08 | SP 28-sides SC handouts (JHU) | \$ 1.96 |
| 05/31/08 | SP 4-sides 6/08 star map (Loyola) | \$ 0.48 |
| 06/01/08 | SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 06/4/08 | STA 1-typewriter ribbon (Ken & Ray) | \$ 5.00 |
| 06/07/08 | SP 34-sides SC handouts (JHU) | \$ 2.38 |
| 06/11/08 | STA White Out (Staples) | \$ 2.38 |
| 06/11/08 | 16-sides SC handouts (JHU) | \$ 1.12 |
| 06/12/08 | SP 23-sides SC handouts (JHU) | \$ 1.61 |
| 06/15/08 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 06/17/08 | STA eye glasses retainer (Rite Aid) | \$ 2.64 |
| 06/13/08 | SP 7-pks 1-7/8" x 2-7/8# post-its (Staples) (8,400 post-its) Cr. cd. | \$59.21 |
| 06/22/08 | SP 22-sides SC handouts (Kinkos) | \$ 1.85 |
| 06/24/08 | SP 2-bike tires + 1-tube (Mt. Wash.) | \$ 11.31 |
| 06/28/08 | SP 31-sides SC handouts (JHU) | \$ 2.17 |
| 07/01/08 | SP 16-sides SC handout July star map (JHU) | \$ 1.12 |
| 07/03/08 | SP 15-sides SC handouts (JHU) | \$ 1.05 |
| 07/11/08 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 07/12/08 | SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 07/13/08 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 07/15/08 | SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 07/17/08 | SP 1-side City Paper Sept. 18 event invoice (Kinkos) | \$ 0.08 |
| 07/17/08 | POST mail City Paper inv. | \$ 0.42 |
| 08/10/08 | SP 28-sides SC handouts (JHU) | \$1.96 |
| 08/13/08 | SP 46-sides SC handouts (JHU) | \$3.22 |
| 08/17/08 | SP 34-sides SC handouts (JHU) | \$2.38 |
| 08/17/08 | SP Frankie in HPL | \$5.00 |
| | | PAGE \$218.35 |
| | SP | |
| | FEES | |
| | EQUIP | |
| | STA | |
| | POST | |
| | \$137.95 | \$10.00 |
| | \$60.00 | \$10.02 |
| | | \$0.42 |

SC EXPENSES -- 2008

| | | |
|----------|--|-----------------|
| 08/18/08 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 08/20/08 | STA 2-replacement sign hooks (Falkenhan's) | \$ 0.85 |
| 08/20/08 | SP 10 sides SC handouts (JHU) | \$ 0.70 |
| 08/22/08 | SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 08/22/08 | SP Frankie in Hpl | \$ 5.00 |
| 08/24/08 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 08/25/08 | SP 25-sides IBID (JHU) | \$ 1.75 |
| 08/31/08 | SP 31-sides IBID (JHU) | \$ 2.17 |
| 09/02/08 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 09/07/08 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 09/08/08 | SP 14-sides IBID (JHU) | \$ 0.98 |
| 09/14/08 | SP 5-sides SC handouts (JHU) | \$ 0.35 |
| 09/18/08 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 09/22/08 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 09/24/08 | SP 38-sides SC handouts (JHU) | \$ 2.66 |
| 10/01/08 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 10/12/08 | SP 72-sides SC handouts (JHU) | \$ 5.04 |
| 10/13/08 | SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 10/15/08 | SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 10/16/08 | SUBS S&T for 1-yr. starting 2/09 (Cr. Cd.) | \$ 32.95 |
| 10/22/08 | SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 10/26/08 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 10/30/08 | SP 4-sides sizing for Albireo lamination (Kinkos) | \$ 0.34 |
| 10/30/08 | SP 2-laminations (Uranus, Albireo) for SC use (kinkos) | \$ 4.22 |
| 10/31/08 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 11/02/08 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 11/08/08 | SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 11/18/08 | SP 5-sides SC handouts (JHU) | \$ 0.35 |
| 12/03/08 | SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 12/06/08 | SP 16-sides SC handouts (JHU) | \$ 1.42 |
| 12/29/08 | SUBS 1-Obsv's Hdbk 2009 (Royal Astro. Soc./Canada (Cr. cd.)) | \$ 32.45 |
| 12/13/08 | FEE parking in Fpt. | \$ 2.00 |
| 12/29/08 | STA wristbands (Target) | \$ 5.39 |
| 12/31/08 | SUBS Planetary Soc. "The Planetary Rpt." | \$30.00 |
| | | <u>\$145.47</u> |

| | <u>SP</u> | <u>FEES</u> | <u>EQUIP</u> | <u>STA</u> | <u>POST</u> | <u>SUBS</u> | <u>PAGE</u> |
|---------------|--|-------------|--------------|------------|-------------|-------------|-------------------|
| PAGE | \$41.83 | \$2.00 | --- | \$6.24 | --- | \$95.40 | |
| <u>YEAR</u> | \$179.78 | \$12.00 | \$60.00 | \$16.26 | \$0.42 | \$95.40 | = <u>\$363.86</u> |
| <u>MILAGE</u> | 777.0 MILES X \$0.585/MILE = <u>\$454.55</u> | | | | | | |

2009

Not for Distribution

- 8 2187) 01/02/09 (FRI) HPL-E. TRASH BIN (6:17-8:29PM). 36°F, .no wind, .comfortable..clear..decent passersby scene. ST. LOUIS (Got home from 8-d. stay +/-5PM. W/good sky & mild temp. decided to postpone unpacking and to head for Hpl. Glad I did as, except for some boredom, felt good to be back.) 6d.-MOON (Lots craters. Lookers amazed!). VENUS (Several times @ 166X. Getting bigger--almost 1/2.) PAINTER MAN (Left early, happily announcing he'd sold out!) I wish I could "sell out!" \$55.97 (\$25.44/hr.)
- 8 2188) 01/03/09 (SAT) HPL-IBID (5:07-8:07PM). 34°F, sl. breeze..v.clear. Pretty decent scene at start, which slowed by 7PM. 7-d.MOON (No quite 1/2. Awesome sunrise on Ptolemaeus!) VENUS (1X. Otherwise explained why not and gave out V blurbs.) M45 (1X, finderscope.) NEW IDEA (Add SATISFACTION GUARANTEED! line to MOON and other signs.) Lots of enthusiastic lookers; lots of families w/good kids. HH(++ ,but clockwatching.) \$73.58 (\$24.53/hr.) MOON (A line I used often tonight is, THIS YEAR IS THE 400TH ANNIVERSARY OF THE DISCOVERY OF THE CRATERS ON THE MOON BY THE ITALIAN ASTRONOMER, GALILEO, IN 1609.)
- 8 01/09/09 (FRI) DRY RUN TO HPL. Cold 30°F + breeze. Bleak scene. 13d-MOON would have been behind WTC for +/-1-hr. Back home predicted clds. moving in to soon blk. Moon. MOON FACTS (Hoped to set up tonight to handout the new Moon Facts created by PLW & HH.)
- 9 2189) 01/22/09 (THU) HPL-IBID (5:35-6:52PM). 46°F. 1st mild temp day in 19d's! Clear. The decent # of strollers as I arrived dropped off by time I was ready. VENUS (Sl. less than 1/2. 165X w/filter best.) URANUS (+/-9' E of V, but was never really sure I spotted it. Why?) HH (Felt ok to be back. Can still do it!) \$18.50 (\$14.34/hr.) CHAS. VILLAGE (Stopped on way home looking for a Venus spot. Donna's corner prob. best. HH bldg. at B's&N corner.)
- 8 2190) 01/24/09 (SAT) HPL-IBID, FURTHER E. TO ESCAPE WIND (5:35-7:10PM). 29°F w/wind chill. I survived cold ok, but needed better pants. VENUS (80X w/filter. A bit small, but nobody complained.) Fairly steady passerby traffic but most walking fast to escape cold. \$28.58 (179)
- 8 2191) 02/01/09 (SUPERBOWL SUNDAY) HPL-IBID (5:13-6:38PM) Mild, great sky. The goodly number of passersby at set-up steadily dropped off. By 5:45PM looked pretty quiet. 5-d.MOON (Lots of craters. 80X. Lookers awed!) VENUS (Once @ 166X. Nice crescent! Is high and v. bright. Lots of people asked what it was...if it was Mars!) HANDOUTS (Gave out lots of MOON FACTS recently composed by PLW and HH. Because V was so obvious, also gave out VENUS FACTS.) HH (In good head. Despite SB, went out because weather finally good.) \$24.50 (\$17.38/hr.)
- 8 2192) 02/06/09 (FRI) HPL-ON PROMENADE BY AMPI. Clear, cold 28°F (5:39-7:15PM). Decent traffic, but little interest in me, plus lots of no-pays. 10-d.MOON (Tycho region 135X. Most lookers impressed.) VENUS (1X. Nice crescent.) VISIT (Barry, who said he's been making \$100/day w/balloons at Discovery Zone. Thanked me for gloves PLW and I left for him at the Mission.) HH (Am tired of telescoping in cold. Should make a rule for myself that no matter how clear, I shouldn't go out in sub-freezing weather!) \$20.10 (\$12.56/hr.)
- 8 2193) 02/07/09 (SAT) HPL-IBID. (6:40-9:22PM). Mild. Hazy sky, then sucker hold clouds. Left, but by time was at garage had cleared! Late start due to late afternoon clds. Settled down to my archives proj. Half hr. late noticed clear sky, put archives away, and headed (somewhat reluctantly, cause was really into archives!) to HPL. Definitely a critical mass of strollers. 11-d. MOON (80X, 135X. Tycho edge craters.) VENUS (Numerous times.) Gave out lots of Moon and Venus facts, plus some sky maps. \$55.63 (\$20.58/hr...included a \$10.00 contrib. HH (V. grumpy driving down but quickly got into a good head when set up.)
- 8 2194) 02/08/09 (SUN) HPL-IBID (5:30-7:46PM). Mild, but then chilly. Was underdressed. ODYSSEY (First went to Plaza Artist Supp. for pencil to touch up a frame. Next, Peabody for a Holst-P. Grainger concert. Great! Stuffed pepper & vegies at std. cafe. With scope in car, parked in Peabody garage. Then to HPL!) VENUS (Main feature for most of stint. Mostly 80X w/filter. Crescentie...34.2" dia. Requires alot of explaining! Ran out of V. Facts.) FULL MOON (Rose 5:30PM v. close to WTC and disappeared. Reappeared 7:05PM. 50X w/filter. Told lookers to look for Tycho. Everybody liked view.) WINDDOWN (By 7PM scene pretty quiet looking. At 7:05PM began packing up, when a crowd suddenly descended on me. Put scope together again and did mostly Moon till quiet again.) HH (In v.good head. Great stint!) \$79.04 (\$34.82/hr.!)**

TOTAL THIS PAGE = \$355.90

TOTAL THIS YEAR = \$355.90

VISIT (Judy, once a Wed. dancer w/lg. family. Were enthusiastic lookers and good contributors.) (Olympia typewr. broke last night!)

- 8 2195) 02/15/09 (SUN) HPL-BENCHES (5:34-7:34PM). Chilly. PLW's #80! Blue sky all day, then late afternoon clds. 1/2 way there nearly turned back because of clds. Happily, didn't! President's Day eve. Pretty busy scene till near quit time. VENUS (80x. Good crescent. Surprised at many lookers good reaction!) VISIT (Barry, Ugh!) TYPEWRITER (Old friend Olympia broken. Will try to get fixed, otherwise buy another off Ebay.) \$78.13 (\$39.07/hr.!)
- 8 2196) 02/17/09 (TUE) HPL-BENCHES (6:03-6:38PM). Comfortable 44-deg. Gd. sky. PLW's #81. PHOTOGRAPHY STUDENT (S. Korean lady. Took lots of shots, incl. a great one of us. Said would e-mail some.) VENUS (Played "what shape" guessing game w/lookers. Most surprised, saying "looks like the Moon." 80X) Scene v. quiet, so a brief stint. CHAS. VILLAGE (On way home surveyed scene nr. 33rd/St. Paul. Alot busier than HPL.) \$3.00 (\$5.17/hr.) TYPEWRITER (This is a S-C Port. which might have been Ken's. Rec. call today from Md. Office Systems say Olympia repair & cleaned. Great news!)
- 8 2197) 02/21/09 (SAT) HPL-3RD BENCH (5:47-7:38PM). Cold. 32°F + wind chill. PLW's #82! VENUS (Nice crescent. 39.8". Most lookers quite surprised. Due to setup loc., V went into a tree, at which point we ended stint.) M42 (For a young man who asked how galaxies look thru my scope. Then for others before going back to V. I really enjoy doing M42!) TYPEWRITER (Happily, was quickly repaired and reconditioned. \$68.70!) \$63.93 (\$34.56/hr.)
- 2 02/22/09 (SUN) COMET LULIN EXPEDITION TO E. SIDE OF 3100 BLK. ST. PAUL ST. (7-7:45PM). Cold w/wind chill. PLW (Stayed in car.) This stint a consequence of my miscalculation that comet would be up enough to see by 7PM. Should have been tomorrow night! However, since was rpt'd in Frank Roylance's 02/20/09 comet art. I'd be there tonight, I felt obligated to go. Good thing, because 2 individuals + a family showed up! I told them I'd miscalculated and asked them to return tomorrow, 7:30PM. Gave handouts to all. PLW and I adjourned to Dissy's, after which returned to St. Paul St. to check out Saturn, next to which comet will be tmw. night. Would have liked it to be higher! Till tmw.! One showee, Jennifer, appeared to have a special astro interest. She'd walked from Remington! Showed her M42 in binocs. We gave her a ride back to Remington (Pizza Boli's)
- 3 02/23/09 (MON) COMET LULIN-II (7-8:45PM). PLW (Back and forth from Bank of America lobby.) Cold. With wind chill supposedly 19°F! NW corner of 32nd & St. Paul. COMET LULIN (Searched and searched, with binocs & scope, but never found it. Why? Supposed to be the night it was just south of Saturn.) SATURN (Thin ring. Titan just off ring tip. Very nice!) M42 (Good...from here good nebulosity) VISITS (Jim Jones with daughter Maggie, a St. Pius X student, who is very knowledgeable in astronomy. They were the "family" from last night. Gave Maggie and envelope full of astro materials. Sarah, who was there last night and hoped to see comet tonight. Steve Cunningham with Zack, his friend who works at Safeway. Zack is very interested in astro. Showed him how to find a UMN via "the pointers".) Despite the cold, thanks to good views of Sat. & M42, was a fun night! COMET SEARCH (Searched again from home up till 11:15PM with binocs and still could not find it. Saw it last night as a small, dim fuzz ball, but not at all tonight. Why?).
- 8 2198) 02/24/09 (TUE) HPL-BENCHES (6:03-7:25PM). Clear. +/-40°F, slight wind. PLW'S #83. VENUS (Good crescent. Getting lower.) COMET LULIN (Decided it's just not a downtown comet. Will try w/binocs from home.) HPL (Very quiet scene. Sometimes noone in sight!) VISIT Jean Smith, wife of Wes Smith, a BYU cehm. prof. who has written paper on TOV and will be giving a talk on a Princess cruise that will stop at Venus Point, Tahiti. Gave her my info, saying would send him my paper if he contacted me.) \$15.50 (\$11.31/hr.)
- 8 2199) 02/25/09 (WED) HPL-BENCHES (6:01-7:30PM). Clear. C601-comfortable. PLW'S #84. VENUS (Good. Getting noticeably lower. 80X.) VENUS DEMONSTRATION (Used a little LED flashlight and white lacross ball to demonstrate to lookers why V is a crescent. Effective. A looker commented, "Where were you when I was in school?") VISITS (This is the week of the annual crafts show at the Convention Ctr. Last night and tonight had some exhibitors look Several commented that business was terrible, one being a woman glassblower named Jacobs who said they've had two very bad shows in a row and are \$10K in the hole. I told her "no chg. for fellow artists," for which she was v. appreciative.) \$24.26 (\$16.39/)

PAGE TOTAL = \$184.82

YEAR TOTAL = \$540.72

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Sky Calendar - January 2009

1. Quadrantid Meteor Shower peaks at 12:50 UT. Produces up to 100 medium-speed meteors per hour. Radiation is in the constellation Bootes. Parent comet is unknown. Very favorable this year.
2. First Quarter Moon at 11:56 UT.
3. Mercury at greatest elongation, 19° east from Sun (evening sky) at 14h UT. Mag. -0.5, very low in the southwest 30 minutes after sunset.
4. Earth at Perihelion (closest to Sun) at 15h UT. The Sun-Earth distance is 0.983273 a.u. or about 147.1 million kilometers.
5. Moon near the Pleiades at 19h UT (evening sky).
6. Moon at perigee (closest to Earth) at 11h UT (357,497 km; 33.6').
7. Full Moon at 3:27 UT. The full Moon of January is called the "Old Moon" or the "Moon After Yule" in North American folklore.
8. Moon near Beehive cluster (M44) at 5h UT.
9. Venus at greatest elongation, 47° east from Sun (evening sky) at 21h UT. Mag. -4.4.
10. Moon near Saturn at 7h UT (morning sky).
11. Moon near Spica at 19h UT (morning sky).
12. Last Quarter Moon at 2:46 UT.
13. Mercury at inferior conjunction with the Sun at 16h UT. Passes into the morning sky (not visible).
14. Moon very near Antares at 14h UT (morning sky). Occultation visible from central S. America (daytime).
15. Moon at apogee (farthest from Earth) at 0h UT (distance 406,118 km; angular size 29.4').
16. Jupiter at conjunction with the Sun at 6h UT. Passes into the morning sky (not visible).
17. New Moon at 7:55 UT. Start of lunation 1065.
18. Annular Solar Eclipse visible along a narrow path across the Indian Ocean and parts of Indonesia. Partial phases visible from southern Africa and (around sunset) Australia and southeast Asia.
19. Moon near Venus at 9h UT (46° from Sun, evening sky).



NORTHERN HEMISPHERE

JANUARY 2009

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS

| | |
|-----------|------|
| EARLY JAN | 8 PM |
| LATE JAN | 7 PM |

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS

ASTRONOMY PICTURE OF THE DAY: <http://www.btscl.edu/outreach>
 HUBBLE PICTURES: <http://www.btscl.edu/outreach>

All times in Universal Time (UT). (USA Eastern Standard Time = UT - 5 hours.)

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BOOK: **Beyond Jupiter--The Story of Planetary Astronomer Heidi Hammel**, 128pp., 2006. Joseph Henry Press

Star Magnitudes: 1 0 1 2 3 4

Galaxy Double Star Variable Star Diffuse Nebula Planetary Nebula Open Star Cluster Globular Star Cluster

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- 2195) 03/05/09 (THUR) HPL-BENCHES (6:10-7:10PM). 40's. SCOPE CASE (Leather handle broke as I was picking it up to slide under the tripod. LucRily, the scope was not in it, otherwise the scope could have been smashed to smithereens! Am hoping one of my neighborhood shoe repair shops will be able to sew it back together tomorrow.) 8d-MOON (Nice. Both Tycho and Copernicus prominent. However, it was nearly straight overhead. Decided Venus was an easier way to go.) VENUS (Very crescenty. Big...48.7") SCENE (Sometimes bleak, sometimes sl. busy. Little interest in me.) HH (Depressed...not happy there.) \$4.82 (\$4.82/)
- 2196) 03/06/09 (FRI) HPL-BENCHES (5:58-9:55PM). +/-60°F. Gd sky. Busy scene. Back in the saddle w/ constant stream of lookers. Lots families w/small kids. Hard, HARD work! VENUS (Did Moon briefly, then to V because it was easier to point to. Set behind bldg. 7:17PM) 9-d-MOON (Briefly, till I spotted Saturn. Tycho region good.) SATURN! (Came from behind WTC 7:35PM Explained by rings look like "spikes" this yr. 2-moons. 135X. Lookers excited by it. Ran out of SATURN FACTS. Had no stickers. Tho it skirted top of ship, is good from Benches.) SCOPE CASE (I repaired handled with duct tape. Hopefully will do the job.) EYEPICCE HOLDER (Today got a brass screw to improve grip on diagonal. Now have 2 screws. Was a bit unsure how to maneuver them, but should work ok.) VISITS (Lot of teachers in town for convention of Expeditionary Learning www.elschools.org. A very enlightened group. Gave out lots of ed. mats.) HH (Hard work, but I guess I have to keep doing it!) \$122.99 (\$31.14/)
- 2197) 03/07/09 (SAT) HPL-BICEN...reluctantly, having been ripped off there last year. However, was too much of a crush near benches (6:10-9:20PM). V. mild, but damp. Gray sky all day, adverse rpt for evening. But at sunset looked like would be ok. HH (Had to drag myself down, but once set up was in good head...HOT!) VENUS. 10-d.MOON (Tycho region 135X. Lookers ok with it.) SATURN (Delayed entrance due to haze. 135X. 2-moons. I hyped it very well, thanks to my new handout, a truncated version of the rings attitude from 1995 to 2016. All lookers able to understand view!) Could have stayed longer, but crowd was thinning, and I was getting cold. \$126.46 (\$40.02/hr.)
- 2198) 03/23/09 (MON) HPL-BENCHES (7:32-8:40PM). 45°F. V. clear. 16-d. weather hiatus! SATURN (166X. 2 moons. Ring shadow across disc. Nice!) Slow scene. \$17.28 (\$15.03/hr.) HH (Dragged myself down there, but once set up was ok. Boredom the main problem.)
- 2199) 03/24/09 (TUE) HPL-IBID (7:30-8:42PM). Sl. hazy. Accompanied by across-the-street neighbor teenager, Dominick. He handed me bangles, pushed the handtrick, and held the Saturn sign, instead of my hanging it on the scope. Slow scene. SATURN (Nice. 1-moon.) EXCITEMENT! (+/8:25PM HPL was decended upon by a huge number of emergency vehicles, plus police boats and a helicopter. It appeared they were looking for someone in the water. Telescope couldn't compete with all of that, so we packed up.) \$15.44 (\$12.87/hr.) SIRIUS & M42 (Once each for Dominick. Gave him "facts" and star map.)
- 2200) 03/30/09 (MON) HPL-IBID (7:35-8:43PM). 4.5/5 sky, mid-40's, no wind. HH (w/boost from PLW on phone, got myself to go. Reluctant because Mon. & cool. Once there was ok, except a bit bored. 4-d.MOON (First looked for Sat. but then noticed Moon, so switched to it till sky got darker. Lots of craters!) SATURN (Acq. 7:45PM. Nice. 2-moons.) VISITORS (Arrived simultaneously...a man from Bordeaux, the other a Belgian working for Catholic Relief Services in Kenya, both of whom are telescopists. We had a good time talking scopes, and I showed them M42. The former's scope is new, the latter an old hand.) \$12.00 (\$10.53/)
- In 1st 1/2-hr. took in \$1.00, making me think would be record low now, but it wasn't!
- 04/04/09 (SAT) B&A TRAIL GLENBURNIE (10:00-2PM). PLANETS WALK (an International Year of Astronomy--100 Hours of Astronomy public event, organized by Jim Lochner of GSFC.) I was at the Venus point. Planned to do V with scope, but couldn't find. Put scope on stop sign and showed lookers V phases diagram. Partnered with Erin of GSFC. NO HAT Event had decent public participation till noon, at which point it dropped of alot.
- 2201) 04/04/09 (SAT) HPL-IBID (7:25-9:27PM) Cool breeze. 2.5/5.9-d.MOON (80X. Tycho to Copernicus terminator. Lots craters.) SATURN (80X due to poor seeing. Lookers liked. Titan right below left ring.) Busy scene. Lots of enthusiastic young lookers. Could have stayed longer, but crowd seemed less interested. Also, at 8:30PM started getting noise competition from a Rollings S's type band. HESITATION (Yet another mass shooting rpt. on TV news. Imagined HPL would be an inviting locale for a berserk shooter, and for a few mins. considered not going down tonight.) \$59.36 (\$29.24/hr.)

TOTAL THIS PAGE = \$ 358.34

TOTAL THIS YEAR = \$ 899.06

56

- 8 2202)04/05/09(SUN)HPL-BENCHES(7:05-9:28PM). Mild. Sky 4.75/5, then hazy. Accompanied by neighbor kid, Dominick. 10-d. MOON ("South Pole" region.) SATURN(Tonight, Titan to lower right. Nice!) V. busy scene at setup, which gradually diminished. INDIAN FAMILY(Biggest yet...maybe a dozen all ages. I subtly let them know I wanted a decent contrib., and they came up w/\$10, which was a relief.) HH(In very good head... good energy. \$62.05 (\$25.96/hr.)
- 8 2203)04/09/09(THU)HPL-BENCHES(7:45-11:07PM). BIG NIGHT...UNEXPECTED! Arrived to a huge, mid-summer week-end like crowd. Juggler performing to a full house. Lots of families, some with kids in NY Yankee get-ups, as that team played here today. Discovered many families here on "spring break" trip. Mild. Sky 4.5/5 (Adverse rpt. Fully expecting clds by mid-eve., but they never appeared.) Wanted to leave at 10PM but simply couldn't get away! SATURN(3-moons. 135X.) 14-d MOON(Rose from behind aquarium +/-9:30PM. Edge craters, Tycho. HH(In good shape, despite strenuous biking this AM.) HANDOUTS(Ran out of maps, Porco, rings pictures.) VISITS(The Dan O'Donnel family on way from NJ to DC, stopping in particular here hoping to find me, as Dan had such a vivid memory of look-thru my scope at Saturn 5 yrs. ago. As he had once worked at the Hayden Planet., Dan knew Tony Tyson, and his son, Keith, had taken an astro course from him. Amazingly, as we were doing the Moon and I mentioned Crater Tycho, Keith remarked, "He died from a ruptured bladder." He hadn't read Koestler's book but a single page with the description of Tycho's death described by Kepler! Also visited by a woman lawyer from U.K. here for an Antarctic conference.) \$111.27 (\$33.02/hr.) (YEAR = \$1,010.28)
- 8 2204)04/11/09(SAT)HPL-IBID(7:57-10:35PM). EXCEPTIONAL NIGHT!! First contrib. was \$5.00, and it was uphill from there, including a \$40.00 contrib....the first I remember ever getting over \$20.00! Also many more \$5's. Morning rain, then gradual clearing PM. Still some clouds for 1st 1/2-hr., then good. SATURN(80X then 135X. 2-moons, equatorial belt, ring shadow. Lots of wowed lookers!) SCENE(Not as heavy as last night, but lots of spring break families + girls' teams...lacross, volley ball. Could have stayed a bit later but decided to get out while the getting was good!) PAT TRACY(A pre-arranged visit for her to take photos for her photography class. She seemed to enjoy the experience and w/luck got some good shots.) HH(Strenuous day, but good.)\$141.50 (\$53.80/!) EASTER EVE(Tonight was...)NPR(On this eve. news was a segment of Galileo's telescope, and finding Saturn in tonight's sky. Was hoping someone would show up who's heard it, but no luck, which was disappointing in terms of NPR listenership.)
- 10 04/12/09(SUN...EASTERNIGHT) Dry run to HPL & FPT. Traditionally tonight is hoodlums' night in HPL. It's being such a great sky for scoping, went to check it out. Semi-quiet scene, but there were cops everywhere, plus a "mobile police station" parked above Ampithr. Decided not to chance it and returned stuff to car. By 8:30PM HPL looked like last night at 10:30PM. Checked out FPT. Very quiet, w/parking spaces galore. Would not have been a good night to setup there. Maybe skipping tonight was for the best, as have felt tired all day, prob. not recovered from past two nights.
- 8 2205)04/16/09(THU)HPL-IBID(7:50-10:10PM). Semi-mild. 4.75/5. Good crowd at setup, which steadily diminished, till empty at shut down. Still lots of "spring break" families! SATURN(Nice. Many thrilled lookers. Ran out of "facts".) \$105.05!(\$44.89/hr.!)
- 8 2206)04/17/09(FRI)HPL-IBID(7:50-10:47PM). Mild. 4/5. Intimidatingly lg. crowd upon arrival. Many lg. gps of high school, girl volleyball players. Huge crowd watching juggler. Discouragingly slow start...maybe 1/2-hr. before 1st contrib.! SATURN(the usual). VISIT(Gp. of NASA people actually working on Cassini!) HH(A bit depressed...enough that I had(22.5 trouble projecting voice. Despite nice sky, maybe not ready for another night?)\$66.58
- 8 2207)04/18/09(SAT)HPL-BICEN(8-9:35PM). Mild. Cloud delay at start, then some haze. Extremely crowded scene, with groups of rough looking youths. Probably could have stayed, but used haze as an excuse to leave. SATURN(2-moons.) HH(In sl. better head than last night but disconcerted by scene.) \$55.79 (\$35.31/hr.)

TOTAL THIS PAGE = \$ 542.24

TOTAL THIS YEAR = \$1,441.30

- 8 2208) 4/23/09 (THU) HPL-4 BENCHES... as a yellow bottle recycling barrel is now in my usual loc., moved E to other side of green trash can. (8-9:15PM). Semi-mild. Slow start, but then a \$5 + \$20 + 2 \$5's in a row! Also had a huge Indian family that pd. \$1.00. SATURN (2-moons.) HH (Got depressed... out of boredom and being tired of hearing myself say the same thing over and over. Tired of meeting/greeting public, too.) \$60.60! (\$48.48/hr.)
- 8 2209) 4/24/09 (FRI) HPL-IBID (8:10-10:43PM). Mild. 3.9/5. Pretty busy scene. SATURN (2-moons. Couldn't find by the #'s. Maybe wedge angle off? Finally acq. by eye.) HH (A bit depressed but made effort to suppress it. Still, no fun.) PAINTER MAN (Expelled mid-eve. by a city cop. I didn't get to ask him what was happening. Recently he said they told him he had to get on to the performers' schedule.) \$95.62 (\$37.50/hr.)
- 8 2210) 4/26/09 (SUN) HPL-IBID (8:05-9:10PM). Hot & sl. humid. 4.7/5. HH (In ok head. Too bad wasn't busier to take advantage of it!) Kind of an ignoramus crowd. Lots of no-pays. SATURN (Acq. 9-min. after sunset. Had spent 5-mins. searching, then it was right on the mark, telling me that shouldn't expect to find it till 9-10 mins. after ss.) \$26.31 (\$24.1')
- 8 2210) 4/27/09 (MON) HPL-IBID (7:58-10:30PM). Short pants/short sleeves weather. 4.5/5. THE TIME OF THE SWINE FLU SCARE (Outbreak began recently in Mexico, where +/- 100 have died. Less virulent strains in NYC, Barcelona, NZ, Canada. It crossed my mind to suspend telescoping for the duration, but went anyway. No signs of sick people in HPL.) Nice sized crowd... not nearly so intimidating as on the week-ends. HH (Started ok but got depressed as evening wore on.) SATURN (Guessing I had a good alignment, went for it with 80X. Found on 3rd sweep! Two moons. Nice!) \$90.81 (\$35.89/hr.)
- FIGHTS PROMPT MORE INNER HARBOR PATROLS--TWO TEENS STABBED AS UNRULY YOUTHS DESCEND UPON AREA (Balto. Sun 04/28/09). Art. rpts on roudness which occurred Sat. night in HPL (Thankfully, I wasn't there!). From art.: "...many people appeared intimidated by packs of predominantly unsupervised youths 10 to 12 strong running across the outdoor promenades and through the enclosed malls... a 16-year-old boy was then beaten and stabbed in the upper chest... some businesses closed early... people could not come into the bldg., and those who were here, we told them to stay and enjoy another drink because it wasn't a good time to leave..." etc. HH (Am thinking I should skip HPL for a while on Sat. nights to see if situation settles down, esp. since I'd be using BICEN, where I am pretty isolated from security and an easy target. Am nervous about BICEN, anyway, because it's where some youths tried to steal my contribs. hat.
- 8 2211) 4/28/09 (TUE) HPL-IBID (7:43-10:08PM). Warm. 4.2/5. HH (Sl. tired... watching the clock... trying to stay till 10PM.) 3-d. MOON (Briefly. Good craters.) SATURN (Titan parked on 2-o'clock rim... a good focus test for lookers.) \$20.00 CONTRIB (Toward 10PM, a young man handed me a \$20.00 bill and said, "Show me something." At that very moment Saturn disappeared in a long cloud. I told him it will be a while till it returns, whereupon he said, "Show me anything." I showed him Arcturus. He said, "Wow!", and left, leaving the \$20 bill. Shuu! \$62.29 (\$25.85/hr.)
- 8 2212) 05/10/09 (SUN) HPL-BENCHES (8:10-9:58PM). Sl. cool. 4.2/5. PLW's #85. 11-day hiatus due to rain. SATURN (Acq. early on 3rd sweep, but then real bad cloud problem 1st 30-mins. Stuck w/85X. Lots of enthusiastic lookers!) VISITS (Many police office patrolling, some of whom looked at Saturn.) \$50.13 (\$27.85/hr.)
- 8 2213) 05/12/09 (TUE) HPL-IBID (8:05-9:49PM). Mild. 4.3/5. PLW's #86. SATURN (Acq. 5-min. before ss by sweeping. 1-moon. Mostly 80X.) Lots of pleased lookers! VISITS (A man who remembered looking thru scope at Sat. in Fpt. 20-yrs. ago. Smitty... passed by. Man w/yarmulke who I remembered from PO & Jewish Festival and was pleased I said so.) \$31.03 (\$17.83/)
- 8 2214) 0515/09 (FRI) HPL-IBID (8:15-11:18PM). PLW's #87. Adverse weather rpt. but good sky. Warm. PREAKNESS PARADE NIGHT. V. busy scene, which cleared out for parade and then returned. SATURN (110X... great in twl., but not so good in dark. Went to 135X. 1-moon.) Many very appreciative lookers. Several who'd looked at Saturn in Fpt. yrs. ago. HH (Long, hard day, incl. bike ride to City Hall for Bike To Wk. Day, Macy's for Emile's present, Trader Joes, Home Depot for flwrs. & mulch, patching front steps, then scoping! Really tired at stint end!) VISIT (Frankie, who looked good.) \$98.83 (\$32.40/hr.)

TOTAL THIS PAGE = \$ 515.62

TOTAL THIS YEAR = \$1,956.92

- 8 2215)05/18/09(MON)HPL-EAST LIP(8:22-10:15PM). Winter sweater weather. PLW's #88. Somewhat hazy for 1st hr., then good. Steady stream passersby. Lookers from "materials" convention. SATURN(80X-110X-135X. Titan 1st noticed by lookers. NEWLY ENGAGED COUPLE(Was 1/2-way thru close down when a young couple appeared announcing they just became engaged and asked us to take their picture. HH took some photos then, wanting to add an extra memory to their night, put lens on scope and showed them Saturn. Then took more photos with them at scope holding TONIGHT SATURN AND ITS RINGS sign.) \$46.80 (\$24.89/hr.) YEAR=\$2003.72!
- 8 2216)05/19/09(TUE)HPL-IBID(8:15-10:16PM). Mild. 4.9/5 sky! PLW's #89...last time for this visit. Will be missed! SATURN(1-moon. Many very excited, appreciative lookers. 110X, the 165X, then 135X.) Lots of "materials convention lookers. \$85.51! (\$42.33/hr.!)
- 8 2217)05/20/09(WED)HPL-IBID(8:20-10:26PM). Mild. 2nd in a row unequivocally cloudless sky! PLW (Back in StL.) SATURN(Many amazed, satisfied lookers. 2-moons. Some no-pays who should have paid.) COLIMATION(S. looked sl. mushy at 135X. A slight tweak greatly improved image.) HH(Good energy and head.) \$64.90 (\$30.90/hr.)(Tmw. Alin's PhD. party.)
- 8 05/22/09(FRI) DRY RUN TO HPL.(8-9PM). Set up tripod but not scope. The clouds which I thought would dissolve at sunset never did, and I finally gave up. Busy scene. LOTS of police in evidence, one telling me they'll be there on week-ends to keep away gangs of young kids. HH(Somewhat depressed.) CLOSE CALL!(When I picked up scope case to place it on handtruck, the lid fell open and the scope started falling out. Luckily I saw it in time!
- 10 2218)05/30/09(SAT)FELLS PT.!(7:47-11:35PM). WHY FPT.?(Knowing that at HPL would be at BICEN and, given recent week-end problems in HPL, feeling I would be isolated and vulnerable there, decided to try FPT...my 1st. Sat. nite there in +/-decade. My parking worries vanished when a car exited a prime space as I was arriving! Upon arrival was greeted by balloon man Charlie, a familiar face. Set up in my old loc., mid-Sq. near Thames St.) HH(To celebrate the occasion, wore white ducks & shoes. Being back felt ok, but mid-way thru started getting depressed by the boring repetition, which made things harder.) SCENE(Pretty busy...many 20 & 30 somethings. Good Zydeco grp. on B'way. However, 1st obnoxious trumpet blower on bench 50' away who never stopped.) SATURN & 6-d.MOON. S. clear enough to do latter 38-min. before ss.) VISITS(Frank Roylance & wife; "Bob", who was real familiar but from where? Steve Schulhoff & family.) \$120.01 (\$31.58/hr.) "STEREO"HOLOGRAPHIC NASA CARDS(1st night w/new batch recv'd. from
- 7 2219)05/31/09(SUN)HPL-E.LIP(8:00-10:40PM). Mild/chilly. 4.9/5! V. loud jazz band at arrival. Didn't want to go BICEN, so decided to tough it out. Fortunately stopped 8:10PM. Peak nite in HPL! Good traffic, nice people, enthusiastic kids, no problem people. HH(In peak shape. Hi energy, articulate, non-depressed!) 7-d.MOON. Started on w/polarizer.) SATURN(2-moons. I hyped it v. well.) VISIT(Wally, young man who used to live across st.) \$89.94 (\$33.69/hr.)
- 10 2220)06/06/09(SAT)FPT.(8:37-11:23PM) ss-8:30PM. Sl hazy sky. 3.5/5 for Saturn. PARKING(Lucky again and got an ok spot almost immed.!) 13-d.MOON(While rising, then intermittently. Tycho.) SATURN(Unsteady. 110X, then 80X. Still, lookers amazed!) HH(OK.) VISIT(Ted Skorko, son of Leonard, grandson of Bill & Marilyn O'Connor. Jay.) \$73.94(\$26.79/hr.)TRUMPETMAN (Sits on a bench 50' away Blowing a mixture of cacophony and bits from "Wizzard of Oz", loudly enough to interfere with my talking to lookers. Balloonman Charles asked him to face away from me, which he did and which was helpful. Later, Trumpetman came over, we shook hands, he declined to look at Saturn. I thanked him for pointing away from me and asked if he'd use a mute. He replied, "Never."
- 8 2221)06/14/09(SUN)HPL(8:42-10:27PM). Ok sky at start, but thickening haze forced close down. Accompanied by neighbor, Dominick. SATURN(One looker claimed seeing 3 moons!) Stint made harder by lots of little kids! HH(No prob. getting back after a 7-d. rain delay, but got bored and sl. depressed.) Gave out lots of stuff. \$62.17 (\$35.53/hr.)

TOTAL THIS PAGE = \$ 543.27

TOTAL THIS YEAR = \$2,500.19

- 7 2222)06/21/09(SUN)HPL(9:32-11:07PM).PLW's #90! Delayed start due to clouds uncertainty + procrastination on the part of HH. SATURN(Lots of enthusiastic lookers.) PARKING(Gate down, speakerphone still broken, so PLW had to get to office to get gate raised.) Good sky. Mild. \$47.70 (\$30.00/hr.)
- 06/22/09 DRY RUN TO HPL. We took a chance on the clouds, but they never allowed.
- 16 07/13/09 DRY RUN TO HPL--TWICE! Have been on a 15-d. vacation with PLW--Helsinki, Barcelona, Andorra w/Ken & family, Helsinki, NYC w/Eve & fam. Removed superfluous keys from keyring for trip, incl. one to scope case. In setting up at HPL discovered key missing from ring. PLW stayed w/scope while I raced home for key. Upon getting back at 9:20PM. discovered clouds moving in. Repacked scope and went home. Thick clds. vis. @ home Arriving at HPL without scope key was a first!
- 7 2223)07/14/09(TUE)HPL(8:49-10:10PM).PLW's #91! Good sky. Comfortable warm. CALVERT ST. GATE (We used PLW's cell phone to get guard to open gate, instead of her having to walk around block to Guilford Ave.) SATURN(Acq. 1st try! Small, somewhat fuzzy image. Rings seem more edge-on. Nevertheless, most lookers impressed. 80X. lost at 10:04PM. Titan dim, so did not call attn. to.) \$57.70 (\$42.74/hr.)
- 8 2224)07/18/09(SAT)HPL-BICEN(9:10-10:20PM). GATE(Called ahead, but guard forgot, gate down, so walked to guard office. She apologized.) Accompanied by Dominick (PLW back in STL). Delayed start due to clds. & gate. SATURN(Surprisingly low in sky. 80X. Nevertheless, most lookers liked. Let it go 9:40PM.) ALBIREO(No sign, didn't recruit, many no-pays, gave it up after 1/2-hr.). JUPITER(Low in SE on drive home.) \$32.21 (\$27.77/hr.) This may be about the end of a great Saturn run! Pizza w/Dominick on way home.
- 9 08/16/09 DRY RUN TO FPT WITH FRANK & THOMAS. Clouds moved as we arrived. Fairly slow looking scene...nothing like what HPL would be.
- 9 08/20/09 DRY RUN TO FPT WITH DOMINICK. Again, scene nothing like HPL. No families seen.
- 08/23/09(SUN)FPT(8:43-10:19PM). FINALLY BACK TO TELESCOPING! Felt OK. HH in good he Didn't miss a beat, despite the long hiatus. Steady traffic early, which gradually dropped off. JUPITER(1+3+stripes. Lookers awed!) \$46.49 (\$29.06/hr.)
- 8 08/24/09(MON)HPL(8:12-10:27PM). DECISION TIME!(Considered both FPT & HPL. From FPT would do Moon till Jupiter arriged, whereas in HPL no Moon. Figuring FPT would be v. quiet, did HPL. No Moon, but J avail. almost immediately!) W.LIP. V. Busy stint, made tougher by semi-loud music from Ampith. JUPITER(2+2. Stripes. Nice!)\$84.34 (\$37.48/hr.) HH(This is VERY hard work. Constant explaining, adjusting scope, giving out ed mats., plus having to talk over loud music, standing up the whole time, carting stuff!) Not exactly fun. Maybe a slower FPT would have been more fun.)
- 8 08/25/09(TUE)HPL W.LIP(8:07-10:34PM) Accompanied by Dominick. Good sky, HH(Felt pretty beat leaving house but was fine at the scope.) JUPITER (1+3. V. nice!)\$62.25(\$25.41/hr) Slower than last night, but that was ok. Needed a more relaxed stint!Dominick V.helpful! Compensated him with a slice of pizza bought on way home (one for me, too!).
- 8 08/26/09(WED)HPL(8:20-10:27PM). Delayed start due to clouds Q. VERY TOUGH STINT...MOON 2228) W/SUCKER HOLES, THEN JUPITER W/SUCKER HOLES, LOUD STEEL DRUM BAND, STICKY HOT, LOTS OF LITTLE KIDS, HEAVY TRAFFIC! 6-D. MOON(Good craters, while it lasted.) JUPITER(4, then 3, then 2, the only 1 moon. Still, lookers liked it.) \$84.00(\$39.62/incl. 2x\$10's.NO COINS!
- 9 08/29/09(SAT) DRY RUN TO FPT. Nice afternoon. Then clouds beginning to appear early eve. Went anyway, hoping would be ok. Got parked pretty well. Cloud burst +/-8PM. Accompanied by neighbor Janet Rawlings, whose 50th birthday is today. Took photos of her at home, then we headed down. Had beer & wine at Berthas (\$10.00 + tip!). Then I had an icecream. As storm approached I suggested we go home, but she wanted to stay, saying she'd get home on the bus(!). Am guessing she wanted to wander around and maybe meet a guy. She was very nicely dressed.

TOTAL THIS PAGE = \$ 414.69

TOTAL THIS YEAR = \$2,914.88

- 8 2229) 8/30/09(SUN)HPL W-LIP(7:38-8:38PM). Nice day but clds. appearing early eve. Took chance would clear, however clds. slowly got thicker, forcing me to quit. 10-d.MOON (TYCHO region. Good at first, then sucker holes.) \$22.00(\$22/hr.)
- 2230) 09/01/09(TUE)HPL-W*LIP(8:13-10:44PM). Sl. late start due to WIA mtg. Great sky. Mild temp. CLOCK DRIVE(Stopped working 10:15PM, so tracked manually. At home plugged into wall socket, and it worked fine. Will give battery a long rechg. If that fails, I need a new battery.) 16-d MOON(Tycho w/rays. Decent craters on terminator.) JUPITER (1+3. Stripes. Nice!) Busy. Generous contributors! \$99.85 (\$39.78/hr.)
- 8 2231) 09/02/09(WED)HPL W-LIP(7:38-10:22PM). CLOCK DRIVE(Thanks to a 20h battery chg., it worked fine. Whew!) 13-D Moon("Starburst"Tycho at its best, with good terminator craters.) JUPITER(1+1 evenly. Nice. Tomorrow, from 00:43 to 02:29, Jupiter will be sans moons, an event that won't happen again till 2019.) 4.75/5 sky. Mild. \$70.55 (\$25.75/hr.)
- 8 2232) 09/03/09(THU)HPL-W.LIP(7:45-10:40PM). Good sky. ALIGNMENT(Way off. Had to rotate tripod +/-5° east. Why, suddenly?) JUPITER(2+1.) 14-d.MOON(Not quite full. Tycho + terminator craters. V. nice.) SNEEZES(Mid-eve. began sneezing violently with runny nose. Felt like I was being hit really hard by something. Snorted H2O from my water bottle which, happily, seemed to cure me! DELAYED LEAVING(Was 2/3's packed when two guys appeared who seemed genuinely interested in looking. More people kept arriving, and ended up staying an extra 38-mins. Did B CYG and URANUS, as well.) A VERY HARD NIGHT DUE TO CONSTANT STREAM OF LOOKERS, LOTS OF LITTLE KIDS, AND BARRY BLABBING AWAY! \$87.05 (\$33.74/hr.)
- 9 2233) 09/04/09(FRI)FELLS PT.(8:11-12:08PM). Went there because a) would be easier to judge the early evening clouds situation than in HPL and b) was worried about loud music in amphitheater. After clouds left, a good sky, tho some background glare from street lamps. Long wait to park, then had to use handtruck to get equip. to sq. JUPITER(3 then 4. Good belts.) 15-d.MOON(Few hrs. past full. Tycho + term. craters. Sometimes at 50X w/filter. Lookers liked view!). VISIT(Jay, who watched stuff while I went for car. Lena, from Liberated Singles, who hung out a while.) \$170.51! (43.13/hr.)
- 2234) 09/05/09(SAT)FPT(8:00-11:39PM). Mild, good sky. PARKING(A 10-min. wait, then had to race someone for a space. Parking uncertainty is the only drawback to FPT.) LOCATION (Initially, Jupiter right over street lamp. Enlisted Charlie the balloon man to help me move 10' westward.) JUPITER(2+2, stripes. Good!). 16-d.MOON(Still the Tycho region, but with lots more terminator craters.) \$179.77 (\$49.25/hr.) ENTHUSIASM(Have always thought that even if a speaker is speaking gobbledygook, if he/she is enthusiastic the audience will be appreciative. Am thinking that a big reason for my recent good results moneywise is the enthusiasm I put into my explanations of what lookers will be seeing. Part of my enthusiasm is inspired by my love of the objects themselves, and part by the subconscious knowledge that it will inspire contributions!)
- 9 2235) 09/18/09(FRI)FPT(7:30-9:45PM). Mild. Good sky, then clouds. Accompanied by Dominick. Slow scene compared to what HPL would have been. JUPITER(4 on L, then 3. Sl. murky image. Some enthusiastic lookers.) HH(1st stint since having spent 8-d in STL with Phyllis.) \$52.97 (\$23.54/hr.)
- 9 2236) 09/;9/09(SAT)FPT(7:30-11:00PM). Great sky. Uncomfortably (for me!) cool. Accompanied by DOMINICK who helped explain Jupiter to waiting lookers. JUPITER(1+1, 2+1, then 2+2. Very nice!) URANUS(Several times. Stickers much appreciated!) HH(In V.G. head. Articulate.) \$85.25 (\$24.36/hr.) Lots of nopays. Only one \$5 contrib. WALLOPS IS. AEROSOL RELEASE(I'd forgotten about it and only saw the tail end as it dissolved away. However, lots of lookers saw it and asked what it was. Apparently, at first it was v. bright.)
- 9 2237) 09/27/09(SUN...Yom Kippur)HPL(7:22-8:58PM). Mild. Gd. sky. PARKING(Calv. St. gate closed. Had to drive to office, and around again when gated opened. Must remember to call ahead!) JUPITER(1+1, the 1+0! Ganymede shadow.) 9-d. MOON(Start of sunrise on Copernicus) Lots of families w/kids. HH(Held up ok. Gave out lots ed. mats.) \$48.96 (\$30.60/hr.)

TOTAL THIS PAGE = \$ 816.91

TOTAL THIS YEAR = \$3,731.79

- 8 2238)09/29/09(TUE)HPL-W.LIP)6:55-9:15PM. Cool, breezy, sl. adverse weather rpt. but great sky, + decently busy scene. Jupiter $2\frac{1}{2}^{\circ}$ below Moon...a great paring! JUPITER(1+2, then 1+3.) 11-d.MOON (Tycho region.) HH(In good head. Have been feeling really good lately both on bike and w/scope. Could it be all the basil I'm eating?) \$56.56 (\$24.27/hr.) URANUS(1X at end for myself. A "little green dot"!)
- 8+8= 2239)09/30/09(WED)KIPP BALTIMORE (aka DBA Kipp Ujima Village Academy, 4701 Greensp. Ave. Invitation from Bill Stapleton, 1-585-414-4019, Who'd looked thru my scope downtown.) Incredible stint! Mostly cloudy sky, which began clearing just in time for event. Set up on tennis ct., using mag. compass to align...which worked well. I started by giving a talk on the Moon and Jupiter.to the gatheredkids & parents. Everybody formed a long line, kids then parents. Used straight thru for kids and diagonal for parents. Everybody seemed to appreciate their look. 12-d.MOON (v. slight cloud problem.) JUPITER(2+2. More of a cloud prob., slightly "sucker hole situation. However, got thru it ok.) 96"I Saw Jupiter" stickers dispensed. Including Moon, that means I had 192 lookers!\$50.00(\$25/hr.) *Visited site Mon. to find right spot to set up.
- 16* 2240)10/01/09(THU)HPL-W.LIP)6:50-9:30PM). Cool. Heavy sweater + cotton shirt. Pristine sky, till shut down by clouds (mercifully, as I'd had enough!). Week-night & cool, but steady stream of lookers! Got 4 x \$5.00 very early on! 13d.-MOON(Tycho + terminator craters. Very nice!) JUPITER(3+1.Ganymead shadow v. prominent whole time.) \$84.27! (\$31.56/hr.) PARKING(I called ahead and Calvert St. door opened for me.)
- 8 2241)10/04/09(SUN)HPL-W.LIP(7:04-9:10PM). "Sucker holesat first but then ok. LAST NIGHT(A perfect sky but didn't go, as not sufficiently recovered from previous night of assembling a packet of 13 photos for SciencePhoto Library, which I mailed Sat. AM.) JUPITER(3+1, then 2+1. Good "stripes". Lookers enjoyed!) MOON(18-hrs. past full. Tycho & terminator craters. Lookers liked it!) HH(Good, but sl. depressed. Had to force patter a bit.)\$76.20 (\$36.29/)
- 8 2242)10/05/09(MON)HPL-W.LIP(6:55-9:35PM). Pristine sky & seeing. Mild. HIP DISCOMFORT(If it's not prostate cancer...it seems associated w/physical movement...maybe it's a recurrence of the hip pain I had before buying the handtruck. I'm not carrying the scope nearly much, now, but maybe there's anage factor at work.) JUPITER(3+1, then 2+1. Nice.) U (Just for myself.) 17-d.MOON(1X. Great terminator craters.) STRANGE STINT(Had 1/2-hr. with no lookers. New juggler in Amphith. w/sizable audience. Stayed till he finished hoping to capture some of them, which happened. Got my only \$5's then.) \$69.10 (\$25.98/)YR.\$4,067.92
- 9 2243)10/09/09(FRI)FPT(6:55-9:40PM). Intended HPL, but garage full. Good sky till shut down by clouds. However, annoying wind, which got ever stronger. Removed dew cap to stablize. scope. PLW's #92. She took charge of scope for a few mins. and had some lookers. A first! JUPITER (3+1. Stripes. Calisto way to right.) L-CROSS ROCKET CRASH INTO MOON(Occured 7:30 AM. Was supposed to kick up dust to detect H2O. However no dust detected. Awaiting data re H2O presence. Lots of lookers asked about it.) \$91.22 (\$33.17/hr.) VISITS(A grand-daughter of Alice Brock. Afghanistan vets saying stars very bright from there.)
- 8 2244)10/11/09(SUN)HPL-W.LIP(6:36-8:57PM.) Great sky. Mild. PLW's#93. SET-UP TIME(From home to fully set-up = 45-mins.) SS = 6:33PM. JUPITER(2+2. Stripes. \$92.04 (\$39.17/hr.)
- 8 2245)10/13/09(TUE)HPL-W.LIP(6:53-7:38PM). Partly cloudy day but "clear" tonight rpts. However, clds. got ever thicker, forcing shutting down. PLW's#94. JUPITER(1+2) \$8.04 Adjourned Diss;
- 8 2246)10/19/09(MON)HPL-W.LIP(6:40-8:40PM). Chilly. Grt. sky. PLW's #95. JUPITER(2+1, then 2+2.) VISITS(Young Taiwanese cpl. on honeymoon. Lots lookers Food Ser.Equip conv.)\$33.83(\$16.92/)
COMET CARDS(1). URANUS(1X. Able to give out 3 I Saw URANUS stickers.) HIGH TIDE to ledge.
- 8 2247)10/20/09(TUE)HPL-W.LIP(6:40-7:40PM). Lots of clds. on drive down, but decided to chance it It worked for 1-hr. till more clds. arv'd. Busy 1-hr.! PLW's #96. Mild. JUPITER(2+1. Bands fairly clear.) Lots of enthusiastic lookers. \$37.71 (\$37.71/hr.)

TOTAL THIS PAGE = \$ 598.97

TOTAL THIS YEAR = \$4,330.76

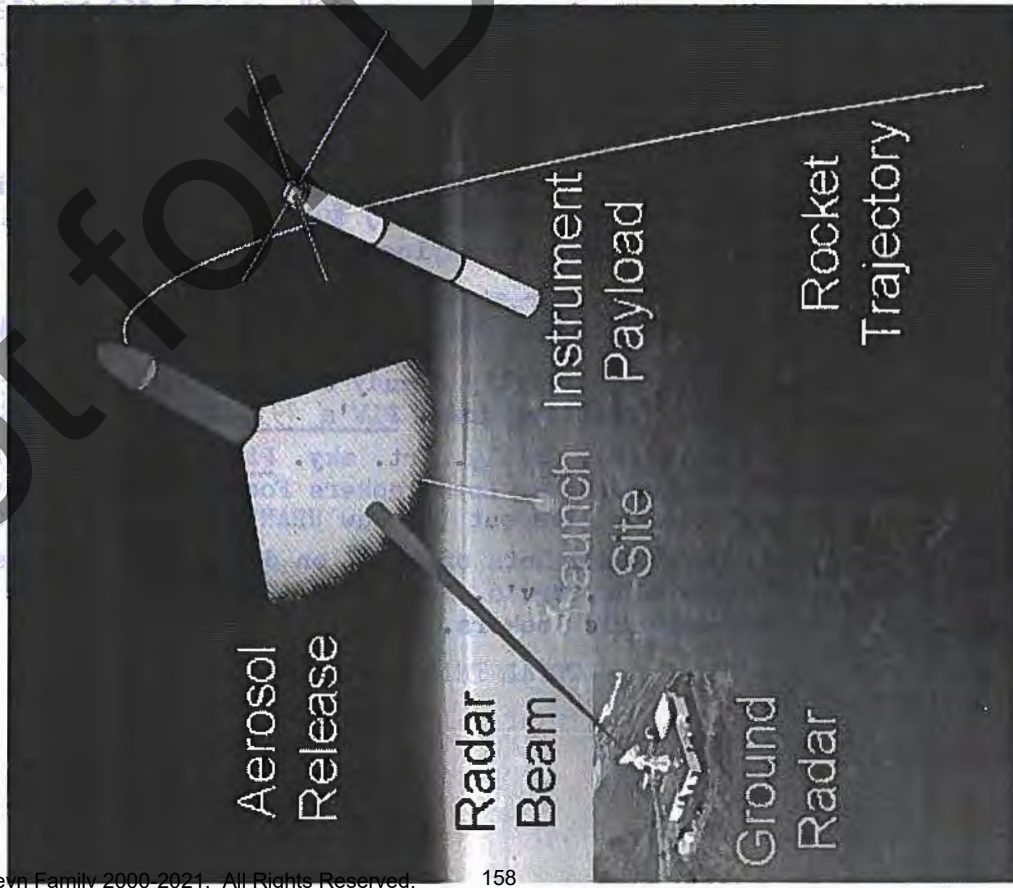


Charged Aerosol Release Experiment Modified/Enhanced CARE Concept

Objectives: Examine the effect of artificially-created, charged-particulate layers on the penetration of UHF, L-Band and S-Band radars.

Design and build a rocket payload with a chemical release and instruments to solve the mystery of radar echoes from dusty plasmas

Description: A series of rocket experiments will be conducted to test the theories for radar scatter from charged dust.



Radar and In Situ Diagnostics of Artificial Dusty Plasma Cloud

- Rocket Experiment
 - Chemical Release (280 km Altitude, 111 kg)
 - Instrumented Payload
 - Radio Beacon (CARE I)
- Ground Radars for Backscatter Observations
- Launch Sites
 - Wallops Island, Virginia (CARE I 2009)
 - Andoya, Norway or Poker Flat, Alaska (CARE II)
 - Kwajalein, Marshall Islands (CARE II Alternate)
- Supporting Theory
 - Chemical Release: Plume Model
 - Particle Dispersal: Monte Carlo Simulations
 - Plasma Turbulence: Electrostatic PIC Code
 - Radar Scatter: Electromagnetic Theory

- 2248)10/21/09(WED)HPL-W.LIP(6:20-9:07PM). Mild. Great sky! PLW's #97! Unbusy scene but steady traffic. JUPITER(2+2. Stripes. Nice!) VISITS(A father w/16-yr. old daughter who remarked 2-comet cds. that she'd first look thru scope as a small child in FPT. Woman from MN who's son is an astrophysicist at Carneige Inst. in CA.) Good stint. Lots of nice lookers! \$75.09 (\$26.91/)
- 2249)10/25/09(SUN)HPL-E.LIP(6:04-6:55PM). PLW back in STL. Though lots of clouds, such a pleasant late afternoon, decided to give it a try. However, plagued by sucker holes, so gave up. Too bad, as I had lots of eager potential lookers! Might have worked had I held out till 8:15PM! 7-d.MOON. JUPITER(2+2.) RIGHT KNEE(Pain present when pushing scope up inclines. Unpleasant!) \$16.00 (\$18.82/hr. SOLD 6 COMET CARDS!
- 2250)11/03/09(MON)HPL-TRASH CAN...hi tide worry pushed me back from lip...which turned out fine(5:15-7:45PM). Busy scene which quickly slowed. However, had pretty steady flow of lookers. JUPITER(3+1. Stripes. Nice!) 16-d.MOON(Edge craters. Rose 6:35PM over E end of Light St. Pav. heading for WTC.) BATTERY(Died after 2-hrs. REALLY need replacement!) VISITS(Group of MICA stds., one of whom just bought a 10" Dob and was v. interested in astronomy. I recommended Koestler's Kepler book.) HH(Was reluctant to go per clouds q's, plus was imagining bleak \$10 night. It turned out differently!) \$60.69 (\$24.28/hr.) MICA KIDS(Spent inordinate time w/them trying to photo Moon, + my unsuccessful search for Uran.
- 2251)11/06/09(FRI)HPL-IBID. Surprisingly busy scene. Steady flow of lookers.(5:24-9:16PM). 1st cold night....38°F. Once I decided to quit, had trouble leaving due to more lookers. JUPITER(4 on L. Very impressive!) URANUS(3 times failed to find!) BATTERY(Failed, even after 24hr chg. Def. need new one!) HH(OK head.) \$103.19 (\$25.66/hr.) Sold 4 comet cds.
- 2252)11/07/09(SAT)HPL-Between benches E. of trash can(5:35-9:35PM). PEAK NIGHT IN HPL! Perfect sky, mild (47°F), busy scene....tho next to no interest 1st 15-mins. HH(Magnificent! Hi energy, enthusiastic, articulate. Great with kids. Am thinking lookers contribute not because they are considering my welfare, but because I put on such a good show!..a major new insight into my routine!) FELLOWS PT.(Went there thinking would be a big band at HPL. Place looked dead...parking places galore. Swung around sq. and headed for HPL...a great decision. No big band. But for painterman, I was only performer) Lots of families. JUPITER(2+1. At 9:15PM finally 2+2. J getting lower. Prob. would have lost by 10:30PM). BATTERY(Died at 7:25PM. Used 110X alot tonight, for which hand tracking worked ok.). Gave out the last of the STEREO holograms. \$183.43! (\$45.86/hr.) ((week = \$347.31))
- 2253)11/08/09(SUN)HPL-IBID(5:08-7:13PM). Busy scene at SU, which dropped off rapidly. Mild. 70°F! JUPITER(2+2. Stripes, which am now calling "cloud formations" V. clear.) Sold 5-CC's. Like last night, v. slow at start. \$48.51 (\$23.21/hr.) ISS(Great flyover 6:15PM. Attached announcement sign below Jupiter sign, but it din't have a noticeable effect.)
- 2254)11/15/09(SUN)HPL-IBID(4:50-7:37PM). Mild. 72°F! Busy scene at start. NEW BATTERY(Retired old one, which had been in service since 01/20/99! If the new one is ^{also} destined to live 10-yrs. too, I hope I'm around for its full lifetime!) JUPITER(2+2. Many remarked on its beauty. 80X & 110X.) URANUS(with the assistance of Vinny, a software guy from Phila., who guided me to it with his Googlephone. Amazingly, it has a sky map and GPS, so any where he pointed it, that part of sky was on screen. He held it on front of dew cap and talked me to Uranus!) BIG FAMILIES(Lots of big, Latino families w/little kids. Rough!) RAIN BREAK (1st time back after solid wk. of rain & clouds.) PARKING(Called ahead and was told a truck blocking entrance, and that it would be there for a while. I chanced it and got in ok.) \$95.50 (\$34.23/hr.) SOLD 2 COMET CARDS. THIS WAS THE 1ST STINT OF MY 23RD YEAR ON THE STREET
- 2255)11/16/09(MON)HPL-IBID(5:00-7:28PM). Chilly. Excellent sky! Slow scene w/ intermittent passers-by. JUPITER(2+2, then 2+1. Fine. 110X) ALBIREO(1X for 2 nice moms & daughters, after trying hard but failing to find Uranus.) VISIT(Woman who attended my 06/08/04 TOV expedition in Druid Hill Park and was still excited about it, esp. the cicada connection!) HH(In VG head, tho tired.) VISIT(Kendall, who contrib'd. \$20.00) \$50.86 (\$20.59/hr.) 1-COMET CD. LEONIDS(Several lookers asked about tomorrow morning's shower, indicating they were going to try to see it. I advised, "You've got to get away from the city lights. I might try to pick-up meteor caused FM station enhancement around 4AM.)

TOTAL THIS PAGE = \$ 633.27

TOTAL THIS YEAR = \$4,964.03

Rambling Through the Skies

SOME CHINESE CONSTELLATIONS OF SUMMER

THE ENJOYABLE aspect of naked-eye stargazing is finding and naming your own "mini-constellations." The sky is full of attractive little stellar groupings waiting to be sought out. And even if light pollution renders them invisible to the unaided eye, binoculars more than compensate.

Many of these groups are not part of the main constellation patterns as we usually delineate them, so they tend to be overlooked. The ancient Chinese, on the other hand, took note of a number of these little asterisms and made them into separate constellations, often using stars to the very limit of naked-eye visibility.

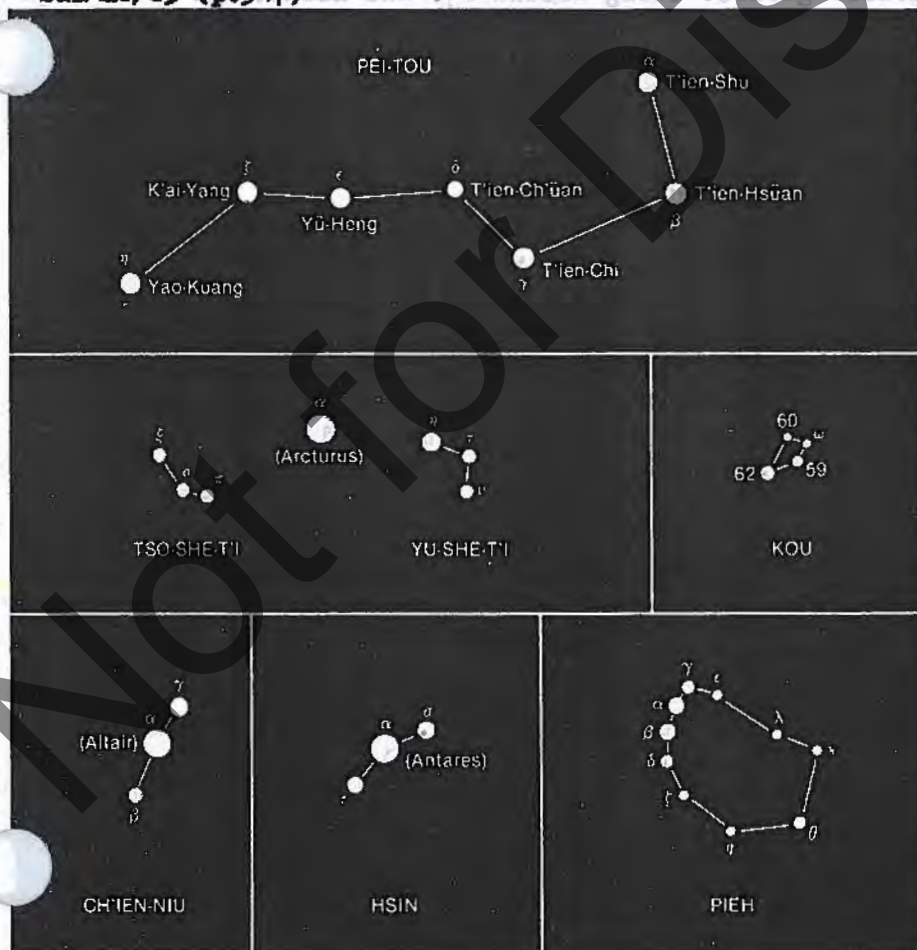
About a year ago I received a copy of *Stars of Jade* by Julius D. W. Staal, a detailed review of early Chinese constellations. I reproduced some of them in last October's Ramblings. These exotic asterisms have always interested me, since most are completely different from our traditional groupings, but the Staal book really got me hooked. So here are some that can be viewed in the skies of summer.

The top one illustrated below needs no * **S&T 10/85 (p.347)**

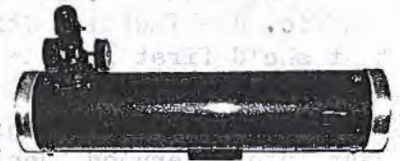
introduction. Our classic seven-star Big Dipper has been considered a single group by the widest variety of peoples, no matter what they interpreted it as being. The Chinese were no exception.

Often they saw a particular gathering of stars in several different ways and gave it several names. One of these for the Dipper was the Northern Bushel, *Pei-Tou*, a utensil for measuring corn on its way to granaries. Another name, comprising only the four bowl stars, was the Imperial Chariot, *Ti-Ch'e*.

Many of us remember the phrase "arc to Arcturus" for following the curve of the Dipper's handle to locate that bright star. The Chinese delineated two compact asterisms flanking Arcturus, *Tso-She-T'i* and *Yu-She-T'i*. They represent the left and right ministers, respectively, accompanying the emperor. The left group, strangely, omits a brighter fourth star just below it, Zeta Bootis. This star shows on our monthly charts as an appendage sticking southeastward from Arcturus, while the three "left ministers" are too faint to be included. Perhaps the Chinese re-



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MYLAR SOLAR FILTER — Full aperture, mounted in machined cell ready to attach to telescope. We use one layer of the highest quality Mylar aluminized on both sides to our specifications for superb optical performance.

| | | | | |
|-----------|--------------|------|------|------|
| Aperture: | 2.4" or 3.1" | \$27 | 10" | \$52 |
| | 4" | \$29 | 11" | \$66 |
| | 5" or 6" | \$32 | 12½" | \$79 |
| | 8" | \$39 | 14" | \$94 |

Binoculars up to 80mm aperture \$55 (pair)

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| APERTURE (Mounted) | | APERTURE (Unmounted) | |
|--------------------|-------|----------------------|-------|
| 2.4" | \$39 | 2.4" | \$28 |
| 3.1" | \$42 | 3.1" | \$32 |
| 4" | \$49 | 4" | \$39 |
| 5" | \$64 | 5" | \$52 |
| 6" | \$87 | 6" | \$55 |
| 8" | \$120 | 8" | \$109 |

Binoculars to 80mm aperture \$96 (pair)

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- 8 2256) 11/20/09 (FRI) HPL-BENCHES (5:30-8:20PM). Chilly. OK sky. Decent scene. Toward end had a long stretch of no lookers, tho there were passersby. JUPITER (2, then 3. As it gets lower glare from light are washing it out a bit. A BUMMER (1/2-way thru closing down, a man came along w/5 young women asking to look. I put eyepiece back on and worked hard each of them...all for \$1.00. I was pissed.) 4-d. MOON (For +/-1.5 hrs.) LEONIDS (A couple reported seeing 7 from Columbia!) \$50.32 (\$17.78/hr.) YEAR = \$5,014.35 1-COMET C.
- 8 2257) 11/22/09 (SUN) HPL-IBID (4:29-6:55PM). Sl. chilly. Pristine sky. Busy scene, as football gm. (Colts 17, Ravens 15) just ending. Some lookers in Ravens garb. CALV. ST. DOOR (Closed, even tho had called ahead. Luckily, spotted hotel employee who notified S.O. Is a real pain when door is closed!) JUPITER (3+1. "Beautiful" is the only word which applies! Lookers very impressed.) 6d. MOON (Very sharp, thanks to the good seeing. Lookers amazed.) URANUS (Finally....for myself by offsetting from J.) \$84.13 (\$34.48/hr.)
- 8 2258) 11/28/09 (SAT) HPL-IBID (4:45-7:33PM). Heavy coat/gloves weather at start, then a warming trend. Good sky. Pretty busy scene. THANKSGIVING WEEKEND (Lots of families/kids.) HH (After 5hrs. w/cards at Fmrs. Mkt, light lunch, 1/2hr. nap. Whew!) 12d. MOON (Tycho region.) JUPITER (2+1, then 2+2.) \$100.25 (\$35.80/hr.) SOLD 3-COMET CDS.
- 8 11/29/09 (SUN) DRY RUN TO HPL. Nice, mild day w/increasing clds. mid-afternoon. Whelled scope to Promenade hoping sky would clear after ss, but it didn't. Fairly busy scene, with lots of Ravens and Steelers fans heading toward stadium.
- 8 2259) 12/06/09 (SUN) HPL-IBID (5:15-5:56PM). PLW'S #98! Start delayed waiting for clouds to thin. Cold. Bleak scene. JUPITER (3+1. S. Equatorial Belt appears to have faded considerable since last stint!) VISIT (A looker who reported his astrophysicist sister at UMBC looked thru scope 6-yrs. ago and still has my Jupiter sticker. I asked if I inspired her at all, He said, "You must have at least a little." \$13.40 (\$19.71/hr.)

TOTAL THIS PAGE = \$ 248.10

TOTAL THIS YEAR = \$5,212.13

40
Year = 741 miles

| | | | | |
|----------|-------------------------------|---|--|----------|
| 01/03/09 | SP 20-sides | SC handouts (JHU) | | \$ 1.40 |
| 01/07/09 | SP 2-copies | Galileo cartoon for Astronomy Mag. (Loyola) | | \$ 0.16 |
| 01/07/09 | POST mail | Galileo cartoon to Astronomy | | \$ 1.17 |
| 01/08/09 | SP-8-sides | Moon Facts (Loyola) | | \$ 0.64 |
| 01/09/09 | SP 18-sides | SC handouts (JHU) | | \$ 1.26 |
| 01/24/09 | SP 8-sides | SC handouts (JHU) | | \$ 0.56 |
| 01/26/09 | COPIES 2-sides | Feb. sky map (Loyola) | | \$ 0.16 |
| 02/01/09 | COPIES SP 12-sides | SC handouts (JHU) | | \$ 0.72 |
| 02/02/09 | SP 12-sides | SC handouts (JHU) | | \$ 0.84 |
| 02/06/09 | SP 8-sides | SC handouts (JHU) | | \$ 0.56 |
| 02/06/09 | SP 14-sides | SC handouts (JHU) | | \$ 0.98 |
| 02/09/09 | SP 22-sides | SC handouts (JHU) | | \$ 1.54 |
| 02/16/09 | MILES (5.7) | typewrtr. to 7913 Harford for repair | | |
| 02/17/09 | SP 25-sides | SC handouts (JHU) | | \$ 1.75 |
| 02/18/09 | EQUIP Typewriter | repair (Md. Office Systems) | | \$ 25.37 |
| 02/18/09 | MILES (5.7) | pick-up repaired typewriter | | |
| 02/21/09 | SP 5-sides | SC handouts (JHU) | | \$ 0.35 |
| 02/23/09 | SP 49-sides | prep for Comet Lulin (JHU) | | \$ 3.43 |
| 02/28/09 | OFF SUPP | bike pump & tire tube (Walmart) | | \$ 4.36 |
| 03/04/09 | SP 20-sides | SC handouts (JHU) | | \$ 1.40 |
| 03/06/09 | STA 1-eyepiece | screw (Falkenhans) | | \$ 0.52 |
| 03/07/09 | SP 79-sides | SC handouts (JHU) | | \$ 5.53 |
| 03/09/09 | SP 12-sides | SC handouts (JHU) | | \$ 0.84 |
| 03/29/09 | SP 12-sides | SC handouts (JHU) | | \$ 0.84 |
| 03/31/09 | SP 11-sides | SC handouts (JHU) | | \$ 0.77 |
| 04/05/09 | SP 6-sides | SC handouts (JHU) | | \$ 0.42 |
| 04/07/09 | SP 16-sides | SC handouts (JHU) | | \$ 1.12 |
| 04/10/09 | STA 1-eyeglass | strap (Falkenhans) | | \$ 1.80 |
| 04/11/09 | SP SC handouts | (JHU) 44-sides | | \$ 30.08 |
| 04/17/09 | SP 39-sides | SC handouts (JHU) | | \$ 2.73 |
| 04/18/09 | SP 45-sides | SC handouts (JHU) | | \$ 3.15 |
| 04/22/09 | SP 10-sides | SC handouts (JHU) | | \$ 0.70 |
| 04/23/09 | SP 10-sides | SC handouts (JHU) | | \$ 0.70 |
| 04/25/09 | SP 29-sides | SC handouts (JHU) | | \$ 2.03 |
| 04/27/09 | SP 5-sides | SC handouts (JHU) | | \$ 0.35 |
| 04/28/09 | SP 18-sides | SC handouts (JHU) | | \$ 1.26 |
| 04/28/09 | STA 25% of bike | repair (Balto. Bike Wks. #01-3178) | | \$10.37 |
| 05/08/09 | SP SC handouts | 16-sides (JHU) | | \$ 1.12 |
| 05/11/09 | SP 32-sides | SC handouts (JHU) | | \$ 2.24 |
| 05/13/09 | SP 42-sides | SC handouts (JHU) | | \$2.94 |
| 05/18/09 | SP 15-sides | SC handouts (JHU) | | \$ 1.05 |
| 05/19/09 | SP 22-sides | SC handouts (JHU) | | \$ 1.54 |
| 05/20/09 | SP 30-sides | SC handouts (JHU) | | \$ 2.10 |
| 05/21/09 | STA white out | (Staples) 33 1/3% | | \$ 2.12 |
| 05/22/09 | SP 5-sides | SC handouts (JHU) | | \$ 0.35 |
| 05/26/09 | STA 2-rings | for hanging signs on scope (Falkenhans) | | \$ 0.83 |
| 05/29/09 | SP 2-sides | SC handouts (Loyola) | | \$ 0.20 |
| 05/30/09 | STA parking | in FPt. | | \$ 0.50 |
| 05/31/09 | SP 11-sides | SC handouts (JHU) | | \$ 0.77 |
| 06/01/09 | SP 24-sides | SC handouts (JHU) | | \$ 1.68 |

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|---------|---------|--------|---------|---------|----------|-------|
| PAGE 1: | SP | POST | EQUIP | STA | PAGE | MILES |
| | \$53.26 | \$1.17 | \$25.37 | \$20.50 | \$100.30 | 11.4 |

| | | |
|----------|---|----------|
| 06/07/09 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 06/07/09 | SP 5-sides SC handouts (Kinkos) | \$ 0.48 |
| 06/08/09 | STA bike chain replacement (Ace Hdwe.) | \$ 2.64 |
| 06/13/09 | STA Kleenex (ultra soft for cleaning eyepieces) (Giant) | \$ 2.12 |
| 06/14/09 | SP Dominick, for help in HPL | \$ 3.00 |
| 06/22/09 | SP 33-sides SC handouts (JHU) | \$ 2.31 |
| 07/13/09 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 07/15/09 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 07/18/09 | SP Dominick for help in Hpl | \$ 3.00 |
| 08/08/09 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 08/24/09 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/25/09 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 08/26/09 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 08/27/09 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 09/02/09 | SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 09/03/09 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 09/04/09 | SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 09/05/09 | SP 35-sides SC handouts (JHU) | \$ 2.35 |
| 09/01/09 | SUBS 2-yr. Sky & Telescope renewal | \$ 65.95 |
| 09/18/09 | SP Dominick FPT. | \$ 3.00 |
| 09/18/09 | STA FPT parking | \$ 1.50 |
| 09/19/09 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 09/19/09 | SP Dominick in FPT | \$ 3.00 |
| 09/19/09 | STA FPT parking | \$ 1.00 |
| 09/20/09 | SP 5-sides HC handouts (JHU) | \$ 0.35 |
| 09/28/09 | SP 9-sides handouts for KIPP school gig (JHU) | \$ 0.63 |
| 10/03/09 | SP 37-sides SC handouts (JHU) | \$ 2.59 |
| 10/05/09 | STA 4"x6" file cds. (B&N) | \$ 0.52 |
| 10/07/09 | SP 1-side SC handbill for Kipp School principal (Kinkos) | \$ 0.10 |
| 10/07/09 | POST mail Kipp School invoice | \$ 0.44 |
| 10/09/09 | STA Fell's Pt. parking | \$ 3.75 |
| 10/10/09 | SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 10/13/09 | SP 14-sides SC handouts (Staples) | \$ 1.12 |
| 10/24/09 | SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 10/26/09 | SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 11/04/09 | 14-sides SC handouts (JHU) | \$ 0.98 |
| 11/05/09 | 12-sides SC handouts (JHU) | \$ 0.84 |
| 11/07/09 | 17-sides SC handouts (JHU) | \$ 1.19 |
| 11/08/09 | 12-sides IBID (JHU) | \$ 0.84 |
| 11/08/09 | SP tip to man in HPL to help me get bungy out of scope case | \$ 1.00 |
| 11/10/09 | 1-PS-1270F-1 rechg. battery for scope drive (Battery Warehse. EQUIP | \$ 26.49 |
| 11/10/09 | MILAGE RT BATTERY WHAREHSE = 14.2 | |
| 11/27/09 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 11/29/09 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 12/10/09 | SUBS RASC HANDBOOK 2010 (credit cd.) | \$ 32.45 |

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|---------------|---------|--------|---------|---------|---------|----------|-------|
| <u>PAGE 2</u> | SP | POST | EQUIP | STA | SUBS | PAGE | MILES |
| | \$43.09 | \$0.44 | \$26.49 | \$11.53 | \$98.40 | \$179.95 | 14.2 |

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|-------------|---------|--------|---------|---------|---------|----------|------------------------------|
| <u>YEAR</u> | \$96.35 | \$1.61 | \$51.86 | \$32.03 | \$98.40 | \$280.25 | 25.6 + 741 = 767 total miles |
|-------------|---------|--------|---------|---------|---------|----------|------------------------------|

2010

Not for Distribution

- 9 2260)03/06/10 FELS POINT (6:28-8:31PM). Cold w/breeze. Good sky. PLW'S #99! FIRST Sat. TELESCOPE STINT OF THE YEAR!(Slow start due to bad weather, decision not to go out on very cold nights, and slight lack of momentum. This time last yr. had made +/- \$600!) PARKING(Intended to do HPL. Called ahead and was told must park in a commercial garage! Decided on FPT. Must look into HPL parking situation!) MARS(220X. Image not too bad during twilight but then degraded. Early on thought could see snow cap at 11-o'clock, but few lookers could. Mars had to be in perfect focus for optimum view, which many lookers could not achieve. Gave it up for M42.) M42(Fine at 165X. Nebula pretty evident. Some lookers impressed.) SATURN(Was hoping to have it by 7:30PM but didn't spot it till 8:15PM. Nice at 100X, w/Titan close under ring. Disappointingly, rings still look somewhat on edge. It is in VIR, +1.4°.) SCENE(A bit empty looking, but we had small, steady stream.) \$51.15 (\$24.95/hr.) HH(Can still do it! Can still pick-up scope ok. Was in a very good head, articulate, able to hype Mars and M42 very well! Also, scope nicely collimated.)
- 9 2261)03/16/10 FPT(8:20-10:05PM DST). Mild. Great sky. Slow scene at start, which stayed that Tue. way. But maybe somewhat slow is OK, as it is pleasantly relaxing, tho sometimes a bit boring. PARKING(A bit of a struggle, as usual.) MARS(1X). M42(For a few lookers, till Saturn arrived. Lookers like M42!) SATURN(Acq. 8:35PM. 2-moons. Pretty sharp image at 165X & 220X. Usual contingent of doubters.) VISIT(Craig, who as a young man was on one of my Comet Halley expeditions. I recognized him after he mentioned his name. We were both amazed!) \$19.76 (\$11.29/hr.) Telescoping was the best thing I could have done 2-nit
- 9 2262)03/18/10 FPT(8:20-9:50PM). Mild. Sl. hazy sky. PARKING(A frustratingly long wait, dur- Thu. ing which I missed several opportunities. Eventually got a decent spot. Another slow scene. SIRIUS(1X for a father w/2 young kids as we awaited Saturn.) SATURN(8:25PM. 1-moon. Lookers impressed. VISIT(Jay.) \$28.51 (\$19.01/hr.)
- 9 2263)03/19/10(FPT(7:50-10:52PM). Mild. Good sky. Busy scene! 4-MOON(Was anticipating a close Fri. Moon-Pleiades array, but it wasn't there. It's tomorrow eve. Am embarrassed, as I'd e-mailed lots of friends telling them to look for it tonight! Even took camera to photograph it. Otherwise, lookers impressed by Moon views.) SATURN(Nice. 2-moons. Used 110X alot. Many disbelieving lookers!) BATTERY(Died 10:50PM. I hope it just needs a good chg.) FPT(Lots of young lookers. Most paid. Most enthusiastic. Who needs HPL!) PARKING(Usual nerve racking ordeal, but got decent spot eventually.) \$88.90 (\$29.24/hr. DEW CAP (After a 5-min. struggle was unable to put it on scope. Layed it down in front w/sign showing. Will try to enlarge it, but how much do I really need it? Tonight OK w/o it!)
- 9 2264)03/20/10 FPT(7:30-10:30PM). Mild. Sl. hazy sky. PARKING(Instant success by squeezing in Sat. between two vehicles which other drivers must have figured were too close for parking between! Also able to park in front of house when returning! A great parking night!) BATTERY(Fine, after a 19hr. chg.) 5-d.MOON(Awesome. Sunrise on Theophilus. Some lookers asked about its central peak. Moon parked near M45, which was vis. in finder. Tried photographing but w/o good results.) SATURN(9:10PM. Delayed start due to both haze and getting good results from Moon.) GAJUN MUSIC GP.(Nearby. Nice. I played a few things on one of its accordians, which they got a kick out of!) SCENE(More adult than last night. HH(In good head. Enjoying the FPT scene alot!) \$79.27 (\$26.42/hr.) (Wk. = \$216.44!)
- 10 2265)03/31/10(WED)FPT(7:54-10:08PM). Mild.Gd. sky! 1st "weather permitting"night in 11-days! PARKING(Quick. N. end of Sq., from where I handtrucked.) SATURN(1st try, thks to good alignment! 1-star + Titan.) VISITS(The Hettlemans...Neil, Grant, Carey, Myra & Buzzy, who were in Fpt. for supper and who knew I'd be there. Fun family reunion! Gave Grant lots of handouts, incl. comet cd. w/personal note. Beside Saturn, showed them Mars & M45.) Slow scene but decent traffic. VISIT(Lisa, dance & MSEL friend, along w/her boyfriend and Tory, also dancer. Bought me an icecream.) HH(Kind of depressed. All evening despite all the visitors, had to push myself to stay with it.) \$33.05 (\$14.82/hr.)

TOTAL THIS PAGE = \$300.66

TOTAL THIS YEAR = \$300.66

The Evening Sky Map

FREE! EACH MONTH FOR YOU TO EXPLORE, LEARN & ENJOY THE NIGHT SKY

Sky Calendar - February 2010

- 4 Moon near Spica (morning sky) at 5h UT.
- 4 Mars 3.2° NNE of Beehive cluster (M44) at 20h UT (midnight sky). A nice sight in binoculars or a telescope. Mag. -1.2.
- 5 Last Quarter Moon at 23:48 UT.
- 7 Moon near Antares (morning sky) at 21h UT.
- 8 Alpha Centaurids meteor shower peaks at 5h UT. Favorable year for a sometimes major southern shower. About 6 meteors/hour but can peak at up to 25/hour. Produces bright, fast meteors. Active Jan 28 to Feb 21. Best observed in the pre-dawn hours.
- 13 Moon at apogee (farthest from Earth) at 2h UT (distance 406,540 km; angular size 29.4').
- 14 New Moon at 2:51 UT. Start of lunation 1078.
- 14 Venus, Jupiter and Moon within a 5° diameter circle at 22h UT (Cautions: only 9° East of Sun).
- 17 Venus 0.54° SSE of Jupiter at 2h UT (Cautions: only 9° East of Sun). Mags. -3.9 and -2.0.
- 21 Moon near the Pleiades (evening sky) at 21h UT.
- 22 First Quarter Moon at 0:42 UT.
- 25 Moon near Pollux (evening sky) at 14h UT.
- 26 Moon near Mars (evening sky) at 2h UT. Mag. -0.7.
- 26 Moon near Beehive cluster (M44) (evening sky) at 13h UT.
- 27 Moon at perigee (closest to Earth) at 22h UT (357,829 km; 33.4').
- 28 Moon near Regulus (midnight sky) at 0h UT.
- 28 Jupiter at conjunction with the Sun at 11h UT. Passes into the morning sky (not visible).
- 28 Full Moon at 16:38 UT.

The Zodiacal Light is caused by sunlight reflected off meteoric dust in the plane of the solar system. Choose a clear, moonless night, about 1-2 hours after sunset, and look for a large triangular-shaped glow extending up from the horizon (along the ecliptic). The best months to view the Zodiacal Light is when the ecliptic is almost vertical at the horizon: March and April (evening) and October-November (morning); times reversed for the southern hemisphere.

More sky events and links at <http://Skymaps.com/skycalendar/>
All times in Universal Time (UT). (USA Eastern Standard Time = UT - 5 hours.)

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Help support the production and free distribution of The Evening Sky Map



NORTHERN HEMISPHERE FEBRUARY 2010

SKY MAP SHOWS HOW THE NIGHT SKY LOOKS
EARLY FEB 8 PM
LATE FEB 7 PM

SKY MAP SHOWS HOW A LUNAR ECLIPSE (if any) will appear in the sky. The outer circle is the horizon and the inner circle is the zenith. Celestial objects are labeled by their right ascension and declination.

Symbols

- Galaxy
- Double Star
- Variable Star
- Diffuse Nebula
- Planetary Nebula
- Open Star Cluster
- Globular Star Cluster

Star Magnitudes

0 1 2 3 4

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STREET CORNER TELESCOPE LOG -- 2010

- 9 2266)04/01/10(THU)FPT(7:52-10:10PM). Mild. Gd. sky. Fairly busy scene. Parked fast, but it was still nerve wracking. SATURN(Titan + star. Great. Appreciated by lookers.) ORI's belt + M42 for 1 couple. HH(In better form.) \$64.84 (\$28.19/hr.)
- 9 04/02/10(FRI) DRY RUN TO FELLS PT....CLOUDS. For two days there've been clouds at sunset which has diasipated at sunset. Tonight they didn't. Treated myself to a cup of chocolate icecream as consolation for parking hassle. Gave Steve a ride to train sta. Came home.
- 9 2267)04/06/10(TUE)FPT(7:59-10:05PM). Warm...should have worn shorts. Sl. hazy. Semi-busy scene. SATURN(2 moons. The usual disbelieving lookers.) CONTRIBUTION(After seeing Saturn, A young lady turned to me saying, You don't know how important this has been for me," and handed me a wad of bills which turned out to be \$27.00!) \$65.74 (\$31.30/hr.) REPAIRED STAR DIAGONAL(I guess because of being dropped, the screw holding the eyepiece in became bent beyond use. With Dr. Henry's ok, took diagonal to Bloomberg machine shop for repair. Shop made a beautiful, new brass screw for which it chg'd Space Grant \$29.00! I will give Henry a check for \$40.00 to cover cost plus a modest contribution. Had looked for replacement screw in 2 hdwe stores but was told needed metric, which was unavailable.)
- 9 2268)04/10/10(SAT)FPT(8:19-11:17PM). Cool breeze. Gd. sky. PIRATE DAY IN FPT(Arrived to find Sq. full of vendors in the process of moving out. Parked immediately in space resv'd for Water Taxi vehs. Was exactly 7PM. Lots of people milling around, many in pirate costumes, many very well done. Lots of "pirate" lookers! Scene added excitement to my night!) SATURN(2-moons.) SIRIUS AND MARS FOR A \$5.00 FAMILY OF 3.) HH(After a good, late afternoon nap, head problem was minimal. No bother at all w/scope. Now at home feel a slight presence of logginess. Performed well tonight.) \$111.62 (\$37.71/hr.) Late start as I had to wait for a parrot zoo to pack-up and move out. Gave photos to zydeco players. Mid evening lots of people on stone bench signing sea shanties. VISIT(The widow of radio personality Lopez, who said he talked about me alot. She said she visited schools with a big. Dob.)
- 9 2269)04/14/10(WED)FPT(7:59-9:25PM). Chilly. Great sky. SCENE(Kind of bleak. Treated myself to an ice cream while deciding whether to set up. Decided, since I was there, to do lhr.) HEAD PROBLEM(Definitely present. Not a hindrance, but kind of disconcerting. Like a slight pressure in the top front of my head, plus a slightly tipsy feeling. Need to have Hennawi give me a neurological referral, as I want more information about what's going on and what is its prognosis!) SATURN(Nice! Titan + ring easily seen across disc.) VISIT(Rita, Eng. Cty. dancer w/friends.) \$34.39 = \$23.88/hr (included a \$10.00 contrib.) BATTERY(Did not work at all. Will chg. tonight & tmw. If still a prob. will take to Battery Store 4 ck.)
- 9 2270)04/15/10(THU)FPT(8-10:30PM). Warm. Sl. hazy but ok sky. SCENE(More lively looking than last night!) SATURN(Titan off ring's L tip. A good focusing marker.) HH(Head prob. there but not an interference.) BATTERY(Gave a 20hr. chg. but still dead! Tmw. will take back to the Battery Store for check-up.) \$51.50 (\$20.60/hr.) BATTERY(Discovered fuse had blown. Replaced it with spare. Hopefully, problem solved!)
- 04/17/10(SAT) PLANETS WALK ON THE B&A TRAIL ORGANIZED BY NASA(attn: Jim Lochner: James.C. Lochner@nasa.gov)(9:30AM-2:30PM). 60% clouds, wind gusts to 38MPH. Not a pleasant situation. SUNSCOPE AT THE SUN STATION(No spots. Handed out "Stereo" holograms + my "The Airplane" story. Showed lookers pictures of sun full of spots + cycles chart, this being Cycle #24. Also offered looks thru #14 welders filter, which always caused amazement.) Only intermittent traffic, with long stretches of none. Thankfully, time passed fairly well. Mostly families with small kids. Recv'd tkt. for free icecream at Mitchells. 29.lmi
- 10 2271)04/19/10(MON)FPT(7:58-10:08PM). Cool. Gd. sky. Bleak scene. Lots of parking spaces! 5-d. MOON(Real good!) SATURN(1-moon.) BATTERY(Works! Discovered prob. was blown fuse. Replaced it w/space from basement parts drawer.) HEAD(Mostly unaware of prob. when on stage. However became aware of dizziness when packing up and stopping for choc. cake.) \$46.20(\$21.39/hr.) 4-\$5's...3 of which came in the last 5-mins.! VISIT(Steve Lampredi). NASA "STEREO" CARDS (Giving them again to kids, having returned from Sat.'s "Planets Walk" w/a batch of them.)

TOTAL THIS PAGE = \$374.29

TOTAL THIS YEAR = \$674.95



Star Performer Certificate

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The Amazing feat of Accomplishing
Her 100th Time On Street Corner Astronomer

Presented this 23rd day of April, 2010

By Herman M. Heyn
Baltimore Street
Corner Astronomer



STREET CORNER TELESCOPE LOG -- 2010

- 9 2272) 04/23/10 (FRI) FPT (7:30-10:57PM) Cool. OK sky. PLW'S #100! 9-d. MOON (Tycho + sunrise on Jura Mts., which was noticed by some lookers on their own.) SATURN (Difficulty finding due to poor alignment. Also, had trouble seeing with eyes, even tho others could! Titan near tip of ring on R.) VISITS (Susan Croix, a friend of Lynn Taylor's, who said Lynn visits Balto. occasionally. Young woman from Melville Ave. who knew me from WIA mtgs. 1-newly-wed cpl. + 2-birthday young women.) \$77.11 (\$22.35/hr.) BATTERY (Dead early-on.) 04/26/10 (MON) HOME. BATTERY TEST. Charged it for 1 1/4 hrs. Plugged it into scope. After 3/4 hrs it was still going strong, so unplugged it. Seems like the past few night's problem may have been an insufficiently recharged battery. I wonder what the minimum chg. is it needs to run the scope +/-4hr.
- 9 2273) 05/04/10 (TUE) FPT (8-10:12PM). Mild. Ok sky, but suoker holes mid- eve. PLW's #101. SATURN (Titan on left, same mag. star above, which was noticed by many lookers on their own.) VISITS (Warren, Sally Heyn's old student. A very nice, articulate young man. A woman who asked where was Daryl.) NO children. \$52.40 (\$23.82/hr.) BATTERY GOOD.
- 9 2274) 05/05/10 (WED) FPT (8:20-10:40PM) Comfortable. Good sky. PLW's #102. BATTERY (Died after 1hr. Had reov'd 4 hr. chg.) SATURN (2-moons + background star above.) VISITS (Nicholas, a young man from Dundalk who said he'd always wanted to look thru a telescope and totally thrilled by finding us. He works as an industrial painter. An EMT driver who said he'd bought a scope having looked thru mine some yrs. ago. Two astronomers in town for a "stars formation" conf., one of whom had never before looked thru a scope. A free ice cream from a Maggie Moo girl who looked thru scope.) A great variety of lookers. \$57.20 (\$24.44/hr.)
- 9 2275) 05/06/10 (THU) FPT (8:10-10:30PM). Mild. Great sky. PLW's #103. BATTERY (+/-10-hr. chg. Stror at start. Lasted the evening.) SATURN (Titan on L, dim moon + star on R. Lookers impressed VISIT (Leslie Kalh, dean of stds. at Wash. U. Med Sch. who knows PLW's good friends Sari & Carl Frieden. Serbian med. std; whoses also a telescopist. Woman from TX, a nurse, who has a C-8.) HH (In v.g. head. no prob. from current dizzy feeling.) \$55.75 (\$23.93/hr.)
- 9 2276) 05/10/10 (MON) FPT (8:15-10:20PM). Chilly. Good sky. PLW back in STL. SCENE (V. slow on arrival. Contemplated buying an ice cream and going home. As I was standing at the car, along came a 1/2-do. young people, one of whom, Jason, who said he's from Westminster and is a bouncer at a strip club, knew quite a bit about astronomy and was v. turned on at seeing the scope. This decided me to set up. Later they showed up at the scope. I gave Jason a star map, etc.) ALIGNMENT (For some reason just can't get it perfect.) BATTERY (Good, after 16-hr chg.) SATURN (Good.) HH (Good.) VISIT (Steve Lampredi. A cpl. from York, the woman of whom was able to photo Saturn w/her digital.) \$40.82 (\$19.63/) BRIGHT METEOR (At the MSEL today Janet, a library employee, described a meteor she saw while driving to work from the E. Shore. I found numerous rpts. on Roylance's weather blog and gave her a copy. In FPT tonight a man reported seeing it from Cockeysville.)
- 9 2277) 05/15/10 (SAT) FPT (8:10-11:23PM). Mild. Good sky. PARKING (Arrived just after 7PM so removed a traffic cone and took a "water taxi employees" slot. I hope I can do this every time!) 2d. MOON (V. thin but some craters. Nice!) VENUS (1X) SATURN (2-moons. Lots of disbelievers.) PREAKNESS NIGHT (Saw a few people dressed like they'd been to it. However, no onslaught of inebriates I was fearing.) SCENE (V. busy.) HH (In good form, though got a bit bored mid- eve.) VISITS (Buster, who carried scope from/to car for me. Was eager to do so and refused \$\$). Dave, who remembered me well and maybe used to work at Ledbetter's. Was very glad to see me. Brought burbon and beer for us from the bar. Lots of people who said they looked thru my scope before.) MONEY (Lots of \$5's!) \$115.03 (\$35.83/hr.)
- 10 2278) 05/16/10 (SUN) FPT (8:29-10:10PM). Mild. Adverse rpt. but gd sky. HH (Tired from last night & depressed. Hesitated, then forced myself to go.) BATTERY (Died 10PM. Chg'd just 2hrs. since last night.) 3d MOON (Nice.) SATURN (Titan beneath R ring tip.) VISITS (Lindsay Roylance. A woman U. Az. astronomer w/her 10-yr-old daughter here for a conf.) \$31.02 (\$18.36/hr.)

TOTAL THIS PAGE = \$ 429.33

TOTAL THIS YEAR = \$1,104.28

3 05/20/10 1/3rd OF THE WAY DRY RUN TOFTP. Nice sky all day then high, thickish clds. late afternoon. Loaded car and headed down, but turned around and came home, using the clouds--which I thought would probably disape--as a pretext. Problems: just didn't feel like entering the FPT scene; have to get up extra early tmw. and meet Mike for Bike to Work Day; relatively intense, annoying head pressure. (Thurs. 05/06 FPT was \$55.75) At home borrowed ladder from Katie to chg. porch light bulb. Of course sky cleared, revealing a near quarter moon in a deep blue sky.

9 2279)05/25/10(TUE)FPT(8:13-11:08PM). Warm. Sl hazy sky. HH(In V.G. form! Lots of fun talking to lookers.) Pretty busy right from the start. 12-d.MOON(Tycho + a few edge craters. SATURN(2-moons + background star. Nice, after collimating.) VISIT(Jay). \$59.63 (\$20.49/) Parking hassle notwithstanding, I like telescoping in FPT. Lookers are more interesting than in HPL-plus, since traffic is lighter I can spend more time with each looker.

9 2280)05/29/10(SAT)FPT(8:43-11:15PM). Warm. Sl. haze. SCENE(Lively! Lots of people walking to & fro. British frigate still along side pier. Mid-ave. two trumpeters on pier playing jazz. Many more families/kids at scope. Great fun for me in FPT is seeing so many high energy, upbeat young people.) HH(This, after having spent 1/2 the day with my stuff at S. Spark's "alley sale". Wasn't expecting to scope tonight but while I was napping sky cleared, making for a very long day. However, I held up well! Began loosing interest mid-ave. and became sl. depressed, making me less articulate, which is no fun.) SATURN(Lots of amazed reactions from lookers. Titan on R. Star 11-o'clk.) VISIT(A young lady asked me to place her "I saw..." sticker on her breast. When it wouldn't stick to her dress, I slipped it under her bra, which she and her friends got a big kick out of!)\$61.41(\$24.27/) Brides' parties and other festivities also bring lots of energy to the FPT scene! NOTE: A sign the Saturn season is waning is that the planet is on the meridian, or actually a little beyond the meridian at time of acquisition.

9 2281)05/30/10(SUN)FPT(8:40-11:54PM). Warm. Great sky! PARKING(So stressful that once parked I treated myself to an icecream!) SCENE(V. busy. Wide variety of people, incl. many families/kids.) SATURN(Titan + star in Leo. Mostly @ 135X. Only 1 "can't you make it bigger?" req. Lots of disbelievers....which is good, as it means Saturn is in good focus for them!) VISITS(Dick Eliasberg at set-up but didn't stick around for a look. The nice husband & wife proprietors of the Trinidad & Tabago carryout in Waverly, which Susan Lebovit introduced me to this afternoon. I'd given them instrs. and they showed up!) HH(After a while sl. depressed, but was able to sustain req'd energy level. Most lookers are energized, so I feel I must +/- equal their level of excitement! Otherwise, combining all the loading/unloading, parking, dealing with young and old individually, this is a very hard job! The combination of incentives--telescope addiction, need to share & educate, MONEY, enjoying people watching, socializing with people on an equal level, and more--seem to make me uniquely qualified for this job. No doubt about it but over the years telescope income has been crucial in keeping me solvent!) 17-dMOON(Rose S end of Rec Pier 11:45PM. Tempted to stay w/it, but enough was enough!) \$128.09 (\$39.66/hr.) BATTERY(Held up all evening on a 12-hr. recharge.)

9 2282)06/07/10(MON)FPT(8:51-10:48PM). Coolish. Good sky. Slow scene. SATURN(The usual number of disbelievers.) MARS-REGULUS CONJUNCTION(+/-1° separation. With reddish Mars and blue Regulus, a very pretty pair in finderscope. Did 1/2-do. times.) VISIT(Herbert & Gloria Katzenberg with daughters Diane and Susan and Dian's daughter in FPT, celebrating H&G's 65th wedding anniversary. Everybody looked thru scope.) \$42.21 (\$21.65/hr.) HH(In ok mood but fighting boredom. Head "buzz" present but not an interference.)

2283)06/10/10(THU)FPT(8:43-11:05PM). Mild. Good sky, except for occasional, small, puffy, fast moving clouds. Slow scene but steady traffic. Seven (7) \$5.00 contribs! SATURN. MARS-REGULUS(Once. Widenening but still in finderscope. VISIT(Jay hung out for a good while.) HH(In good form, tho was feeling slight dizziness all eve.) \$75.31 (\$31.91/hr.)

TOTAL THIS PAGE = \$ 324.44

TOTAL THIS YEAR = \$1,428.72

4 VISIT(A nice looking young man from Cuba who said he left there in 2000. Had built his own scope and had worked in an astronomical inst. While on a European trip he decided not to return to Cuba but came to the States. He was with another man, both of whom had camera equipment and appeared to be on a photographic safari in FPT.)

- 9 2284)06/11/10(FRI)FPT(8:47-9:05, 9:15-9:45PM). Clouds arriving as was setting up. Mostly a "sucker hole" situation. SATURN(Due to clds. only at 80X. Nevertheless, nobody complained about its small size. Actually, is very pretty at 80X. 2-moons on R.) Business was pretty brisk, so it was only reluctantly that I packed up. I expected sky to have cleared by the time I got home, but it hadn't..was totally socked in. HH(In verg gd. form...strong voice & good patter. A teen-age sea scout gave me a "ten out of ten" for my teaching ability!) PARKING(Moved traffic cone and parked in Water Taxi space.) COL-LIMATION(Last night performed a major one. Tightened screws all the way and then backed off slightly, with very good results. Was worried would be a struggle.) \$33.35 (\$41.69/!)
- 9 2285)06/13/10(SUN)FPT(8:43-10:13PM). PLW'S #104. Ok sky, but very muggy. Relatively slow scene. SATURN. VISIT(Mary Jo & Steve Luxenberg with NYT writer Scott Shane. Steve works for W. Post. Two dentists from NC here for a class reunion, one of whom was UNC '57.) HH(A bit tired after bike ride to Hon Fest with PLW to meet Jim & Debbie.) \$43.43 (\$28.39)
- 9 2286)06/17/10(THU)FPT(8:16-10:33PM). Mild, good seeing, but considerable cloud problem for 1st hour. PLW'S #105 Fairly busy scene up till quitting time. 5d.MOON(Theophilus-Cyrillus-Catharina. Early start thanks to Moon.) SATURN(Titan beneath right ring. Nice.) VISITS(A couple who'd see me way back, incl. HPL, and was surprised I was back in FPT. Man here for coin convention with whom PLW had long conversation re coins. At my mention, he was very familiar with the Eliasberg collection. Med std. who's attended Wash. U. and recalled with pleasure running the college telescope.) \$52.15 (\$22.87/hr.)
- 9 2287)06/18/10(FRI)FPT(8:11-10:53PM). PLW'S #106. Mild. Sl haze. 6d.MOON(w/polarizer at start SATURN(Took 20 terrible mins. to find it. Why? Need to ck. mount. Otherwise, nice, w/ Titan near ring tip. Usual # of doubters.) VISITS(Mark Walker of the "Fellspointer" neighborhood pub., who writes me up often. Rich, a young man who said looking thru my scope 10-yrs. ago inspired him to buy a C-8, for which he was very grateful. Josh Steven, who won a round-the-world trip from Groupon.Com and must pay his way with coupons given him by Groupon. W/his camera took pix of him w/scope which he will put on line. www.liveoffgroupon.com. Email: the.groupan@liveoffgroupon.com.) \$55.59 (\$20.59/hr.) Drove to BOLT BUS loc. to pick up Eve, in town for Jason Heyn's Sat. Bar Mitzvah.
- 9 2288)06/19/10(SAT)FPT(8:16-11:02PM). PLW'S #107. Comfortable. Sl. haze. 7d.MOON(Polarizer start. Impressive.) SATURN(1-moon.) TODAY(Jason Heyn's Bar Mitzvah near Rockville. Drove over w/Phyllis & Eve, whose birthday it was. Back home was real tired and considered not scoping, but w/such a pristine sky, and w/1/2-hr. nap, went anyway. Was glad we did, but mid eve. I was feeling a bit staggered!) VISITS(A voice asked me if I were a City College grad. I answered, "Class of 49." Voice said, "Did you know Nolan Rogers?" Turns out it was Nolan's son, to whom Nolan had mentioned that his classmate was in FPT with a telescope. I told him to give Nolan my regards. Bill and Sue O'Connor, who hung out with us for +/-1/2-hrs. Was fun having them there. PLW reports observing a little Mexican boy intently studying a planets blurb, trying to read it word-by-word. Tonight, had a good number of bright, young childred.) \$87.05 (\$31.51/hr.)
- 9 2289)06/20/10(SUN)FPT(8:25-10:45PM). PLW'S #108 (For 2nd nite in row she got me a parking space by asking a driver she saw about to leave to wait a few mins. till I brought my car around!) Comfortable. Considerable haze at set up which soon dissolved leaving a very good sky. 8d.MOON(Polarizer at 50X at start, then 165X on Tycho region & Plato reg SATURN(1-moon. Fine view.) FPT(Kind of slow scene but we had steady traffic. FATHERS' DAY...maybe more families w/kids than usual in that regard.) \$60.36 (\$25.91/hr.) 8d.MOON (As were were closing down, sunrise on Copernicus was just beginning. Awesome!)
- 10 2290)06/21/10(MON)FPT(8:10-10:22PM). PLW'S #109(Returns to STL Wed.) Accompanied by Dominick, who was very helpful. Sl. hazy, then clear, the haze. 9d.MOON(Tycho region @ 135X.) SATURN(1-moon.) Fairly slow scene but steady business. Children early-on. VISIT(Joyce & Steve Bilanow, out for supper in FPT celebrating their 13th wedding anniversary. Jay R. Thompson, reporter for Arbutus Times, who I encouraged to write me up.) \$47.76 (\$21.71/hr) HH(Last night was so staggered that decided would not work tonight come what may. However, as sky was pretty good early eve., coul't not resist temptation to go....+Phyllis said it was ok with her.)

TOTAL THIS PAGE = \$ 379.69

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- 9 2291)06/24/10(THU)FPT(8:41-11:10PM). Warm. Some clds. at start, then clear. 12d. MOON(Tycho region. Sunrise on Pathagoras.) SATURN(I saw 1 moon, but some lookers saw 2 moons.) VISIT(Steve Lampredi w/Jim, who works at FPT Visitors' Ctr.) \$47.02 (\$18.88/hr.) SATURN (At 11:10PM it sunk behind Adm. Fell Inn. Will soon need to move scope eastward.)
- 9 2292)06/25/10(FRI)FPT(8:50-11:36PM). Warm. Haze diminished Saturn. 13d.MOON(Full as can be. Great @ 50X with Moon filter. Several guys took cameraphone pix.) SATURN(Titan perched at ring tip on L but very hard to see.) VISITS(Ignatio from Nat. Instrument Co.& wife. Is still working at age 76. Renee, a NASA engr. Tommy Buckets.) \$57.03 (\$20.60/hr.) Saturn lost at 11:02PM. Finished stint on Moon @ 50X + filter. Magnificent! VISIT(Lena from Liberated Singles.) ISS(Rose from behind Admr. Fell 10:06PM. Had coralled a few obsvs)
- 9 2293)06/27/10(SUN)FPT(8:50-10:58PM). Warm. Kinda slow scene, but I did ok! HH(Some dizziness all day. Reluctant to scope because of it + iffy sky. However, went because staying home would have been very boring. No dizziness prob. while scoping, tho I feel it a bit now.) SATURN(Good image, but Titan barely vis.) 15d.MOON(Acq. 10:35PM. Lots of edge craters. Tycho very noticeable.) STINT(Early on was thinking would be worst money night ever, but it improved and I had a \$15 contrib. + \$5's. Who knew!) \$70.63(\$33.00/hr.!) VISIT(Helen, the big woman who stops bywhile walking her dog and is very knowledgeable re astronomy. I told her about my asterism. She'll email me so I can sent her my web sites. Said she's a science writer for Knight-Ridder newspapers.)ISS(From behind Admr. Fell +/-9:24PM. Had +/- doz. people gathered for it. Good fly over!)
- 9 2294)06/28/10(MON)FPT(8:55-9:41PM). Sticky warm. Clouds on way down which I figured would disape at sunset, 8:37PM. Some did, and was able to acq. Saturn. However, it turned into a sucker hole situation, so I packed up. VISIT(John Spurrier and friend, Odette.)\$5(\$6.59/)
- 9 2295)06/30/10(WED)FPT(8:45-9:57PM). +/-mild. Good sky, then clds. Shut down, but could have stayed a little longer but was feeling depressed and not having fun. Also, dizziness from earlier still somewhat present. SATURN(2nd try.) LOCATION(Now setting up eastward to near kiosk. VISIT(Eng. dancer who's being treated for PC at Hopkins. Gleason 7; father had PG. Is getting 37 X-ray treatments.) \$16.00 (\$13.33/hr.)
- 9 2296)06/01/10(THU)FPT(8:45-10:52PM). Mild. Clds. for 45-min., the v. clear. HH(Sl. dizzy & tipsy, but it didn't interfere. Articulate. Not depressed.) ALIGNMENT(Bad time finding Sat. Prob. might have been w/tripod wedge angle.) COLLIMATION(Was perfect on Sat. but bad on B Cyg.) SATURN(V.G. Image. Titan.) B CYG(Fall back while Sat. in clds. VISIT(Bill Harvey of Chas. Vil. w/friend Keith.) Lost Sat. 10:52PM. SS at 8:36PM! Boo! \$51.60(\$29.15/) HH(Had some very appreciative lookers. Feel I did a v.g. job with families/kids.)
- 9 2297)07/02/10(FRI)FPT(8:45-10:58PM). Mild. Great sky, then intermittent hi, thin haze. Set up E corner of Kiosk. Perfect alignment...finally! Young crowd. Lots of no-pays. SATURN(1-moon. Lots of skeptics.) HH(Somewhat bored & depressed. Slight dizziness.)\$33.45 (\$13.29/) VISIT(My freq. Dutch friends, Tiemen and Els Woutersen.)
- 9 2298)07/03/10(SAT)FPT(8:50-11:08PM). Warm. Grt. skywhich soon developed poor seeing. HH(In good shape. Good voice, articulate, minimal dizziness.) SATURN(Titan beneath R ring but v. hard to see because of bad seeing. Lost 10:55PM.) B CYG(Briefly.) VISIT(Victoria, dancer and FPT Ghost Tours leader.) PARKING(Nearly 1/2-hr. waiting for space. Stressful!)\$80.59(\$34.99/ Second contrib. was \$15.00. The rest were \$1's. (Wk. = \$257.27 = 6-stints.= \$42.88/ea.) Am taking tomorrow night, July 4th, off. Beside, really need a break.
- 10 2299)07/11/10(SUN)FPT(8:30PM-10:25PM). Warm. Ok sky. LOST TIME(8-d due to heat wave and accompanying haze. Too hot to telescope!) VENUS(Till Sat. Writhing gibbous.) SATURN(Nice till over bldg. Titan over tip of L ring.) HH(Dizziness seems to fade to background when telescoping. Is no problem.) VISITS(Mother-son pair, both w/camera phones, who worked hard to photo Sat. and succeeded somewhat.) \$34.61 (\$18.03/). Lots no-pays. PARKING(At kiosk!).

TOTAL THIS PAGE = \$ 395.93

TOTAL THIS YEAR = \$2,204.34

- 9 2300) 07/17/10(SAT)FPT(8:22-10:28PM). After 5-d. break due to heat wave. Sl. hazy sky. Shut down by clds. PARKING(Heavy traffic. Was contemplating going home, but spotted man w/ keys in hand, followed him, and got a good spot. Nerve racking!) TOUGH JOB!(Weather confusion, loading, parking, unloading, setting-up, meeting & greeting the public, packing up, getting stuff back to car, unloading at home, cleaning equip., writing rpt., count-money...just one heck of a hard job! Can't quit till I find a) another way to earn out-of-pocket expenses money and b) something else to do with my time. Until then I'm doomed to continue telescoping.) 6-d.MOON(Impressive.) SATURN(Titan barely vis.) HH(Performed ok, but was aware of head prob.) VISIT(Teacher friends of Barbara Gudenius, Sally Levin and Marty Cooper, daughter of Cooper's Camaras owner, plus their friend Luz Martin from Spain. Marty took photos of me and will email.) \$48.34 (\$23.01/hr.) Lost Saturn 10:02PM and went to Moon, which was clouded out shortly thereafter.
- 9 2301) 07/18/10(SUN)FPT(8:08-9:22PM). Warm. Sl. haze. Shut down by clds. PARKING(Lucky tonight Slid right into a good spot.) SNITCHIE KIDS(Four 7-12 yrs. old inner-city kids. Looked at Moon & Saturn. I shoed them away but they kept returning. As a precaution I'd removed all bills from hat. Still, suddenly one went for the few coins. Might have gotten 25¢, at which point they ran away. I guess should be more on guard in FPT!) 7-day MOON(Started w/polarizer. Lookers impressed!) SATURN(Trouble finding,)\$26.85(\$21.65/hr. PARKING METERS(Raised from 25¢/15min. to 25¢/7.5mins.)
- 9 2302) 07/19/10(MON)FPT(8:20-9:17PM). Sticky warm. Sl. hazy sky. Packed up when I thought I saw a lightening flash behind the FPT. Inn. No storm came, but clouds which would have made scoping difficult. 8-d.MOON(Not yet Copernicus.) SATURN(I continue to have much difficulty finding it "by the numbers", which costs significant \$\$ Why?) \$8.01 (\$8.43/hr.)
- 9 2303) 07/21/10(WED)FPT(8:20-11:03PM). Warm & humid. COLLIMATION(Needed to do for every part of the sky. Why? Is very time and energy consuming. Is scope broken?) 10-d.MOON(Tycho region.) SATURN(Titan not vis. Lost 9:48PM.) Too many no-pays! \$33.66 (\$12.38/hr.) Objects included Saturn, Arcturus, Antares, B Sco, B Cyg, Moon.
- FPT vs. HPL: Calculated that on avg. am making \$16.35/night less in FPT. Given 43 FPT nights this year, that's \$703.05 less. If HPL parking is \$10-\$15.00, is probably not worthwhile trying to return.
- 9 2304) 07/23/10(FRI)FPT(8:45-11:02PM). Hot! VENUS(Collimated on. Is in "quarter" phase.) 13-d MOON(Tycho & a few edge craters. Mainly 50X w/filter. Nice!) SATURN(Lost @ 9:40PM. No Titan.) Very good sky. HH(Survived heat ok...I think.) \$51.06 (\$22.39/hr.) VISIT (Steve Stich, JHU C-Level librarian.)
- 9 2305) 07/26/10(MON)FPT(8:35-9:30PM)(9:45-10:20PM). Warm. Accompanied by Dominick, who helped lugging stuff. I let him take scope out of case and attach it to tripod. Problem. He disappeared for 45-mins., which had me worried after a while. VENUS(Blk'd by clds. at start. Lookers liked.) SATURN(Titan vis. Acq.8:45 & lost 9:30PM. Sat. season almost over. Has been a good one!) 16-d.MOON(After loosing Sat., packed up and moved to W. side of sq. to scope rising Moon. Some clds. but still gorgeous.) \$39.17(\$26.11/Adj'd Bopps. SHIP(Japanese warship in port. We watched flag lowering at sunset. No sailor lookers.)
- 9 2306) 07/27/10(TUE)FPT-SQ EAST(8:10-9:45PM). Warm. OK sky. VENUS AND SATURN. SCOPE(Big prob. with finding objs. "by the numbers". I calibrated dec. dial today, but that didn't seem to help. Also, am uncertain about polar alignment. Anyhow, couldn't find B Cyg after loosing Saturn.) VISIT(Frank Pratkan w/friend. Mary Spicker in car. Said Kay is spending 12-hrs./day taking care of her brother.) \$18.00 (\$11.39/hr.)
- 10 2307) 07/30/10(FRI)FPT(8:05-10:45PM). Warmish. Good sky. VENUS(Lost 8:45PM.) SATURN(Acq. ** 8:43, lost 9:18PM. Tho brief, feel I did some good w/kids.) ANTARES(Briefly.) B CYG (Had to collimate. Lookers liked, but it doesn't inspire me to recruit hard.) ALIGNMENT(Dec. wheel was off. Calibrated it at home, and it worked fine. Finally!) a BOO (Re-collimated on it before leaving.) VISITS(Lena. Tieman/Ells & parents.)\$39.49(\$14.79,

TOTAL THIS PAGE = \$ 264.58

TOTAL THIS YEAR = \$2,468.92

**Upon arriving home at 11:30PM, spotted Jupiter 15° above E. 36th St. Bright!

9 08/06/10 DRY RUN TO FPT. Unload stuff, got car parked (with effort!) Saturn & Venus too low to set-up for. (In HPL prob. could have held Sat. for another hr.!) Helen McComas had e-mailed was a ship in port named Antares. Made sign SEE THE REAL ANTARES!, but ship was no where to be seen. Didn't feel up to B Cyg. Got an ice cream and headed home.

9 2308) 08/07/10(SAT)FPT(8:24-10:58PM). Warm.VG sky. PLW'S #110. PARKING(PLW got some motor-cyclists not to leave till I brought the car around....a big help!) VENUS(Briefly.) ALBIREO(Collimated for best image. Hard work, as reqs. alot of explaining. But it works!) NEW SIGN(For no planets nor Moon, made a sign saying simply HAV-A-LOOK! It felt right to me and, hopefully, it grabbed passerby's attn.) \$63.45 (\$24.68/hr.)

9 2309) 08/08/10(SUN)FPT(8:23-9:33PM). PLW'S #111. Warm. OK sky. SNITCHIE KIDS(Same 4, + another 3 or 4 from SUN 07/18 suddenly appeared. I shouted to PLW, "Pick up the money!", which she did. They hung out for a while, pushing shoving, grabbing for stuff. Then they entered Maggie Moos where, apparently, they tried to steal the tip jar. They ranged all around the sq. Called 911 on borrowed cell. Eventually a cop on a bike came and took off looking for them. A no fun experience!) VENUS(Briefly.) ALBIREO(Acq. 1st try!) Slow scene. VISIT(Tom Stern of Suburban Club days and family.) \$8.00 (\$6.84/hr.) HH (Tho lookers are ok with it, I'm tired of B Cyg. Maybe should quit till Moon returns.)

9 2310) 08/19/10(THU)FPT(8:00-10:32PM). Nice sky. Warm. SCENE(Slow, esp. at start. Kept thinking would have been making good money in HPL.) 11-d. MOON(Copernicus past sunrise but very prominent. Mostly 50X. Lookers impressed.) ANTARES(At 1st try blocked by street light. Derelect turned it off, and there it was!) COAT HANGER(partially). B Cyg(1X). HH(Didn't mind being back. In good form. Slightly headache.) VISITS(Helen, Tim. Moon, a very interested young woman whose looked before.) \$29.63 (\$11.71/hr.) SUN HOLOGRAM CARDS (Have alot more to give out thanks to James Lochner, NASA, responding to my request.) BEARD(First night out sans my 38-yr. old beard, which, w/PLW's encouragement, had shaved off Saturday in a Greenmt. Ave. barbershop. Was worried its absence would detract from my telescope man persona, but I didn't notice any change.)

9 2311) 08/20/10(FRI)FPT(8:00-11:43PM). Nice sky. Warm(Showered before bed.). PARKING(2nd lucky break in a row!). SCENE(Busy early and got busier.). 12-d.MOON(Tycho region. Used photo alot. Pointed out Tycho, itself. Mostly 50X.) JUPITER!(Spotted 10:30PM by an astronomer looker rising over the Rec. Pier. Really surprised me, as I wasn't expecting to see it from FPT. for several more weeks. Was great! 3-moons in triangle on L, one on R. One stripe, w/slight hint of SEB.) VISIT(Jay, Helen).HH(Sl. dizziness.) \$89.47 (\$24.07/hr.)

9 2312) 08/22/10(SUN)FPT(8:20-10:30PM). Clds. early, then good. Warm. FAINTING FEELING(As was finishing setting up suddenly felt very wobbly and had to hold on to tripod to keep from falling over. Got myself over to nearby urn to sit but couldn't stay long because lookers arrived. Recovered, but had the dizzy feeling throughout eve. Now sitting down is alot less.) POLICE(Called Southeastern describing problem of previous Sundays. Cop said would make sure someone was on Square. I saw no police all eve.) 14-d.MOON(Still not full. Tycho, edge craters.) JUPITER(Acq. 9:54PM. 2+2. Stickers.) \$45.26 (\$20.86/) Had several gps. of no-pays who definitely should have pd. HH(Had my feeling faint while cross the street w/scope, I would have been in BIG trouble!)

9 2313) 08/25/10(WED)FPT(8:40-11:15PM). Good sky. Mild. PARKING(Got a good spot, but getting it was very stressful. At one point was thinking should just go home.) 17-d.MOON(Tycho & edge craters. 50X. Fine!) JUPITER(2+2. Stripe. Gave out lots of stickers.) URANUS(Supposedly just E of J at same dec. but didn't find.) VISITS(A bachlorette who had a J sticker from yrs. ago taped to her wallet. Frankie. Victoria.) \$78.04! (\$30.25/5-\$5's. MOVIE NITE(Maybe business was enhanced by lots of attendees at movie on the pier.)

10 2314) 08/26/10(THU)FPT(8:30-11:12PM). Clear & mild. PARKING(Immediate. Took space blocked by traffic cone.) HH(Felt terrific...really healthy!). ISS(Gd. flyover 8:23PM.Lassoed a few appreciative watchers.) HELEN(Inspired by ISS, brought out her C-5 and did Moon while it was still in tree for me.). MOON(Gd. as it gets! Row of 4 big craters just S. of Crisium Lookers wowed!) JUPITER(4 on L. Also wowed lookers!) VISITS(David Scruggs & wife of Atlanta. He a pro photographer, who took many, posed shots of wife, then me with scope.) Adjourned to Bopp Pizza with Jay. \$49.31 (\$18.26/hr.) VISIT(A pretty, intelligent, upbeat young woman whose pondering God's existence. We had brief, good talk. Gave my CP letter.)

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TOTAL THIS YEAR = \$2,832.08

- 9 2315)08/27/10(FRI)FPT(8:30-12MN). Clear/mild. PARKING(Nerveracking for few mins., then suddenly a good spot). ALBIREO(1st try! "Opening act" for J.). JUPITER(2+2, stripe. Good!) 19-d.MOON(Good as it gets. Am thinking waning moon more impressive then waxing!) URANUS Just had to slew 10' W from J., and there it was...little green dot. Fun giving out "I Saw Uranus!" stickers. VISITS(Some of John's friends, incl. Linda Himmelrich.) HH(Not feeling as healthy as last night. Sl. dizzy, wobbly.) \$87.81 (\$25.09/hr.)
- 9 2316)08/28/10(SAT)FPT(8:55-12:04AM). Clear/mild. PARKING(3-mins. of stress, then luck.) B CYG (Briefly.) JUPITER(2+2 + "red" stripe. Collimated scope on moons.) 20-d.MOON(Acq. 22:15. Continues to awe lookers.) URANUS(A number of times when time allowed. Gave stickers, which get laughs.) WEB SITE ANNOUNCEMENT(Gave out 33 1"-strips. One guy brought up site on his iPhone saying, "Recognize this?"). MARS HOAX(Unbelievable # of inquiries!) ISS FALSE ALARM(Gathered people to see it then realized had wrong evening!) \$118.75 (\$37.70/
- 9 08/30/10(MON) DRY RUN TO FPT & CHARLES VILLAGE. Bleak scene in Fpt. Got ice cream and sat on bench. Could see Albireo. No body walked by my spot for 10-mins. at a time.JUPITE (Low over Thames St. 9PM. Ok at my spot by 9:15PM.) CHAS. VIL.(Also a bleak scene. Could have acq. J from 3120 St. P. by 9:45PM.) Last yr's log show I did really well in HPL on week nights in HPL: 9/01(Tue)=\$99.85, 9/02(Wed)=\$70.55, 9/03(Thu)=\$87.05, 9/29(Tue)=\$56.56, etc. Would never happen in Fpt.Should get back to HPL on week nights!!
- 9 09/01/10(WED)FPT(9:05-10:35PM). Clear/warm. PARK(Ibid.). Late start as I wanted to start on Jupiter and not B Cyg. JUPITER(Acq. 9:05. Sl mushy for 10-mins. 1+3+stripe.)URANUS (10' W of J. Easy! Did 1/2-doz. times.) Slow scene. \$25.11 (\$16.74/) Luckily got 2 \$5's! STOOL(Took aluminum stool to sit on. Worked good!)
- 9 09/04/10(SAT)FPT.(8:55-12:19AM). Clear/cool(sweater weather!). PARKING(For a change slid right in to ok space being vacated.) HH(In good head. Only sl. dizziness. Began to tire toward end.) JUPITER(1+3. Good!). URANUS(Showed it, then asked what it is. Stumped, I gave lookers an "I Saw...URANUS!" sticker, which provoked much surprise and laughter. Most saw color as blue, while I see green and have "green" on sticker.) FPT.(Fairly busy, young crowd.) VISITS(Tim, Jay.) \$100.56 (\$29.58/hr.) LABOR DAY WEEK-END.
- 09/05/10(SUN) KURT & CATHY'S DECK BUSTER. Figured Jupiter would be blocked by tree and, anyway, wouldn't be viewable till late. Also, because it's such a hard gig, just didn't want to do it. Was going to stay away for fear of people expressing disappointment over my not having scope. Consulted with Jim, who urged me to go w/o scope, that it would be ok. I went, and it was ok. Simply told the 1/2-doz. or so who inquired that I just needed a break from the telescope. They understood. Afterall, Jupiter was not blocked by trees, rising in a nice gap over the food tables around 8:50PM. Great sky, too.
- 9 09/06/10(MON)FPT.(8:23-10:28PM) LABOR DAY(V. quiet scene). Clear/mild. PARK.(Gd. luck.) ALBIREO(Till Jupiter.) JUPITER(Acq. 8:43PM. Nice. 2+1. IV skirting N. pole.) URANUS (Several times. Easy.) VISITS(Lisa Permutt...apparently who I took to Renaissance Fest. years ago. Patrick, owner of Whistling Oyster...regular looker.) \$23.70 (\$11.34/) Lots NF
- 9 09/08/10(WED)FPT(8:35-10:24PM). ROSH HASHANAH.Clear/cool/windy. PARKING(Long, discouraging wait.) JUPITER(Acq. 8:35PM. 3, then 4 moons. Murky image for 50-mins.) URANUS (Several times.) VISIT(Digeriedo player & drummer."Telesmaband") \$20.51 (\$11.27/hr.)
- 09/11/10(SAT)JIM & DEBS LAKE WALKER ANNUAL COMMUNITY PARTY(6:45-8:55PM). Hazy. Shut down by clds. before Jupiter. SCENE(Lots of people. Set up looking W for Venus & BOO. Aligned w/mag. compass. Venus too low, but acq. a BOO at +17° after 20-min. search, clds not being the least of the problem. Kept it for most of stint. Also did a AQL. B CYG in trees, then clds. Decent # of lookers. Gave out lots of website announcements and "STEREO" cards to kids. NO HAT but a \$4.00 tip. Tough stint, but I held up ok. Jay (443-994-0158) has a 6" SCT which may want to trade for an 8".
- 10 2321)09/13/10(MON)FPT(7:44-10:34PM). Clear/mild. HPL(Wanted to give it a try but was detered by security worries, esp. an unguarded parking garage. Too bad, as scene would have been much busier than Fpt.) 5-d. MOON(Great!) JUPITER(Acq. 8:14PM 1+3. Nice!) URANUS(A little star bendath Ganymede in same field as Jupiter. Not believing it was really U, searched over and over to the W. To me it just didn't look like U, even with magnification. Asked some lookers about color and they said "blue", so it must have been U. Fooled me!, Tomorrow night will try to photograph.) \$37.94 (\$13.36/hr.)(Incl'd 3x\$5.00)

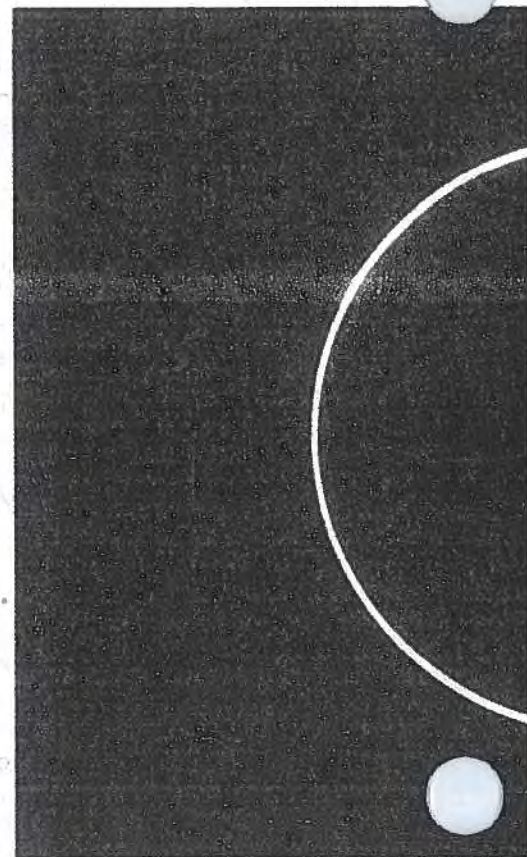
TOTAL THIS PAGE = \$414.38

TOTAL THIS YEAR = \$3,246.46

- 9 2322) 09/14/10(TUE)FPT.(7:50-10:59PM). Good sky/mild. HH(Really articulate, with lots of good lines, like "Check out my website. It has lots of photos of me before I shaved last month."Got good laughs!) SCENE(Slow looking. Nevertheless had a steady stream of lookers.) SCENE-2(A big gaggle of miscreant types talking loudly on nearby benches. Was worried they'd descend on me, but they didn't happily!) 6-d.MOON(Aristotle & Eudoxos. Great!) JUPITER(1+2, then 2+2. Lookers liked!) URANUS(In same field as J, to the SE. Easy for lookers to see. Stickers much appreciated.) NEPTUNE!(On first try. Shared with Tim dieck. At 165X little blue dot.) CLOSING SHOP(Pulled plug at 10:33PM and was suddenly descended upon by a series of enthusiastic, generous lookers. May have taken in \$50.00 in that brief period, including 2X\$20's!) VISIT(Tieman, Ells w/friend Rbt.)\$107.99!(\$34.28/) HH(I think my putting on such a good show had alot to do with tonight's contriibe bonanza!
- 9 2323) 09/15/10(WED)FPT(7:55-10:24PM). Sl. hazy/mild. PARKING(Moved traffic cone and pulled into 1st W.Taxi spot.) SCENE(Quiet, but good start, then a lull.) 7-d.MOON(Good.) JUPITER(2+2, then 1+2). URANUS(Like a 5th moon of J. Diminished by haze.) ISS(Low in SSE. Pointed out by Tim.) VISIT(One time neighbor, Erica, who moved to get married but didn't and who now lives in Butcher's Hill.) Adjourned to Oyster for Natty Boh. HH(Need break!)\$52.00(\$20.99)
- 9 2324) 09/18/10(SAT)FPT(7:15-11:31PM). Great sky/coolish. PARKING(Arv'd early anticipating a Water Taxi spot, but car was leaving a good, regular spot and I took it. W.T. spot would have worked, too.) 10-d.MOON(Tycho region. ok.) JUPITER(Acq. 7:50PM. 2+2. Noticed "storm" but not distinct enough to point out to lookers.) URANUS(Frustratingly hard time finding. Was because diagonal was rotated which, apparently, throws off directions. Found it after lining up diag. w/scope axis. NW of J. Bright and v. green!) SCENE(Busy from the start.) VISIT(F. Roylance w/wife Cindy. I was v. disappointed could not find U for him! A father w/2 sons who came from Bolton Hill just to see me!) HH(Less than tiptop.)\$133.73(\$31.32/ VISIT(Matt Mittenthal and wife. Matt is the son of Miriam Linneburg Mittenthal, the father daughter of the Linneburgs, out neighbors on Bosworth Ave. Matt works in real estate with
- 9 2325) 09/19/10(SUN)FPT(7:20-8:02PM). Good sky, then shutdown by suddenly arriving clds. Was even slightly drizzled on. PARKING(Like last night but better. After I'd pulled in, the driver of the vacating car gave me his parking slip good till 8:01PM!) 11-d.MOON(Tycho all the way!) JUPITER(Acq. 7:47PM. 0+3.) Busy scene for a Sunday. \$16.00 (\$22.86/hr.)
- 9 2326) 09/20/10(MON)FPT(7:28-9:30PM).Great sky/coolish...long pants. Quiet scene. No problem parking. 12-d.MOON(Tycho at its best!) JUPITER(2+2. Closest approach to E between 1963 and 2022...367M. Mag. -2.9.) URANUS(Easy, now that I know how!) VISITS(Suzanne Lebovit and friend, Chintha Kuruppunayake. SL had heard about the Jupiter event and called ahead to see if I'd be out.) URANUS was .75° N of J. \$26.00 (\$12.81/hr.) y AND(once).
- 9 2327) 09/21/10(TUE)FPT(7:18-9:57PM). Great sky/mild. Semi-quiet scene. 13d-MOON(Tycho. Edge craters not as good as last night.) VENUS(Briefly. V. nice crescent!) JUPITER(2+2, then 2+1. Spot!) URANUS(Easy from J. Invited looks, then asked what is it? Lots of laughs when as my ans. I gave them "I Saw...URANUS! stickers. Fun! HH(Top form!) \$50.97 (\$19.23/hr. VISITS(1st lookers were from Saudi Arabia. Put in +/- \$8.00. A group from Maine, the man of which has a cabin near Baxter St. Pk. Told Katahdin story and said would send photos.)
- 10 64 2328) 09/23/10(THU)FPT(7:35-10:22PM). Hazy, ptly cldy sky late afternoon. Almost didn't go! Good thing I did! Early haze, then ok sky. Mild. Water Taxi (WT) parking. FULL MOON RISING CRIMSON OVER THAMES ST! (Tycho and beginning of edge craters.) JUPITER(2+2, then 0+3. OK.) URANUS(Alot, w/same reaction when given sticker. Most lookers saw it a bluish.) HH(In good head.) VISITS(Tieman, Ells, Tim, Jay.) \$73.62 (\$26.39/hr.) GOOD FORTUNE!(To what can I attribute my recent good money week nights? Jupiter? Moon? Uranus? My enthusiastic performance?...or a combination of all four? (week = \$166.59)
- 09/24/10(FRI)NIGHT LIGHTS-A SKY SPACE PROJECT, 808 HOMESTEAD ST.(7-9:30PM). Great sky/warm. Community proj. sponsored by MICA student Rachael London (skyspaceproject@gmail.com), Sarah (410-366-2252), and others. Looks at the sky thru their 6" reflector and 3" refractor for neighborhood kids, plus a music workshop. Event held in a field between two houses known as the "Arts Youth Sculpture Garden". Near perfect alignment w/mag. compass. I did Jupiter (1+3), and they did the Moon. I was hesitant to do this unknown stint but also wanted to do a neighborhood thing. Went well. Good kids, who I got organized into age bins so I wouldn't be overwhelmed. Gave all J. Facts. VISITS(Deborah Evans, Jay.. Algebra Proj. dir.) NO HAT.

TOTAL THIS PAGE = \$ 460.31

TOTAL THIS YEAR = \$3,706.77



The southeastern United States was center stage for May 30th's annular eclipse, but elsewhere observers also had interesting views. *Clockwise from above:* Herman and Kenneth Heyn were in Paris where they photographed the Sun through a No. 14 welder's glass held at arm's length. Maurizio Eltri recorded the eclipse above the western skyline of his home city of Venice, Italy. Roberto Toledano photographed the eclipsed Sun setting at his observatory in Verona, Italy. William Dellinges was part of the Moonshadow expedition to El Ricon, Mexico. The group enjoyed an unbroken ring at central eclipse, a phenomenon that was not visible in the United States.

- 9 2329)09/25/10(SAT)FPT(7:25-10:55PM) PLW's #112. OK sky, then suckerholes, then shut down by clouds. Mild. PARKING(1st WT slot!) JUPITER(2+2. Stripe. Ok image.) URANUS(As much as possible. Lookers saw blue-green or blue.) 17-d.MOON(Rim of M. Crisium on terminator.) Busy scene. Unusually busy at scope. Lots of enthusiastic lookers. \$132.28 (\$37.79/hr.)
- 330)10/16/10(SAT)FPT(7:55-10:52PM) PLW's #113. Great sky, then good sky. Cool. PARKING(Luckily, 1st w. taxi slot still open. Big relief) EUROPEAN VACATION(We went over to celebrate Frank's 50th, but while at it visited Brussels, Paris & London. Party at Inge's & Don's BlancheFosse. In Paris stayed w/P's cousin Andrew & family. Also met her brother David and wife Anne. Great trip!) JUPITER(3, then 2, then 3. Stripe.). 9d.MOON(Sunrise on Copernicus!) URANUS(Acq.'d several times; failed most trys. Why? Lookers who saw it laughed when rec'ing stickers!) \$58.57 (\$19.85/hr.)
- 9 2331)10/17/10(SUN)FPT(6:45-9:30PM). PLW's #114. Pleasantly mild. Great sky. PARKING(A W.T. space...easy!) 10dMOON(Real nice. Copernicus outstanding.) JUPITER(2+1, then 3+1. Lookers excited by it.) URANUS(Several times, but still trouble finding. Had people look at "our mystery object". When they couldn't guess what it was, I sprung the U sticker on them, which always evoked great surprise and laughter. Most see it blue.) VISIT(Elderly gentleman from Solvenia who remembered seeing Saturn 10-yrs. ago thru my scope.) HH(In v.g. form. Despite daytime dizziness, noticed none while scoping.) \$49.65 (\$18.05/hr.) ICE CREAM(PLW went to Maggie Moo's for I.C. After saying she was w/the telescope, she got two freebees. Later, 2 employees came out for looks.)
- 9 2332)10/22/10(FRI)FPT(7:21-11:08PM). COOL(Underdressed. Worried would have to leave soon, un-Stephen Lampredi came along, noticed my discomfort, and lent me his sweater. Sweet guy!) Great sky. JUPITER(1+3. Lookers liked.) FULL MOON(Full at 9:36PM. 50X w/filter. Explained it with photo. Lookers liked.) URANUS(Still problem acquiring, but did several times.) HH(A bit bored. Dizziness of earlier not very evident.) Slow, then busy. \$112.61 (\$29.79/hr) Incl'd 2x\$5 + 1x\$20.00. 1902 INDIAN HEAD PENNY(Discovered in hat at home!! First ever!!)
- 9 10/23/10 DRY RUN TO FPT. Scattered clds. at leaving time, but decided to go because 1) I wanted to return Stephen's sweater, 2) I wanted to show him my Argus slide projector in case he could use it in his "seance" event, and 3) on chance clds. would disapate. While I was standing around watching clds. come & go, Stephen came along, and I gave him his sweater. Also, he thought projector looked interesting and took it. Around 8PM decided sky was OK, and hauled stuff to sq. No sooner had I gotten it there then a huge bank of clds. came in from the W, making me decided to call it a night. Adjourned to Whistling Oyster for a Natty Boh, then home. HH(Noticeable dizziness. It doesn't interfere with my work, but is unpleasant. Sometimes I think my head rings slightly with each step I take. Typing might make it ring, too.) INDIAN HEAD PENNY(Researching Ebay today suggests it's worth only \$1.00. Too bad, as was hoping is would allow me to retire!)
- 9 2333)10/28/10(THU)FPT(7:15-9:38PM). Mild. Hard wind toward end. OK sky. HH(In good head. No noticeable dizziness.) Fast start, then intermitten lookers. JUPITER (2+2). URANUS(Num-ber of time. No prob. finding.) Appreciative lookers. A few Halloweeners. \$50.97(\$21.42/)
- 9 2334)10/29/10(FRI)FPT(7:53-10:24PM). Cold. Used Kiosk as a wind break. Good sky. PARKING(Waited 1/2-hr. for space. Contemplated leaving.) JUPITER(0+4. Spectacular!) URANUS(Several time .) Kind of slow scene. \$50.57 (\$20.07/hr.) WIFE!(A man commented, "I bet your wife doesn't like you going down here so often," to which I replied, "Yes she does. In fact she sometimes pushes me out the door, plus she likes to come down here, herself, sometimes.") ORION(Lying on its side over the treetops as I was unloading. M42 will be my obj. after J.)
- 10 10/31/10(SUN) FPT DRY RUN. Fri. nite people were saying Sat. would be the big Halloween, so I stayed away. Went tonight, only to find a big Halloween happening, w/many street and parking spaces blocked. Found a lucky spot next to Bertha's Beer at W. Oyster, pizza at Bopp's, watched costume contest for a while, got bored, came home. There was a huge police presence and the square was ringed by port-o-pots.

TOTAL THIS PAGE = \$ 454.65

TOTAL THIS YEAR = \$4,161.42 (last yr. = \$4,421.85)

Windows Live | Hotmail (27) | Messenger | Office | Photos | MSN

Hotmail | New | Reply | Reply all | Forward | Delete | Junk | Sweep | Mark as | Move to |

Inbox (27)

Re: Red sunset (revision)

Back to messages |

herman heyn
profile | sign out
Options

Folders

Junk (169)

Drafts (7)

Sent

Deleted (196)

New folder

Quick views

Flagged

Photos (1)

Office docs

Shipping updates

Messenger

Sign in to Messenger

27 Invitations

Home

Contacts

Calendar



Rebecca Trager
To herman heyn

Thanks for this!

From: herman heyn
To: Rebecca Trager

Sent: Thu, September 23, 2010 10:57:45 AM
Subject: FW: Red sunset (revision)

From: hermanheyn
To: rebeccatrager
Subject: Why is the sky blue?
Date: Wed, 22 Sep 2010 15:14:39 -0400

WHY IS THE SKY PAINTED BLUE?

Actually, the sky is not really painted blue. Its blue color comes from sunlight, which contains all the colors of the rainbow--red, orange, yellow, green, blue, indigo and violet. The name ROY G BIV will remind you of them.

Most of the colors pass straight through our atmosphere (the air above us) to the Earth's surface. However, the blue light is scattered around by the nitrogen and oxygen gas molecules in the air. So the sky looks blue because of all



STREET CORNER TELESCOPE LOG -- 2010

- 9 2335) 11/05/10 (FRI) FPT (7:58-10:01 PM). Cool...but I was kept comfortable by great sweater just given me by Ethan. Clear, but terrible seeing for first 50-mins. PARKING (Very stressful. Took +/-30-mins. to get a place.) JUPITER (1+3. Like through a rushing stream for first 50-mins.) URANUS (Several times.) SKY & TELESCOPE (Dec. ed. has my letter describing my "street" experience with the colors of Uranus and Neptune!) ALIGNMENT (Made a 3° diagram which worked real well.) Closed up by clouds. \$43.76 (\$21.35/
- 9 11/09/10 (TUE) DRY RUN TO FPT. Nice sky. Mild. Bleak scene...too bleak to set up. Given a 4-d. crescent Moon, probably would have done OK starting early in HPL. Re FPT, despite nice nights, probably should set up only on Fri thru Sun.
- 9 2336) 11/11/10 (THU) FPT (7:20-9:03 PM). 5/5 sky. Coolish. Quiet scene, partly due to Ravens game. 5d. MOON (Just once.) JUPITER (3+1. Nice!) URANUS (1X). \$40.50 (\$23.55/) 3 x \$5.00!
- 9 2337) 11/12/10 (FRI) FPT (7:19-10:58 PM). LAST STINT OF MY 23RD YEAR, HAVING STARTED 11/13/87! JUPITER AND THE MOON, SAME AS 23 YEARS AGO. THE FEW PEOPLE I MENTIONED MY MILESTONE TO GAVE ME NICE CONGRATS. 6-d. MOON (Real good.) JUPITER (Acknowledged my event by giving me all 4 moons breathtakingly arrayed on the right! Lookers amazed!) URANUS (1X, then couldn't find again.) Great sky. Cool. Slow scene which picked up later. \$38.10 (\$24.14/ VISIT (A early 30's, well dressed Korean man who spoke Eng. poorly but who stayed around for some time conversing with me and another man. When he discovered I'd been in the army in Korea during the war, he very sincerely thanked me several times over.
- 9 2338) 11/13/10 (SAT) FPT (7:15-11:07 PM). FIRST NIGHT OF MY 24TH YEAR! MY LONGEST EVER JOB!! Good but sl. hazy sky. 7d. MOON (1st. Qt. Lots of craters to awe my lookers.) JUPITER (1+3. Good.) Very busy night. Seven \$5's! VISITS (Dave Harding & Mary. Steve Lampredi, who hung out and bought me coffee.) HH (VG form!) Enthusiastic lookers! \$108.38 (\$28/hr.
- 9 2339) 11/19/10 (FRI) FPT (7:15-10:18 PM). Cool. 5/5 sky. PARKING (Immediately, as 3 W.T. spaces open. A relief!) SQUARE (Trees draped w/pretty, multi-colored lights.) DRUNK DERELICT ((Present at start. A very scary type. Fortunately, an ERM driver was at scope and eventually got him to leave.) JUPITER (0+4. Stripe. Nice!) MOON (Near full. Good edge craters.) URANUS (1X.). SCENE (Slow.) \$62.50 (\$20.49/hr). Incl. a \$5 and \$10.00.
- 9 2340) 11/20/10 (SAT) FPT (7:05-10:43 PM). Cool. Gd. sky, w/occasional haze. PARKING (Arr'd @:45pm 3-Water Taxi slots open. As "Pay For Parking" sign points away from W.T. slots, decided not necessary to pay and skipped getting parking slip, saving \$2.00.) FULL MOON (Great a 50X filtered.) JUPITER (2+2. Strip...seen red by many lookers.) GANYMEDE-EUROPA COLORS** (Though separable, mid-eve. they were extremely close. To me, suddenly, they looked like a mini-Albireo, w/G golden and E blue. I poled a dozen lookers, asking "Do you see any color difference between the two?" or "Do you see any color in the dimmer one?" I'd say at least 4-5 lookers said Europa looked blue! Will email this experience to S&T's Alan MacRobert to see if he's aware of a blue Europa. Could I have discovered something) VISIT (A v. well dressed Pharsi speaking family. When I asked if they were Iranian, they said they were Afghani, that Pharsi is spoken there!) \$94.92 (\$26.08/hr.) To Bopp.
- 9 2341) 11/21/10 (SUN) FPT (6:16-6:27 PM). Shut down by clouds. Sky nice all day, so I neglected to check eve. rpt. Quiet scene, but I had lookers for entire time. JUPITER (3+1. Nice. Today I e-mailed Alan MacRobert, S&T, describing blue Europa and asked for his opinion.) FULL MOON (Exactly at 12:28 PM. V. nice at 50X.) W.T. parking. \$8.00 (\$44.44/hr.!)
 10 11/27/10 (SAT) DRY RUN TO FPT. Nice sky as leaving home. Parked. As was setting up tripod noticed a huge bank of clds. in the W, N & E. It moved in slowly and eventually covered Jupiter. Too bad, because I wanted to view Europa & Ganymede for any color. 33°F. Was dressed ok, with two sweaters and "Bahand" foam jacket. 8:45 PM EUROPA-GANYMEDE. Clear, Set-up in front house. Judging from J's size, E-G +/-8" sep. Not enough bluish on E to say was not my imagination. On the 20th they were essentially "touching". 9:25 PM J closed out again. Had I stayed around in FPT, might have gotten in 1-hr. of scoping.

TOTAL THIS PAGE = \$ 446.16

TOTAL THIS YEAR = \$4,607.58

**See stint #2641

STREET CORNER TELESCOPE LOG -- 2010

9 2342)11/28/10(SUN)FPT(5:15-6:05PM). V. cool, but was dressed ok. V. gd. sky. JUPITER(3+1. Great array!). URANUS(For Ali and Roya.) ALBIREO(ditto).VISIT(Ali Shams and woman friend, Roya, Ali being Ehsan's brother who is studying for a PhD at Carneige Mellon. Roya is a psych major at Pitt. They came thru town on an extended week-end, on way from Phila. to DC. We had lunch at Jimmies, after which they went to the Aquarium and then came back to FPT. to see me in action at the telescope. We took photos at both Jimmies and the scope. They were planning a Little Italy diner and invited me to join them. I packed up. After some discussion about leaving my stuff in my car, we decided to drive to my hse. and unload. Once here I remembered the Italian restaurant on 39th St., and they were ok with going there. From there we returned here, took some photos, and they left for DC using a GPS to guide them. I gave Ali and Roya comet cds. + FPT. cds. and a Poe cd. Ali insited on paying for both lunch and supper, saying it was in appreciation of all the friendship I've given him and Ehsan over the years.)\$6.0+1-comet.

Year = 826 Mi

TOTAL THIS PAGE \$ 6.00
 TOTAL THIS YEAR \$4,613.58

Not for Distribution

Windows Live™ Hotmail (32) Messenger Office Photos MSN

herman heyn

profile | sign out

Hotmail

New | Reply Reply all Forward | Delete Mark as ▾ Move to ▾ |

Options ▾

Inbox (32)

Europa's color?

Back to messages

To see messages related to this one, group messages by conversation.

Folders

Junk (102)

Drafts

Sent

Deleted (162)

New folder

Quick views

Flagged

Photos (3)

Office docs

Shipping updates

Messenger

27 invitations

Sign in to Messenger

Home

Contacts

Calendar

herman heyn

11/21/10

To Alan MacRobert/ Sky & Telescope

Reply ▾

Dear Alan, This is Herman Heyn, whose letter on Uranus' color was in Dec.'s S&T. Here's another color challenge. Mid evening last night (11/20) when Europa and Ganymede were just a hair's breath apart, I saw Europa as pale blue while Ganymede was golden. They looked like a mini-Albireo! This was in a steady sky at 80X in my 8" SCT.

Alan, I was doing my "street" telescoping routine, so I subsequently asked my next dozen or so passerby lookers if they saw any color in the top one. About 4 or 5 of them, without any color prompting, said it looked blue, which told me mine was an objective observation.

I've never before noticed any color differences in Jupiter's moons at 80X, which is my working magnification for Jupiter. I'm wondering if you've seen any yourself or have heard of color observations like the above. I'm also wondering if Europa's blue hue could be caused by its icy surface. I believe that star colors not noticeable in single stars become so in double stars of different hues. At 80X the moons are "stars".

I look forward to hearing from you on this query.

Clear skies!

Herman Heyn
Baltimore's Street Corner Astronomer

P.S. Please check out my website:
www.hermanheyn.com

Ad feedback | AdChoices

New | Reply Reply all Forward | Delete Mark as ▾ Move to ▾ |

SC EXPENSES -- 2010

| | |
|---|----------|
| 01/14/10 SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 01/28/10 STA Balto. Bike Wks. #281454 | \$ 24.91 |
| 01/25/10 SP 13-sides SC handouts (JHU) | \$ 0.91 |
| 03/19/10 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 03/19/10 SP FPT. parking | \$ 0.75 |
| 03/20/10 SP FPT. parking | \$ 0.75 |
| 03/21/10 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 03/27/10 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 03/31/10 SP FPT Parking | \$ 0.50 |
| 04/01/10 SP FPT parking | \$ 0.50 |
| 04/02/10 SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 04/03/10 SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 04/06/10 SP FPT parking | \$ 0.50 |
| 04/07/10 EQUIP Repair of star diagonal by JHU Bloomberg machine shop. Amount covers repair cost + contrib. of \$11.00 to Md. Sp. Grant Consort. Attn: Prof. Richard Henry (CK#1044) | \$ 40.00 |
| 04/12/10 SP 23-sides SC handouts (JHU) | \$ 1.61 |
| 04/10/10 SP FPT. Parking | \$ 0.75 |
| 04/14/10 SP FPT. parking | \$ 0.75 |
| 04/15/10 SP FPT parking | \$ 0.50 |
| 04/19/10 SP FPT parking | \$ 0.25 |
| 04/23/10 SP FPT parking | \$ 0.75 |
| 05/04/10 SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 05/05/10 SP FPT. parking | \$ 0.50 |
| 05/07/10 SP SC handouts 24-sides (JHU) | \$ 1.68 |
| FELLS PT. PARKING SP 5/10=0.25, 5/15=0.75, 5/16=0.50, 5/29=50¢, 5/30=25¢, 6/18=25¢ = | \$ 2.50 |
| 05/21/10 SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 05/30/10 SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 05/31/10 SP 3-SC handouts (Kinkos) | \$ 0.29 |
| 06/02/10 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 06/11/10 SP 12-sides SC handouts (JHU) | \$ 0.96 |
| 06/16/10 SP 7-sides SC handouts (JHU) | \$ 0.49 |
| 06/20/10 SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 06/29/10 SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 06/30/10 SP 24-sides SC handouts (JHU) | \$ 1.68 |
| 07/02/10 SP 13-sides SC handouts (JHU) | \$ 0.91 |
| 07/05/10 SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 07/16/10 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 07/22/10 FELL'S PT PARKING SP 7/21=0.25+ | \$ 0.25 |
| 07/22/10 SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 07/25/10 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 07/30/10 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/07/10 SP 4-sides letters for new HAV-A-LOOK! sign (Kinkos) | \$ 0.40 |
| 08/07/10 SP 7-sides HAV-A-LOOK! original (Kinkos) | \$ 0.70 |
| 08/09/10 SP 20-SC handouts (JHU) | \$ 1.12 |
| 08/20/10 SP 11-sides SC handouts (JHU) | \$ 0.70 |
| 08/25/10 SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 08/25/10 SP Frankie in FPT (loading assist) | \$ 3.00 |
| 08/29/10 SP 5-sides SC handouts (Kinkos-JHU) | \$ 0.40 |
| 09/08/10 SUBS S&T renewal (+ free sub to Aren's school) CK#1068 (Kelly Vaughn, Sc. Teacher, Brooklyn Prospect Chart. Sch., Bkyn. 11232) | \$ 34.95 |

| PAGE 1: | SP | STA | EQUIP | SUBS | PAGE |
|---------|---------|---------|---------|---------|----------|
| | \$37.87 | \$24.91 | \$40.00 | \$34.95 | \$137.73 |

SC EXPENSES -- 2010

| | |
|---|----------|
| 09/09/10 STA bicycle pedal repair (Balto. Cycle Wks.) | \$ 3.43 |
| 09/09/10 SP SC handouts (JHU) | \$ 0.21 |
| 09/13/10 SP (1/2-hr. parking in FPT. | \$ 1.00 |
| 09/14/10 SP 7-sides SC handouts (JHU) | \$ 0.49 |
| 09/14/10 SP FPT parking | \$ 0.75 |
| 09/15/10 SP 13-sides SC handouts (JHU) | \$ 0.91 |
| 09/15/10 SP FPT parking | \$ 0.50 |
| 09/18/10 SP FPT parking | \$ 2.00 |
| 09/20/10 SP FPT parking | \$ 1.50 |
| 09/21/10 SP SC handouts (JHU) 3lea. | \$ 2.17 |
| 09/21/10 SP FPT parking | \$ 1.75 |
| 09/23/10 SP FPT parking | \$ 1.25 |
| 09/24/10 SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 09/26/10 STA 1000 "Super Sticky" Post-it notes (Ebay) | \$ 6.73 |
| 10/16/10 SP FTP parking | \$ 0.75 |
| 10/17/10 SP FPT parking | \$ 3.00 |
| 10/21/10 SP 20-sides SC handouts (Kinkos) | \$ 2.00 |
| 10/22/10 SP FPT parking | \$ 3.00 |
| 10/23/10 SP 8-sides SC handouts (Kinkos) | \$ 0.80 |
| 10/23/10 SP 11-sides " " (JHU) | \$ 0.77 |
| 10/23/10 SP FPT parking | \$ 0.25 |
| 10/28/10 SP FPT parking | \$ 2.00 |
| 10/29/10 SP FPT parking | \$ 1.00 |
| 11/05/10 SP FPT PARKING | \$ 0.75 |
| 11/06/10 SP 9-sides SC handouts (Kinkis) | \$ 0.90 |
| 11/09/10 STA typewriter ribbon (Ken & Ray)(50% use) | \$ 5.30 |
| 11/11/10 SP FPT PARKING | \$ 1.75 |
| 11/12/10 SP FPT parking | \$ 2.00 |
| 11/13/10 SP 2-sides SC handouts (KINKOS) | \$ 0.19 |
| 11/13/10 SP FPT parking .. | \$ 2.00 |
| 11/17/10 STA 1-bottle stamp pad ink (Office Depot) | \$ 3.49 |
| 11/19/10 SP 15-sides SC handouts (JHU) | \$ 1.05 |
| 11/19/10 SP 2-sides SC handouts (Kinkos) | \$ 0.20 |
| 11/19/10 SP FPT parking | \$ 2.00 |
| 11/20/10 SP 14-sides SC handouts (Kinkos) | \$ 1.34 |
| 11/21/10 SP 9-sides SC handouts (Kinkos) | \$ 0.87 |
| 11/27/10 SP FPT parking | \$ 2.10 |
| 12/05/10 SUBS Physics Today, 1-yr. | \$ 20.00 |
| 12/20/10 BOOKS Obsvr's Handbook (S&T ord.#10545698) | \$ 36.90 |
| 12/31/10 EQUIP 1-RKE 15mm eyepiece | \$ 45.00 |

| PAGE 2: | SP | STA | EQUIP | SUBS | BOOKS | PAGE |
|---------|---------|---------|---------|---------|---------|----------|
| | \$49.52 | \$12.22 | \$45.00 | \$20.00 | \$36.90 | \$163.64 |

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|--------------|---------|---------|---------|---------|---------|----------|
| <u>YEAR:</u> | \$87.39 | \$37.13 | \$85.00 | \$54.95 | \$36.90 | \$301.37 |
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MILES = 826.0 x \$0.50 = \$413.00

2011

Not for Distribution

STREET CORNER TELESCOPE LOG -- 2011

- 9 2343)02/11/11(FRI)FPT(7:17-9:17PM). First stint since 11/28. Clear & cold. +/-34°F. I was OK except feet. Might have stayed longer otherwise. Slow scene. Long stretches w/no lookers. JUPITER(2+1. Only for 15-min.) 8-day MOON(Good. lookers awed.) Tough stint, no the least due to ice in front of my house. Encouraged to go by PLW. Having not been out for so long, I discovered I was none the worse for wear.Can still do it!(\$25.23)
- 9 2344)03/13/11(SUN)FPT(7:14-9:02PM DST) PLW'S #115. V. clear. 40°F. Kiosk for windbreak. 1ST QT. MOON(Great scene, with sunrise on Copernicus. Lookers awed!) OCCULTATION(-/- 8:30PM. Mu GEM, mag. 2.8. Exciting! Witnessed by PLW thru main scope and HH thru finderscope.) 50X on Moon. Slow scene but fairly steady traffic. VISITS(A young lady who brought coffee. Family from NC here for college visits.) \$32.40(\$18.00/hr.) PLW (Great company, plus energetically recruited lookers!) KIOSK MAN(Gave us some free hotdogs and pretzels, some of which PLW gave away and some we brought home.) VISIT(Michael, who bought a scope having looked thru mine. Connie...first looker and a local who was very happy to see us back.)
- 9 2345)03/18/11(FRI)FPT(8:15-10:28PM). Accompanied by Dominick, who tries to help as best he can. Shows initiative! Near 70°F! Continuous clouds problem. V. busy scene. Overall, a very difficult night...starting w/parking and an unusual number of little kids. MOON (1-day short of full. 50X. Bad suckerhole situation, + haze. Nevertheless, lookers liked even a hazy view. Featured Tycho.) "SUPERMOON" PHENOMENON(Being very close to perigee, tomorrow night's full Moon will be the biggest and closest in 20 yrs. Many lookers were aware of this and asked about it!) VISITS(A few lookers who remembered me fro 20 yrs. ago. Rena. Tim. Charles. Meichael Reitzig.) Shut down by clouds. \$44.80 (\$20.18/hr. SATURN(Dominick spotted it 10:15PM just west of the "Darth Vader" radio tower, but before I could get it in scope clouds blotted it out.) SCOPE(Eyepiece holder grip poor and not holding diagonal firmly enough. Happily, a new one from Astromart on the way!)
- 9 2346)03/19/11(SAT)FPT.(8:15-10:47PM). V. clear. Cold, w/never relenting cold wind. Between the wind and working w/lookers, was a very demanding stint. I held up ok, but am thinking I must be some kind of masochist. Parking ok. Then hung out waiting for moonrise to determine where to setup. Beautiful white (not crimson!) Moon, but I couldn't have scoped it decently from anywhere. Had to wait for it to rise above Rec. Pier. M42(while awaiting Moon. No nebula, but trapizium decent. Showed photo first.) "SUPER FULL MOON"(Closest and thus largest full Moon since 1993. Lots of passersby aware of this. Explained it and handed out a printout w/drawing.) SATURN(1st time this yr.! Acq. 9:45PM just to left of twr. No Titan. Gave out stickers. New RKE 15mm worked well!) VISITS(Maria, who brought coffee last time and again tonight. Lives on S. Wolfe. Jacki from Phila., whose deceased husband years ago was totally turned on to astronomy by looking thru my scope. Allison, my NYC Bolt Bus seat buddy who works at Ale Mary.) \$63.60 (\$25.14/hr.) FULL MOON(50X w/filter. Offset image for Tycho. Showed photo. Everybody liked. Nobody asked to see whole Moon.) VISITS(A man who recalled reading Linda Turbyville's May6-12, 1988 City Paper piece "HEAVENS ABOVE A Street Corner Astronomer's Guide to the Galaxy", which combined my activity with Gabriel Garcia Marquez's "100 Years of Solitude". He said he did really understand it, and I said that I didn't either!. A man who said he was the June 8, 2004 TRANSIT OF VENUS while driving east across the Bay Bridge. I referred him to my website's cicada photo and told him about next year's transit.)*Rose 7:37PM; acq. 9PM.
- 9 2347)04/02/11(SAT)FPT.(8:40-10:12PM). Clear. Cold + wind chill. Mildly busy scene, despite it being night of "March Madness" semi-finals. The used Kiosk as wind break was able to acq. Saturn right away. Accompanied by DOMINICK. NEW EYEPIECE HOLDER(its inaugural night, my having just acq.'d via Astromart. Worked fine, but had to do alot of improvazation to make it work.) SATURN(80X, the n 133X. Some doubters, most lookers impressed. Titan. Encountered twr. 9:23PM.) VISIT(Mitch Gyson, who was mgr. at Rotunda Giant in mid-80's. Is an artist and made "Comet Halley Expo" posters. Now a professional artist living in NYC. www.mitchgyson.com. Great reunion!) Slow, cold, HH bored. Adjourned to Bopp Pizza. PARKING(V. stressful, but immediate relief upon finding a spot.) 40°F \$21.13 (\$13.81/)

TOTAL THIS PAGE = \$ 187.16
 TOTAL THIS YEAR = \$ 187.16

- 04/09/11 B&A TRAIL PLANETS WALK (ref: Jim Lochner, NASA: 410-652-9629). Cloudy & cool. My 3RD year as a "docent" at this event. I staffed the "SUN" position, which is the position at which participant start down trail. My duties included stamping "pass-ports", asking the q. about what fuels the Sun, giving out Sun literature (photos), recording quantity of visitors and asking "evaluation" q's. As always, kind of slow, but nevertheless, some very appreciative participants. I recorded +/-50. Gave out my own website business card, as well. Began day driving to Poly-Western w/2 boxes of "archives" from my basement for shredding. (10:30AM-2:30PM)
- 28.4
- 04/14/11(THU)FPT(7:49-10:10PM). 1st weather doable nite since 4/02. Mild. V. clear. HH(Some dizziness but performed ok.) lld. MOON(Briefly.) SATURN(Acq. 8PM, but could have done so 10-mins. sooner. Twr. at 8:15PM. Due to streetlight glare, 8:50PM w/Charlie's assist moved scope closer to Kiosk. 135X. Titan. Eventually a great image.) VISIT(Charles the Balloon Man, who got me a pretzel dog and helped move scope.) \$40.00 (\$17.02/hr). WEBSITE "BUSINESS CARD"(1st night at scope. It felt good giving them out. Conceived of and typeset by PLW, printed by HH on cd. stock. Nice looking product!)
- 9
#2348
- 04/24/11(SUN)SHERWOOD GARDENS W/SUNSCOPE(2:15-3:30PM). Thru binocs saw two small spots so decided to do it. Two false stars delayed getting started. Biked to Kinkos to copy "Airplane story handout and discovered had left original home. Biked home, returned in car w/scope made copies and drove to SG's. Was 1/2-way setup and discovered had left screen bracket home! Put everything back in car, returned home for bracket, returned to SG's, setup. When finally setup, clouds began appearing. Mostly a "sucker hole" situation. Nevertheless, drew lots of interest. Lots of photos taken of me/scope.(Melissa.Arribas.org e-mailed two nice ones.) LOTS of orthodox Jewish families present. Enjoyable experience.**
- 2-4
- 04/30/11(SAT)SHERWD. GDNS/SUNSCOPE(2:40-4:00PM). Nice day. No spots in binocs but went anyway. Two faint spots on opposite solar rims. LAMINATION(Laminated back-to-back photo of mega spots w/cycles chart 1750-2010. Very useful in explaining spots.) SCENE(Nothing like last Sun. Its being Sat., no orthodox Jews!) Gave out 14 "business cards.) NO HAT
- 2-4
- 1349)04/30/11(SAT)FPT(8:15-11:15PM).Mild/cool. Sl. haze. PARKING(W.Taxi slot.) Accompanied by Dominick, who I let remove scope from case and secure on mt. SATURN(Acq. "by the #'s". Titan. Lookers impressed. Doubters...but no adamant ones. 80X, then 133X.) BATTERY(Dead from the start. Had to manually track.) VISIT(Maria, who lives in FPT, is a regular visitor and who excitedly reported seeing a bright meteor early evening from Belvedere Square.) Gave out lots of "business cards". \$80.00 (\$26.67/hr.)
- 9
- ***VISIT(Lisa, contra dancer, "Cafe Q" worker, music teacher, w/her sister and parents.)
- 2350)05/05/11(THU)FPT(8:05-10:40PM). Mild. Sl. unsteady sky. TRACKING SYSTEM(Prob. last time due to blown fuse, which I replaced. Tonight system worked for 10-15 mins. and died. Why? New fuse looked ok.Am chg'ing bat. overnight and test it tmw.) 2-D. MOON (Briefly, than occasionally.) SATURN(Couldn't find "by the #'s". Prob. due to bad alignment. Most lookers very impressed. Titan. 133X.) Visit(Jay, contradancer.)\$56.02 (\$21.63/hr.)
- 9
- 2351)05/09/11(MON)FPT(7:53-10:15PM). Mild. Ok sky. SCENE(On arrival looked pretty slow--the kind of scene which, in the past, I would have kept going to HPL.) PARKING(W.T. spot.) 6-D MOON(Great. Till Saturn.) SATURN(It's usual singular self.) \$45.00 (\$18.99/hr.)
- 9
- 2352)05/10/11(TUE)FPT(8:05-9:25PM). Mild. Intermittent hazy which eventually shut me down. ALIGNMENT(Used compass.Was good. Got me within 1° of Sat.) 7-d MOON(Good. Not quite 1/4.) SATURN(Sometimes diminished by haze.) HAT(Lots of no-pays but a \$10!) \$25.79 (\$19.25/)
- 9
- 2353)05/11/11(WED)FPT(8:12-10:27PM). Mild. VG sky. PARKING(Long, unpleasant wait for space.) BATTERY(Kaput from start. Blown fuse...as it worked till end last night, suspect happened during rechg. Will try 2.4 amp.) 7-D MOON(Sunrise on Copernicus. As good as it gets!) SATURN(Titan close at 2-o'clock.Gd test of focus.) ALIGNMENT(Figured out pretty good now.) VISITS(Steve Shulhoff, who met Eddie Rosenthal in Cleveland and who asked about me and many others here. Murray Bentley who contrib'd \$20!) \$69.17(\$30.74/) VISIT(David Thomas) HH(In good form. Because of the variety of people you meet and their often high level of excitement, "street" telescoping has got to be among the most interesting and fun of human activities!)
- 10

PAGE TOTAL = \$315.98

YEAT TOTAL = \$503.14

60

- 2354) 05/12/11 (THU) FPT (8:15-10:53PM). Chilly. Gd sky. Hesitated to go due to clds. Once there, hesitated to set-up. Happily, clds dissolved at sunset (8:11PM), and I got to work. Slow start; no-pays. But later it dramatically improved! 8-dMOON (Luminescent sunrise on Jura Mtns. Lookers impressed.) SATURN (Titan. Street lights hiding dimmer moons which wasn't the case in HPL.) NEW BATTERY CHGF (Black & Decker from Home Depot. Concluded that blown fuse prob. was caused by my 24-yr old one and a replacement was needed.) VISITS (Maria, who enthusiastically recruited lookers. A woman from E. 38th St. who'd seen me at a WIA mtg. Lived there 4-yr and "loves it".) \$82.61 (\$31.37/hr.)
- 2355) 05/20/11 (FRI) FPT (8:30-10:43PM). Mild. Questionable sky as leaving hm, then long delay till clds allowed. PLW's #116 Did a good recruiting job! PRAKNESS EVE...with a noticeable no. of lookers here for event. SATURN (Great, when not behind clds. Bad "sucker holes" situation.) Even tho plenty of potential lookers, gave it up due to clds. \$70 (31.53 VISIT (Rob Vary, a FPT. Ghost Tours leader. Very interested in science. Does Sch. demos. Two MICA students who thought PLW and I were "cute" and took some photos of us posed with our scope. Young woman, just today graduated from pharmacy school, who said she will put her Saturn sticker next to her Jupiter one already on her refrig.)
- 2356) 05/25/11 (WED) FPT (8:30-10:55PM). Warm. 1st stint in short pants. Iffy sky, but we went for it. Turned out to be a perfect sky! PLW's #117 BATTERY (Worked fine w/o rech'ing.) ALIGNMENT (For a chg....perfect.) SATURN (Good as it gets. Lots of skeptics!) FPT (Fairly busy scene. Families with new grads from various JHU schools.) PARKING (2 spaces next to W.T. spaces now reserved for ZIP cars.) HH (V.G. head.) \$87.00 (\$35.95/hr.)
- 2357) 05/26/11 (THU) FPT (8:30-10:45PM). PLW's #118 Huge bank of ominous clds in W at leaving time. We decided to go, which was a good thing because by starting time sky was clearing. Ok sky; fair seeing. SATURN (Not as sharp as last night, but it still aroused skepticism! BATTERY (Not working. Afterwards at home wouldn't chg. What to do next?) VISITS (While setting up, Hubble's program dir., who was please to see what I was doing. ANDREW McCARTHY, who took notes while asking lots of Q's. Is writing Balto. art for National Geographic Traveler Magazine. Said might send photographer. A looker recognized him as a movie actor, one of his films being "Pretty & Pink".) \$74.32 (\$33.03/hr.)
- 2358) 05/28/11 (SAT) FPT (8:30-11:30PM). PLW's #119 Slight cool wind. Ok sky. Busy scene! BATTERY (Working again! As discovered by Bainesville Electronics, frayed wires in male plug were touching and blowing fuses. New plug installed. W/2.5 AMP fuse = \$9.12.) SATURN (Often at 165X. Used Titan as focus test. As usual, lots of skeptics!) VISITS (SCHUYLER DENHAM & SON VALENTINO, S. being Ken's h.s. classmate. He inquired if Ken had been found, and I told him the story. Coincidentally, Valentino had recently been in Andorra! Schuyler retired from the Balto. Police Dept. and is living in Colorado. He recalled attending my TOV event in Druid Hill Pk, 06/08/04. schuyler@thehistoryhut.org. SHELLY FINGERHUT (HOLT?)...a very warm, friendly and very impressed looker. Maybe a writer. Will Google him. HELEN, writer/illustrator...after a long hiatus.) \$121.72 (\$40.57/)
- 2359) 05/29/11 (SUN) FPT (8:35-11:27PM). PLW's #120 Mild. Ok sky. Busy scene. SATURN (135-65X, per haze presence. Titan and ring shadow as focus tests for lookers.) VISIT (Young lady from yrs. ago who said I gave her a mnemonic and told her she'd get a free look if she learned the planets in order. She said she returned later for her look!) \$88.45 (\$30.82/)
- 2360) 05/30/11 (MON: MEMORIAL DAY) FPT (8:50-10:15PM). Warm. Gd. sky. V. slow scene. LATE START (I impulsively adjusted the tripod's wedge angle, destroying my ability to find Saturn "by the numbers". Fixed at home.) SATURN (V.G. image @ 165X) PLW's #121. \$28.70 (\$21.21/)
- 2361) 05/31/11 (TUE) 808 NORTHWIND RD, TOWSON (8:40-10:15PM). Spur of the moment, Cambridge Sch. 5th grade campout, per call from Colleen (443-690-5655). Backyard of mansion w/big pool of Charles Edwards.. On grass, w/good mag. compass alignment. SATURN/TITAN. +/-40 kid/adult lookers after which, at my req., they assembled on grass near scope while I pointed out bright stars, UMa, and Polaris. Beside Saf. Facts/stickers, gave out 20 Sky Maps. A good alternation to FPT, from which we needed a break. Asked for \$75 and got \$80.00 Driving home was feeling I was worth \$100.00! PLW's #122.

TOTAL THIS PAGE = \$ 632.80

TOTAL THIS YEAR = \$1,135.94

STREET CORNER TELESCOPE LOG -- 2011

2362)06/02/11(THU)FPT(8:40-11:20PM). Mild. Gd. sky. Surprisingly busy scene. SATURN/TITAN. GAMMA VIRGO(aka Porrima. Is v. close to Saturn. At req. of Grant Miller tried to split it but failed. At 166X & 220X, even after collimation, looked like an elongated flare. Sep. 1.59)VISIT(Kathleen from Denver, who'd seen Jupiter thru scope 6-mos. ago and was hoping she and her husband would find me again. Very effusive!)PLW's #123 \$88.26(\$33.18

2363)06/03/11(FRI)FPT(8:40-11:20PM). Mild. Gd. sky. PLW's #124 2-D MOON(Called to my attn. by PLW. Thin, gorgeous, thin crescent w/a large crater.) SATURN/TITAN(As always, lots of skeptics as well as flabbergasted lookers!) VISITS(Young man from Ga. who teaches astronomy to elem. teachers. Gave him Bernie Nebel ref. Josh Foti, owner of S. Balto. restaurant, Ryleigh's Oyster, who was totally taken by Saturn and invited us to visit.) FREE ICE CREAM(As she was paying for 2 cups, PLW invited the Maggie Moo workers to visit our scope, upon which she was refunded her\$\$). Later, 4 of them showed up and had looks at Saturn.) \$126.59 (\$47.59/hr.)

2364)06/05/11(SUN)FPT(8:18-10:10PM). Warm. Ok sky, then shut down by clds. PLW left this AM for Atlanta. 4-D MOON(Lookers impressed.) SATURN(Did a few times at 80X so y Vir was in same field. Beautiful paring, y Vir being 39 ly.) Slow scene, but got \$20.00 contrib from a woman from Jordan. VISIT(Oleg, a BSO violinist who knew my BSO friends, Wayne and Jonathan.) \$47.00 (\$25.13/hr.)

2365)06/07/11(TUE)FPT(9:18-10:58PM). Late start due to high haze procrastination. SATURN (Sans Titan due to haze.) 6-D MOON(Lots of craters.) \$30.50 (\$18.30/hr.)

2366)06/08/11(WED)FPT(8:29-10:44PM). Sticky hot! Hazy. Good alignment after tweaking wedge dec. angle. SATURN(Same-same w/lookers. Sans Titan in haze.) 7-D MOON(Awesome at 135X. Just short of 1st Qt.) VISITS(Lookers from disabilities convention.) \$56.00 (\$24.89/)

06/10/11(FRI)721 E. 36th St.(9-11PM). Hot & hazy. Discouraged by early evening storm for FPT. By 8:45PM, however, sky looked doable. Began preparing for FPT, but decided to set up at home to photograph Moon. Got a good one of Tycho region, whereupon camera battery died. (It's never easy, is it!) By now had attracted neighbor's attention. Had +/-dozen lookers for Saturn and Moon. Then tried to split y Vir. Ugly image of two small spikes, one atop the other. On z Vir was only one spike, so I guess, in effect, I did split y Vir. No hat. Gave out stickers and a few "facts". VISITS(Tieman & Els, after a long absence.)

2367)06/12/11(SUN)FPT(8:32-10:28PM). Warm. Ok seeing. BATTERY(Dead...am thinking it won't hold a chg. Will buy new one tomorrow.) DEC. LATCH(Suddenly, at end of stint, very hard to move. Worrisome. Must ck. tmw.) 11-D MOON(Tycho region. Good.) SATURN(Titan close at 2-o'clock. y Vir still in same 80X field. Pretty!) VISIT(A guy with a sky app on his i-phone. Lead him to H's Cross and told him to go to it on website.)\$32.07(\$16.53

28 06/13/11 Two round trips to Battery Warehouse to purchase new 12V bat. for scope.

2368)06/13/11(MON)FPT(8:30-10:33PM). Chilly...lg slv. shirt + beret. V. clear but just ok seeing. NEW BATTERY(Good move, as I think the old one was definitely defective.) DEC. LATCH(Prob. solved w/oil. Now working smoothly.) ALIGNMENT(w/mag. compass, which worked v. well.) 12-D MOON(50X w/filter. Featured the "starburst crater" Tycho.) SATURN(w/Titan.) ISS(10:18PM. Nice SW-NE flyover.) \$71.24 (\$34.75/hr). Included \$20.00 from a 3-family group, + 3ea. \$5's.

2369)06/14/11(TUE)FPT(8:48-11:02PM).Chilly. Sl. clds delay, then intermittent clds, but basically a great sky. SATURN(w/Titan. On 1st try.) 13-D MOON(Full to the eye. 50X with filter. Tycho.) VISIT(Yng. lady who has a Balto. blog. Will put me on it.)\$52.07(23.35/

TOTAL THIS PAGE = \$ 503.73

TOTAL THIS YEAR + \$1,639.67 (last yr. = \$1,505.50)

STREET CORNER TELESCOPE LOG -- 2011

2370)06/18/11(SAT). Dry run with Dominick to FPT. At sunset clouds looked like they were dissolving, but they never did. With my front walk removed in prep. for a new one and yellow tape surrounding it, D. was a big help in moving out and in.

9 2370)06/20/11(MON)FPT(8:41-10:27PM).Unexpectedly, sky cleared late afternoon! Chilly. Semi quiet scene. SATURN(Titan near at 7 o'clk. Lookers impressed.) VISIT(Jill, who it turned out, is the daughter of a childhood contemporary, David Greenberg. Conversation began w/her asking about a telescope her deceased father left.)\$42.55(\$24.04/)

9 06/24/11(FRI) DRY RUN TO FPT. Thick clds in W. as I left home, but I hoped they'd stay over that way. However, in FPT they'd moved easterly. Stayed w/car and watched for a while. Decided was not worthwhile to unload. Come home. Too bad, as was busy. 10PM at home: sky perfectly clear. Saturn w/Porrina easy to see. But how would I know!

17 06/29/11(WED) BATTERY SAGA! Yesterday, when I tried to chg. my new battery, the green light in my new B&D charger didn't come on, indicating the chg. wasn't being accepted. Same thing with my old charger--no characteristic buzz. This AM took set up to Bainesville, who decided prob. was battery. Went to Battery Warehouse., where green lgt. went on when chg. set for 6V. Guy said to fully chg. to 6V, then go to 12V. Back to B. who said that wasn't right. Made tests, concluding battery bad. Back to B.Warehouse., where, happily, was given new battery in exchange, with no questions asked!

9 06/29/11(WED) ANOTHER DRY RUN TO FPT. Blue sky day, but big, puffy clds. appeared late afternoon. Left FPT 9:30PM. Probably would have been ok in another 20-mins., but I was too demoralized at that point to set up. Besides, there were more than usual low lifes acting out on the Square who I was afraid I would have to deal with at the scope.

9 2371)06/30/11(THU)FPT(8:50-10:40PM). Pleasant. VG sky. Fairly busy scene. Accompanied by Dominick. HH(In good form.) SATURN(Many lookers excited by it. Titan.) Adjourned to Bop Pizza. \$38.05 (\$20.68/hr.) B CYG(At req. of looker who asked if can see something else)

9 2372)07/01/11(FRI)FPT(8:50-11:22PM). Pleasant. VG sky. Busy scene. PARKING(Immediate, but on far side of ZIP car spaces, which made for an extra long haul to sq.) SATURN(50/50 between wowed and skeptical lookers. Titan.) *ISS(48° alt. Couple from Chas. Vil. waited around for it and was very excited by it.) HH(Sl. dizzy, sl. depressed.) *Stayed w/SAT. till it hit the Inn roof at 11:22PM. \$88.87 (\$34.99/hr.)

10 2373)07/05/11(TUE)FPT(9:04-9:46PM). Warm. Sl. haze. Delayed by clds. Slow scene. BATTERY SCARE(At first didn't work. Was depressed...at wits end. After a while I jiggled plug at scope and it worked. What a relief!) BUBBLE LEVEL(Dropped it and broke off a 70° piece of its rim, but it still is usable.) 4-d MOON(Briefly.) SATURN(w/Titan. Appreciative lookers.) CLOUDS(Suddenly, Sat. was in a cld. Since I'd had a \$2.00 University Mart chocolate ice cream on my mind since arriving, I immediately packed up and went for IC. Would have been sucker holes had I stayed. \$23.25 (\$33.14/hr!)

10 2374)07/06/11(WED)FPT(8:45-11:10PM). Warm. Hazy. PARKING(Terrible...took 1/2-hr!) "UFO" SIGHTING! (While setting up Crystal, a young woman habituate of Sq., came over and asked, "is that Venus near the Moon?" I glanced at the Moon and to my amazement saw a mag. -3 obj. a few deg. NW of the Moon, drifting very slowly westerly. Lots of people gathered around to see it in my scope. At 80X and 166X, it looked like a small, slightly oval Moon--same color, and with a maria-like vertical, grey smudge. Was +/-1 arc min. wide. Had to move scope every 30-sec. to stay with it. At 8:54PM it was suddenly gone. Unfortunately, nobody witnessed its demise thru the scope. My guess is that it was a large, high up weather balloon. It was all highly exciting!) 5-d. MOON. SATURN(Due to haze, Titan less vis. than usual. Followed it to Inn roof.) MOVIE NIGHT ON PIER("Fighter". I stayed till it ended, thinking I'd get lookers from it, but it never happened. Lesson learned!\$26.80(\$10.74 Slow night in general, plus lots of no-pays and should have paid more-pays.

TOTAL THIS PAGE = \$ 219.52

TOTAL THIS YEAR = \$1,859.19 (last year = \$2,169.73)

- 07/08/11 "UFO"SIGHTING OF 07/06/11: DENOUEMENT. Yesterday, I launched a description of it on the HAL list serve. Today, I recv'd 3 replies concluding it was a weather balloon, probably launched from Wallops Is. or Sterling, Va. Elizabeth Warner sent a photo of one near the Moon which looked exactly like the one seen from FPT. It's the "Fall 07 Guided (Proj) Winner" on the Midlands Astronomy Clubs website. Sean's explanation says that when it expands beyond its elastic limit of +/-20', the balloon bursts, which explains why it vanished from sight so abruptly.
- 2375)07/09/11(SAT)FPT(8:35-10:07PM). Warm. Blue sky all day then 75% cld. cover tonight. Tired of "sucker holing" it and packed up. PARKING(Tonight made me a "believer"! Was so unwanted to struggle for a space was saying to myself that I do such a good thing that if there were a god a space would open up for me as I was approaching Thames. No such luck but, what'd you know, there were 3 spaces open in the Water Taxi reserved space. Made me a believer...almost!) SUNRISE ON COPERNICUS(Could see w/binocs from home it was about to happen, so took camera, as have been wanting to photograph it. Probably would have not set up except for this. Took lots of shots. Most poor due to hand shakes, but got one kind of artful one which will print.) MOON/SATURN(Back & forth thru sucker holes.)\$30.05(\$19.5 "UFO"(Had 5 cyps Eliz. Warner's weather balloon pix for Crystal & friends, but not there.
- 2376)07/10/11(SUN)FPT(8:17-10:19PM). Warm. Good sky(no clds!). 9-d. MOON(Before sunset. Tycho region, Jura Mts. Nice.) SATURN(No Titan-haze, lights, I guess.) B CYG(For Joe...a man from Mont. Co. now living in FPT, who was very interested in my work and who won an astro scout merit badge.) HH(Good head & energy...except scope seems ever heavier!) PARKING (On phone PLW prayed for good spot and, shazaam!, I got 1st W. Taxi slot!) \$42.87(\$21.01/
- 2377)07/12/11(TUE)FPT(8:30-10:30PM). Warm & sticky. Gd. sky. 11-d. MOON(Tycho limb.) SATURN (Titan barely vis.) Slow scene. PARKING(3rd night in row W. Taxi spot!) \$34.20 (\$17.10/hr)
- 2378)07/14/11(THU)FPT(9:13-9:52PM). Pleasant. Moderately busy scene. VACATION(My last stint before leaving on a driving trip w/PLW to Winnipeg to visit Ehsan & Mary, to Red Lodge, MT to visit ex-Baltimorean, Val Smith, and to make stops at Nat. Parks in the region.) Late start due to arrival of late afternoon clds. HH(Feeling good, having taken last night off to recuperate.) FULL MOON & SATURN(Both through sucker holes. Called it quits!)\$11.00(16.9 Too bad about the clds, because I was both feeling good and drawing decent interest. PARKING(4th night in a row I was able to squeeze into the first Water Taxi slot!!!)
- 2379)08/10/11(WED)FPT(7:55-10:13PM). Pleasant. OK sky. Semi-busy scene. ROAD TRIP(1st night back after PLW's and my 18-day, 4,618 mile road trip to Winnipeg to visit Ehsan & Mary and then to points west, including Yellowstone, BlackHills region, Devils Twr., etc.) 11-d MOON(Tycho region. Mostly 8OX.) SATURN(8:35-8:53PM. Still around! Tomorrow night will move eastward to hold it longer.) VISIT(, a looker from years ago said I had to pick him up to reach scope. Mother Yevonne, who I recalled. Accompanied by his blind, fiance lady, to whom I gave a hands-on into to the scope. With her eye to the eyepiece, unfortunately she could detect no moonlight. A great experience for her and me!)PARKING (The usual no-fun experience.) HH(In good form.) \$24.35 (\$10.59/hr.)
- 2380)08/11/11(THUR)FPT(8:17-10:37PM). Sl. warm. Good sky. Semi-busy scene. LOCATION(E side of Sq. to hold Saturn as long as possible.) ALIGNMENT(Perfect for a chg.!) SATURN(8:17-9:13 PM. Even at 8OX, lookers impressed.) 12-d. MOON(Good. Tycho region. 8OX) PARKING(Lucky!) HH(Good form.) VISIT(Family from NJ who said I'm a "must" on their annual trips to Balto.) ALBIREO(Briefly, while Moon behind light.) LEAVING(Delayed due to steady stream of lookers.) COLLIMATION(Performed, as scope badly in need.) \$65.49 (\$27.99/hr.)
- 2381)08/12/11(FRI)FPT(8:26-10:33PM)Warm. Gd. sky. Busy scene. PARKING(OK, except had to stand by while cpl. chg'd a diaper!) SATURN(8:26-9:09PM. Maybe last shot!) 13-d. MOON(Great at 4OX w/filter.) COLLIMATION(Needed, as Sat. was a mess!) VISIT(Tieman & Els, who's just been to Yellowstone! Moving to AZ, where T has a new job.) ASTROPHOTOGRAPHER(Showed me a magnificent of SGR milkyway, incl. H's Cross, which he said he took handheld. Hard to believe...but maybe so.) Tho busy scene, had a long stretch of no lookers, so packed up. \$47.00 (\$22.17/hr.) NIGHT OF THE PERSEIDS(Many inquiries on how to see them. With full moon, I recommended looking from 3-5AM, when Moon low in west...away from city lights, of course. A looker who reported seeing many from Maine a few nights ago.)

TOTAL THIS PAGE = \$ 254.96

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- 08/20/11 RT to Jøppa Rd. Battery Whres. to see why battery won't rechg. Placed closed.
If can't make it chg., will need to go back Monday.
- 14 08/22/11 Return trip to Battery Whres. Left battery for charging.
- 08/23/11 To Battery Whres. to retrieve chg'd. battery. Works now w/my B&D chg'er!
- 10 2382) 08/23/11 (FPT) 8:10-10:10PM. Mild. V. clear. PARKING(ok). BATTERY(After all of the above (Tue) back-and-forth, I forgot to bring the battery-to-scope cord and so had to move by hand!) EARTHQUAKE(Very dramatic! Lasted for maybe 30-sec. around 1:45PM. Awakened by it while dozing on couch. Felt alot of shaking. Saw everything across rñom vibrating. Was a 5.8 quake centered in Va.) ALBIREO(Fall back position. Was decent. Most lookers seemed to like it.) HH(Ocasionally worked up some enthusiasm.) \$28.94 (\$14.47/hr.)
- 10 2383) 08/28/11 (FPT) 8:08-9:26PM. Mild. V. clear. PARKING(Hectic but ok.) HURRICANE IRENE(Night (Sun) after its fringe swept thru area bringing lots of rain and 50MPH gusts. Was worried FPT would be a mess. However, heard on TV was "bone dry", so went down. Brought home a bag of sand from pile of bags on curb.) BATTERY(Trepidation on plug-in time, but worked fine. From now on will re-chg. after each use!) ALBIREO(Sl. problem finding due to poor alignment. Seems alignment w/tripod legs fully extended works differently when shorter.) VISIT(Family from Alexandria with 4-yr. old who knew names of both the planets and J's moons! Recommended I visit Mt. Meadows dark sky area in Va.) \$13.04 (\$10.03/hr. only!)
- 10 2384) 08/30/11 (FPT) 8:02-9:48PM. Pleasant. V. clear. PARK.(2nd WT slot!) ALIGNMENT(Perfect... (Tue) thanks to using magnetic compass!) ALBIREO(Acq'd instantly. lookers liked.) \$24.00(13.56) ISS(20:41/34° flyover. Seen by +/-10 people, none of whom seemed to know of it!)
- 2385) 09/01/11 (THU) FPT(7:43-9:24PM). Warm. Sl. haze. PARK(1st WT slot!). 3-d MOON(Crescent over w.Thames. Ended by clds. after 30-min.) ALBIREO(Gd. eyeball alignment.) VISITS(JHU philo prof. Eckart Forster!) ISS(Gd. 8:40PM flyover. Witnessed by cpl. from NYC here for week-end INDY road race. Got a squiggly photo. Saw B Cyg. \$5/contrib.) CLOUDS(Arrived 9:15PM. Not knowing if here to stay, packed up. After all, could have stayed.) VISIT(Skyler Denem's son... Skyler was Ken's Poly classmate.) \$18.00 (\$10.71/hr.)*Gave him copy of my 03/13/96 City Paper THIS MODERN WORLD "First Things Considered" letter.
- 10 2386) 09/04/11 (SUN) FPT(7:43-8:27PM). Shut down by clds. Too bad, because it was a busy, good quality scene. Got a \$10 and \$5 in first few mins. Warm. PARK(1st WT slot!) As was at Barbara Svoda's party last night, causing me to miss a good FPT night(!), decided to skip tonight's "Deck Buster" in favor of FPT. 6-d MOON(Good craters.) \$23.38 (\$31.99/hr!)
- 10 2387) 09/12/11 (MON) FPT(7:46-9:49PM). Great sky. Mild. FULL MOON(...or just past full. Harvest Moon. Beautiful rising down Thames St. 50X, edge craters at 166X. Lookers liked this Moon.) VISITS(Steve Lampredi, busking w/fiddle. Alfredo, a public defender who lives in Little Italy and who is a regular looker.) SCENE(Kinda slow.) \$32.60! (\$15.90/hr.) TELESCOPE(Getting heavier & heavier...especially when I move it to curb for loading.) JUPITER(Getting closer. spotted 20° over NE horizon at 10:45PM. while unloading at home.)
- 10 2388) 09/13/11 (TUE) FPT(8:19-10:47PM). V. pleasant. Great sky. PARKING(1st WT slot, again!) 15-d MOON(Terrific! Edge craters, Tycho. 50X, 166X, then 80X.) JUPITER!(Having spotted it 20° up at home last night, decided to go for it. Acq. 10:20PM, +15.5°. I was at far W side of Sq. 0+3 moons, 2-stripes. Brought in some good contribs! A month earlier than expected!) THE ROGUES(Arrived to find this Scottish music band--kilts, bagpipes, et al, playing loudly next to my spot. In this business, you never know what to expect next! They were very professional sounding. Turns out they are full-time performers, traveling from festival to festival. Worried they'd delay my start, but they stopped at 8PM. All looked thru scope.) HH(In very good head.) Recv'd several \$5's and a \$10. \$66.00! (\$26.83/hr.)
- 10 2389) 09/29/11 (THU) FPT(8:17-10:20PM). First decent sky since 9/13! PLW's 125! Mild. Great sky. (PARK. Good, thanks to PLW!) Semi-quiet scene, but steady stream of lookers. B CYG(While awaiting Jupiter. Went ok.) JUPITER(Acq. 9:13PM. 1+3 + stripes. Lookers awed!) VISITS (Family from LA with daughter Katie, who was very excited by both B Cyg and Jupiter. Duncan, son of Yvonne, who we both agreed that yrs. ago I had to pick him up to look thru scope.) HH(In good head. Being back was ok.) \$59.50 (\$29.02/hr.) CONFEDERATE FLAG (Mid-eve., a white pick-up truck w/a large one mounted on the tailgate made two passes around the Square.)

TOTAL THIS PAGE = \$ 265.46

TOTAL THIS YEAR = \$2,379.61

2390)10/04/11(TUE)FPT(7:50-9:55PM). Good sky. Cool. PLW's #126 (she leaves for Atlanta tmw.) 1st QT. MOON(Fine. Lookers awed. 80X.) JUPITER(Acq. 8:53PM. 2+2 + stripes. Lookers awed!) VISITS(Lg grp. Englishman now living in Balto. Well dressed, JHU Chinese woman students w/very gd. Eng., having started it in 5th grade.) Bleak scene. \$42.71 (\$20.44/hr)

2391)10/05/11(WED)FPT(7:48-10:02PM). VG sky. Mild. Slow scene. PARKING(Stressful...no fun.) 8-d MOON(Plenty of craters. Sunrise on Tycho but not yet Copernicus.) JUPITER(Great! 1+1 + Callisto close beneath S pole. Gd.stripes. Lookers awed!) VISIT! Skyler Denem & wife. Website Thehistoryhut.org) \$33.18 (\$14.88/hr.) HH(A bit more like a job again.)

**Visit from a 28-yr. old woman who remembered looking thru my scope in Chas. Village. Since she must have been around 4 or 5 then, I asked if I had to pick her up to look, to which she said "yes".!

2392)10/06/11(THU)FPT(8:02-10:00PM). Gd sky. Mild. Slow scene. PARK(Next to last WT slot...a good haul to my west end spot.) 9-d. MOON(Nice. Post Copernicus sunrise.) JUPITER(2+2. Stripes. Fine!) VISIT(Man on disability who astrobabled quite well. Linda & Lori, very personable women from STL. Took photos. Will connect on FB.) \$29.15 (\$14.80/hr.)

2393)10/07/11(FRI)FPT(8:00-11:32PM). Gd sky. Mild. Very busy scene. E.A. POE(Commorating the 162 anniversary of his death, there was a line of cars, bumper to bumper, parked at foot of Sq. on Thames St., some shrinkrapped in black, as well as black, lifesized figures placed around the Square. Some cars bore RIP E.A.P. 10/07/11 stickers. Nobody seemed to be paying much attention to all of this.) 10-d.MOON(50X w/filter. Tycho region. Two guys took so-so iPhone photos.) JUPITER(2+2 w/textbook perfect spacing. Lookers wowed!) HR (More and more lookers asking, "How long have you been doing this?" Most guess my age +/-65 and are shocked when I say I'M 80!) VISITS(Linda & Lori from last night. Tom Chalkley, down for a music gig. Helped me pack-up. Schyler & wife Carole.) STICKERS (Gave out very last of the no longer manufactured 2"x3" yellow ones. Started on the 2"x3" antique white pack I discovered at Dawn's Stationery.) \$102.92 (\$29.16/hr.)

2394)10/08/11(SAT)FPT(7:30-11:25PM). Great sky. Mild. V. busy scene. 11-d. MOON(Tycho region. Impressive at 135X.) JUPITER(3+1. Stripes. Heard "beautiful" from many lookers!) VISITS (Temple U. photography students, Lee Miller and Diana ?, who took many photos and interviewed me. Lee managed to get decent shots of Moon, Jupiter thru scope. Linda & Lori, who waved from a distance.) HH(Kept my high energy, enthusiasm level going throughout. Very hard work! Gave out lots of stickers and "facts".) \$132.05 (\$33.71/hr.) VISIT(Man who's studying remote sensing at U. MI who said he didn't know J was viz. naked eye!)

10/10/11(MON) Cloudy tonight. Last night, however, was clear, but I stayed home because after five nights in a row telescoping, my body felt like it had been beaten up in a boxing ring. Good thing, because today I feel fully recovered!

10/14/11(FRI) DRY RUN TO FPT. FIRST TIME EVER....COULDN'T FIND A PARKING SPACE. TRIED AND TRIED FOR 30-MINS., AND GAVE UP. WAS ILL-POSITIONED FOR TWO THAT DID OPEN UP. COLLECTED MY STUFF FROM SQ. AND CAME HOME. LATE START BECAUSE OF WEATHER ??'s, AND DIDN'T START LOOKING FOR A SPACE TILL 8:05PM. NEED TO GET THERE A LOT EARLIER FROM NOW ON! TOO BAD ABOUT TONIGHT. WAS FAIRLY BUSY SCENE, + JUPITER & 17-d. MOON ON STAGE.

10/15/11(SAT) SUN STAR PARTY, ALPHA RIDGE PK., AUSPICES HAL. My SUNSCOPE + around five Ha scopes. Tiny public attendance...but incl'd a mom w/2 teen sons who I worked with very well. Respectable spot presence. Talked w/Sally, Mark Feurerbach's mom. 51.1 miles.

2395)10/15/11(SAT)FPT(7:43-11:31PM.)Busy scene. Cool. PARKING(IMMEDIATE! Something new. Street by pier. Last night saw a line of cars parked there, so went for it. Put "please see me before ticketing" sign on daeh. Was 1st there, followed by others. No problem. I hope it lasts. Am afraid other will catch on.) B Cyg(Till Jupiter.) JUPITER(Acq. 8:07PM. 2+2. Poor seeing 1st hr.) 18d.-MOON(Acq.10PM. Gd craters.) VISIT(Steve/Amanda Cunningham with half dozen relatives. Big surprise! \$136.59 (\$35.94/hr. Incl'd a \$40.00 contribution!) HH(Not is top form. Voice a bit weak. Slightly depressed?)

TOTAL THIS PAGE = \$476.60

TOTAL THIS YEAR = \$2,856.21

- 2396)10/16/11(SUN) DRY RUN TO FPT. Bleak scene. Gusty, cool wind. Even though Jupiter's moon would be all on one side, my favorite view of them, decided not to set up. PARKING(1 car in my new, hopeful loc., but took 1st Water Taxi slot.) JUPITER(From front porch, w/shaky 7X50 binocs, imagined a line on L and definitely saw Ganymede.)
- 2397)10/17/11(MON)FPT(7:58-10:13PM) Mild. Sl. hazy, then great sky. PARKING(My new-found spot all parked up...ugh! Got 1st WT slot.) SCOPE(Working really well. Jupiter magnificent even at 166X!) JUPITER(Acq. 8PM. 2+2. Mostly 80X.) URANUS!(1X, thanks to perfect alignment. 3 lookers.) VISITS(Steve L, to whom gave a ride home. Carl the Pirate, who works on the pirate tour boat. Hyper. Stayed quite a while.) HH(Good.) \$53.30(\$23.69/hr.) SCENE(So bleak I almost didn't set-up. But FPT never fails to surprise!)
- 2398)10/18/11(TUE)FPT(8:00-8:25PM). Mild. Nice sky when leaving home, but just as I got set up it started clouding up. HH(Maybe a good thing, as feeling beat from strenuous day on top of last night.) ISS(W to N flyover, 7:55PM. Witnessed by Tim and looker Vicky.) JUPITER(2+2, while it lasted!) "BUSINESS CARD"(Have added asterisks and footnote "Check out my Comet Hale-Bopp Xmas card!" Gave out willy-nilly. A woman asked, "You have comet Christmas cards?", telling me this move is working!) \$2.00 (\$4.76/hr.)
- 2399)10/25/11(TUE)FPT(7:28-9:12PM). Mild. Good sky. FPT(As quiet a scene as I ever remember.) PARKING(1st slot on pier road...easy.) JUPITER('Could have acq'd 7:25pm. 3+1+ stripes. Great!) URANUS(1X...two stickers given.) \$19.10 (\$11.04/hr.) ACCIDENT(I pinched a finger putting scope on tripod. Blood got on some stickers and file cds. Bleeding stopped 20m's)
- ★ 2400) 10/30/11(SUN)...#1 having been 11/13/87 in FPT.(7:27-8:30PM) Good sky, then shut down by clouds. Cool...fingerless gloves, heavy sweater & scarf weather. PARKING(Very slow scene with plenty of open spots.) HALLOWEEN EVE(was expecting lots of costumers, but were very few. Many policeman present. 15 "Bobby's Pots" lining front of Sq. and blocking my intended spot. Set up on E side of Sq. 4-d. MOON(Low in SW. Didn't scope.) JUPITER(Incredible moons array! IV beneath J, while the others closely aligned on left side. Some competition from street light. \$18.00 (\$17.14/hr.) SURPRISE(2nd contrib. was a "tenner"!
- STICKING TRIPOD LEG Has been very difficult to pull out and push back in from day one. Tonight, it was near impossible, forcing me to finally bite the bullet and exchange it with a working one from the same kind of tripod Alin bought several yrs. ago on ASTRO-MART and which has been languishing in the basement. Worked 1½-hrs tonight and another 1-hr. next morning, but got it done. Not an easy job. Took all the mechanical skills I possess. Test will come when I next set up. If it works right, telescoping will become noticeably less taxing.
- 2402)11/02/11(WED)FPT(7:28-9:28PM) Mild...glvs. not needed. Great sky. Slow scene. Coast Gd. cutter along pier. PARKING(2nd WT slot.) NEW TRIPOD LEG(Worked fine. Big improvement!) 8d.-MOON(Quarter. Awesome. Sunrise on Alphonsus.) JUPITER(1+3. Stripes. Sharp.) VISIT (WIA member Deborah Stein and friend, Charles. I recognized her, but she not me. Was surprised when I said, "I'm your treasurer.") COMMENTS(How often do you do this? I've never seen you here before. Haven't seen you in a long time...where've you been? You're the best thing in Fells Pt.) \$35.47 (\$17.74/hr.) URANUS(Couldn't find.Tried hard! Why?)
- 2403)11/03/11(THU)FPT(7:17-9:45PM). Chilly. Great sky. Ok scene. DEW!(Pretty heavy. Coated corrector plate. Happily, did not degrade images.) 9-d.MOON(Tycho just lighting up.) JUPITER(1+3. Fine!) HH(Per the video Johnny Heyn is making for me to enter into the Bakerartistawards.org contest, early on I was trying to be professorial, while now I am much more animated with my patter.) \$tint began discouragingly slow, with many no-pays, but it gradually got a lot better.) \$49.44 (\$20.02/hr.) CLOUDS(while unloading at home noticed sky clouding over. I hope it stays that way, as I need a break!)
- 2404)11/04/11(FRI)FPT(7:25-10:08PM). 50°+womdchill.Bad, then good seeing. Discouragingly slow start but then good traffic. 10d. MOON(S.R. Copernicus...awesome!) JUPITER(2+2. 80X and 166X.) URANUS(Finally! twice.) VISIT(Mike Arida, Goddard astronomer and 9-yr. old son Joseph. Did U for them.) HH(L hip pain. Pretty constant, sometimes w/tingling. Arthritis or prostate cancer? If former, must be from lifting scope.) HH(Quit early as have busy day ahead...like dlvr'ing cards to Hometown.) \$65.07 (\$24.01/hr.)

TOTAL THIS PAGE = \$ 242.38
TOTAL THIS YEAR = \$3,098.59

2405)11/05/11(SAT)FPT(7:12-10:28PM). Cold, but not like last night. Ok sky. Semi-busy scene. 1ld. MOON(Only a few times.) JUPITER(Io transited 7:30-9:42PM). LEFT HIP PAIN(Used handtruck for hse. to car, car to sq., and car to hse. Might have helped. Some degree of chronic pain, except when lying down.) HH(Voice faltering a bit. Maybe need break!) VISITS(Lots of Morris dancers, who performed today in FPT. David Mozurkewich, who said he's done engineering on big telescopes. Jim O'Leary & fam. just after I closed up.) JUPITER'S RED SPOT(Many q's each night as whether can see it. My stock ans.: "Since J rotates so rapidly, it's only vis. for about 45m every 10hrs." Actually, I haven't seen it even once this J season.) URANUS(Dozen tries and couldn't spot.)\$79.93(\$24.47/hr)

2406)11/06/11(SUN)FPT(5:28-8:31PM EST). Chilly...hands got sl. numb. Great sky. SCENE(Lots of parking, which eventually filled up...prob. w/fans arriving to watch Ravens-Steelers game in the bars.) JUPITER(Acq. 5:28PM. IEGC looking like a pearl necklass on one side. Incredible sight, which astonished lookers!) 12d-MOON(Several times.) URANUS(Searched futilely several times, then found it right where was supposed to be, then couldn't find it again. Don't know why is such a problem!) L.HIP PAIN(Abscent when I got out of bed this AM, but came on during the morning. Constantly present at telescope.) VISIT(A lg. gp. leaving tmw. on a Bermuda cruise. Most contrib'd.)\$80.33(\$26.34/hr) Six \$5 conribes

2407)11/08/11(TUE)FPT(7:15-9:25PM). Mild. Grt. sky. ASTEROID 2005 YU55(To fly by Earth close than Moon, but at mag. 11.5. Even knowing that w/lights + full Moon would be impossible to see, I prepared an ephemeris for FPT. Passed 5° N of e Peg at 20:55. Thanks to perfect alignment, was right there w/scope, but no luck. Just a dull, orange sky! Some passersby asked about it, but I didn't invite them to come back, just saying it was pretty impossibl to see from FPT.) JUPITER(3+1+stripes. Very nice.) 14-d MOON(Not quite full, so some good edge craters.) HH(Hi energy. Very animated.)\$41.42(\$19.09/hr) MOON PHOTO(Looker got a decent one w/his iPhone. Said he'd email it to me...he did!)

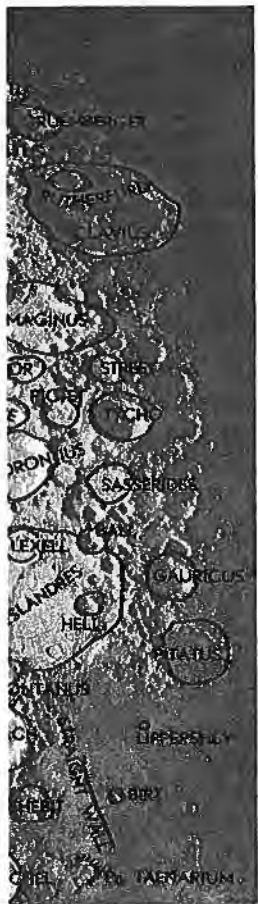
2408)11/09/11(WED)FPT(7:24-8:51PM). Mild but dewy. HH(Was hesitating to go out, when recv'd call from "Ray" (443-449-9295) who, w/friends, was so excited by looking thru scope tha he wanted to return tonight with more friends. (Sounded like was calling from a bar.) S I set up. By 8:51PM hadn't shown, scene was bleak, so I packed up. At home had call on TAM saying Ray was down there. I called back, saying I waited 1 1/2 hrs, and when he didn't show up I came home. I assured there'd be many more chances.) JUPITER(4+0. Dew on front lens noticeably diminished brightness.) FULL MOON(Awesome w/filter at 50X.)\$22.57(15.57

★ 2409)11/12/11(FRI)FPT(6:30-10:23PM). END OF MY 24TH YEAR OF STREET CORNER TELESCOPING! BELIEVING AS I DO THAT LIFE, IF NOTHING ELSE, IS PERVERSE, I WAS SOMEWHAT AFRAID THAT SOMETHING BAD WOULD HAPPEN TONIGHT, BUT IT DIDN'T, SO HERE I AM WRITING MY 24TH ANNIVERSARY REPORT! Sl. Chilly. Sl. hazy. HH(Hi energy.) L HIP(Good all day but started to tingle.) SCENE(Busy.) PARKING(B'way extended...easy.) HANDTRUCK(Using it as much as possible, making my hips feel noticiably less arthritic.) JUPITER(2+2, then 2+1 wide. Lots of excited, appreciative lookers.) 18-d. MOON(Awesome craters each side of Mare Crisium.) VISITS(Dan & Elaine Lowenthal. Dan looked. Woman from Deer Creek Fiddlers days who gave me a huge hug but whose name I couldn't remember but which I now know is Carole. Eddie Arrossi, prof. photographer who took a nice star trails photo which he'll send me.) Could have stayed longer, but enough was enough! \$138.29 (\$35.64/hr.)

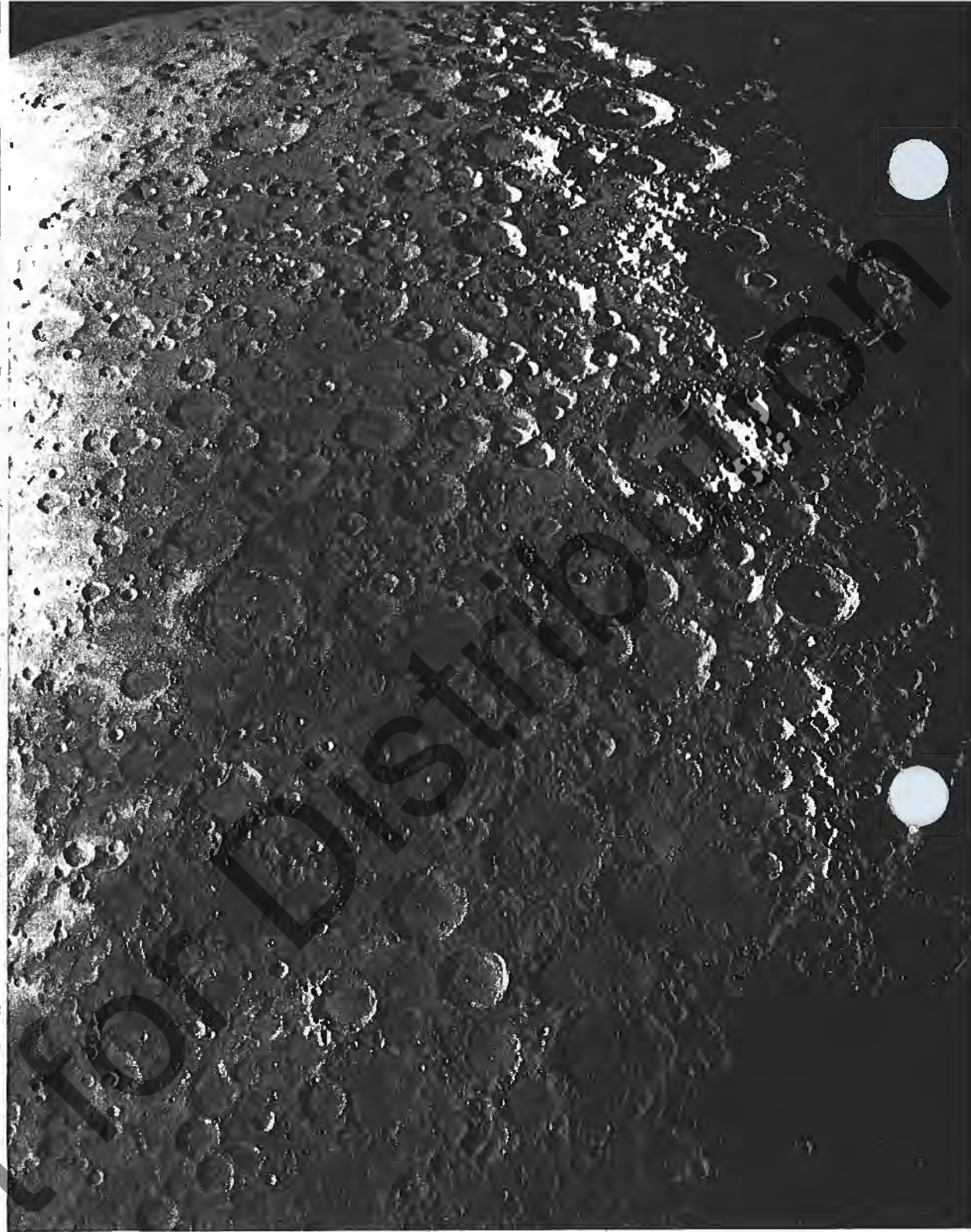
★ 2410)11/18/11(FRI)FPT(7:25-8:53PM). FIRST NIGHT OF 25TH YEAR! COLD w/WIND CHILL(Feeling a bit hypothermic, so quit.) Gd. sky. Moderate traffic but few lookers. PARKING(Easy... on drive below sq.) JUPITER(1+2+ star right above. Nice.) VISIT(Young man asked how long have been here. Said used to visit with his mother.) \$16.34 (\$11.19/hr.)

2411)11/19/11(SAT)FPT(6:54-8:05PM). Shut down by clds. Too f'ing bad, because mild weather, busy scene, HH feeling good! PARKING(Again B'way extended. Is truely a godsend not having to struggle for a space! I just hope it lasts!!) NEW TRIPOD LEG(Also a godsend. Makes adjusting height 100 times easier!) JUPITER(1+3+stripes. Has moved westward of background star.) VISIT(Woman who's just completed an on-line astro course. No scope but used Android to locate sky objects. Liked course. Good grade.)\$22.00 (\$18.64/hr.)

PAGE TOTAL = \$ 400.88
YEAR TOTAL = \$3,499.47



1 May 1964 - 8.94 days.



9 2412) 11/25/11(FRI)FPT.(6:38-10:35PM). Clear. Semi-mild w/sl. dew. Moderately busy scene. PARKING(Still 1st spot on Bway extended. Whew!) BATTERY(Wouldn't chg. this afternoon. Then, in a panic, I broke a connection in the female socket. Will get a new & better battery from Bainesville, and hope it can fix the socket.) JUPITER(Hand tracking worked ok, but battery tracking much preferred! 2+2, then 2+1. Pices 7th mag. star below, Lookers very pleased with view.) HH(In good shape.) \$122.70 (\$31.06/hr.) SOLD 3 COMET CDS

9 2413) 11/27/11(SUN)FPT(6:16-7:25PM). Mild. Mediocre seeing. Adverse rpt. but doable, but shut down by "sucker holes". JUPITER(2+1). VISIT(Dan Fribush, now living in New Orleans but who remembered me from the Wed. night dance.) Woman who ^{seriously} admired my fingernails! \$9.51 (\$8.27/hr.) Adjourned to Maggie Moo for a chocolate sunday..

9 2414) 12/02/11(FRI)FPT(7:14-10:23PM). V.clear. Cold w/wind chill. Used Kiosk as wind break. BATTERY(Back in action, with new battery and plug, by Baineysville. \$51.64.) PARKING (Bway ext. parked up. Unloaded. Just as was going to start searching, the 1st WT slot opened up! Put handtruck there to save it. Parked. Whew!) JUPITER(Great! 3 moons, then 4. Stripes.) 7-d MOON(1st qt. exactly. Awesome!) HH(Animated, but cold.) \$53.96(\$17.13/) COMMENTS(Lots of "You made my night!")

9 2415) 12/03/11(SAT)FPT(7-9:26PM). EVENING OF THE FPT XMAS TREE LIGHTING FOLLOWED BY THE LIGHT -ED BOATS PARADE. A HUGE # OF PEOPLE PRESENT, BY THE TIME I ARRIVED MOST OUT ON PIER WATCHING THE BOATS. AS WAS SETTING UP THEY BEGAN STREAMING MY WAY, SO BUSINESS BEGAN WITH A BANG, WHICH LASTED AT LEAST AN HOUR! PARKING(Spotted a space occupied by a vendor's box, which she agreed to move. As I couldn't back up, she agreed to leave it there till I drove around block. Nice!) LOTS AND LOTS OF FAMILIES?KIDS...SO MANY THAT I RAN OUT OF JUPITER FACTS! Milder than last night, but hazy at start. Cleared nicely, but eventually hazed up. As traffic had slowed considerably, packed up and adjourned to Bopp Pizza for a slice. JUPITER(1+3+stripes+double shadow transit. Most lookers v. impressed.) 8-d MOON(Soon a sl.hazy view but good craters.) HH(Very energized. V. good with kids.) \$77.70 (\$31.98/hr.) In lieu of J facts gave out Moon Facts. VISITS(Mark Walker, my booster at the Fells Pointer. Brief, but enthusiastic. Also, every night I have a few lookers who remember me from years ago.)

9 2416) 12/04/11(SUN)FPT(5:29-7:03PM). On/off haze at start, then ok. Slow scene. Quit because of an uncomfortable, cold, penetrating dampness. JUPITER(2+2, then 1+2. Good. GRS suspected at 80X, confirmed at 166X. A very small, pale white thing. Nothing I would invite lookers to see.) 9-d. MOON(Post sunrise Copernicus.) VISIT(Alice Brock's granddaughter, Michelle.) \$27.10 (\$17.26...incl'd a \$10/contrib.) 1-Comet (HH to looker)

TOTAL THIS PAGE = \$ 290.97

TOTAL THIS YEAR = \$3,790.44

45
Year = 817 + 33 = 850

1/1 → 6/30 = 377 @ \$0.51 = \$192.27

7/1 → 12/31 = 473 @ \$0.55 = \$260.15

T = \$452.42

SC EXPENSES -- 2011

| | |
|--|---------------------|
| 3/13/11 SP Fpt. parking | \$ 1.00 |
| 03/16/11 SP 12-sides SC handouts (Kinkos) | \$ 1.14 |
| 03/16/11 EQUIP scope eyepiece holder* | \$16.00 |
| 03/19/11 SP 14-sides SC handouts (Kinkos) | \$ 1.34 |
| 03/19/11 SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 03/19/11 SP FPT parking | \$ 1.00 |
| 03/16/11 *Purchased via Astromart from Jeff Council, 2208 Sulphur Run Rd., Jersey Shore, PA 17740. | \$ 16.00 |
| 04/04/11 POSTAGE mail old eyepiece holder to J. Council for repair | \$ 2.07 |
| 04/04/11 POSTAGE cash to J. Council for return postage | \$ 5.00 |
| 04/14/11 SP Fpt. parking | \$ 1.00 |
| 04/15/11 SP 8-sides SC handouts (Kinkos) | \$ 0.78 |
| 04/30/11 SP laminate sunspot explanations (Kinkos) | \$ 2.11 |
| 04/30/11 SP 12-sides "Airplane" story handout (KINKOS) | \$ 1.18 |
| 05/05/11 EQUIP fuse for battery (ACE HDWE) | \$ 2.54 |
| 05/10/11 SP FPT parking | \$ 0.50 |
| → 05/12/11 MILES (to Home Depot to buy new battery charger | 9.0 |
| 05/12/11 EQUIP (Home Depot: Black & Decker "battery maintainer" reghg'er) | \$21.17 |
| 05/12/11 EQUIP 2-fuses 2.0A + 2.5A for battery (ACE Hdwe) | \$ 1.59 |
| 05/16/11 EQUIP 1-fuse 2.5A (Ace) | \$ 0.80 |
| 05/16/11 EQUIP 1-2.5A "slo blow" fuse (Ace) | \$ 2.54 |
| 05/20/11 SP 20-sides "Sun Facts" (7-up) Kinkos | \$ 1.91 |
| 05/27/11 EQUIP 2ea. 2.5A fuses (ACE) | \$ 1.59 |
| 05/28/11 EQUIP New plug/fuse (Baynesville Electronics) | \$ 9.12 |
| 05/29/11 SP 4-sides (8-up) SATURN FACTS (KINKOS) | \$ 0.38 |
| 05/31/11 SP 38-sides SC handouts (JHU-KINKOS) | \$3.07 |
| 06/05/11 SP 27-sides SC handouts (KINKOS) | \$ 2.58 |
| 06/09/11 SP 4-sides SC handouts (Kinkos) | \$ 0.38 |
| 06/13/11 EQUIP New 12V battery for telescope (Battery Warehouse) | \$26.49 |
| 06/18/11 SP 1-sign holding clip ring for tripod (Falkenhans) | \$ 0.64 |
| 06/24/11 SP 1,200 2"x3" Post-Its (Dawns) (= 9/10¢/ea.) | \$10.81 |
| 07/01/11 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 04/07/11 SP 6-sheets of card stock for web site cards (HH photo) | \$ 0.36 |
| 06/15/11 SP 25-sheets (IBID) (HH photo) | \$ 1.50 |
| 07/08/11 SP 20-sheets (IBID) (HH photo) | \$ 1.20 |
| 06/30/11 SP 1-framed "Jogger" photo to T. Palomar for telescope loan (HH photo) | \$ 5.00 |
| 07/07/11 SP 5-sides web site cards (Kinkos) | \$ 0.48 |
| 07/09/11 SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 07/13/11 SP 1-sign holder clip ring (Falkenhans) | \$ 0.64 |
| 08/10/11 SP Fpt parking | \$ 1.00 |
| 08/12/11 SP 2-sides SC handouts (JHU) | \$ 0.14 |
| 09/01/11 SP 3-sides SKY Map Sept. (Loyola) | \$ 0.30 |
| 09/13/11 SP FPT parking | \$ 0.50 |
| 09/14/11 SP 16-sides SC handouts (JHU) | \$ 1.12 |
| 10/04/11 SP FPT parking | \$ 0.50 |
| 10/05/11 SP FPT parking | \$1.00 |
| 10/06/11 SP FPT parking | \$ 0.25 |
| 10/07/11 SP 6-sides SC handouts (Kinkos) | \$ 0.64 |
| 10/07/11 SP FPT parking | \$ 0.25 |

Total = \$ 135.71

| | |
|--|----------|
| 10/08/11 SP FPT parking | \$ 1.25 |
| 10/09/11 SP 16-sides SC handouts (Kinkos) | \$ 1.71 |
| 10/16/11 SP 6-sides SC handouts (Kinkos) | \$ 0.64 |
| 10/18/11 SP 6-sides SC (ibid) (Kinkos) | \$ 0.64 |
| 10/18/11 SP. KINKOS parking | \$ 0.25 |
| 10/18/11 SP bike repair (Balto. Bike. Wks.) | \$ 3.78 |
| 10/18/11 SP FPT parking | \$ 1.00 |
| 11/01/11 SP 5-sides SC handouts (Kinkos) | \$ 0.55 |
| 11/04/11 SP FPT parking | \$ 1.50 |
| 11/06/11 SP 4-sides SC handouts (Kinkos) | \$ 0.44 |
| 11/08/11 SP 2-sides SC handouts (Kinkos) | \$ 0.22 |
| 11/09/11 SP FPT parking | \$ 1.50 |
| 11/12/11 SP 20-sides SC handouts (Kinkos) | \$ 2.10 |
| 11/13/11 SP 12-sides SC handouts (Kinkos) | \$ 1.27 |
| 11/23/11 SP 10-sides SC handouts (Kinkos) | \$ 0.85 |
| 11/26/11 SP 21-sides SC handouts (Kinkos) | \$ 2.23 |
| - 11/28/11 MILES dlvr. battery pack to Bainesville Elec. for make-over | 12.0 |
| 11/29/11 EQUIP (Baynesville Elec. for new battery & plug socket | \$ 51.64 |
| - 11/29/11 MILES pick up battery pack from Baynesville Elec. | 12.0 |
| 12/03/11 SP 4-copies SC handouts (Kinkos) | \$ 0.42 |
| 12/03/11 SP 4-sheets card stock (HC Photo) | \$ 0.20 |
| 12/04/11 SP 18-sides SC handouts (Kinkos) | \$ 1.91 |
| 12/01/11 BOOKS 1-Obsrv's Handbk. (RASC...cr. cd.) 2012 | \$ 32.63 |

\$ 106.73

Not for Distribution

mod

2012

Not for Distribution

- 2417) 01/06/12 (Fri) FPT (7:10-10:32PM). First stint since 12/04/11, having been first on PLW's Birthday Caribbean cruise and then in SFL and ATL over Xmas-N.Y. week. Mild for this time of yr. Only fair seeing. iPHONE PHOTO ADAPTER (An Xmas present I req'd from Eve. First tryout. One photo of J & moons, which may be emailed to me. Effort to photo Moon failed, maybe due to bad focus. Not easy to use. Needs practice.) JUPITER (2+2. Good.) 12-d. MOON (Tycho + edge craters.) VISIT (Two local 12-yr. old girls who were totally enthralled with scope. Returned several times for looks. One unsuccessfully tried to photograph Moon. Showed them M42 Trappazium.) HH (Hard work. A bit boring despite interesting enthusiastic, appreciative lookers!) \$73.60 (\$21.90/hr.)
- 2418) 01/08/12 (SUN) FPT (5:58-7:28PM). Chilly. Great sky. V. slow scene. PARKING (was warned away from WT slot by meter maid writing Sun. eve. tkts.) JUPITER (V.G. 2+2+ stripes.) VERY FULL MOON (Twice.) VISIT ("Mr. Buckets", who is studying to be an X-ray tech. Performed this afternoon. W/his bro., a microbiologist. Maria, newly arrived from Alabama for an accounting job in DC.) HH (In great form.) \$27.55 (\$13.78/hr.) DRUNK COUPLE (\$17.00 of take from a drunk cpl. who arrived even before I was fully set-up. Woman put the \$\$ in hat but was too tanked to look thru scope! W/O them would have been a bummer night!!) iPHONE ADAPTER (No photos tonight, but I discovered will prob. work best thru diagonal.)
- 2419) 01/29/12 (SUN) FPT (6:10-7:23PM). Cold w/wind chill. Wearing 2X cotton socks, sleeveless sw., Bean jacket, wool hat, fingerless glvs. Was ok when working w/lookers, but otherwise, cold. Needed best coat. SCENE (Quiet, but not dead.) PARKING (Last slot in B'way ext'd.) HH (Still ok, physically. Main problem is boredom when few lookers.) SHUTDOWN (As always, as soon as I took down sign as 1st step toward leaving, began having lookers, keeping me in business another 1/2-hr.!) 6-DAY MOON (5° W of Jupiter. Awesome!) JUPITER (1+2, then 2+2. shrinking: 39.1", down from 49.6".) \$14.46 (\$11.92/hr.)
- 2420) 01/31/12 (TUE) FPT (7:47-9:47PM). 54° w/no wind chill...v. nice! Great sky. SIGN (Having noticed several times that it doesn't seem to make much difference attracting lookers, tonight simply placed it on ground in front of scope.) SCENE (Pretty quiet, but busy enough I didn't get bored.) PARKING (As was beginning to look, a B'way ext'd slot opened up. JUPITER (2+2. Now 62% of its old self! Would have dropped below Inn roof 10:15PM.) 8-d MOON (Sunrise on Eratosthenese. Occulted d-Ari.) ORI BELT (Thru finder for woman who had it tattooed on her neck!) VISIT (Derelict who was proud to have been born on 7/19/69.) CONTRIBUTIONS (Incl'd 2-\$20's. Am always expecting \$1's, so \$20's are always a totally unexpected surprise!) HH (In gd. shape both mentally & physically.) \$63.35! (\$31.68/hr.)
- 2421) 02/03/12 (FRI) FPT (8:02-10:20PM). 43° w/no wind. Gd. sky. Busy scene. PARKING (Harassed by meter maid while unloading, saying I was too close to fire plug. My assurance I'd be only 2-mins. fell on deaf ears. Unloaded from behind Kiosk. Then sat there for 35-mins. till slot opened. Toward end of wait was contemplating going home.) JUPITER (2+2. "Stripes getting harder to see @ 80X.) 11-d. MOON (Upper right "edge" prettiest.) MARS! (Lost Jupiter +/-9:55PM and immediately spotted Mars rising over Thames St. At 166X a bit of a blob, but maybe could see a snow cap.) VISIT (Lenon...a 10-yr. old boy who plays Beattles piano at The Horse 1st Fri. of month, 7-9PM. Wow!) HH (Unhappy, thanks to parking prob., cold, diminishing Jupiter.) COLD (Wool hat, sweater + sleeveless, best coat, longjohns, genes, 2-pr. cotton + big socks, Reeboks, fingerless gloves.) \$51.01 (\$22.18/hr.) I-PHONE PHOTO BRACKET (Tried 1X on Moon, but couldn't get an image on phone. Ugh!)
- 02/06/12 (MON) FPT (DRY RUN) Semi-mild evening, good sky, but place was empty, with a million parking spots. An exception to the emptiness was the Greenspace Rainbow Warrior III in port. (If any had looked thru scope, I wouldn't have chg'd them.) Decided, if I set up, it would be a very boring evening...boredom being a big prob. for me currently. Anyway, it was conjectural that any Greenpeacers would come by for a look.
- 2422) 02/17/12 (FRI) FPT (7:40-10PM). 45°/no wind. Gd. sky. PARK (10-mins. of no fun.) HH (Gd. shape mental & physically.) JUPITER (2+2. A bit mushy & smallish.) MARS (Acq. 9:10PM. Writhing, but better as it rose. GAVE OUT NEW "I Saw...MARS!" STICKERS! Small polar cap 2 o'clock.) VISITS (Billy Heller. Said he thought he'd find me, as I'm a FPT institution. He looked VG. Derek, here from Norfolk for Max's "Belgian Beer Fest." Pleasant fellow, w/some knowledge of scopes. Kept me company for a good while.) M45 (1X, thru finder.) \$19.79 (\$8.48/hr)

TOTAL THIS PAGE = \$ 249.76

TOTAL THIS YEAR = \$ 249.76

About the Celestial Objects

Listed on this page are several of the brighter, more interesting celestial objects visible in the evening sky this month (refer to the monthly sky map). The objects are grouped into three categories. Those that can be easily seen with the naked eye (that is, without optical aid), those easily seen with binoculars, and those requiring a telescope to be appreciated. **Note, all of the objects (except single stars) will appear more impressive when viewed through a telescope or very large binoculars.** They are grouped in this way to highlight objects that can be seen using the optical equipment that may be available to the star gazer.

Tips for Observing the Night Sky

When observing the night sky, and in particular deep-sky objects such as star clusters, nebulae, and galaxies, it's always best to observe from a dark location. Avoid direct light from street lights and other sources. If possible observe from a dark location away from the light pollution that surrounds many of today's large cities.

You will see more stars after your eyes adapt to the darkness—usually about 10 to 20 minutes after you go outside. Also, if you need to use a torch to view the sky map, cover the light bulb with red cellophane. This will preserve your dark vision.

Finally, even though the Moon is one of the most stunning objects to view through a telescope, its light is so bright that it brightens the sky and makes many of the fainter objects very difficult to see. So try to observe the evening sky on moonless nights around either New Moon or Last Quarter.

Astronomical Glossary

Conjunction – An alignment of two celestial bodies such that they present the least angular separation as viewed from Earth.

Constellation – A defined area of the sky containing a star pattern.

Diffuse Nebula – A cloud of gas illuminated by nearby stars.

Double Star – Two stars that appear close to each other in the sky; either linked by gravity so that they orbit each other (binary star) or lying at different distances from Earth (optical double). Apparent separation of stars is given in seconds of arc (").

Ecliptic – The path of the Sun's center on the celestial sphere as seen from Earth.

Elongation – The angular separation of two celestial bodies. For Mercury and Venus the greatest elongation occurs when they are at their most angular distance from the Sun as viewed from Earth.

Galaxy – A mass of up to several billion stars held together by gravity.

Globular Star Cluster – A ball-shaped group of several thousand old stars.

Light Year (ly) – The distance a beam of light travels at 300,000 km/sec in one year.

Magnitude – The brightness of a celestial object as it appears in the sky.

Open Star Cluster – A group of tens or hundreds of relatively young stars.

Opposition – When a celestial body is opposite the Sun in the sky.

Planetary Nebula – The remnants of a shell of gas blown off by a star.

Universal Time (UT) – A time system used by astronomers. Also known as Greenwich Mean Time. USA Eastern Standard Time (for example, New York) is 5 hours behind UT.

Variable Star – A star that changes brightness over a period of time.

Easily Seen with the Naked Eye

- Brightest star in Aquila. Name means "the flying eagle". Dist=16.7 ly.
- The 6th brightest star. Appears yellowish in color. Spectroscopic binary. Dist=42 ly.
- Orange, giant K star. Name means "bear watcher". Dist=36.7 ly.
- Cepheid prototype. Mag varies between 3.5 & 4.4 over 5.366 days. Mag 6 companion.
- Brightest star in Cygnus. One of the greatest known supergiants. Dist=1,400±200 ly.
- Semi-regular variable. Magnitude varies between 3.1 & 3.9 over 90 days. Mag 5.4 companion.
- The 5th brightest star in the sky. A blue-white star. Dist=25.0 ly.
- Famous eclipsing binary star. Magnitude varies between 2.1 & 3.4 over 2.667 days.
- Brightest star in Piscis Austrinus. In Arabic the "fish's mouth". Dist=25 ly.
- Red, supergiant star. Name means "rival of Mars". Dist=135.9 ly.
- The North Pole Star. A telescope reveals an unrelated mag 8 companion star. Dist=433 ly.

Easily Seen with Binoculars

- The Andromeda Galaxy. Most distant object visible to naked eye. Dist=2.93 million ly.
- Resembles a fuzzy star in binoculars.
- Bright Cepheid variable. Mag varies between 3.6 & 4.5 over 7.166 days. Dist=1,200 ly.
- Easy to find in binoculars. Might be glimpsed with the naked eye.
- Herschel's Garnet Star. One of the reddest stars. Mag 3.4 to 5.1 over 730 days.
- Long period pulsating red giant. Magnitude varies between 3.3 & 14.2 over 407 days.
- May be visible to the naked eye under good conditions. Dist=900 ly.
- Wide pair of white stars. One of the finest binocular pairs in the sky. Dist=100 ly.
- Best globular in northern skies. Discovered by Halley in 1714. Dist=23,000 ly.
- Fainter and smaller than M13. Use a telescope to resolve its stars.
- Famous Double Double. Binoculars show a double star. High power reveals each a double.
- Semi-regular variable. Magnitude varies between 3.9 & 5.0 over 46.0 days.
- 3 degrees from the fainter M12. Both may be glimpsed in binoculars. Dist=14,000 ly.
- Large, scattered open cluster. Visible with binoculars.
- Scattered open cluster. Visible with binoculars.
- Only globular known to contain a planetary nebula (Mag 14, d=1"). Dist=30,000 ly.
- Double Cluster in Perseus. NGC 869 & 884. Excellent in binoculars. Dist=7,300 ly.
- Lagoon Nebula. Bright nebula bisected by a dark lane. Dist=5,200 ly.
- Bright cluster located about 6 deg N of "teapot's" lid. Dist=1,900 ly.
- A spectacular globular star cluster. Telescope will show stars. Dist=10,000 ly.
- Butterfly Cluster. 30+ stars in 7x binoculars. Dist=1,960 ly.
- Superb open cluster. Visible to the naked eye. Age=260 million years. Dist=780 ly.
- Good eyepiece or binoculars reveals 2 stars. Not a binary. Mizar has a mag 4 companion.
- Coaxial asterism or "Bocchii's Cluster". Ngt. a true star cluster. Dist=218 to 1,140 ly.

Telescopic Objects

- Attractive double star. Bright orange star with mag 5 blue companion. Sep=9.8".
- Saturn Nebula. Requires 8-inch telescope to see Saturn-like appendages.
- Helix Nebula. Spans nearly 1/4 deg. Requires dark sky. Dist=300 ly.
- Impressive looking double blue-white star. Visible in a small telescope. Sep=7.8".
- Red giant star (mag 2.5) with a blue-green mag 4.9 companion. Sep=2.8". Difficult to split.
- Whirlpool Galaxy. First recognized to have spiral structure. Dist=25 million ly.
- Yellow star mag 3.4 & orange star mag 7.5. Dist=19 ly. Orbit=480 years. Sep=12".
- Beautiful double star. Contrasting colours of orange and blue-green. Sep=34.4".
- Attractive double star. Mags 5.2 & 6.1 orange dwarfs. Dist=11.4 ly. Sep=28.6".
- Appear yellow & white. Mags 4.3 & 5.2. Dist=100 ly. Struve 2725 double in same field.
- Eclipsing binary. Mag varies between 3.3 & 4.3 over 12,940 days. Fainter mag 7.2 blue star.
- Ring Nebula. Magnificent object. Smoke-ring shape. Dist=4,100 ly.
- Trifid Nebula. A telescope shows 3 dust lanes bisecting nebula. Dist=5,200 ly.
- Omega Nebula. Contains the star cluster NGC 6618. Dist=4,900 ly.
- Wild Duck Cluster. Resembles a globular through binoculars. V-shaped. Dist=5,600 ly.
- Eagle Nebula. Requires a telescope of large aperture. Dist=8,150 ly.
- Fine face-on spiral galaxy. Requires a large aperture telescope. Dist=2.3 million ly.
- Dumbbell Nebula. Large, twin-lobed shape. Most spectacular planetary. Dist=975 ly.

- 2423)02/27/12(MON)FPT(7:39-9:05PM). Semi-mild/no wind. Gd sky. PARK(1st WT slot.) Quiet scene but intermittent passersby. 6-D MOON(A "knock your socks off" performance by Theophilus, Cyrillus, and Catharina!) JUPITER(2+2+stripe. Lookers liked.) MARS(Ok focus. P. cap at 3-o'clock.) PLW'S #127 (Did a super job recrudng lookers!) VISIT (Jonathan Linneburg, son of Lester, who lived next door on Bosworth Ave. Very nice looking, tall, and well mannered 20-something young man. Steve Lampredi, who is about to produce a play on War of 1812 featuring period music.) \$24.00 (\$16.78/hr.)
- 9 03/01/12(THU). Dry run to FPT with PLW. Bleak scene, plus cold, unforgiving wind. Adjourned to Dissies. Drank beer and watched basketball.
- 2424)03/10/12(SAT)FPT(7:31-9:38PM). Cold wind at start, then ok. Gd. sky. PARKING(WT spot blocked by limo. Had to really lean on driver to get him to move and let me park.) METER MAIDS(Two looked thru scope. Were friendly. Gave them stickers and jokingly asked them to keep an eye on my car...the white Subaru. They said they would.) HH(In extremely good physical and mental form.) SCENE(Semi busy at start, and v. busy at end.) VENUS (For Steve L. 1/2-moon phase. Small.) JUPITER(3+1 + stripe. Stopped at 8:15PM, as was too close to roof and boiling.) MARS(Mostly @ 166X. Thought I could see N pole cap on 2-o'clock edge. Showed Hubble photo and told lookers to "crank up your imagination", but nobody saw cap. When nearly packed-up, people were showing up wanting to look. I showed them Mars in sky, told them it looked better by eye than thru scope, and give the stickers. All seemed happy to get them.) VISITS(Steve Lampredi for 1st 1/2-hr. Good company. MARGO...a very excited young woman who said her look at Jupiter recently thru my scope was a "truly life-changing experience" for her. LIMO DRIVER who early looked at Jupiter and later hauled scope to car for me.) Adjourned to Bopp Pizza for a slice. \$37.14 (\$17.60/hr.) SATURN(Saw it from home. With Mars being so little fun, maybe should suspend scoping until Saturn is on FPT stage.) VISIT(Ed Johnson, from anti-war days, with his sister.)
- 2425)03/11/12(SUN)FPT(7:21-9:17 DST!). Semi-quiet scene. Cool but no wind. Gd. sky. PARK (B&W extended) SKY(J & V a spectacular pair in SW. Was amazed that so many passersby were oblivious to my calling their attn. to them!) VENUS(Briefly, but then J, as it was so much more interesting.) JUPITER(3+1+SEB. Has the NEB disappeared? Moons in close, so very breathtaking!) MARS(1X, then packed up.) VISITS(PHOTOGRAPHER TODD BAKER, 1 of who's photos of me in FPT is on website. At my urging, took a shot of me in front of scope and holding J & V signs with J & V in sky above. A fantastic photo which he will email to me. JACOB: A 20-something, aspiring novelist, who I told about the current NPR short novel contest. BURBURY SCARF WEARING MAN: I complimented him on it. I told him how expensive it was, but when he showed me the label it turned out to be a knock-off! SHERRY: Real glad to see me, saying she still had one of my photos. Face looked v. familiar, but I just couldn't place her. Maybe the Irish scene, as she was w/2 Irish revelers on their way to the Cats Eye.) HH(Like last night, in V.G. form!) \$36.14 (\$18.70/hr.)
- 2426)03/14/12(WED)CHARLES VILLAGE...SIDEWALK E. SIDE OF 3200 BLK. Decided could hold J & V in scope significantly longer than in FPT, (7:20-9:10PM). Warm. Gd. sky. VENUS(Just twice.) JUPITER(1+3, then 0+3. Vague stripes. Tho still fairly hi, by 9:10 was too mushy for my liking, so packed up.) SCENE(Busy, especially for 1st hour. Students, I guess. Most lookers extremely appreciative. Gave out many stickers & "facts". \$69.04(37.5 HH(In very good form. Did a lot of teaching", especially with youngsters.)
- 2427)03/17/12(SAT...ST. PAT'S DAY)CHAS. VIL.(6:54-9:11). Wanted to avoid FPT tonight, + CV is a better loc. for the planets. VENUS(By the #'s for 10-mins. Explained it with an enlarged S&T picture illustrating phases.) JUPITER(2+2+stripes. Is becoming a small, pale shade of its old self. Yet, people liked it.) SCENE(Pretty busy till toward end. A number of people showed up having seen my announcement today on the WIA list serve. A young man who remembered my Rotunda stints and was sorry I still wasn't there. LOTS of families/kids, with whom I did lots of teaching.) HH(In top shape!) \$75.22 (\$32.99/hr.) Gave out LOTS of "I Saw...JUPITER" stickers and "facts".

TOTAL THIS PAGE = \$ 241.54

TOTAL THIS YEAR = \$ 491.30

STREET CORNER TELESCOPE LOG -- 2012

- 2428)03/18/12(SUN)FPT(5:55-8:38PM). Gd sky. Cool but no wind. PARK(WT slot w/"see me..." sign and parking receipt on dash.) VENUS IN THE DAYTIME(ss 7:17PM. Used S&T orbit diagram to explain "half moon" appearance. Lookers seemed satisfied.) JUPITER(Acq. 7:20PM. 2+2+stripe. Ended stint when it started to "boil".) HH(Carried on!) \$57.15 (\$21.07/hr.)
- 10
- 2429)03/22/12(THU)CHAS.VIL.(7:10-9:16PM). Sl. haze. Warm! PARK(Next to my spot.) ALIGNMENT (Perfect!) SCENE(Quiet, but OK.) VENUS(Now less than 1/2.) JUPITER(2+1, then 2+0. Stripe. Faded in haze, then ok again.) FACTS & STICKERS(Almost out of everything, but I'm getting v. tired of xeroxing and stamping. What to do!) HH(Could have stayed longer, but boredom overcame desire for more \$\$.) \$38.84 (\$18.50/hr. No "fives"!)
- 2
- 2430)03/23/12(FRI)CHAS.VIL(7:10-9:16pm). Short pants weather! Great sky for a while. SCENE(Busier than last ngt.) VENUS. JUPITER(3+0+stripe. Looks black to most lookers and me, too. Held longer than usual.) STICKERS(Bit the bullet and printed "facts" and stickers today. Website cds.) \$39.81 (\$18.96/hr.)
- 2
- 2431)03/27/12(TUE)CHAS. VIL.(7:17-9:10PM). Clear and cool. Longjohns, sweater, winter coat weather. Kinda slow scene. 5d+MOON(Lookers impressed. Me, too!) VENUS(Greatest elong. E 46°.) VENUS FACTS(Composed yesterday and began giving out tonight. Felt good doing it.) VISIT(Phil Lambdin, who I met this AM at Hampden PO and invited to visit tonight. Phil used to drive a cab and was one of my early, regular FPT lookers. Ian the digger-iedo player, but w/o his "do".) \$17.55 (\$9.29/hr.)
- 2
- 2432)03/28/12(WED)FPT(7:48-10:03PM). Decided not to overstay my welcome in Chas. Vil. Mild. Seeing only fair. 6d-MOON(Good.) VENUS(Same-osame-o.) JUPITER(2+2. Gave it up 8:25PM.) SCENE(Pretty slow, tho sometimes I had a knot of lookers.) HH(I must be in v.g. shape! Telescoping requires a lot of heavy lifting, plus rode bike today to Hampden.) \$46.17 (\$20.52/hr.) Included a \$5 and a \$10 contrib. A good number of people remarked on the recent Jupiter-Venus paring.
- 9
- 2433)03/29/12(THU)FPT(7:29-9:20PM). Great sky. Cold...winter sweater & jacket! SCENE(Pretty slow, but was picking up as I was leaving.) MY RIGHT EYE(With bright Venus I notice a cobweb-like image around the planet. Not so w/left eye. What does this mean? Cataract?) 7d-MOON(Great craters on terminator.) VENUS(same-o-same-o.) JUPITER(1+3 close in. Held right to roof at 8:25PM). \$27.16 (\$14.68/hr.) ((Year = \$717.98!))
- 10
- 2434)03/03/12(TUE)CHAS. VIL.(7:57-9:47PM). Mild. Gd. sky. VENUS(Sitting beneath the Pleiade ...close enough that could see both w/40mmK. eyepiece. Showed lookers both my Venus' phases dia. and Pleiads "Subaru" photo.) JUPITER(Low & fuzzy. 0+3.) HH(Feeling drag-gie all day but got energized on the "sidewalk".) \$41.91 (\$22.81/hr.)
- 2
- 2435)04/04/12(WED)FPT(7:57-10:37PM). Great sky. Mild, but w/breeze. PARKING(1st slot behind kiosk, but frustrating 10m wait for car to finally leave.) JUPITER(Briefly. Fuzzy. 1+3.) VENUS(Sans Pleiades.) 13-d MOON(Craters on Tycho edge.) SATURN!(Acq. 10PM. Not expecting it in FPT for a few more wks., I was taken totally by surprise when I spotted it low and to the right of the "Darth Vader" tower.) CLOSING DOWN(Took 37mins., as people kept coming wanting to look. Happily, one looker made a \$20/contrib.! Actually, thanks to Saturn, I didn't mind too much extending my stay.) \$55.27 (\$20.72/hr.) MARS (First showed lookers Hubble photo, saying the only similiary will be the color!)
- 9
- 2436)04/06/12(FRI)FPT(8:55-11:47PM). Grt. sky. Chilly, then breezy. Late start due to hesita over cold wind. Almost didn't go, but good thing I did because was a BIG night with lots of appreciative lookers. PARKING(Lucky! Was anticipating difficulty, but as was unloading a B'way ext. spot opened up, which Charles held till I could get to it.) VENUS(Noticeably less than "half".) 14-d MOON(Had to wait for it to rise from behind Rec. Pier. Perfectly full. great @ 50X.) SATURN(A little to left of Moon. Aq. 9:38PM in "Darth Vader" radio twr.) HH(In good form.) VISITS(Mike Klag, head of JHU Sch. of Pub. Health, and wife, Lucy. V. appreciative lookers. Back when bought my Comet Hyakutaki over barn photo. Remembered my "streets" finding. Brett Bond, owner of Kiosk, Cr. St. Mkt. stall, and other enterprises. Long time no see!) \$97.05 (\$33.91/hr.)
- 10

TOTAL THIS PAGE = \$ 420.91

TOTAL THIS YEAR = \$ 912.21

- 2437)04/07/12(SAT)FPT(7:42-11:48PM). Sl. chilly. Grt. sky. PARKING(Lucky again. 1st slot behind Kiosk.) VENUS. JUPITER(V. briefly. 2+1, stripe.) SCOPE MOVE(At Saturn rise time, realized that corner street light was back on and would badly interfere w/view. With Charles' help, moved scope NE +/-12 ft., which worked.) SATURN(Many awed lookers. One very adamant disbeliever.) 15-d MOON(M. Crisium edge craters. Good!). SCENE(Moderate early, quiet mid-eve., v. busy late.) VISITS(Photographer Patrick Montgomery, who once lived on Melville and who Johnny Heyn has occasionally hired as an assistant. Took photos of me.) Family from Fla. here for JHU daughter's lacross game. Very intrigued with scope and views, with a v. interested 12-yr. old boy.) HH(Voice cracking a bit, but otherwise in good form...even after last night!) BIG NIGHT! \$105.14 (\$25.64/hr.) Y=\$1,017.3 VISIT(Matt, from STSci, who I first met back in the early 90's as a reg. looker.)
- 2438)04/13/12(FRI)FPT(7:34-10:15PM). Chilly. Gd. sky. PARKING(More luck...1st Kiosk slot!) VENUS(Now clearly looking like a ~~crescent~~ Moon.) SATURN(A terrible time getting it into scope....maybe 40-mins! Lost a lot of lookers. Left me totally demoralized. Bad lights, but still should have gotten it a lot sooner.) VISITS(Dave from the old days, who used to live over Ledbetter. Now working for a rehab contractor in Brooklyn. Cinder, who I vaguely remember meeting at Donna Kecks yrs. ago.) \$24.68 (\$9.21/hr....ugh!) VISIT(A young lady taking astro. 101 at Corning College, NY, who was thrilled at seeing crescent Venus, as she knew what it was all about!) "HOW LONG HAVE YOU BEEN DOING THIS?"(Comes up almost every night in FPT, often several times a night. I answer, "I'm working on my 25th year." When someone says he/she looked through my scope when they were a child, I ask, "Did I have to pick you up?" Once someone said "yes".)
- 2439)04/16/12(MON)FPT(7:42-9:49PM). Hi 80's. Sl. humid. Gd. sky. PARKING(W.Taxi slot.) VENUS (Ever more crescent looking. Dia. 30".) SATURN(Acq. 9:15PM.) VISITS(Alfredo, Stephen, Diana-my dentist's secretary, w/Joe, Mary Ellen Graybill, pianist, once a Sun writer, now with a Lancaster, Pa. paper. Will send her my M&D paper.) \$25.00 (\$11.79/hr.) MARS(1X for visitor Eckart, a JHU prof. A frequent and knowledgeable looker.)
- 2440)04/19/12(THU)FPT(7:52-10:20PM). Cool. Gd. sky. PARK(1st Kiosk slow...immediately!) VENUS(Enticing lookers by saying, "It's not what you expect." Seems to work.) SATURN (+/-9:05PM. Real good. Amazed lookers.) SCENE(Ok early, v. slow mid-eve., big pick-up toward 10PM.) VISIT(Jim O'leary of the Md. Sc. Ctr. Lots of "How long have you been down here" remarks. Carlos, a Procter & Gamble person who tried over and over w/o success to get a Saturn photo w/his Iphone.) \$53.65 (\$21.81/hr.)
- 04/20/12(FRI)FPT. DRY RUN. Blue sky at supertime, but clds. on distant horizon as I was loading. Decided to take a chance, but it didn't work. Mostly clds. when I arrived. Struggled for a parking space, sat on bench for a while, then headed home. Busy scene!
- 2441)04/29/12(SUN)FPT(6:27-9:03PM). Mild. Hazy sky. PARK(Luckee...as I arrived, 1st WT slot opened up!) VENUS BY DAY(Aligned w/compass...not perfect, but acq. V on 3rd, brief try through very thick haze. Very crescenty. Lookers surprised.) 7-d. MOON(Good.) FORGOTS! (Folder w/Venus diagram, stool. Kiosk guy lent a chair.) Busy early. Slow by 8PM. \$50.00 (\$19.23/hr.) 2/3rds. on Daytime Venus. HH(Ok, but got bored.) MELISSA(A young lady who asked what Venus looked like. I said, "It looks very pretty...just like you." She was so complimented by what I said that she teared-up and gave me a big hug.)
- 2442)05/16/12(WED)FPT(8:23-10:15PM). Warm. Hazy sky. In STL 5/3-13 for PLW's condo "house-warming...w/3d side trip to Chicago to see her new twins. HH(Good to be back in my "real element"!)
- 2443)05/17/12(THU)FPT(8:02-10:00PM). Mild. Grt. sky. VENUS. SATURN(Sharp, w/Titan). HH(Could have stayed longer but was bored. VISITS(Mario Livio/wife Sophie...her 1st Sat. look. Mario briefly baffled by Venus! Celia...young woman who's called a few time wanting to know if would be out. Japanese sailors...happily surprised by Sat. views. Leonard... who told me people at my STSci talk complained it was too long!) \$42.44 (\$21.54/hr.)

TOTAL THIS PAGE = \$ 355.52
 TOTAL THIS YEAR = \$1,267.73

- 2444)05/18/12(FRI...PREAKNESS EVE)FTP(8:06-10:05PM). PARKING(One at a distance opened as was arriving. Took it.) Passing thin clds. Continuous cold wind which disrupted my papers. Fortunately was wearing long pants/cotton shirt. Busy scene! VENUS(By the #'s, as buried in haze. SATURN(Titan 1st spotted by looker. Mixture of non-believers and wowed lookers!) VISITS(Couple from TX here for race. He is going to see Sunday's solar eclipse w/welders helmet. I gave him my TOV slurb. CELIA...my dark haired, fairly regular looker. Will try to make my TOV. JAPANESE SAILORS.) \$53.60 (\$27.07/hr.) HH(Time seems to go so slowly, it's hard to believe was there less than two hours!)
- 2445)05/19/12(SAT...PREAKNESS NIGHT. EXPECTED TO SEE RACE GOERS, BUT DIDN'T.) Mild. Gd. sky. PARKING(A very thin slot in W.T. section.) ALIGNMENT(Now, near perfect every night. Both Venus & Saturn on 1st try.) VENUS(Still easily available. Great crescent!) SATURN (Titan. Many, many doubters, for whom I "Eclipsed" it by blocking front of scope.) (8:01-10:30PM) HH(Still ok after 4 consecutive nights!) VISIT(Jeff Hettleman & family celebrating daughter Rachelle's 17th BD. All recv'd "I Saw...Saturn!" stickers.) Busy scene, but by 10PM interest in me rapidly diminishing. \$53.13(\$21.42/) Adjourned to Boyz HH(Anticipating a slightly fancier crowd, I wore my "Inga" shirt. The crowd didn't materialize, and my shirt drew nary a comment.)
- 2446)05/25/12(FRI...MEM. DAY WEEK-END)FPT(8:30-11:08PM). PARK.(Long wait. Almost gave up.) VENUS(Has disappeared from FPT on its way to its 6/05 rendezvous w/the Sun!) SATURN (Titan on left, background star above. LOTS of doubters!) VISIT(Ted Rouse and lady friend, Daisy. Asked lots of q's; maybe put 50¢ in hat...maybe!) HH(Feeling tired all day, but after nap felt ok on "the street". Lots of no-pays! \$58.00 (\$22.03/hr.)
- 2447)05/27/12(SUN...M.DAY WK-END)FPT(8:05-8:21PM). Shut down by clds. Too bad, because was a great looking scene, and I had immediate interest. 6d.MOON \$4.00 (\$15/hr.)
- 2448)05/28/12(MON...M.DAY)FPT(7:55-10:15PM). Much quieter scene than last night. PARKING(WT space wide open!) 7d.MOON(%. Appenine Mts. in 3D.) SATURN(Titan close above.) Hot/sticky HH(Slight stomach ache. Unusual!) Some very good sub-teen lookers. \$51.80(\$22.23/hr.) VISIT(M. Eastern looking man who, ^{upon} seeing Saturn in scope, shouted "Allah Akbar!".)
- 2449)05/31/12(THU)FPT(8:22-11:23PM). PARK.(Unpleasantly long eiege. Considered giving up. Good thing didn't, as was great stint!) Mild. Great sky. Spica & Saturn above Moon. Semi-quiet scene, but steady flow of lookers...many enthusiastic. 10d-MOON(Tycho region. Breathtaking!) SATURN(Fine. Evoked usual reactions.) VISITS(Family who bought me an ice cream. Rouse, on in-line skates. Is now a regular. Tonight made \$1 contrib Saye is in urban farming business, w/six greenhouses in Bolton Hill and which grossed \$100,000 last yr.) Gave out many TOV announcements. \$85.00 (\$28.24/hr.) VISITS(Selwin Ray, his daughter, her friend, and his brother Uthman. They were good contributors. Selwin looked great in a light gray, seersucker suit!) HH(After a really bad "head" day, felt absolutely fine on the "street". No pressure, heaches, wobbles.)
- 2450)06/02/12(SAT)FPT(8:12-10:55PM). PARK(Arv'd 30m early to park. Got one at B'way ext. Celebrated w/ice cream.) RISING 12daMOON(Tycho & edge craters. Terrific! 50X & 80X.) SATURN(Fine. Titan on R.) CHARLIE(Suddenly swamped by 2-doz. 12yr. old girls. Great scene. He handled it very well!) VISITS(Jay & Michelle. Jay is a STSci 1st Tue. regular and said he really liked my talk. Amazed by depth of my knowledge. Several people who remembered me from 20-yrs. ago.) HH(Good form.) Some TOV inquiries. \$66.18 (\$24.36/hr.) STICKERS(Forgot to make more, so had just a few. Gave out none, which felt good!)
- 2451)06/05/12(TUE)TRANSIT OF VENUS FROM LAKE MONTEBELLO(6:04-8:31PM SUNSET). Off to an iffy start due to clds., then good till +/-8PM. 8" SCT w/sunfilter...mainly @ 50X. Very crisp Venus image. (Intended to us SUNSCOPE with its 7 1/2" solar image projection, but was so flummoxed by clds. when l'ving home didn't take it. New very sorry, as it would have done a spectacular job vs. the 8" look thru.) Thinking clds here to stay, planned to not stay long and leave sign telling any arrivrs to see it on line. However discovered a blue sky patch in NE coming our way, which it did, thus saving the day! 4 scopes--mine, "Starman Jer" Feldman, Teresa Palomar, + an unknown. An estimate of 150 lookers! Bruce Manger go good results with binocs! Visit by City Paper's Laura Dattaro/photographer Frank Hamilton who will do an "after-the-fact" story. Frank Roylance took some good, thru the scope iPhone pix, as did others. Lookers v. appreciative. NO HAT but \$16.00. Next Transit of Venus...2117!

TOTAL THIS PAGE = \$ 387.71
 TOTAL THIS YEAR = \$1,655.44

- 2452)06/08/12(FRI)FPT(8:50-11:48PM). PARK.(Ariv. 1½-hrs. early. Got last WF slot. Sat on bench watching car to avoid park. fee.) SKY(Haze at sunset but then good.) SATURN(Lots of doubters. Convinced some by showing Under Armour sign!) TEMP.(Misjudged and wore lg. pants when should have worn shorts.) VISITS(Ted Rouse on inline skates. Used i-phone to help get aligned. Returned much later, still on skates w/daughter. JOHN STRO-SACKER and SARAH, in FPT to hear musician friend.) SCENE(Looked slow on arrival but later very busy.) \$96.50 (\$32.39/hr.)ISS(Surprise flyover a little after 9PM.)
- 2453)06/09/12(SAT)FPT(8:45-11:38PM). PARK.(1½-hrs.early. Wtslot. Metermaid said don't have to pay there! SCENE(Busy!). ALIGNMENT(w/magnetic compass...perfect!) SKY(Good.) EXPERI- IENCE(With all that you see going on around you, plus with all the people you meet... including droves of very pretty, upbeat young women!...and their varied, often vociferous reactions to seeing Saturn thru the scope, plus all the compliments you receive, plus the old friends & acquaintances who show up, plus all the conversations you have, plus all the neat youngsters who have a look...I wish I could adequately put the experience into words, but I can't, other than to say that, despite the hard, logistical work involved, street telescoping is an EXHILARATING experience! I feel both privileged and lucky (thank you Miss Wicker!) for having fallen into it!) ALBIREO(1X for an especially enthusiastic young woman.) VISITS(Earth sc. teach. Gayle Gavazzi who was in one of my JHU Space Grant classes. Rob Kanigel, from peace movement days. Ed Johnson.. ditto. Jim Scherlis, photographer, son of the physician, and from a Suburban Club past MONEY(Not an inconsequential ingredient in the above mix! Tonight \$96.22 (\$33.37/hr.) SATURN(Stayed on 80X for most of evening. Nobody complained about smallness of image.) SNOWBALL(While sitting around waiting to set up, had a chocolate one.)
- 2454)06/13/12(WED)CHAS. VIL.(9:58-10:33PM.) Quiet scene, but closed down by clouds. HOW COME?(Hazy, windy sky early. Attended Rob Kanigel talk at VLP. Back home, spotted the bright pair, Sat.-Spica while putting out recycle. Couldn't resist telescoping Sat. Recruited Dominick and headed for Chas. Vil. SATURN(Titan + 1. Grt. image when not in clds.) VISITS(Blaze Sanders, a JHU engineering std. working with a team to design a Moon lander; solarsystemexpress.com. Tom, who works at Charlestown Retirement and who seemed interested in my coming out there sometime.) \$6.25 (\$10.71/hr.)
- 06/16/12(SAT)HOWARD CO. CENTRAL LIBRARY(1-3PM). HAL sponsored, solar observing event in conjunction w/other library sponsored activities. 6-scopes, my SUNSCOPE being the only projector. Used 20mm eyepiece for an awesome 6½" image. 3-lg. spots in a tight grouping, + smaller scattered ones. Some kids could see the 3 with welders lens. Good interest. Gave out lots of sun lit. A girl who said she learned more about the Sun from me in 1-min. then in a whole semester in her science class!***
- 06/16/12(SAT). DRY RUN TO FPT. War of 1812 celebration week-end. Huge crowd. Square loaded w/vendors. Parking avail. in spaces reserved for vendors, but rather than chance being towed, left for Charles Village.
- 2455)06/15/12(SAT)CHAS. VIL.(8:48-10:40PM). PARK(Easy?). Quiet scene but steady traffic. Gd. sky. SATURN(Sometimes very good image. 2-moons.) VISIT(Greg Paul for most of stint.) HH(A very demanding day, but held up ok, meaning I must be healthy!) \$56.68 (\$30.36/hr) A \$25.00 contribution came just as I was beginning to pack up! VISIT(Joseph, a 10-yr. old who was loaded w/astro information and questions. Impressive! Showed him Mars.)
- ***Two very interesting encounters. First w/a woman who said her family lives in America because her GGG grandfather came to S.C. to see the 1769 TOV and stayed. "Otherwise, she said, "I would have lived in Germany and been a NAZI!" Second w/Ms. Hains, library head, who said her father was a long-time teacher at Waverly Elem. Sch. #51. I asked both to email me, one for a ltr. to S&T and one to pass on to Joe Stewart, our historic
- 2456)06/17/12(SUN)FPT(8:55-10:08PM). PARK(Decided to take a chance. Lucked out w/B'way ext. spot.) MAGNETIC ALIGNMENT(Good!). SCENE(Ragedy...slow, then slower. Little interest.) SATURN(Usual doubters.) SPICA(On req. to see a star.) \$21.82 (\$17.99/) Adjourned BOP.

TOTAL THIS PAGE = \$ 277.47

TOTAL THIS YEAR = \$1,932.91

- 2457)06/19/12(TUE)CHAS. VIL.(8:56-10:38PM). Hazy & hot. Quiet scene. ALIGNMENT(w/mag. compass...perfect!) SATURN(Somewhat diminished by haze but great image.) VISIT(Arin Robb, who reported business pretty slow...masonry, ie. Alex Guerrero, a professional photographer who was on NYC's High Line for the TOV.) \$28.00(\$16.47/hr.) LOTS of no-pays.
- 2458)06/20/12(WED)CHAS.VIL.(8:52-10:25PM). Hot & sticky. Great sky. ALIGN(Awful! Why?) FPT (First drove to FPT, parked easily. Quiet scene, + would have had to sit around for 1hr to start. Left for Chas. Vil.) CITY PAPER ARTICLE WITH BIG PHOTO OF ME(Maybe 1 mention on street; no calls about.) SOLSTICE(7:09PM). SATURN(Great! Titan near at 4-o'clock.) VISIT(Extremely enthused 5-yr. old named Leila.) \$23.35 (\$15.09/hr.)
- 2459)06/21/12(THR)FPT(8:50-9:54PM). Semi-busy scene. Parked B'way ext. HOT/STICKY(Ok at scope, but means I have to wash clothes after every stint.) *CP ARTICLE(No mention of by lookers. I showed copy to some and told them they could get a copy at nearby CP yellow box, but nobody did.) Shut down by clouds. SATURN(A bit diminished by haze.) HH(Wondering how much longer I want to do this. But if I quit at 25yrs., what will I fill the time with? Back to dancing? Ugh!) \$24.62 (\$23.01/hr.) **And take a shower, too
- 06/22/12(FRI)PHONE CALL(4PM) From an Ernest Green with a UFO story, having seen my tel.# in the City Paper art. We had a good discussion, in which I explained the astronomers' position. Then we talked telescope, at which point I gave him Orion's 1-800 #.
- 2460)06/23/12(SAT)FPT(8:50-11PM). Busy scene. Warm...not sticky. PARK(Whole WC space blocked by traffic cones. Moved them, pulled in, to immed. be followed by others.) 4d-MOON(Till it dipped below roof.) SATURN(The usual experience.) VISIT(Sited Rouse on skates. Peter E. Auchincloss & daughter. Remembered me well from past. Very friendly. \$20/contrib. Nicole Gregory, leather bags maker, who'd seen Sat. at Sproutwood Obsv. and who vouched for its authenticity to her friends. HH(Hard work!) \$82.15 (\$39.86/hr.) SOMETHING NEW IN FPT(A man in only a bathing suit walking all around playing a saxophone.)
- 2461)06/26/12(TUE)FPT(8:18-10:58PM). Semi-busy scene which got busier. Comfortable. Grt.Sky. 7d-MOON(Ptolemaeus-Alphonsus-Arzachel...terrific at 135X!) SATURN(East of Moon at nearl same dec., so easily swung back-and-forth. More doubters than ever, I'm afraid! SCOPE DEC.(Reading 1 1/2° S. Must fix!) NASSIR THE ROSE SELLER(Today's Sun reported he died Fri. and that there was a makeshift memorial in the Daily Grind. A fixture in FPT since I've been there, we always exchg'd greetings and he sometimes gave a rose to PLW. I left a Comet Card condolence at the memorial.) VISIT(Bill Preston, a local radical way back when. Now pres. of AFGE Local 17. Good reunion.) CP ARTICLE(I'd collected a lot to give away but forgot to bring them. Two of my lookers, Natalie and Koko, Hopkins researchers collected +/-2-do. for me, which I started giving away. Autographed two.) HH(Not feeling real great, especially since my jeans kept slipping down. Kept asking myself, "Am I sick or just feeling the effects of aging?" I was struggling to keep up the pace.) PARKING(Lucky...a meter slot SW end of Sq.) \$49.91 (\$18.71/hr.) Plenty of no-pays. BATES COLLEGE ASTROPHOTOGRAPHY EXHIBIT(Currently underway and will be for a while in the Fine Arts Bldg. Reported by a young lady who said her father is the curator.)
- 2462)06/27/12(WED)FPT(8:27-10:45PM). Quit doing a lull, then scene got busy again. Prob. should have stayed longer. PARKING((Lucky. Have also been lucky w/parking at home, a space in front of house being open.) Gd. sky, then sl. hazy. Saturn & Spica just east of Moon. QT. MOON(At first at 50X, later at 135X. Awesome!) SATURN(No at best, but still many doubters.) THEFT ATTEMPT(Derelict who looked at Moon, returned and began grabbing bills out of hat, claiming he was making chg. for a \$10 he'd put in. Happily, I caught him quickly. The "\$10" was a rolled up \$1!) VISIT(A large family, one member of which, John, gave me \$15 before they arrived. 1/2-do. young girls, to all of whom I gave ed. mats. I explained everything w/pictures before they looked.) \$63.60 (\$27.65/hr.) HH(Felt healthier tonight, esp. had a gd BM before lving home + pants fit better!)

TOTAL THIS PAGE = \$ 271.63

TOTAL THIS YEAR = \$2,204.54

- 2463)06/28/12(THU)FPT(8:38-11:07PM). Semi-busy scene. Warm, but not sticky. Threatening clds. the v.g. sky. MAGNETIC COMPASS PROBLEM(Last night and tonight its needle was pointing much farther west than its normal 11° ...maybe 20° to 25° west! WHY? Is there an iron pipe right under where I'm setting up? Has the local magnetic declination suddenly shifted? Last night & tonight polar aligned by eyeballing B'way. Will test at home.) 9d-MOON(Tycho region. Breathtaking!) SATURN(+ Titan. Many doubters...even after 1st looking at Moon!) HH(Felt healthy all day...tonight as well.) \$57.29 (\$23.04/hr.)
COMPASS CHECK AT HOME(06/29/12, 8AM). Reading appears normal 11° W dec. Compass on wooden stool in front yard.
- 2464)06/30/12(SAT)FPT(8:50-11:05PM). Busy scene. Warm/sticky. PARK(Slight struggle, then luck.) PLW'S #128! Gave out "I Saws", stickers. Chatted w/lookers. 11d-MOON(Tycho region. Impressive!) SATURN(Sl. diminished by haze. Titan hard to see. Nevertheless, some doubters.) SKY(Upon arrival threatening clds. in S which soon dissolved.) \$76.51 (\$33.96/) BOOKS(Gave 3 astronomy books acq. at The Book Thing to the very-intetested-in-the-subject young man who works at Maggy-Moo's Icecream. He was very appreciative.)
- 2465)07/01/12(SUN)FPT(8:48-10:15PM). PARK(Easy.) Quiet scene. Warm/sticky. Ok sky at start, then increasing haze which eventually ruined view of Moon. PLW'S #129. 12d-MOON(Tycho & edge craters. Ok.) SATURN(Ok, then hazed out.) VISITS($\frac{1}{2}$ -doz. women in long robes with covered heads who at first I thought were Menonites, but who were Jewish. I remarked we were non-observant Jews, to which one said that's how she used to be. One called home on her cell while looking at Moon asking for an appropriate prayer! A man on a bike who seriously, said his family was from Mars and that he had proof!) \$36.56 (\$25.21/hr.)
- 2466)07/02/12(MON)CHAS.VIL.(8:53-10:23PM). PARK(V. easy). Scene slow. Warm/sticky. Grt. sky at start; eventually some clds. SATURN(Grt. Astounded lookers. Titan) PLW'S #130. \$24.13 (\$16.07/hr.) 13d-MOON(Behind building from this location.)
- 2467)07/17/12(TUE)FPT(8:47-10:07PM). PARK(N end of sq.) Semi-quiet scene. Warm/sticky. Ok sky, then intermittent semi-transparent clds. LONG HIATUS(Weather + 1-wk Maine vacation w/PLW.) ALIGNMENT(Sat. at $+9^\circ$ when should have been at -6.7° . Must correct situation ASAP!) SATURN(Not at its best. No Titan. Sould be ok from FPT for another mo.) VISITS(Nancy, a 50yr.-old woman who said she looked thru scope 25yrs. ago and still had I SAW...SATURN! sticker on frige. A local couple who guessed I've been scoping for 25-yrs. because that's how long they've lived in FPT.) HH(OK. Can still do it!)\$26.12(\$19.49/)
- 2468)07/24/12(TUE)FPT(8:43-10:29PM). Quiet scene, which became busier. Warm. Sl. hazie sky. Fair seeing. ALIGNMENT(Good, w/compass. Saturn at -8.0° when should have been -6.8° . Will adj. dial when time.) 5d-MOON(Lookers impressed.) SATURN(Only at 80X. Nevertheless lookers impressed. For a chg. few doubters.) VISIT(Susanne Lebovitt, now taking Yoga classes in FPT. Stephen Lampredi.) HH(OK, but a bit bored.) \$42.21 (\$23.98/hr.)
- 2469)07/25/12(WED)FPT(8:17-10:54PM). Pleasant temp. PARK(Stressful but fast.) Semi-busy scene. ALIGNMENT(Compass. Still need to adj. dec. dial. Sat. -8° .) 6-d MOON(Breath-taking even to me!) SATURN(+ Titan. Lost behind A.F. Inn, 10:50PM.) VISIT(Lynn & Jonathan Jensen of dance scene.) HH(OK, but bored. Wanted to leave but couldn't.) \$48.61 (\$18.55/hr.) MOVIE NITE ON THE PIER(When it ended, dozens of viewers streamed toward the Square. While many patronized the Kiosk, none at all stopped at my scope.)
- 2470)07/29/12(SUN)FPT(8:13-10:30PM). Busy scene. Warm/sticky. ALIGNMENT(In AM set up scope and re-set dec. circles, I thought. Disappointingly, Saturn read 3° low. On the other hand, B CYG was perfect at $+28^\circ$! Don't understand it. Will re-set again.) 10-d MOON(Tycho region. Very nice!) SATURN(Good, but less Titan. Am amazed image remains good when it's low and between lights.) HH(Very hard work, but OK.) VISITS(French family w/ two sub-teen boys who were totally fascinated and had great q's. Otherwise, many familie Gave out lots of ed. mats. 1st lookers was a family w/+/-8 sub-teens. Really challenging \$55.84 (\$24.49/hr.) PARK(WC slot.) ALBIREO(1X for French family.)

TOTAL THIS PAGE = \$ 367.27
TOTAL THIS YEAR = \$2,572.11

- 2471) 08/02/12(THU)FPT(8:25-10:55PM). Semi-busy scene. Hot/humid. ALIGNMENT(Arcturus too hi, Saturn too low, B CYG just right. Don't understand.) SATURN(Over, than in lights, but doable till 10PM. No Titan.) 14-d MOON(Past full. Edge craters, Tycho. Good. B CYG (1X) HH(Hard work...somewhat due to heat/humidity. Had to push myself hard to maintain enthusiasm.) VISIT(Judy, friend of Leah's from the "League".) \$34.59(\$13.85/hr.) 14-d MOON(Rose above Rec. Pier 10:03PM but was blocked 15-min. by street lamp.)
- 9
- 2472) 08/12/12(SUN)FPT(8:25-10:05PM). Warm but not sticky. ALIGNMENT(Am sure was close to N, but dec readings were confounding. a BOO at +15, Saturn at -12, but B Cyg at +29. I just don't understand what's going on. It appears the west is reading low, while the east is ok. It defies my understanding. It will be very bad new for finding Uranus if I can't fix the situation.) COLLIMATION(Tweaked B Cyg and got it good. But then later a Boo was terrible. Why???) a BOO(For starters. Trouble finding! Lookers amazed by star size illustrations.) SATURN(Still there. Lost in clds 9:15PM.) PERSEIDS(Peaked this AM. Cloudy here. Lots of inquired as to whether still viz.) HH(Ok). SATURN-MARS(1X together at opposite edges of finderscope.) HH(Bugged by scope problem!) \$27.50(\$16.57/hr.) VISIT(Marlina...little girl on a scooter who's been my first paying looker all summer. Tonight her parents announced that next week they are moving back to Cypress.)
- 10
- 2473) 08/16/12(THU)FPT(8:15-10:05PM). SCENE(Slow at first but was picking up as I left.) PARKING(Formula: If no immediate spot, unload and then wait on B'way behind Kiosk for someone to leave. Is a bit stressful but seems to be working.) BUBBLE LEVEL(One just bought at Home Depot seems to be working ok.) ALIGNMENT(Baffling! Arcturus 4° low and Saturn 5° low, while Albireo on the money! Instead of somehow trying to fix it, will for now just live with the situation. Baffling!!) B BOO(1st try at +15°. Show lookers star sizes comparison to explain.) SATURN(1st try at -12°. 133X, then 80X. Lots of amazement! Lost 9:29PM). HH(Ok, but bored.) VISIT(Ted Rouse's friend, Daisy, with two teenage girls. All very excited by Sat. but no contrib. \$20.35=\$11.07/ HEAT(Sticky enough that at home I right away put everything in washing machine!) VISIT(Marlina & family...see above. As this is their last week in FPT, I made up cards to give them tonight. But what'da ya know...they didn't show up. Bummer!) SUNSET 8PM (Last one in the 8 o'clock hour!)
- 9
- 2474) 08/18/12(SAT)FPT(7:25-10:42PM.) PARKING(Arrived extra early hoping for a WT spot, which I got!) SCENE(Extremely busy.) SKY(Great.) TEMP.(Pleasant/not sticky!) FRUSTRATION! (Being there early, and seeing so many people, instead of sitting on bench for an hr. decided to go for Arcturus which I thought, would be a piece of cake. For some reason ...maybe because I expected it to be brighter in finderscope...I couldn't find it. Many many people came by wanting to look, but I had to tell them to come back for Saturn. Because I wouldn't quit, I wore myself down searching. Finally eyeballed it, only to discover it was close to where I was looking on the dec. scale. What a bummer!) a BOO (Acq.8:19PM @ +16°. SATURN(-11°. Lost at 9:21PM. It continued to amaze lookers right to the end.) B CYG(Raised tripod and found immediately @ +28.5°.) COLLIMATION(Screwed it up badly on B CYG. Ended up doing it on distant lights, which worked surprisingly well. For a while I had horrible "angel of death" images!) HH(One of my toughest night ever. 1st the a Boo problem, then the lengthy explanations of B Cyc. Just couldn't take any more, so packed up and adjourned to Bop Pizza for a slice. Would have had plenty of business had I stayed!) \$90.63(\$27.63/hr.) (\$38.08 not counting time lost on a BOO!)* COLLIMATION AGAIN(For while with B CYG it seemed so intractable I was ready to pack up and try it from home. Then I went for the lights across the river, which worked. This exercise was also very wearing on me.) *(Might have been \$38.08 x 3.28 = \$124.90!)
- 10
- 2475) 08/28/12(Tue)FPT(8:22-9:58PM)SKY(VG).SCENE(Slow...HPL would have been worlds busier!) HH(Missed 2 gd Moon night because couldn't get myself to go!) BIG BOO BOO!(As was settin discovered left eyepieces home! Left scope, tripod, stool on sq. and went home for them 11-d MOON(Tycho + edge craters. Fine! 80X/filter) B CYG(several times.) ALIGNMENT(a BOO +15, but B CYG and a AQL right on mark. Why??) VISITS(Meteorite man Spencer Henderson, 443-467-8152. Am think will have someone at JHU examine his specimen. Myra Hettleman, just saying "hello". Meegan Hamilton. Dr. Christos Georgiades, father of Marlina, who I thought had returned to Cypress w/family. Family gone, but now I can give him the cards I made up for them!) \$10.50 (\$6.57/hr.)
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TOTAL THIS PAGE = \$ 183.57

TOTAL THIS YEAR = \$2,755.68

28 How many stars are visible from a dark site?

Most people could spot approximately 5,000 stars between the end of evening twilight and the beginning of morning twilight. Those with exceptional eyesight might boost the count to 8,000.

29 Why is the sky dark at night?

The number of stars in space isn't large enough so that your eye (or a telescope) would meet one no matter which direction you looked. Even if there were that many, the stars within distant galaxies are moving away from us at great speeds, so their light is redshifted (changed to longer wavelengths) out of the visible part of the spectrum.

30 What is a Messier object?

It is one of 109 deep-sky objects (star cluster, nebula, or galaxy) cataloged by French comet-hunter Charles Messier, who compiled the list so other observers wouldn't mistake these objects for comets. His original list, published in 1774, contained 45 objects. By 1781, the catalog had grown to 103 members. Historians later added another six based on Messier's notes. For observers, Messier's list contains some of the sky's true wonders.

31 What percentage of stars are double or multiple?

Approximately 60 percent.

32 Why do stars vary in brightness?

The most common reason is that the components of double stars eclipse each other in our line of sight. We call these eclipsing binaries. Pulsating variables enlarge and shrink, changing brightness as they do. Other variable stars erupt, most with irregular periods. Recently, astronomers have found the brightnesses of more than 500 stars drop ever-so-slightly as planets cross in front of them from our point of view.

33 What makes the gas in a nebula glow?

Nebulae can glow by emitting or reflecting light. Atoms of gases like hydrogen, oxygen, and nitrogen can absorb ultra-

violet energy from nearby stars and re-emit it as light of various colors. If the star is too far away to energize the atoms, the nebula can still reflect its light. As it does so, however, it also scatters the light, creating a characteristic blue color.

34 What is a planetary nebula?

It is a phase of stellar evolution for Sun-like stars during which a shell of ionized gas (the outer atmosphere of the star) expands into space. The core of the original star emits enough ultraviolet radiation to keep the nebula glowing for 10,000 years, on average. After that, the gas becomes too thin and has moved too far from the star to continue glowing.

35 What types of objects result from a star's death?

A Sun-like star will shed its outer layers, producing an expanding planetary nebula. Its core will contract and become a white dwarf — a stellar remnant no longer generating energy by fusion. It will still contain most of the star's mass but will be only as big as Earth. More massive stars will explode, producing supernova remnants rushing out into space. The cores of such stars will become either neutron stars (dense suns only a few miles across) or black holes.



The Pacman Nebula (NGC 281) glows fire-engine red because hydrogen atoms are emitting light of that color after absorbing energy from nearby stars. Jason Ware



The beautiful Whirlpool Galaxy (M51) is one example from the billions of galaxies that populate our universe.

Keith Quarmochi

36 What is a galaxy?

Each of these building blocks of our universe contains massive collections of stars, gas, dust, and associated unseen matter bound by gravity.

37 How many stars does the Milky Way contain?

Astronomers think between 250 billion and 400 billion stars populate our galaxy and that its total mass is somewhat less than 1 trillion Suns. This rather wide estimate depends on the number of faint red dwarfs, which are hard to detect if their distance exceeds 1,000 light-years.

38 Does the Milky Way have satellite galaxies?

Yes, at least a dozen galaxies orbit the Milky Way, much as the Moon orbits Earth. The biggest of these are the Large and Small Magellanic Clouds. Other satellites include the Sculptor Dwarf, the Canis Major Dwarf, the Fornax Dwarf, and the Ursa Minor Dwarf.

39 What is the Local Group?

It is a collection of galaxies that includes 43 confirmed members of which the Milky Way and the Andromeda Galaxy (M31) are the most prominent. The Local Group has a diameter of some 10 million light-years and is a small part of the Virgo Supercluster of galaxies.

40 What's the universe made of?

Current estimates by cosmologists divide the contents of the universe as: dark energy, 70 percent; dark matter, 25 percent; free hydrogen and helium, 4 percent; stars, 0.5 percent; neutrinos and everything else, 0.5 percent. ☛



You'll find 75 more questions answered at www.Astronomy.com/toc.

Michael E. Bakich is an Astronomy senior editor whose latest book is *1,001 Celestial Wonders to See Before You Die* (Springer, 2010).

STREET CORNER TELESCOPE LOG -- 2012

- 2476) 8/29/12(WED)FPT(7:55-9:43PM.) PARKING(A narrow WT slot.) Grt. sky. Warm but not sticky. Semi-busy scene. HH(Realized that just a few yrs. ago could pick-up scope in its case and carry it 100-ft. Now, picking it up by its handle to carry it 10-ft. is a big effort I would say that, all in all, telescoping is a much more physically demanding routine than it used to be! Am beginning to think again about a lighter scope.) 12-d MOON(Tycho and edge craters still putting on a good show. I rotated eyepiece diagonal so Tycho edge is toward top, accentuating the edge craters.) BLUE MOON(Aug. 31st. Lots of Q's about what it is. Am hoping can find my blue filter.) B CYG(1X. No prob. locating.) VISITS (Cecilia, who got a middling Moon pix w/her Iphone. Reichert, who's written a book "25 Years of Philosophy, which will look up at MSEL.) \$20-contrib. \$52.00 (\$28.89/hr.)
- 2477) 08/30/12(THU)FPT(7:58-9:45PM.) PARK(Paid a street guy \$2 to save a space.) Grt. sky. Warm/sl. sticky. SCENE(Bleak, but busy for 1st hr.) A pretty decent strummer/singer near by. HH(Hard work, even on the "job". Probably could have had more lookers, but I'd had enough for one night.) a BOO(+14° Why?) 13-d. MOON(Rose over Rec. Pier 8:10PM. Mostly at 50X/filter, but would have been ok at 80X, as Tycho & edge craters still ok.) VISIT(Celia & 2 friends. She called ahead to make sure would be there.) B CYG(For Celia's friends. +28!) ALIGNMENT(Gd. w/compass.) \$32.55(\$18.29/hr.) photo w/Celia.
- 2478) 08/31/12(FRI)FPT(7:53-11PM.) PARKING(Arv'd 7PM and surprised to find all WT slots taken. After 10-min. wait got slot up by Jimmies.) SCENE(Slow, then busy.) SKY(Great) NEW SIGN (NEIL ARMSTRONG 1930-2012 RIP. Hung on front of scope. Surprisingly, it evoked very few comments.) 14-d MOON(Acq. as it rose E. end of Thames St. Briefly hidden by Rec. Pier, "Earth Vader" tower. Essentially no craters, so instructed lookers to find Tycho, which put on a great show. More lookers than usual asked to see SEA of Tranquility which, come to think of it, might have been due to Armstrong sign. Craters appearing on limb toward end of stint."BLUE MOON": lots of lookers asked what it is. Some knew that next one won't be till 2015!) VISIT(Sabrina, woman with camera, who I got to take photos of me w/Armstrong sign. Alfredo, who took pix w/my camera.) \$79.70(\$25.54/hr)HH(Peak of game!) PROSAIC MOON?(Yes, because we see it so regularly, but done right through the telescope, it's absolutely breathtaking.) SCOPE(Dec. lock needs attention...again.)
- 2479) 09/07/12(FRI)FPT(8:07-10:15PM). PARKING(lucky!). Warm/sl.sticky. Ok sky. ALIGNMENT(Eyeball, as compass readings off.) a BOO(+16° Why?). a AQL(+10°). B CYG(+29°. Tonight's main feature. Very tough because of all the explaining required. Most lookers liked it. 80X, then 50X since, w/all the ambient light, its wider field made it easier to look thru than 80X.) VISIT(Susan Schulhoff w/2 young boys. Raoul, a U. of Pitt grad, possibly in Frank's year. Mike, age 55 and on a bike, who said he remembers me from 25yrs. ago.) \$33.00 (\$15.49/hr.) Lots of no-pays. PLW's #130 Says so many no-pays took away fun for her! ALBIREO FACTS(Since it will be a main feature for a while, will be helpful to have one.)
- 2480) 09/11/12(TUE)FPT(7:55-9:23PM). Comfortable temp. Gd. sky. PLW's #131. a BOO(Set dec. +16 Not there. To my very pleasant surprise it was at +19°...exactly where it's supposed to be. Why was it at +16° for last several weeks? Why??) ALBIREO(1st try. First night giving out "Albireo Facts". Nevertheless, did a lot of explaining. Hard work!) VISITS(3 astronomers from JHU w/Russian woman astro. Interested enough to stay around for a good while. Various lookers from previous nights.) \$18.00 (\$12.33/hr.) SCENE(slow but steady.
- 2481) 09/12/12(WED)FPT(8:02-9:02PM). Comfortable. Gd. sky. Ok parking. SCENE(Slow, and remained so. Quit after 1-hr.) PLW'S #132. ALBIREO(50X. Would be so much better in a dark place where lights wouldn't interfere with eyepiece view. Gave out blurbs.) VISITS(Ruth Schoonover, who looked thru Chas. Vil.scope in '88 and had bought comet and unicorn T-shirts. Ceelia,..first meeting with PLW.) Adjourned to Warf Rat, Bop. \$7.53 (\$7.53/hr.)
- 2482) 09/15/12(SAT)ST.PAUL ST.(8:59-10:11PM). First to FPT but parking impossible. Warm. Sl. haze. PLW's #133. ALIGNMENT(perfect). ALBIREO(Lookers liked. PLW gave out "FACTS", which occasionally inspired contrib.) SCENE(Slow, compared to Eddies block below. Next time maybe set up there.) LOTS of no-pays. EDUCATION IS THE KEY BUMPER STICKERS(Last night put one on scope case; tonight had some to sell, but no interest.) \$13.25 (\$11.01/hr.)** VISIT(Student who runs Bloomberg public nights scope who was unfamiliar w/Albireo.) **Didn't cover the doz.-pack beer we bought at Schnapps Shop on way home!

TOTAL THIS PAGE = \$ 236.03

TOTAL THIS YEAR = \$2,991.71

- 2483)09/16/12(SUN)FPT(7:55-9:18PM). Pleasant, Gd. sky. Easy parking. V. quiet scene. PLW's #134. ALBIREO(About at zenith. Scope raised high as possible, but lookers still had to bend quite a bit to put eye in front of ocular. Ambient light adding to the difficulty of seeing the two stars. Came near to loosing a "patient" who'd given up!) VISIT(3 women astronomers here for a conf. at STScI. None were backyarders. Found us interesting and hung around for a good while.) HH(Reluctant, but ok there.\$27.00(\$19.57/Included 3-\$5's! Adjourned to Univeraity Mart for \$2.00 icecream cups.
- 2484)09/19/12(WED)FPT8:13-9:47PM). Sl. chilly. Grt. sky. Easy park. Quiet scene. PLW's #135. 3-d MOON(1st spotted by PLW thur her window from home, so we rushed down to see as much of it as possible before it set. Great moon. 50X. Lookers impressed. Held 34-mins.) ALBIREO(The usual routine and reactions.) VISIT(Ryan from NC who has a 12" DOB and the constellation Orion tatoood on his arm. Reported spotting a globular cl.)\$20.00 (\$12.82/ Adjourned to the Chas. Vil University Mart where got choc. mint chip ice cream for PLW. VISIT(Christos Georgiades & woman friend. C said was leaving Balto. Fri.)
- 2485)09/20/12(THU)FPT(7:58-9:34PM). Warmish. Sl. haze. Park'd last WT slot. Semi-quiet scene. PLW's #136.(She was very unhappy with the lack of interest shown by passersby!) 4-d. MOON(Theophilus...a big black hole of a crater on terminator. Tip of ctrl peak a tiny point. Awesome! 8:30-45PM lost behind chimney.) ALBIREO(While Moon lost.) VISITS(Carey Ries, with Ann + 2 other women friends in car stopped to say hello. Gave all Moon Facts and Carey business cd. Woman named Lyra who's been by before. Showed her a LYR in finder.) Lots of no-pays, esp. a lg. group of natural foods conventioners! \$15.70 (\$9.81/)
- 2486)09/21/12(FRI)FPT(7:17-10:31PM). Mild. Grt. sky. Busy scene. PARKING(Early supper to lv. in time for easy parking. Arr'd 7PM, just in time for last WT slot!) PLW's #137. 5-d. MOON(No special features...just nice. Lookers impressed...a few not sure was real. Lost for +/-25-mins. behind roofs. Lost for good 10:31PM. Ran out of Moon Facts.) ALBIREO (1X for an STScI looker.) VISITS(Lady in wheelchair for whom I severely lowered scope. Back 1-hr later asking to see Moon again, but I said, "No, is too much work." 2-guys-- Swiss & Dutch, one of whom had iPhone photo of his friend w/me at TOV. PLW took photos of me w/them to give to the friend. PLW asked a guy if his look"was worth a buck", whereupon he put \$10 in hat! 4-STScI guys. Woman who had me use Moon map to ID some features.) GENERAL(Slow start, with many disinterested passersby, but then things began to really pick-up! An all around good night!) \$82.05 (\$26.58/hr.) Only used 50X on Moon.
- 2487)09/23/12(SUN)FPT(7-9:00PM). Coolish. Grt. sky. Semi-slow scene. PARK.(1st WT slot.) 7-d.MOON(1/4+. Apennine Mts. Good! 50X w/filter.) ALBIREO (1X). y AND(Searched for night after night but no luck. Why?) VISIT(Maura White with 2 sub-teen kids & husband. She e-mailed yesterday wanting to know when I'd be in Fpt and called today. Knew of me, and Googled to contact me. I thought kids not too interested, but gave them all handouts. Maura is a speech therapist. mwhite@kinderspeak.com. She contrib'd \$18 and at my urging bought 2-WIA bump. stkr.) PLW(Back in STL. 1 inquiry for her.) \$56.02 (\$28.01/hr.)
- 2488)09/24/12(MON)FPT(7:28-9:17PM). Coolish. Grt. sky. Slow scene but decent traffic till near end. PARK.(1st WT slot.) 8-d.MOON(Mid-sunrise on Copernicus @ 50X. Some lookers gasped!) COLIMATION(On a AQL. All 3 screws fairly tight. Is good news, or not so good?) HH(In good form. Energetic both psychologically and physically.) 1-BUMP STKR \$37.86(\$20.88/hr.)
- 2489)10/04/12(THU)FPT(7:30-10:35PM). V.mild. Grt sky. Surprisingly busy scene. PARK(Car pulled out from good metered spot as was arriving. Took it but then noticed WT-ZIP Car slot opens. Left metered slot and took it. Saved \$2!) HH(In good form, tho on drive down kept saying to myself, "Why am I doing this?")ALBIREO(While got it on 1st try at +28°, dec fell steadily and, as well, level kept needing adjustment. What's going on? Am worried scope is no longer reliable for positional work.) VISITS(Group of interested women from U. of Colorado, here for a women's technology conf. Dan?...asked if I knew Leonard Scorco, Marilyn Oconnor's son. Am not sure why he asked, except he seemed to know something about my anti-war history.) 18-d MOON(Rising just as I was loading car. Good thing I didn't see it while still set up, as would have stayed longer!) JUPITER(Spotted from dias at W side of Sq. Maybe doable late Oct.) \$47.62 (\$15.46/hr.) WEATHER(Was 1st possible stint after 10d. of bad weather. Am about to miss 2-wks on a trip to Europe to visit Frank & Ken & families in Amsterdam and Toulouse.)

TOTAL THIS PAGE = \$ 286.25

TOTAL THIS YEAR = \$3,277.96

2490) 10/06/12(SAT)GHAS, VIL...here due to FPT Festival(8-10PM). Grt sky. Fairly busy scene. Parked right next to my set-up spot. HH(Great in all respects! Last stint till back from 16-d visit to Frank & Ken in A'dam & Ken in Toulouse.) #2490!(Made official with a \$1.00 contribution at 8:23PM. Now I feel free to travel knowing I have reached this important gateway number on the way to 2500!) B CYG(Doing good. Many lookers liked a lot. Used the line, "Hav-A-Look! folks at some awesome stars. Having done the calculation last night, I informed lookers that the line-of-sight sep. between them is 400 BILLION miles. Gave out 25 Albireo Facts.) COLLIMATION(Needed at start. Luckily, got it on 1st tweak... finder scope, as well! \$20.49 (\$10.25/hr) Jupiter looking good in NE as arrived home. WEATHER(Day started warm but ended cool. Wore jeans and heavy sweater.)

2491) 11/09/12(FRI)FPT(7:39-10:07PM). LONG HIATUS(Due to 17-d visit to Frank & Ken in A'dam and Toulouse, respectively, followed by bad weather.) Grt. sky. Semi-busy scene. Cool. PARK(Lucked out on close park. mtr. slot.) PLW's #138(She had a really good time chatting up and recruiting lookers. Given pr. of socks by a street vendor who remembers me for 20 yrs. back!) SCOPE(perfect alignmt, good optics.) JUPITER(Acq. 7:39PM from W. side of square. 3+1+stripes. Most lookers v. pleased w/view.) VISIT(John Linneberg, son of Lester. A very tall, articulate, handsome young man. Reported Miriam now a grand moth. Learned that Carl has passed away. Ann, a looker from the past, who contributed \$20 as a ticket for the season!) HH(In good form. Wining at first but then OK with it. A good night.) VISIT(Sabrina Depestre, young woman photographer who took pix 8/31/12)\$97/39.27 VISIT(A group of Australians with one of whom I sang Waltzing Matilda.)

2492) 11/10/12(SAT)FPT(7:41-10:53PM). Busy scene! Coolish. PARK(2-min wait, then metered slot. Hazy sky early eve. but decided to go down on gamble would clear, which it did. However, for 1st hr. Jupiter came and went in the haze, PLW's #139(Had a fun time recruiting, chatting up, and giving "I Saw...JUPITER!" stickers to lookers.) JUPITER("Stripes" v. murky 1st hr. 3 moons. Ganymede appeared briefly on J's limb then mysteriously disappeared...probably into J's shadow. Many "Can you see the Red Spot" q's.) HH(Thrilled by the enthusiasm, amazement, and expressions of appreciations of lookers...not to mention being in the midst of a passing parade of humanity in a busy place like FPT. PLW and I are having a unique life's experience probably shared...and unimagined by few others!) VISITS(Lots of people who remember me from years ago and ask "how long have you been doing this?") \$123.77 (\$38.64/hr.)

11/12/12 (MON) marked the end of my 25th year of "street" telescoping, which began in Fell's Pt. on 11/13/87. Weather didn't permit telescoping tonight, but event was celebrated by a nice lunch at Chloe Ringer's house and attended by PLW and Debbie and Jim Pickett. PLW contributed a surprise chocolate cake decorated with blue and gold stars representing Albireo, a yellow sun, and topped with big, wax, lighted numbers 2 and 5, wax candles. A fun time was had by all. Took 2 nice photos of occasion.

TOTAL STINTS SUMMARY* Over 25 years have been to the "street" 2,492 times. Total contributions is \$168,175.73, averaging \$6,727.03/year, 100 times/year, and \$67.49/time. Assuming +/-3-looks per \$1.00 contribution, I've given 504,527 looks!

*Pages with year-by-year, cumulative data can be found at the back of my "Fell's Point" folder. Over the years, contributions per average stint have dropped from between \$70 to \$80 down to \$46.37 for my 25th year. It probably reflects my switch from Harbor-place to Fell's Point, as well as staying out shorter hours/stint.

2493) 11/16/12(FRI)FPT(7:41-10:16PM). START OF 26TH YEAR(began officially with a \$1.00 contrib. at 7:50PM!). Grt. sky. Cold (low 40's). PARK(Close by mtr. slot.) 3-d MOON(Down Thames St. but set before set-up.) JUPITER(3, then 4 moons on left. Awesome. Good stripes.) SCOPE(Perfect alignment & colimation!) Thanks to alignment picked up both M45 and B-Cyg for a fellow scopist...later low in W.) VISIT(Telescopist from London, Ont. here for a computer sc. teaching job interview.) HH(Tip top form!) PLW back in STL. Pretty slow scene...especially compared to last Fri. \$37.60 (\$14.53/hr.)

TOTAL THIS PAGE = \$ 278.86

TOTAL THIS YEAR = \$3,556.82

28.

$$dx/dt = \alpha(p-x)(q-x)$$

$$a) x(0) = 0$$

$$dx/dt > 0 \text{ when } x < \min(p, q) \\ \text{and } x > \max(p, q)$$

$$dx/dt < 0 \text{ when } x > \min(p, q) \\ \text{and } x < \max(p, q)$$

$$\int \frac{dx}{(p-x)(q-x)} = \int \alpha dt$$

$$\int \frac{1}{q-p} \left(\frac{1}{q-x} - \frac{1}{p-x} \right) dx = \int \alpha dt$$

$$\frac{\ln(x-p) - \ln(x-q)}{p-q} = \alpha t + c$$

$$\frac{x-p}{x-q} = c e^{(p-q)\alpha t}$$

$$\frac{+p}{+q} = c$$

$$\frac{x-p}{x-q} = \frac{p}{q} e^{(p-q)\alpha t}$$

b) $x=p$ is a semi stable point, and since $\frac{dx}{dt} > 0$, $x(t)$ is increasing.

$x(t)$ approaches p as $t \rightarrow \infty$.

$$dx/dt = \alpha(p-x)^2$$

$$\int \frac{dx}{(p-x)^2} = \int \alpha dt$$

$$(p-x)^{-1} = \alpha t + c$$

$$\frac{1}{p-x} = \alpha t + c$$

$$p-x = \frac{1}{\alpha t + c}$$

$$x = p - \frac{1}{\alpha t + c}$$

$$x(0) = 0$$

$$0 = p - \frac{1}{c}$$

$$\frac{1}{c} = p$$

$$c = \frac{1}{p}$$

$$x = p - \frac{1}{\alpha t + \frac{1}{p}}$$

as $t \rightarrow \infty$

x approaches p

- 2494) 11/17/12 (SAT) FPT (6:45-9:25PM) Milder than last night. Clear all day but encroaching haze from sputh late afternoon. PARK (Arv'd 6:25PM. All Water Taxi slots open. Parked there w/ "in Square" sign in window.) 4-d. MOON (Haze arrived as setting up. Became a "sucker hole situation.") JUPITER (Acq.'d 7:37PM after being buried in haze. 2+2 but slightly mushy image. Sucker hole situation finally forced me to pack-up. Nevertheless, had some enthusiastic lookers.) VISITS (Ann Marie... a young woman VERY interest in sky. Had iPhone with Google sky app. Seemed knowledgeable. Asked good q's. Josie... an 8-yr. old who, to my great surprise, recited my planets mnemonic which, her father said, she got from me 2-yrs ago! She did a good job on both Moon & J at scope.) ALIGNMENT (Quite off a start Couldn't find B-Cyg. A few adjustments, then good.) HH (Frustrating stint!) \$58.67! (\$21.9'
- 2495) 11/21/12 (WED) FPT (7:17-10:04PM) THANKSGIVING EVE! (Pondered whether to go, thinking TG eve scene would be dead. It appeared so as I arrived. Parking spots all over. Took a WT slot But there were knots of people around, so set up. Good thing, as it turned out I had some very generous contribs! Scene got busier as evening wore on, but I had fewer and fewer lookers, so packed up. THIS IS THE FIRST TIME SINCE 1978 THAT I'VE MISSED THE NIGHT BEFORE TG, OLD TIMERS' NIGHT DANCE USUALLY, CALLED BY BOB DALSEMER AT LOVELY LANE!) Cool. Ok sky. 8-d MOON (Sunrise on Eratosthenes & Tycho. Lot of craters!) JUPITER (1+3 + sl. mushy stripes. Most lookers very awed!) HH (In good head.) Adjourned 4 pizza. \$75.75 (27.1'
- 2496) 11/25/12 (SUN) FPT (6:10-7:14PM) Gd. sky. Cold... 43F PARK (WT wide open.) SCENE (Bleak, due in part to Ravens game underway. Had some lookers at start, but then nothing, driving me to quit. Could hear cheering for team coming from bars.) HH (With a gd sky, a week-end night and wanting to reach #2500 and \$4,000, despite cold felt driven to go. As well, I wanted the pleasure of seeing Jupiter and the Moon thru the scope. Cold feet my weakest link! Tho I didn't feel it at scope or driving home, the moment I got home had to pee real bad Am wondering if would eventually felt it at scope, or would mind over matter prevail.) 12-d MOON (Tycho region and nearby craters. Good!) JUPITER (Acq. 6:25PM. Fuzzied by heat wave at first, but was good at end. 1+3.) \$7.60 (\$7.17/hr.) (YEAR = \$3,698.84) PRACTICE (Always room for improvement! Tonight, plugged together M/F battery connectors at home, which is much more convenient than doing it on the Square. Will do from now on!) VISITS (Crystal, husband & baby. VLP Phyllis and husband.)
- 2497) 11/28/12 (WED) FPT (7:50-9:30PM). Perfect sky! Cool but comfortable. PARK (Close by paid.) Scene (Bleak, but good stream of lookers.) WHY TONIGHT? (Late afternoon attended a Daniel Dennett talk w/Mike Franch at JHU. Leaving talk spotted rising full moon w/Jupiter extremely close by. Seeing this incredible sight I knew I would be telescoping tonight! JUPITER (2+2, seen 2+2. Stripes. A great sight appreciated by all lookers!) FULL MOON (Fine at 50X w/filter. Tycho and a few rim craters.) HH (Totally galvanized by Jupiter MOON conjunction!) VISIT (Celia, who called ahead to see if I'd be there. She did a great job recruiting lookers. We adjourned to her favorite bar, where she bought me a couple of beers and where we had a fun conversation. Learned she carries a gun in her credit card scam job! She enjoys her single life and has no desire to marry and have children. She is very enthusiastic about both me and my telescope routine. My first ever "groupie"! HH (Am amazed how I do all this after an intense day on projects and bicycling. I seem to have incredible stamina! Celia asked me my age and was flabbergasted at the news "18 days until I'm 82"! Same with PLW's age.) \$45.20 (\$27.07/hr.) CELIA (Handed me an envelope and instructed me to not open it until I got home. I opened it at home and found a beautiful letter congratulating me on "25 years of gracing Fells Point visitors and locals alike with beautiful views of space!" She also said, "I've been lucky enough to see many beautiful stars and planets through your fantastic telescope (and) I just wanted to say thank you for the knowledge that you share with Baltimore! It has truly been a pleasure getting to know you and our beautiful galaxy!" Enclosed in her letter was a big surprise gift of \$25.00 (apping tonight's contribs to \$70.20)!!

TOTAL THIS PAGE = \$ 212.22

TOTAL THIS YEAR = \$3,769.04

2498) 11/29/12 (THU) FPT (8:15-9:32PM). Perfect sky! Cool but not cold. PARKING (Very quiet scene, yet took 20-mins. to get a space.) 16-d. MOON (Craters on rim. Ok.) JUPITER (4+0. Great! Stripes very distinct.) VISIT (Tim the photographer, who remarked he's seen all the plane but Pluto thru my FPT scope. Another Tim, who reminisced about grinding a mirror with his father with an assist from Charlie Kratz.) PARKING AT HOME (Getting tougher all the time. Am even having trouble parking in front of house in daytime!) HH (A bit zonked out driv- down but was galvanized by sight of Jupiter in scope. Slept poorly last night.) VISIT (Eric from The (E. Balto.) Guide, who is doing a story on my "Jubilee". Accidental visit but took photos and said he picked up more material for article.) PLEIADES (For Eric. Acquired after fine tuning alignment.) \$15.00 (\$11.72/hr.)

2499) 12/01/12 (SAT) FPT (7:15-10:20PM) #2499 (Put sign on ground in front of scope reading, "TONIGHT IS MY 2499th TIME "STREET" TELESCOPING SINCE START-NOVEMBER 13, 1987! HAV-A-LOOK! Disappointingly, it didn't evoke many comments or congrats.) LIGHTED BOATS PARADE NIGHT (Knowing place would be packed, contemplated not arriving till crowd was leaving. Went early, anyway, and totally lucked out getting a space across from Bertha's. Was able to hand truck everything to Sq. on 1 trip.) Fair sky. Mild. DEW (Enough on scope to diminish J's moons but not "stripes".) JUPITER (3+1, then 2+1, then 2+2! Was IO which disappeared for nearly 3-hrs.) 18-d. MOON (Acq. +/-9:30PM. Good rim craters.) SCENE (V. busy at start. Lots of families/kids. Many kids at scope. By time I left was mostly 20-somethings...many a bit drunk.) VISIT (1st lookers were MYRA & BUZZY, on way to play. Had B. take photos w/my camera of me holding #2499 sign. CELIA. Didn't stay very long but brought me a chicken dinner to take home!) HH (Held up well!) \$93.85 (\$30.47/hr.) BOP PIZZA (Adjourned for a slice. Photoed two young men in Santa suites, one wearing a homemade menorah hat w/8 paper candles + a Jewish star!) MISSED PHOTO OP (A pretty young woman who put an "I Saw...Jupiter" sticker in the rim of her wool cap. I really wanted to photo her but lacked the initiative. She looked so great! Am kicking myself over it.) DEW (At home directed electric heater/blower at scope to dry it off.) VISIT (3 men from NY here for antique auto show. Very interested. Hung at scope for a good while.) "4th MOON (Spotted not by me but a woman looker who, upon hearing me say, "Jupiter with 3 moons," responded saying, "No, there are four moons!")

"I Saw...." RUBBER STAMPS HISTORY. On 1/7/92 bought Jupiter stamp from Moore Printing for \$14.70. On 9/8/92 bought Saturn in Harborplace stamp from Moore for \$12.39.

12/13/12 (THU) DRY RUN TO FPT. Even tho a cold Thurs. night, with not many people walking around, the place was totally parked up. Took +/-35-mins. to get a spot, but by then I was too bummed out to set-up...plus, aside from all the parked cars it was a slow looking scene. Was supposed to meet Celia to give her some holiday cds., but missed her. At home she was on my TAM asking, "Where are you?" I called back and explained. Hopefully, we'll meet up tomorrow night, which is also supposed to be clear. STILL STUCK AT #2,499!!

2500) 12/14/12 (FRI) FPT (7:10-10:27PM). After nearly 2-wks of weather delays, finally got there! Hung a sign on scope saying "TONIGHT IS MY 2,500th TIME TELESCOPING!", but it didn't draw many spontaneous comments. For me #2500 stimulated some self-reflection--should I retire? (No), or shift gears and not go out so much...especially with the money in mind? (Yes, if I can...but then what would I do on nice nights when I don't go out?), get a lighter telescope (would definitely help ans. the above q's!). PARKING (Left home 6:15 and slid in to a Water Taxi slot 6:40PM...a relief after last night!) A bit mild at start, but gradually cooler. Didn't realize, so when time to dismantle scope my fingers were quite stiff. SCENE (Not super busy but a lot busier than last night.) JUPITER (3+1. Nice! GRS on meridian 8:22PM but pale white and hardly noticeable...maybe a little because scope in need of collimation.) COLLIMATION (Got it all out of wack, taking +/-20-mins to get it back... all the while losing lookers by not recruiting.) VISITS (Steve Lampredi, Rob...a regular local. Had neat iPhone photo of J taken thru his own scope and took another thru mine, Ester the flute player, Scott...the brother of Mark Walker...very smartly attired, Tim...who reported that one of his photos will be on the new state highway map, Celia... to whom I gave a pk. of holiday cds. and who treated me to a long wine sipping session at several of her regular spots. Wants to take me out for supper on my birthday!) \$48.91 (\$14.91/hr.). Disappointing for a Fri. night! GEMINIDS (A good number of lookers reported seeing some last night. Others asked if still vis. tonight. In 1/2-hr. of looking I saw one last night from my back yard.)

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TOTAL THIS YEAR + \$3,936.80

Where oh where would my life
had gone I had not discovered
telescope All I can imagine is
it would have fallen into a
very unhappy, unfulfilling abyss.

STREET CORNER EXPENSES -- 2012

Page 1 of 2

| | |
|---|----------|
| 1/6/12 SP Fpt. parking | \$ 2.00 |
| 1/7/12 SP 12-sides SC handouts (Kinkos) | \$ 1.27 |
| 02/02/12 SP 12-sides SC handouts (Kinkos) | \$ 1.27 |
| 02/05/12 SP 12-sides for "I Saw...MARS!" sticker (JHU) | \$ 0.84 |
| 02/06/12 SP 2-sides for Mars sticker (JHU) | \$ 0.14 |
| 02/07/12 SP 7-sides for Mars sticker (JHU) | \$ 0.49 |
| 02/15/12 SP 1-"I Saw...MARS!" rubber stamp (Baumgarten Co.) | \$ 20.67 |
| 02/17/12 SP FPT Parking | \$ 0.50 |
| 02/18/12 SP 4-sides website cards (Kinkos) | \$ 0.42 |
| 02/27/12 SP FPT parking | \$ 0.25 |
| 03/01/12 SP 4-sides SC handouts (Kinkos) | \$ 0.42 |
| 03/10/12 SP FPT parking | \$ 0.75 |
| 03/14/12 SP 8-sides SP handouts (Kinkos) | \$ 0.85 |
| 03/14/12 SP CHAS. VILLAGE PARKING | \$ 2.00 |
| 03/17/12 SP 6-sides SC handouts (KINKOS) | \$ 0.66 |
| 03/17/12 SP 5-sides SC handouts (JHU) | \$ 0.35 |
| 03/18/12 SP FPT parking | \$ 2.50 |
| 03/19/12 STA 1-eyeglasses holding strap (RiteAid) | \$ 2.12 |
| 03/23/12 SP 14-sides SC handouts (KINKOS) | \$ 1.48 |
| 03/26/12 SP 18-sides SC handouts...Venus Facts (Kinkos) | \$ 1.91 |
| 03/28/12 SP FPT parking | \$ 1.00 |
| 03/29/12 SP 14-sides SC handoutd (Kinkos) | \$ 1.48 |
| 03/29/12 SP FPT parking | \$ 1.50 |
| 04/04/12 SP 6-sides SC handouts (Kinkos) | \$ 0.64 |
| 04/04/12 SP FPT parking | \$ 0.75 |
| 04/07/12 SP 19ea. sheets od. stock for bus. cd (Heyn Photo) | \$ 0.95 |
| 04/07/12 SP print 4 shts. cd stock bus. cd (Kinkos) | \$ 0.43 |
| 04/07/12 SP 8-sides SC handouts (JH) | \$ 0.56 |
| 04/07/12 SP FPT parking | \$ 1.00 |
| 04/08/12 SB 16-sides SC handouts (JHU) | \$ 1.12 |
| 04/10/12 SP 1-side ISS flyovers (JHU) | \$ 0.07 |
| 04/13/12 SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 04/13/12 SP 1-pk Post-It's.....1,200ea = 1.3¢/ea. (Dawn's) | \$ 15.86 |
| 04/13/12 SP FPT parking | \$ 1.50 |
| 04/19/12 SP SC handouts (JHU) 2-sides | \$ 0.14 |
| 04/19/12 SP FPT parking | \$ 0.75 |
| 04/20/12 SP SC handouts 8-sides (JHU) | \$ 0.56 |
| 04/20/12 SP FPT parking | \$ 0.50 |
| 04/25/12 EQUIP 1-bicycle air pump (Joe's Bike Shop) | \$ 10.60 |
| 04/29/12 SP FPT parking | \$ 3.25 |
| 0 /16/12 SP FPT parking | \$ 0.50 |
| 05/17/12 SP 9-sides SC handouts (JHU) | \$ 0.63 |
| 05/17/12 SP FPT parking | \$ 0.75 |
| 05/18/12 SP FPT parking | \$ 0.75 |
| 05/19/12 SP 12-sides SChandouts (JHU) | \$ 0.84 |
| 05/19/12 SP FPT parking | \$ 1.00 |
| 05/23/12 SP Bike repair (Twenty20 Cycking Co.) | \$ 10.20 |
| 05/27/12 SP FPT parking | \$ 0.75 |
| 05/28/12 SP FPT parking | \$ 0.50 |
| 06/01/12 SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 05/05/12 SP 36-sides Transit of Venus announcements (JHU) | \$ 2.52 |

PAGE + \$103.46

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|-------------|-----------------|
| <u>PAGE</u> | STA = \$ 2.12 |
| | EQUIP = \$10.60 |
| | SP = \$90.74 |

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|---|----------|
| 06/09/12 SP 7-sides SC handouts (JHU) | \$ 0.49 |
| 06/10/12 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 06/17/12 SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 06/23/12 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 06/26/12 SP FPT parking | \$ 0.25 |
| 06/27/12 SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 07/01/12 SP 14-sides SC handouts (JHU) | \$ 0.91 |
| 07/02/12 FEES Street entertainer license renewal (ck #1179) 2012/2013 | \$ 25.00 |
| 07/25/12 SP 12-sides SC handouts (JHU) | \$ 0.85 |
| 08/01/12 SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 08/05/12 EQUIP 1-bubble level for leveling scope (Home Depot) | \$ 3.07 |
| 08/28/12 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 08/30/12 SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 08/30/12 SP FPT parking | \$ 2.00 |
| 08/31/12 SP 4-sides sc handouts (JHU) | \$ 0.28 |
| 08/31/12 SP FPT parking | \$ 0.75 |
| 09/09/12 SP 7-sides SC handouts (JHU) | \$ 0.42 |
| 09/07/12 SP FPT parking | \$ 0.25 |
| 09/11/12 SP SP FPT parking | \$ 0.75 |
| 09/12/12 SP 5-sides SC handouts (JHI) | \$ 0.30 |
| 09/12/12 SP FPT parking | \$ 0.50 |
| 09/16/12 SP FPT parking | \$ 0.75 |
| 09/18/12 STA Whiteout (Staples) | \$ 3.00 |
| 09/20/12 SP 9-sides SC handouts (JHU) | \$ 0.54 |
| 09/23/12 SP 6-sides SC handouts (Kinkos) | \$ 0.74 |
| 09/24/12 SP 4-sides SC handouts (JHU) | \$ 0.24 |
| 09/25/12 SP 10-sides SC handouts (JHU) | \$ 0.60 |
| 10/05/12 SP 4-copies (10-up) website card (Kinkos) | \$ 0.43 |
| 10/06/12 SP 4-sides SC handouts (JHU) | \$ 0.24 |
| 10/08/12 SP 11-sides SC handouts (JHU) | \$ 0.66 |
| 11/09/12 SP FPT parking | \$ 1.00 |
| 11/10/12 SP SC handouts 19ea. (JHU) | \$ 1.14 |
| 11/10/12 SP FPT parking | \$ 0.75 |
| 11/11/12 SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 11/16/12 STA FPT parking | \$ 2.00 |
| 11/24/12 SP 13-sides SC handouts (JHU) | \$ 0.78 |
| 11/28/12 SP FPT parking | \$ 0.75 |
| 11/23/12 BOOKS RASC Observers Handbk. 2013 (RASC) | \$ 28.31 |
| 12/15/12 SP 4-sheets cd. stock for website cds | \$ 0.25 |
| 12/15/12 SP 4-sides website cards (Kinkos) | \$ 0.44 |
| 12/31/12 SUBS S&T for 1-yr. (cr cd) Sub starts either 3 or 4/13. | \$ 37.95 |

T = \$121.57

| <u>PAGE 2</u> | <u>PAGE 1</u> | <u>YEAR</u> |
|-------------------|------------------|-------------------|
| FEES = \$ 25.00 | EQUIP = \$10.60 | FEES = \$ 25.00 ✓ |
| EQUIP = 3.07 | STA = 2.12 | EQUIP = 13.67 ✓ |
| STA = 5.00 | BOOKS = 28.31 | STA = 7.12 ✓ |
| BOOKS = 28.31 | SUBS = 37.95 | BOOKS = 28.31 ✓ |
| SUBS = 37.95 | SP = 90.74 | SUBS = 37.95 ✓ |
| SALES PRO = 22.24 | TOTAL = \$103.46 | SP = 112.98 ✓ |
| TOTAL = \$121.57 | | TOTAL = \$225.03 |

2013

Not for Distribution

- 2501) 01/18/13 (FRI) FPT (7:05-9:30PM). Great sky. 32°F. CLOTHING (Even with good socks, feet were weakest link. Need insulated boots as Reeboks not sufficient in cold.) "HOT HANDS" FOOT WARMER (Inside my leather gloves... did great! Still warm 4hrs later at home.) PARKING (Arv'd 6:45PM and got WT slot. From passing by WT workers got name of WT boss... Mike McDaniel.) JUPITER (3+1+stripes.) 7-d MOON (Not quite 1/4. Great!) y AND (1X for self. 1st try.) SCOPE (Because of collimating problem last time out, was worried how it would be tonight. Happily, was fine!) HH (Even tho cold, went because the astronomer in me couldn't resist such a nice sky... w/both Jupiter and the Moon avail., to boot!) VISIT (Rob Baumann to whom I lent my gismo for attaching iPhone to scope. Stephen, who serenaded some passer by w/an old Eng. song.) SCENE (Decent.) HH (In gd. form.) \$41.44 (\$17.12/hr... tks to a \$20! NOTE: Rec'd foot warmers in my Atlanta Xmas stocking! VISITS (Amateur astro women from Buffalo who's visited before. Young woman who's majoring in astronomy at U of M.) SCENE (No chg., but for me got v. slow... not cost effective. Adjourned to Bop for a slice.)
- 2502) 01/19/13 (SAT) FPT (7:06-9:55PM). Great sky. 42°F. PARKING (Left hm. 6:15, arv'd 6:30PM and got WT slot directly in front of pole w/WT parking sign. Gave me idea that my sign, if I get it, can also go on to that pole, making installation a lot easier.) SCENE (Busy.) JUPITER (All 4 moons on left.) 8-d, MOON (1st Qt. Lots of craters awed lookers.) HH (In gd. form... buoyed by enthusiasm of lookers!) VISIT (Carl & Diane Friedman from dancing there to take in a play. Celia and friends.) \$107.00 (\$37.94/hr.) Adjourned to Admiral's Cup to meet Celia & friends, the to Mike's for food.
- 2503) 02/12/13 (TUE) FPT (7:32-9:33PM). 40°'s. Sky iffy at start but then ok. HH (Delayed leaving home because of approaching clds. Walked outside and back many times before deciding to go. In FPT everything but Jupiter was hazy, which kept hanging in there. Sat 15-min. on bench before deciding to set up. +/- 9PM, as traffic slowed, got bored. Beside parking, my other big problem is boredom!) JUPITER (1+3+stripes. Lookers impressed. Many asked, "Why are the moons in a straight line?") SCENE (FAT TUESDAY! Decent # passersby, many wearing beads, some of whom decked out both me and scope in beads! Maybe am mistaken, but it seemed to me there were a lot more plump women present tonight than usual!) VISIT (Lisa The Unicycle Lady, saying she lost all her money in the Md. and W.Va casinos. Is now attending Gamblers' Anonymous meetings. Said her gambling addiction very powerful. Has had several v. good HPL stints this year. In addition, she had published a neat looking littl booklet about her act for which she's found no market and which cost her \$8,000 to produce. Otherwise, she looked great... well dress and nicely coifed.) Adjourned to Bop for a slice. COLLIMATION (Fine... even tho have been recently storing scope on handtruck in upright position in living rm.) \$29.95 (\$14.83/hr.)
- 2504) 02/14/13 (THU) CHAS. VILLAGE (7:28-9:32PM). Drove to FPT, but it looked so bleak, decided to try Chas. Vil. Chas. Vil is inviting because I can unload pretty much right where I set up. SCENE (A lot busier than Fpt.) Cool, clear. Perfect alignment. Seem to be getting that 3 1/2° eastward azimuth down to a science! 4d-MOON (Lookers impressed. A line which gets laughs is, "That's why we spent \$20 billion to go there, because it looks so great through my telescope!") JUPITER (0+4+stripes, w/Calisto at max. distance. Lookers impressed!) VISITS (A young, Indian?, PhD, JHU chemical researcher who spend a lot of time trying to photograph Moon & Jupiter with a fancy Nikon. Got some ok Moon shots but none of Jupiter. Contributed \$10.00. A looker who got a parking tkt. while looking thru scope but who nevertheless contributed \$2.00.) Fairly ok traffic. HH (Good.) \$36.31 (\$17.63/hr.)
- 9 02/25/13 (MON) DRY RUN TO FPT. Parked in WT slot and sat on bench watching scene. Essentially no passersby. Would have been a lonely stint. Great sky, mild. HH in gd. shape.
- 2505) 03/09/13 (SAT) FPT (7:05-10:14PM). PLW's #140! Grt. sky. Mild. Parked WT. Busy scene. HH (Still in tip top shape!) JUPITER (3+1. Lots of "Why are they in a straight line?" Lookers impressed.) PHOTO (Looker w/i-Phone got one of J w/4 moons!) FIGHT (+/- 9:45PM A pretty violent one broke out 25' away among 3 women... slugging each other, wrestling on the bricks. Very violent, actually! PLW went over and shouted "Stop it!", at which one of the 3 punched PLW in the jaw! - fortunately w/o injury! A passerby called 911. Cops came pretty quickly, but women had left. But then one of them walked by. We pointed her out to cops, who caught up w/her. Cops interviewed PLW, but she decline to press chgs. In 25 yrs. have never before seen such a scene!) VISIT (Chloe Ringer pursuing her nephew's "Flat Stanley" school project, in which "FS" is to be photographed in interesting venues. We took photos with "FS" at scope w/both her and my cameras. Chloe's 1st visit to scope!) \$101.86 (\$32.72/hr.)

TOTAL THIS PAGE = \$316.56

TOTAL THIS YEAR = \$316.56

03/14/13 (7:45-8:15PM DST) COMET PAN-STARRS with PLW...her first ever comet sighting! Spotted with binocs (required) low in the west. Small, with fairly bright coma and noticeable but short tail at 10 o'clock angle. Help in spotting it from a taxi cab driver, Tom Donovan, who had spotted it w/binocs. We were at the east end of Lake Montebello. Failed photographing comet with my digital camera. VERY cold wind! Am sending Tom a comet cd. He knew of me in Fpt.

9 2506)03/23/13(SAT)FPT(7:10-9:57PM). Cold(Low 40's +/-windchill.) Sky sl unsteady. PARK(Left hm. 6:15P, arrived 6:33P. 3-WT slots open, but by 6:45P filled.). 12-d MOON(Tycho + edge craters.) JUPITER(Moons in pairs +3 J dias. out.) M42, Betelgeuse & Rigel for Carly Baumann. Fair traffic early but slowed by 9:30P. VISITS(Rob & Carly. Rob returned iPhone photo holder, reporting did not accomodate his model. EKHART & Catherine, she visiting from Germany.) HH(In v.g. form, except felt sl. dizzy.) Adjourned to Bop for a slice. \$36.75 (\$13.22/hr.) C. PAN-STARRS(Tried w/o luck.) HH(At engaging people and explaining things, I'm still very good at it!)

14 03/29/13(FRI) Went to recharge battery for tonight and discovered green light on B&D recharger (purchased +/-11/11) not blinking. Check out system in various ways and then drove to Banesville Electronics, where it was discovered recharger not working! Drove to Home Depot where I bought it. Not having my receipt for original item to try to claim refund, purchased new one (\$21.17).

10 2507)04/05/13(FRI)FPT(7:53-10:19PM). Cool w/o wind chill. Busy scene. Sl. unsteady sky. PARK(Left hm 6:20, arv. 6:37PM.Gst last WC slot. Whew!) JUPITER(1+3+stripes. Many impressed lookers. One uttered, "That's the most beautiful thing I've ever seen. I asked his wife, "Did you hear what he just said?" There was some giggling in their group, and the guy made amends!) HH(In good form, but very aware of what a strenuous workout this is. Lots of heavy lifting, being on feet for hours, talking almost non-stop...is like belonging to a gym! But I seems to be in good enough shape to do it....one downside being the feeling it's just a job...like repeating the same script for 25-yrs.) VISITS(Al ?, who said that thanks to the instrs. I gave him, he shot some great Comet H-B photos. Josh, activities concierge for the Admr.Fell Inn and other local hotels, who took my photo and said would add me to the website advertising things to do in area. For the 2nd time, someone who said he'd heard I had died!) \$59.34 (\$24.32/hr.) BATTERY(Fully chg'd and working good.) Was Orioles opening game day, with lots of passersby ~~were~~ wearing orange team shirts. O's 9-5!

9 2508)04/06/13(SAT)FPT(7:50-9:35PM). Sl. cold,..45°F w/sl windchill. PARK(3-WT vehicles parked...got next-2-last slot.) Ok sky...then suddenly shut down by clds. JUPITER(3-close-in, IV"above". Nice! GRS sked for 8PM but barely seen...if at all.) VISIT (Karen Cook & husband. For a brief time she was Lorinda's step daughter and lived at 731. She did the artwork on the "City 4-Ever" T-shirt. Last saw Karen leaving the Fpt Inn following her wedding which, she said, was 15 yrs. ago. She looked great. Is a 5th grd. teacher. Gave her handouts for her class.) HH(In ok shape. Got a good workout lifting and hauling tripod & scope!) \$63.57(\$36.33/...incl.a\$20)

10 2509)04/09/13(TUE)FPT(7:48-9:35PM). Warm....+/-75°F! PARK(2 late for WT slot. In 3-mins. got close-by meter slot.) SCENE(Semi-busy...thanks to mild temp.) HANDTRUCK(Seems I'd unknowingly left it in street behind car. Returned +/-9:15PM by a car parker guy. Lucky!!Gave him \$5 tip.) JUPITER(2+2 in pairs close-in. Verynice. By 9:35PM was getting mushy, so closed down.) ISS(At 8:30PM, dancer Steve Billanow arrived w/binocs saying it was due at 8:36PM and would pass close by Jupiter. It flew over just as he said. We had a pretty good collection of passersby watching. Steve was attending a BFMS sing-along at Bertha's!) HH(Hard work, but OK.) \$57.00 (\$32.02/) ISS(I need a photo of it so watchers can know what it really looks like!) VISIT (A young man who attended my talk "Mason & Dixon and the Transit of Venus", 06/05/12 at STSci. As I began complaining about how long it was, he interrupted saying, "No, not at all, it was a great talk and I really enjoyed it." Hopefully, his comment will help me feel better about the talk which I felt was very discombobulated!)

TOTAL THIS PAGE = \$216.66

TOTAL THIS YEAR = \$533.28

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 P.S. Have been imagining how I would have felt had I returned to my car and discovered my handtruck missing with no clue as to where it was. It would have been a totally confusing ~~shock~~ from which it would have taken me weeks to recover!

- 04/13/13(SAT)5TH ANNUAL BALTIMORE-ANNAPOLIS TRAIL "PLANETS WALK" SPONSORED BY NASA (10AM-3PM) (28.5miles) Visibly better attendance than previous yrs. Cool, breezy. SUNSCOPE(Till 1:45PM 75-80% clouds, so had to play the "sucker hole" game. 3-pairs small spot groups. I did a lot of explaining, showing photo of heavily spotted sun and solar cycles chart, gave out lots of "SUN FACTS" and "SUNSPOT FACTS". Table manned by a woman named Korey who is studying exoplanets. "Starman Jer" showed up w/2 scopes.) HH(Felt ok about educational.)
- 2510(SAT)CHARLES VILLAGE(8:11-9:48PM). Here, because of rest I took after above event would have arrived in Fpt too late for easy parking. Mild. Gd. sky...except objects low enough to be affected by atmospherics. JUPITER(Mainly 2+1. 10° above Moon. Lots of impressed lookers. Gave out Fpt stickers & "facts".) 3d-MOON(Lookers very impressed!) SCENE(JHU Spring Fair week-end. Lots of sidewalk traffic.) VISIT(Joe, a woman who works at STScI and was very impressed w/scope. gave her my card.) HH(Got easily parked, set up scope, only to discover had left eyepieces home! Put everything back in car and drove home for eyepieces. Placed smell like burning gas. Discovered had left burner on after cooking pea soup, so going back home was doubly lucky! VISIT(Tony, the Morgan student I met at the VLP astro talk a few mos ago. Is about to graduate. Said would get in touch.) AURORA(Apparently news reports that it might be vis. this far south tonight. Lots of inquiries at Planets Walk, one phone call, and lots tonight on sidewalk..I had no good advice other than can't be seen in town.)\$47.89(29.56 SciFi movies recommended for me by looker: "Another Earth" and "Melancholia".
- 2511(SAT)FPT(7:23-10:55PM). Arrived to find "Privateer Festival" in full sway!Sq. filled w/ vendors' tents. Lots of people in pirate costumes. Ck'd scene and discovered there was room for me. Cold enough that fingers got a bit stiff. Great sky. Parked WT slot. 10d-MOON(Tycho + sunrise on Jura Mts. Nice.) JUPITER(0+3, the 1+3. Stripes. Great!) SATURN!(Acq'd 10:12PM. 1st. time this yr. Found by the #'s. Put up Sat. sign but no lookers till 10:30PM...then a rush of them. Was set-up mid-square.) VISIT(Adam, on Main Sts. board. Knew of my parking prob. and said he would work on it.) \$80.88 (\$22.85/hr.) Women "pirates" boobs were pushed up so high they were almost falling out of blouses!
- 2512(SUN)FPT(7:23-8:27PM). Arrived as last of festival vendors leaving. Compared to last night, a very quiet scene. PARK(WT slot) Hazy sky but set up anyway. 11d-MOON(Still daylight when started on, then ok, then hazed out. No complaints from lookers.) JUPITER (in haze at start but then very nice till haze returned. 3+1+stripes.) CONTRIBS(1st two on Moon were \$5's! Got \$20 on J from a guy who must have been spaced out on LSD. Hung around babbling nonsense for what seemed like forever. Was afraid to try to shoo him away for fear he'd take his \$20 with him! Escaped him when haze forced shutdown.) HH(in good form. Again, when leaving house am thinking, "I don't want to do this," but once there I get with it. Am inspired by views in scope + prospect of \$\$\$ \$37.00(\$34.58/!) HH(On way home stopped at the Giant, where I met Joe Fanzone from dancing & J. Pats.)
- 2513(TUE)FPT(7:51-9:06PM). Cool. Sl. unsteady seeing. Parked metered slot. Arv'd to find "Kat & Her Thing" juggling near my spot. I asked her to stay, but as I set up she moved across the st. SCENE(One of the slowest in memory.) 13d-MOON(Tycho + edge craters. V. good.) JUPITER(3+1 + mushy stripes. Lookers impressed.) VISIT(A young cpl., Jade & Javana, he a Katahdin climber from Maine and she from Iran. We exchanged Katahdin & Iran stories. Told Jade to send me his email add. and I'd send him some 1950 Katahdin pix.) HH(In good form. Got a good aerobic workout handling scope!) \$21.03 (\$16.84/hr.)
- 2514(SAT)04/25/13(THU)FPT(7:58-10:18PM). Cool w/chill...then ok. VG sky. Park WT. Juggle Kat on Sq. as I set-upbut was invited by Stephen L. to go for a drink. JUPITER(2+2+sort of stripes.) FULL "ROSE" MOON(Rose 8:06PM & acq. 9:20PM. Did Tycho.) SATURN(Acq. +/-9:30P. Lookers amazed! VISIT(Randi from Toronto. Said he worked on the Candian "arm" which flew of Shuttle. Amy, a 20-something who knew names J's moons! \$45.00 (\$19.31/hr.)

TOTAL THIS PAGE = \$ 231.81

TOTAL THIS YEAR = \$ 765.02

- 2515) 04/26/13 (FRI) FPT (7:52-10:58 PM). Coolish. PARK (Left hm. 6:10 PM, arr'd 6:30 PM to 3 WT slots. All gone by 6:45 PM.) Finangled free icecream from Maggie Moos. JugglerKat at work, but made rm for me. JUPITER (0+4, then 0+3. Stripes murky. Lost 9:33 PM. SATURN (Acq'd 9:35 PM. Some doubters. Titan in view.) 16d-MOON (Nice terminator craters. Lookers impressed.) HH (Dragging a bit from last night.) VISIT (Jade. Is a lawyer here practicing foreclosure law, but will be moving w/wife Javana back to Machias, Me. We had interesting conversation on many subjs. Helped me pack up.) \$81.50 (\$26.29/hr.) VISIT (Woman who was one of the chief GEDCO organizers of the Stadium Place retirement community.)
- 2516) 04/27/13 (SAT) FPT (8:15-10:58 PM). Cool. PARK (WT full 6:30 PM. Lucked out on metered slot. Kept lookout for tkt. writers so wouldn't have to pay.) SCENE (Big pile of trash bags from afternoon's pub crawl at my spot, so moved eastward. Fairly busy, but w/big lull for me from 9:15 to 10:30 PM.) COLIMATION (Way off at start but quickly repaired. Why?) JUPITER (1+2+sort of stripes. Is now prettly low over AF Inn right at start.) SATURN (Acq'd 9:29 PM. Some interference from street light. Tried OR-18mm eyepiece. Dimmer image than w/OR-25mm. Light inteferred more. Will stick w/latter till S gets higher. OR-18.6.111X...right away smeared by kid pushing against it...one of its problems.) HH (Not feeling a bummed out as last night.) \$63.59 (\$23.38/hr.) SCENE (w/women, orange seems to be "in". Also, short skirts w/lots of leg showing. Nice!) BACK HOME PARKING (Nothing on 36th St., + Frisby totally parked! Unloaded onto sidewalk and parked up the street along side tree which parkers usually avoid due to sticking out branches. Bran-scraped side of car as I parked. Tomorrow will trim them for future parking, if need be VISIT (Billy & Sally Heller's grandson.)
- 2517) 05/01/13 (WED) FPT (8:17-9:33 PM.) Grt. sky. Cool wind at start. PARK (10m wait till meter slot opened.) SCENE (Slow.) JUPITER (1+3, 1+2+stripes. Gd at 1st. Just as was getting a bit mushy was able to go to Saturn.) SATURN (Mainly @ 8OX. 111X V.G. at start but then messed up by lights. Saturn is in Libra, meaning it is low in the sky and will have competition from street lights for next few yrs.) VISIT (Denise...with her late husband, Bill, was a Gandy Dancer musician. Connie...an occasional local lookers. She'd read my Guide write-up and mentioned my "xtreets" discovery. Llygd from Ottawa....impressed enough w/Jupiter to contrib. \$10. Returned for Saturn and contrib'd + \$2.) \$27.97 (\$22.02/ *Extra mile due to detour caused by auto repair shop fire beneath 29th St. Bridge.
- 2518) 05/02/13 (THU) FPT (8:16-9:40 PM) Grt. sky. Semi-cool. No wind. PARK (Took 17m. Meter slot. Realized when parked along side Sq. can haul everything to set-up spot in 1 trip!) PAVING BLOCKS (w/help from Crystal's husband, Jason, moved them to far end of Sq. Feel relieved nothing untoward will happen because of them!) SCENE (Semi-quiet, Thinking should stay home Thur. nights to save juices for Fri. nite!) JUPITER (3+1+stripes+star. Nice!) SATURN (Acq. 9:26 PM. Good at 8OX.) VISITS (Rob Bauman & Carly; Cindy. \$5/ea.) \$26.54 (18.96
- 05/03/13 (FRI) FPT. DRY RUN...due to a stiff, cold wind, a slow scene, and being a bit worn from the past two nights, decided not to set up. Also, haze in the west for Jupiter. STREAMLINING PRACTICE (1. Am now leaving tripod & stool in car overnight, which makes loading/unloading significantly easier. 2) Am turning R on Fleet, L on Ann, R on Lancaster and L on B'way, allowing me to avoid the slow moving traffic between Fleet and Lancaster. 3) Have realized that when parking at a metered slot along side Sq., can haul everything to setup spot in 1 trip. Am thinking should start trying to wait out parking along Sq. instead of waiting for 7PM in WT slot, even if it costs \$1 or so for the added convenience.)
- 2519) 05/04/13 (SAT) FPT (8:27-10:40 PM). Fair sky. Unexpectedly cold wind. Should have worn long johns! PARK (Metered slot whcih opened just as I arrived. at 6:30 PM. Paid only 25¢. SCENE (Tail-end of Cinco de Mayo-1 event. Slow mid-eve but then picked-up. JUPITER (1+3. Mushy image.) SATURN (Acq. 9:15 PM. Not perfect but ok.) VISITS (Uri, a guy taking photos down Thames St. w/panoramic camera. Later visited scope and took photos. BOB & CINDY BROWN from dancing...for Saturn. SAM, a cute young girl who has looked before and is totally enthusiastic about looking thru scope. Saw J and returned for S. HH (Due to wind and high clds., hesitated to set up, but not wanting to spend a 2nd boring night a home convinced myself to do it. Mostly glad I did!) \$50.50 (\$22.75/hr.)

TOTAL THIS PAGE = \$ 250.10
 TOTAL THIS YEAR = \$1,015.12

Baltimore GUIDE

SERVING EAST BALTIMORE SINCE 1927

WEDNESDAY, DECEMBER 5, 2012



Herman Heyn has shared his telescope, and his knowledge of the night sky, for 25 years in Fell's Point. Here, he offers a view of Jupiter.

Photo by Erik Zygmunt

Staring into space for 25 years

BY ERIK ZYGMONT
EDITOR@BALTIMOREGUIDE.COM

"Folks, take a look at the planet Jupiter," says Herman Heyn, offering a view through his telescope to passers-by in Fell's Point's Broadway Square. "It's the experience of a lifetime."

Since he was a boy, the night sky has grounded Heyn's otherwise fluid life.

"It's been a serious hobby since Miss Wicker in the 8th grade," says Heyn. "She drew the Big Dipper on the blackboard one day, and told us to go out and look for it that night. I went out, looked for it, found it, and fell in love with the stars."

The stars and planets have been there through Heyn's many jobs—substitute teacher, soldier, office manager, concrete inspector on the Harbor Tunnel, and delivery driver, to name a few.

Astronomy is more than a hobby to him. Heyn has been setting up his telescope in Fell's Point's Broadway Square since Nov. 13, 1987.

"The moon was up, Jupiter was up, and it was a nice clear night," he says. "I just decided to share it."

Acting as a tour guide to the stars and planets for interested passers by, Heyn has brought out his telescope to share his pas-

CONTINUED ON PAGE 4

Herman Heyn: numerous jobs, a singular passion

CONTINUED FROM PAGE 1

sion 2,400 times according to his own records, with 40 to 50 percent of those outings occurring in Fell's Point. He has a street performer's license and pays the taxes on the income he makes.

"I think everybody, once in their lifetime, deserves to see the rings of Saturn through a telescope, or the mountains and craters on the moon, or the moons of Jupiter," says Heyn. "I see these things as beautiful, and I want to share that beauty."

Beyond astronomy, Heyn dabbles in physical science in general.

"I'm a wannabe physicist," he says.

Wannabe or not, he made an interesting discovery about some of Baltimore's north-south running roads, such as Calvert St., Charles St., and Broadway.

"They look like they run north-south, but they don't," Heyn says. "They run 3 degrees west of true north."

Whenever he sets up his telescope, Heyn must align it with true north so that its tracking mechanism can follow the stars as

they move across the sky. The tracking function keeps the same stars and planets in view, even as the earth moves.

Some time ago, Heyn found that if he aligned the telescope 3 degrees off the above mentioned city streets, he would find true north. His theory, which he later proved, was that the streets were laid out to magnetic north, which is often not equivalent to true north. Magnetic north depends on the position of the fluid, magnetic material in

I think everybody, once in their lifetime, deserves to see the rings of Saturn through a telescope.

the earth's core, which "wanders arbitrarily" closer and farther from true north.

Sure enough, Heyn discovered that in 1730, when the streets were laid out, the magnetic compass read 3 degrees west of true north. He found the information in the Maryland Geological Society's library, in a paper that had been written on magnetism in Baltimore, which included a chart.

Now Heyn has written his own paper on the discovery, which is about to be published in the Journal of the History of Surveying.

Heyn notes that he temporarily "got out of" astronomy, soon after high school. He had lent all his books on the stars and planets to an acquaintance, who never returned them.

The Leonid Meteor Shower brought him back into the fold. Heyn remembers that he read about the Leonids as a teenager, and had hoped that that he would live to see them again. Sure enough, they came back in 1966. Heyn was married at the time, with children. He remembers reading about the meteors in the newspaper.

"Wow, I'm alive," he thought.

Since then, Heyn has been gazing at the stars with a vengeance.

"Everybody has some sort of interest," he says. "Some people fall in love with animals or trees or flowers—it was the stars for me."

Heyn still comes to Fell's Point regularly, but his 40-pound telescope gets heavy. He says that finding parking can be a hassle sometimes.

Heyn's friends are planning to hold a jubilee celebration to commemorate his 25 years in Fell's Point. Check the Guide's Community Calendar for details over the next weeks.



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- 2520)05/05/13(SUN)FPT(8:17-9:45PM). Gd. sky. Another cold wind night. Semi-quiet scene. PLW's #141. As usual, she did a great recruiting job! JUPITER(3+1+stripes. Great!) SATURN(Acq.9:07PM. Gd. image @ 80X. Lgts still intruding at 111X.) VISIT(Sataj?, a young India woman on a return visit. An enthusiastic looker! The Korean woman who took the photo of PLW & me that's on our website.) \$35.35 (\$24.05/hr.)
- 2521)05/15/13(WED)FPT(8:42-9:54PM). Delayed start due to clds. PLW's #142. PARKING(W/good assist from PLW!) SCENE(Semi-quiet, but getting busier.) AMERICA'S BEST RACING PROMOTIONS BUS(Parked foot of sq. Covered with colorful racing scenes, w/several flat screen TV's showing races. Staffed by 1/2-doz. college-age kids giving out lots of free stuff--drinking glasses, posters, racing goggles. Some looked thru scope.) 5d-MOON(Theophilus-Cyrrillus-Catharina. Lookers liked. Nice till clds. blotted it out.) HH(Feeling tired from several bike rides during day.) \$40.05 (\$33.33/hr.) 10-d bad weather hiatus.
- 2522)05/16/13(THU)FPT(9:25-10:47PM). Delayed start due to supper w/Sally & John at Cafe Hon... + clouds q's.) PLW's #143. PARK(The arv'd late, almost immediate, thanks to PLW's spotting a car leaving on other side of Sq.) WARM. Ok sky. Colimated on a Vir. 6-d MOON(Terrific!) SATURN(w/Titan. Some doubters, for whom I blk'd view w/ folder.) SCENE(Slow at first but gradually picking up. Lots of enthusiastic lookers. VISITS(German couple sightseeing up the E. Coast in an RV.) PLW(Roped in some last min. lookers with the line, "He said we couldn't go home until I got 1 more person to look thru the telescope!") \$39.00 (\$25.49/)
- 05/17/13 DRY RUN TO FPT with PLW. Accuweather predicted clear till midnight, but clouds came in early eve. and only got thicker. PLW very disappointed at not being able to add another "notch" to her gun. Left 6:15PM and got WT spot...last one went at 6:45PM.
- 2523)05/20/13(MON)FPT(7:50-9:47PM). Nice sky when I left home, but clds arrived shortly after setup. Did "sucker holes as long as I could, then gave up. Sky clear at home. Warm. Busy scene. PARK(At 7:28PM still 4 WT slots open!) PLW back in STL. 10-d MOON(Tycho. Good.) SATURN(Titan w/effort. Usual doubters.) OCCULARS(Compared 18mm ORTHO and 15MM RKE. Decided latter better for public...maybe has longer eye relief.) VISIT(A young man who was thrilled to find me having read about me in an ANDREW MCCARTHY writing. He even knew about Phyllis from McCarthy. PLW remembers him from +/-2yrs ago. I remember that after he left scope people were asking, "Did you know that was Andrew McCarthy?" Next day I Goggled him and discovered he'd been in +/-26 movies. Tomorrow will try to find his piece.) \$34.00(\$17.44/)
- 2524)05/21/13(TUE)FPT(8:25-10:57PM). Start delayed by clds, then clear. warm. PARK(18-mins of maneuvering, then gd apot on w.side sq.) Fairly busy scene. 11d-MOON(Tycho region at 133X. Really great. Lots of edge craters.) SATURN(133X. Titan. Doubters, but no adamant ones.) VISIT(Fellow astronomer, Leonard, who recently bought a 12" Dob. Sharon, Celia's friend who works at Adms. Cup.Arrived at end. Wanted to help me load car.) \$58.92 (\$23.29/hr.)
- 2525)05/22/13(WED)FPT(8:05-9:17PM). Nice sky late afternoon, then clds in west. Moon ok, so set-up. PARK(10-mins.) 12d-MOON(Tycho region still good. 80-133X.) SATURN(Trouble finding "by numbers". Need to check. dec gauge.) COLLIMATION(The lookers liked, Saturn looked sl. mushy to me. Collimated on a Vir.) APPROACHING STORM(Saw lightning in north. Packed up shortly thereafter. Rain began as I arv'd home.) VISIT(Jeff Rosen, house painter. Company is Advantage Pro. Expressed interest in buying astrophotos.) \$11.56(\$9.63/hr.) VISIT (Dan, once a wed. night dancer, now living in New Orleans.) HH(Tired.Badly in need of night off!
- 2526)05/25/13(SAT)FPT(8:44-11:22PM). A great night thanks to lots of lookers extremely moved by their views of both Saturn and the Moon. A young lady was brought to tears by Saturn, while a young man gave me an appreciative hug. HH(In VG form.) Cold wind...should of worn winter jacket. Great sky. PARK(Lucky...a close by metered slot within 1-min.) ALIGNMENT(Perfect, thanks to mag. compass.) COLLIMATION(VG). SATURN(133X. Titan + Casinni Div.) 15d-MOON(Arq. 10PM from side of Rec. Pier. Used 50X for full view. Limb craters impressive at 133X.) VISIT(Dmitry, a repeat looker. Russian. Maybe a scientist. Dancer Dan.) \$62.00 (\$23.48/) Prior to set up worried by 1/2-doz marauding kids on Sq. Happily, they disappeared before SU ICECREAM(Before setup finagled a second free small cup from Maggie Moo.)

TOTAL THIS PAGE = \$ 250.10

TOTAL THIS YEAR = \$1,296.00

- 2527)5/26/13(SUN...MEM. DAY EVE)FPT(8:43-10:24PM). Mild. Busy scene. PARK(Arv'd 7:30PM and got WF slot blocked by traffic cone.) ALIGNMENT(w/compass, but somewhat off.) SATURN (Early-on, parents w/young children. 5-ten yr. olds. I told them to tell their parents that \$1 contrib. would be appreciated. They returned w/\$5. They returned later to make sure Saturn was real! A frail, elderly woman with whom I worked very hard to see Sat. She was so excited when she did that she gave me a big hug. She was w/a group of five who only contribed \$1. A looker who was probably drugged up and was so obnoxiously adamant that S was a slide that he took back his \$1. 2nd time in 25-yrs. this has happened! Casinni Div. + Titan. Good view!) VISIT(Woman who revealed a big, clear Saturn tatoo on her right butt!) Adjourned to Mezze, to where I had directed a gp of lookers. I greeted bartender Shawn, who gave me white wine. We exchg'd Celia news.\$44.00(\$26.19/)
- 2528)05/30/13(THU)FPT(8:40-10:30PM). Warm. Grt. sky. PARK(Lucky...3rd slot E side Sq. But at home had to park around corner on Frisby and handtruck everything home. Hard work!)Very slow start but then busier.) ALIGNMT(Eyeballed, then ck'd w/compass. Perfect!) SATURN (133X, 166X & 222X. Maybe 133X best as it brightest.) HH(Dwelled on how difficult tele scoping can be and how much longer I can keep it up. One thing is that I've got to ease up on daytime activities if going to telescope that night. \$38.00 (\$31.35/hr.)
- 2529)05/31/13(FRI)FPT(8:40-11:33PM). Warm. Gd sky. PARK(17-mins till slot W-side Sq. Frisby again at home.) SATURN(Mostly 166X. Titan at 1-o'clock. Lots of astroued lookers. One adamant doubter. HH(In gd form but feeling a bit fatigued.) VISITS(Man who's heard Michael plug me on his Dan Rodricks interview and who was thrilled to have come across me.) 3-INNERCITY KIDS ON BIKES(Soon as I spotted them took most of \$\$ from hat. I gave them my best, friendly but serious school teacher intro to Saturn. After they looked, one of them put \$2 in hat!!) VISITS(Just lots of nice, friendly people.)\$105.79(\$36.73/)
- 2530)06/01/13(SAT)FPT(8:40-11:40PM). Pleasant. Gd. sky. PARK(Dumb lucky...instant W. Sq.!) ALIGNMENT(Eyeballed...perfect!) COLLIMATION(In immediate need due to some jolts scope received in car and at front door.) SCOPE(Dec. latch loosing grip. Must adjust now!) SATURN(Nice. 166X. Very few doubters tonight.) HH(Feeling down leaving home and for 1st half of stint. However, managed to rise to the occasion.) VISIT(One of last night's "inercity kids returned for 2 more Saturn stickers and Facts. Wow! Victoria, who used to lead FPT tours but who is now teaching school in Richmond.) \$120.69 (\$40.23/hr.!)
- 2531)06/04/13(TUE)FPT(8:44-10:44PM). Pleasant. Sl hazy sky. PARK(ok.) SCOPE(After cleaning and slight adjustment, dec. latch holding better.) SCENE(Fairly steady passersby flow.) SATURN(166X from start. Lots of doubters. Beside "If it looks fake it's in good focus," am saying, "If I were going to fake you out I wouldn't have to bring 75-lbs. of equipment down here, I could do it w/a toilet paper tube!" Many lookers spotted Titan on their own and asked about it.) PHOTOGRAPHING SATURN(Many try w/iPhones and either fail or get a fuzzy image, but tonight a young woman, Maggie, got a good one!)\$54.14(\$27.07/)
- 2532)06/05/13(WED)FPT(8:46-10:38PM). Persistent, cool wind...wished had brought beret. Ok scene. PARK(Discontinuing rpt. unless unusual.) SATURN(w/Titan. Lots of both doubting and appreciative lookers. 166X from start.) VISITS(Usual number of lookers who remember me from yrs. ago. 1/2-dozen young people from Australia. Young Indian descent woman who complained to PLW about her problem finding a Moslem, Indian marrigable man. Tonight was w/ a nice looking young man.) HH(In pretty good form...physical & mental.) \$51.52 (\$27.70/)
- ISS(10:23PM Moderately bright flyover. Joined in obsv'ing by young, intrigued couple.)
- 2533)06/08/13(SAT)FTP(8:56-11:08PM). Cloudless sky which some mistook for cloudy sky! Mild. PARK(Arv'd late after supper w/Herbert & Gloria at their new condo expecting big trouble but was dumbucky w/an immediate space being vacated by Irish music friend, Cathy, & fan JIM NICKEL(Long time astro friend & book seller died in Mar., bequeathing a huge no. of astro bks. to HAL. AM met HAL pres, Chris Todd, at J's hse and helped pick out blks. of interest to HAL mbrs.) SATURN(+ Titan. Usual mix of appreciators and doubters!) HH(At start was reeling a bit from v. long day w/o nap, which included visit to the Md. Accordion Club mtg. in Catonsville, gradually recovered. I seem to have great stamina which, hopefully, means I'm pretty healthy!) \$73.50 (\$33141/hr.) By 10:45PM crowd getting young

**Big traffic tie-up on way home which I had to

TOTAL THIS PAGE = \$ 487.64

circumvent.

TOTAL THIS YEAR = \$1,783.64

SATURN FACTS: Saturn is the sixth planet from the Sun, which it orbits in 29.4 years. It is nearly ten times larger than Earth and, after Jupiter, the second largest planet in our solar system. Encircled by bright rings, many consider Saturn the most beautiful of the eight planets. Saturn, Uranus and Neptune all have rings, but Saturn's are the most visible. In small telescopes we see two rings, but orbiting satellites see thousands of rings etc. Made of billions of water ice particles, while 170,000 miles wide, they are only a few yards thick. Saturn has about sixty moons, the largest of which, Titan, is bigger than the planet Mercury. Along with the rings, Titan is visible in even small telescopes. Right now scientists are learning more than ever about Saturn because the unmanned Cassini spacecraft is there sending back photographs and data about the ringed planet. For more information: <http://saturn.jpl.nasa.gov/home/index.cfm> www.nineplanets.org www.hermanheyn.com

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- 2534) 06/11/13 (TUE) FPT (8:56-10:05PM). Ok sky. Mild. Very slow scene. ALIGNMENT (Eyeballed... good.) SATURN (+ Titan) VISIT (Balloonman Charlie before set-up. Looks very good. Working HPL 7-d./week.) HH (All the lifting & hauling... hard work.) \$19.00 (\$16.52/hr.)
- 2535) 06/14/13 (FRI) FPT (8:30-11:04PM). PARK (27-mins. of stress. How I recover to then telescope is beyond me!) V. busy scene! Grt. sky. Sl. chilly. 6-d MOON (Mushy image at start. Afraid would need collimation for Saturn, but was fine. Later, Moon fine, too. No coll. req'd.) SATURN (+ Titan. Grt. image. A lot of doubters. HH (Not happy about going out, but once in action rose to the occasion.) \$81.49 (\$31.71/hr.) VISIT (Megan, the baker from whom Celia bought the cupcakes for me & Phyllis.)
- 2536) 06/15/13 (SAT) FPT (8:12-11:20PM) PARK (Arr'd 6:37PM aiming for WT slot but all taken. Drove around blk and had gd. luck. Per PLW's idea, sat on bench till 8PM reading The Nation and watching for metermaids.) 7-d MOON (Fine w/polarizer at 8:12PM. Great Moon... craters all a long terminator.) SATURN (Acq. 8:50PM. Titan above it. Tonight, more believers than doubters, but a really adamant young woman doubter.) VISIT (Judy Meyers of BFMS. Down for a show. We chatted before setup. She stopped by very briefly after show but didn't look. While setting up some Suburban Club types.) HH (In good form but really feeling the pressure to perform. Voice began cracking at one point. Could use a break!) \$150.43 (\$48.06/ Early evening lots of families with kids. *ie, 23 minutes before sunset... great hat plus!
- 2537) 06/21/13 (FRI) FPT (8:48-11:23PM). HH (Just a few hrs. off the Bolt Bus from NYC, where I was for daughter Eve's 50th party. Got a decent nap beforehand, so was ok.) PARK (18-mins. of stress.) Mild. Gd sky. Busy scene.) 13-d MOON (Near a "super Moon", meaning closest full moon of the year @ 221,691mi. Public very aware of this... how, I don't know. Tycho and rim craters @ 50X w/filter. Nice!) SATURN (+ Titan. Used photo alot, saying "You'll see something in scope not in photo"... meaning Titan.) VISITS (Frank & Thomas. We bussed together from the party. They on way to Seattle & Alaska. They witnessed a slightly crazy night than usual! Marybeth... a drunk or high woman from Alabama whose enthusiasm knew no bounds. Recruited lookers till I politely asked her to leave. CELIA & Mezze bartender, Shawn, she looked good and was her usual upbeat self. Got to meet F&T! \$65.00 (\$25.19/hr) F&T came down in a taxi and rode w/me back to the Colonade... I reimbursed taxi fare.
- 2538) 06/22/13 (SAT) FPT (8:55PM-12:18AM). PARK (2-mins. stress) Hazy sky. Busy scene. HH (Prob. not fully recovered from last night. Voice cracking at start, then great effort to sustain energy level required. Didn't get to bed till near 2AM, then a fitful sleep.) 14-d. MOON (A street astronomer's worst nightmare... a hazy full moon! Happily, as yet a few hrs. to full, some edge-wise rim craters below Tycho on which to focus. Tycho, itself, seeable. Showed lookers Moon photos to demonstrate why no craters when full... a draining effort. Also had to explain over and over the "super moon" phenomenon, which many lookers were aware of. That the wind was blowing my handouts around added insult to injury! All in all, one of my toughest ever stints!) SATURN (+ Titan. Since most lookers don't mind smallness, and since image is bright, tonight did 50% at 80X. Continually back & forth between Sat. and Moon.) MATCHMAKER SCOPE (Woman named Julie said that looking thru scope 3-yrs ago with the date, Jonathan, definitely lead 3-mos. ago to their marriage! Told her, "That makes my whole 25-years worthwhile!") MICHAEL ON DAN RODRICKS SHOW (People still coming along saying they heard me mentioned... now prob. 1/2-do. times.) VISIT (Family with whom I worked by e-mail to choose a star-naming co. for their deceased infant, Harrison. Gratefully contributed \$10. Mary Beth... the Alabama woman from last night. Not quite so high. Located B Cyg for her.) \$137.02 (\$40.54/hr... disappointing, given how hard stint was.) Ugh... lots of British coins not included in talley. PARK HOME (Nary a space on my blk nor Frisby. After asking some people standing in street to allow me, parked in 600blk E. 36th. First time!) VISIT (2nd in a yr. by woman named Lyra. Told her I have some stars named after me and wrote "hermans cross" on a sticker for her to Google.)
- 2539) 06/25/13 (TUE) FPT (8:47-9:45PM) Shut down by clds & distant lightning. Big storm at home, forcing me to lv. scope in car. Quiet scene. Warm/sticky. Gd sky till clds. SATURN (+ Titan. Very sharp at 133X.) VISIT (Satha & boyfriend. She looked very pretty!) \$35.77 (\$36.88/hr.) *Included a twenty and a five.

TOTAL THIS PAGE = \$ 488.71

TOTAL THIS YEAR = \$2,272.35

- 9 06/27/13(THU) DRY RUN TO FPT. Chan. 11's Tom Tasselmeier announced a tornado watch till 10PM, but with blue sky at 8:00PM, I headed down. Clouds assembling as I arrived, and it looked like no telescoping, for sure. Got a choc. snowball. While sitting on bench, Ted Rouse's wife came along, and we talked a bit about urban farming. Drizzling at home.
- 2540) 06/29/13(SAT) CHAS. VILLAGE, CORNER ST. PAUL & 32ND. Here because of iffy sky and not wanting another FPT "dry run". Also, as an easier stint, did not want to be bummed out tomorrow for PLW's arrival. (8:50-10:50PM) Shut down by clde., but traffic had visibly dwindled. HH(Not feeling great. Fighting "dizziness". Somewhat fatigued. Still, managed to perform ok.) Seeing only 3/5. PARK(No problem.) SATURN(+ Titan. Many enthusiasts. Not as many doubters as in FPT) VISIT(Roland Pk. M.S. girl very into Saturn mythology. Man who owns an IT company which is sponsoring a group of students participating in a Google contest to land a rover on Moon by 2014.) \$51.71 (\$25.86/hr.)
- 10 2541) 07/05/13(FRI) FPT(8:53-11:23PM). PLW's #144. PARK(PLW stationed herself in Sq. and after 15-min. lassoed a spot, holding off another contender for it.) Busy scene. Early haze, then ok sky. SATURN(Lots of at-first-glance-disbelievers. Also many appreciators. Ran out of "Saturn Facts". A 7-yr. old girl remarked, "The rings are made of water." VISITS (Young man who, 10 yrs. ago at age 12, looked at Jupiter in HPL and still has sticker. Was pleased to receive a Saturn one! A cousin of Jacob Glubakow, John's childhood art teacher.) HH(Hard work. Beginning to feel effects even after 1-hr.) \$85.97 (\$34.39/hr.)
- 9 2542) 07/06/13(SAT) FPT(8:50-11:13PM). PLW's #145. PARK(Instant!. Narrow slot between paid parking and ZIPCAR spaces. A big relief from what we were anticipating!!) Gd. sky. Warm. SATURN(At 135X. Usual reactions. Most saw Titan, meaning focus was gd.) SCENE(Looked slow at start but turned very busy.) VISITS(Anand, a STSci astronomer who attended Tuesday's mtg. where we were and was speaker at previous mtg. Newly weds who arrived too late last night returned, looked, and rec'd stickers to mark the occasion. +/-8 very lively and attractive young women here for a UCLA reunion. Got a photo of them lined up holding stickers, then another of me with them. Am really looking fwd to seeing them! 1/2-dozen smart intelligent-youngsters.) HH(A bit enervate after an hr. but then recovered...maybe thanks to a free choc. snowball from Pretzel Twist.) \$96.15 (\$40.23/hr.) SCOPE(Am worried collimation screws too loose. Want to do a makeover at earliest opportunity.)
- 2543) 07/08/13(MON) CHAS VILLAGE(9-10:13PM). PLW's #146. Decided on C.V. tonight having driven 206 mi. RT to Liberty Bellows in Phila. to buy a new, smaller accordion and feeling a bit worn out by the drive. PARK(As usual in C.V., instant.) Warm. Passing clde which sometimes interrupted view. Scene fairly busy at start w/lots of young people.) SATURN(Used only 80X, which worked real well. Gave a small but sharp, bright, very pretty image. Titan easy to see at "4:30".) VISITS(A 20-something female looker who said she'd never forget this experience as long as she liv'd. She returned a little later but we'd pack-up scope. Got a \$20 from a man with 5 12-yr. old boys in tow.) \$34.72 (\$30.99/hr.) VISITS(Manzar, Iranian woman w/art gallery on Pratt St. Suzzie the kimono sales lady.)
- 10 2544) 07/14/13(SUN) FPT(8:33-10:35PM). PLW's #147. PARK(Immediate, thanks to PLW's spotting car leaving WT slot and standing in it to hold it.) Warm. Gd. sky. 6-d MOON(Great. Lookers very impressed.) COLLIMATION(Poor Moon image but early lookers still impressed. Fixed ASAP!) SATURN(Switching from Moon discovered same problem. Fixed. Otherwise, mostly 80X but good even at 166X.) VISIT(STSci astro. Eileen Meyer, who is scheduled to give next month's Tues. talk. A woman who PLW says was so awestruck by Saturn she couldn't say anything.) \$63.80 (\$31.43/hr.)
- 9 2545) 07/15/13(MON) FPT(8:34-10:27PM) PLW's #148. PARK(Immed. WT.) Slow looking scene. Warm. Gd. sky. 7-d MOON(Great. Ibid.) SATURN(80X-136X-166X...all worked well. Many awestruck lookers.) COLLIMATION(Tightened all 3 screws, then only had to back off on 1. Am hoping will now be "permanent"!) VISITS(Lots of enthusiastic, interesting people, including a family from San Antonio who looked before and after supper.) \$43.00 (\$22.87/hr.)

TOTAL THIS PAGE = \$ 375.35

TOTAL THIS YEAR = \$2,647.70 (last yr. = \$2,399.03)

- 2546)07/16/13(TUE)FPT(8:23-10:13PM). PLW BACK TO STL. PARK(Immed. nr. Kiosk.)Slwo scene. Hot & sticky. Gd. sky. COLLIMATION(Seems to be holding ok.) 8-d MOON(Great. Sunrise on Copernicus beginning. Tycho good.) SATURN(80X, 136X. Very sharp. Titan difficult.) HR(Feeling a bit enervated...maybe the heat...maybe from last night.) \$44.78 (\$24.34/)* *Inclde. 2-\$10's and a \$5. VISIT(Kevin, who had a gorgeous photo of the "supermoon" taken w/his own camera. Asked me where he should go to photograph the Milky Way. Told him would look into it. Scoped ALBIREO for him. A tall, talkative young man wearing an American flag cape who said he was taking part in the local demonstrations protesting the Travon Martin-Zimmerman verdict. Gave him \$2 "for the cause".)
- 2547)07/17/13(WED)CHAS. VILLAGE(8:33-10:14PM). HR(In need of an easier stint than FPT.) Semi-quiet scene. Did very little recruiting or soliciting. Mostly student lookers. 9-d MOON (Fine!) SATURN(Titan straight above and brighter than in FPT.) \$22.30(\$13.25/)Lots nopay
- 2548)07/23/13(TUE)CHAS. VIL.(8:45-10:30PM). Comfortable temp. Semi-quiet scene. Minimal recruiting. Lots no-pays. ALIGNMENT(Per map, St. Paul runs 4° W of N. Tried using mag. compass but reading way off. Eyeballed. Perfect!) COLLIMATION(Holding nicely.) SKY(Slightly hazy, sl. unsteady.) SATURN(Mostly 136X. Titan a bit diminished by haze. Drew many gasps from women and "no way" from men.) 15-d.MOON(Spotted 10PM. Tycho + rim craters. Tee-riffic @ 50X!) PARK(Easy, both there & home.) \$27.54 (\$15.74/hr.) VISIT(Young man who does the staged science demos at the Md. Sc. Ctr. Waxed v. enthusiastic re his work.)
- 2549)07/25/13(THU)CHAS.VIL.(8:50-9:54PM). PARK(Easy.) SCENE(+/-busy.) SKY(Ok, till shut down by clds.) HH EYESIGHT (Discovered that Saturn is several magnitudes brighter thru my left eye than my right eye. Very surprised by discovery! Am thinking R eye has been messed up by many accidental glances at the sun with binocs. This also tells me that Sat.'s image will be pleasingly bright to lookers at 166X, while I've been assuming it was unpleasingly dim compared to 136X! WOW!!) SATURN(136X. Titan close below it, seen by all lookers but Barbara.) VISITS(TC Green, WIA pres. following Mike Franch! w/her son.Johnathan of Barage Band, who said band will play tmw. night, 7PM at "WAVEscape, to which I will be taking scope. Am considering joining band with my new accordion!)\$28.52(\$26.65/) VISIT(Jeff & Shelly Hettleman & son, Johnathan came by as was setting up.on way to supper at Tambers. Returned for looks after had shut down.)
- 2550)07/26/13(FRI)CHAS.VIL.(9:30-10:38PM...shut down by clds.). Began evening at "WAVEscape", a big community party in the Montpelier & 30th St. Park, where I intended to telescope. However, there were so many people, including many, many young kids, I decided it would be an impossible situation for me and decided to regroup and do C.V. On way there I was stopped at Greenmt. & 33rd by a passing parade of bicyclists.Spent 10-15 mins. watching in awe as 100's, if not 1000's of them sped by. They were participating in the city's monthly "Bike Parade". In C.V. a busier scene than previous nights. SATURN(Now that I know image is considerably brighter than I thought, used 166X throughout. Many women lookers gasp at sight of Saturn!) VISITS(Some "parade" bikers. Frank Pratkan, with whom I adjourned to the Chas. Vil. Pub for beer.) ALBIREO(Fell back to it after Saturn completely lost in clds.) \$31.93 \$28.26/hr.) VISIT(The very muscular, Chas. Vil. denizen who always has a soda in his hand. Surprisingly knowledgeable on astro! Left before looking. 3-days later I stopped to intriduce myself. Name is Mark. We had a nice chat about the expanding universe. I told him to be sure to look next time he sees my scope.)
- 2551)07/29/13(MON)FPT(8:30-10PM). Ok scene which gradually slowed down. Gd. sky. Warm. PARK (Instant along side sq.) ALIGNMENT(Way off, but managed to correct.) SATURN(Good.) VISIT(Tim Wheeler w/wife and family.) LEFT-RIGHT EYE BRIGHTNESS SURVEY(13 lookers, 8F+5 M, 10RH + 3LH, 8RE + 4LE + 1BE, re brightness...3LE + 2RE + 8BE. HANDEDNESS: 6R used R eye, 3R used L eye, 2L used R eye, 1L used L eye. Concl.: 8 of 13 saw brightness same in both eyes. 3 saw brighter in L eye and 2 in R eye. \$31.00 (\$20.67) Several no-pays at en

TOTAL THIS PAGE = \$ 186.07

TOTAL THIS YEAR = \$2,833.77

Telescope takes shape in 'clean

TELESCOPE, From page 1
 vehicle for space travel and exploration. It has been pitched since 1996 as a successor to the Hubble Space Telescope, but with the ability to give the farthest glimpses ever into the universe, just 100 million to 250 million years after the Big Bang.

"The same books that Hubble rewrote over the years, we're going to rewrite again," said Bill Ochs, the telescope's project manager at the NASA Goddard Space Flight Center, where key components are under construction inside the clean room. "Just like with Hubble, you're basically looking back in time. We'll be able to look at formation of the earliest stars and the first galaxies in the universe."

The clean room at Goddard, roughly a 100-foot cube, is where those eyes are being built, with collaboration from the Canadian and European space agencies and companies including Northrop Grumman Corp. Parts of the telescope have already crisscrossed the country, with remaining stops at the NASA Johnson Space Center in Houston and a Northrop facility in South California before launch.

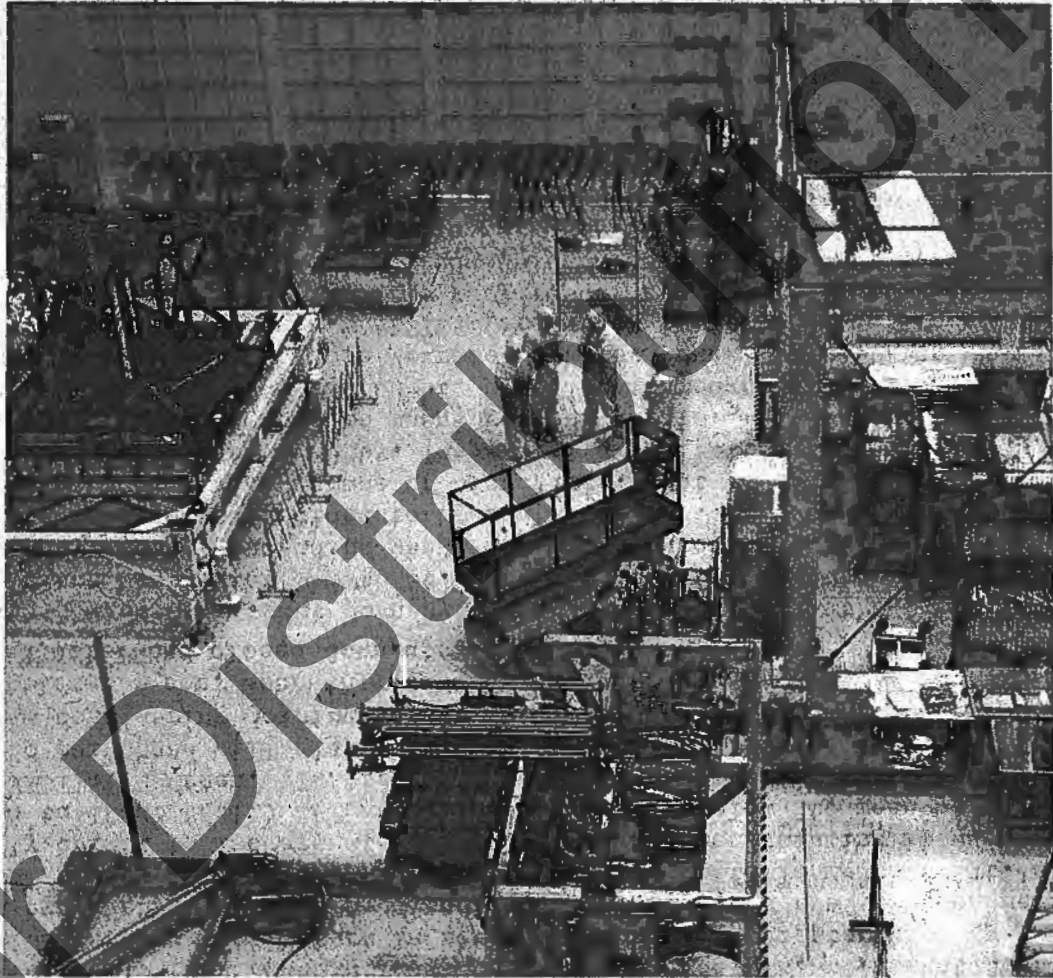
Recent work has focused on two of the telescope's four scientific instruments. The Mid-Infrared Instrument, or MIRI, is part camera, part spectrograph that will see in wavelengths longer than human eyes can to spot distant galaxies, newly forming stars and faintly visible comets. It will be responsible for capturing the next heavenly images that made Hubble so renowned.

The Fine Guidance Sensor, or FGS in NASA parlance, will guide the telescope's gaze using a built-in map of the stars to locate targets as much as 600 million years older than those Hubble can see.

For now, they look like the insides of massive television sets — the old cathode ray tube kind. But eventually, they will form the brains behind a three-story honeycomb-like array of 18 molded beryllium mirrors, coated in gold. Together they will sit atop a vast sun shield — about the size of a Boeing 737 airplane and made of six layers of a material similar to a Mylar balloon.

Until then, the cleanliness of the environment is paramount to ensuring those revolutionary images can be captured. The concern is not just degradation from dirt and dust, but also gases released by cleaning from cologne or makeup to latex and some rubbers that can implant on space-bound equipment and compromise their function.

Among the room's rules, outlined in a 37-page contamination control training guide that must be read by anyone who enters: No "regular" paper allowed, only special clean room paper that has been



This is an overview of one section of the Clean Room at the NASA Goddard Space Flight Center, where the telescope is being prepared to soar through Earth's atmosphere in 2018 en route to its home base nearly a million miles away.



Hubble vs. Webb

In Greenbelt, a clean room with strict rules allows the advanced telescopes. Here's a look at the new Webb telescope and the agency's existing Hubble satellite. Sizes and distances



HUBBLE SPACE TELESCOPE
 354 miles

Launch date: April 24, 1990
Cost: \$2.5 billion

Size: 43.5 feet long, 14 feet in diameter (about the size of a school bus)

Viewing distance: 400 million years to 800 million years after the Big Bang

Named for: American astronomer Edwin P. Hubble

WEBB SPACE TELESCOPE
 930,000 miles

Proposed Cost: \$8 billion

Size: 21-foot diameter (about the size of a school bus)

Viewing distance: 400 million years to 800 million years after the Big Bang

Named for: American astronomer Edwin P. Hubble

- 2552)07/30/13(TUE)CHAS. VILLAGE(8:40-10:12PM). Intended to do FPT but hesitated because of early eve. clds. When I finally decided to try it, was too late for FPT. Gd. sky. Warm but comfortable. Semi busy scene at start; very quiet at end. SATURN(+ Titan. Lots of surprised lookers.) BALTO. MAGAZINE "BEST OF BALTO." issue(Recv'd in mail from Tom Hess clipping saying, "Herman Heyn, the Fells Pt. Street corner Astronomer. Always a treat to look through his telescope and chat with someone who just wants to share his love of the stars." Chris Godsick, executive producer.) \$33.95 (\$22.19/hr.)
- 2553)08/14/13(WED)CHAS. VIL.(8:10-9:45PM). Cool...wore beret. Gd. sky. Semi-busy scene. LONG HIATUS!(Bad weather streak, plus recuperating from 7/31 bicycle accident which left me with very sore right rib cage. Only slight discomfort tonight.) 7-d MOON(Qt. Great. Sunrise on Plato.) SATURN(+ Titan. Lost behind bldg. 9:35PM...suggesting Saturn won't be do-able much longer from St.P& 32nd.) VISIT(Che w/wife + 2 young girls. On his Nikon Che had a great Milky Way photo taken in Me. which incl'd Herman's Cross! Pointed it out to him and asked him to look it up on my website. Said & fam, he being a student in my early 90's JHU evening course and who now work in MSEL. Neighbor Dominick & friend Tony on bikes Lots of enthusiastic lookers.) \$30.77 (\$19.47/hr.) HANDTRUCK (Now outfitted with Velcro strips to keep extension from flopping down on inclines. Will be a great help!)
- 2554)08/15/13(THU)CHAS.VIL.(7:57-10:02PM) Mild. Haze intermittent. Steady stream of lookers. 8-d MOON(Mostly 50X w/filter. Copernicus good.) SATURN(Clds, delay. Acq. 8:38PM. Lost behind bldg. 9:20PM.) ALBIREO(Toward end, as Moon v. hazy.) CLOSE DOWN(Tried at 9:30PM, but people kept coming. Recv'd a \$5 & \$10 contrib. Group of young men + 1 women engaged in a philosophical discussion nearby.) HH(In pretty gd. form.) \$T HOME(Met on sidewalk by Calvin Fields, to whom today I wrote a \$300.00 check to support his studies. Helped me unload, after which we had a nice talk at home over juice & beer.) \$55.76 (\$2681/hr.)
- 2555)08/16/13(FRI)FPT(9:05-10:58PM). PLW's #149 Start delayed by clds. Q's, but then gd. sky. PARK(Stressful. Spot finally lassoed by PLW.) SATURN(Spotted low at setup but then couldn't locate. Alignment?) 9-d MOON(Good! Sometimes 50X, sometimes 135X. For latter, showed pictures of Moon from a distance and up close saying "We're looking at it this way.") Lots of no-pays. VISIT(Seth, a nice young man from columbia studying galactic clusters at college in NH. Cindy Darnstead, Celia's good friend. First looker.) \$53.99 (\$28.61/hr.)
- 2556)08/24/13(SAT)CHAS.VIL.(8:17-10PM). Warm. Grt. sky. PLW's #150! SCOPE(Incredibly good. Perfect alignmnet. Perfect coll. on Saturn, then perfect re-coll. on Albireo.) SATURN (Unexpectedly! Held till 8:41PM.) ALBIREO(Some lookers seemed astounded by it. Touted it as a "heautiful double star".) HIATUS(Slight, due to 2-day vacation in Rehoboth.) HH (In v.g. shape. No prob. manhandling scope.) Very slow night. No pays. \$18.00(\$10.47/hr.)
- 2557)08/25/13(SAT)FPT(8:04-10:10PM). PLW's #151. PARK(WT slot). Somewhat hazy sky. Sl. slow scene which Kiosk guy attributed to tomorrow's schools opening. Setup E side of Sq. SATURN(Couldn't find...alignmt, lights, clds?) ARCTURUS(Not finding B CYG on 1st try, w/people waiting, went to it. Showed picture of its size relative Sun, spoke of it distance and brightness vs. Sun. Lookers seemed satisfied.) ALBIREO(BIG trouble finding!Clds may have contributed. Wore myself down polar aligning and leveling over and over again. Finally, aligned on Vega and shortly after found B CYG. at 9:01PM...wasting nearly 1hr.! As before, some aghast!) VISITS(The Roseman and wife from Jordan. They quietly sung as they waited for me to setup and while I searched for Saturn & B CGY. Finally showed them a BOO. Roseman gave two roses to PLW. Little Jay and his mother...lookers for Chas. Vil. Mother said Jay totally obsessed with scope and me and when I'm not out wants to go to my home! DEMETRIUS....a young, working class type young man who is totally into astronomy and is extremely knowledgeable.) \$24.12 (\$11.49/hr.) HH(Since returning from two good ocean swims at Rehoboth, I feel I can manhandle scope surprisingly well!)
- 2558)08/29/13(THU)CHAS.VIL.(8:30-9:02PM). PLW back in STL. Delayed start due to clds., then shut down by clds. V. little interest in scope. ALBIREO(1st try. Good collimation. Feel I'm talking it up real well.) PARKING(extra mile due to circling blk. several times be-lot opened.) VISIT(Angie. Awed by recent pink Moonrise. When told her about my photo asked if she could buy print for boyfriend. Told her to email me.) \$4.55 (\$8.58/hr.)

TOTAL THIS PAGE = \$ 225.17

TOTAL THIS YEAR = \$3,058.94

- 2559) 08/30/13 (FRI) FPT (8:20-11PM). PARK (Instant! Made quick left turn down 1-way north side of B'way into a slot just being vacated. By luck, 1st car coming up was a taxi which would not have grabbed slot before me!) Threatening clds leaving home, but then v.g. sky. Cool wind at start, then warm. HH (A bit bummed out from having spent 3-hrs. in dentists chair having lower front bridge installed... a \$5,000 job!) ALIGNMENT (Compass not working right. Am thinking is due to steel cotterpin now on tripod. Need to find a non-mag one. Otherwise, perfect by eyeballing B'way!) ALBIREO (On 1st try. Not as many aghast lookers as usual. Gave out lots of "FACTS".) VISIT (Ken, a young, intelligent, merchant marine electrician who hung out talking for a long time.) \$36.41 (\$13.64/hr.)
- 2560) 09/02/13 (MON...LABOR DAY) FPT (8:05-9:38PM). PARK (WT...which remained wide open for another br.!) Warm & humid. SCENE (Looked decent upon arrival but then got v. slow.) ALBIREO (Gd. eyeball alignment.) VISIT (Ekhart...briefly.) \$9.79 (\$6.32/hr.)
- 2561) 09/06/13 (FRI) FPT (8-10:55PM). PARK (Quick at meter slot.) Cool (long slv. shirt & trousers. Semi slow scene which improved. Good sky. ALBIREO (As always.) VISITS (Ken, from a week ago. Handed him the Albireo lamination and let him do some recruiting. Steve Lampredi with friends.) MISSILE LAUNCH! (The Lunar Atmosphere and Dust Environment Explorer, or LADEE, was launched from Wallops Is. at 11:27PM. Lots of looker had heard about it and asked how to see it. I recommended end of B'way pier, where I was for it. Came off on time, a surprisingly bright, pike flare-like light, which dimmed over the course of a minute and disappeared. Other, but none of my inquiring looker present.) \$43.00 (\$14.74/)
- 2562) 09/10/13 (TUE) FPT (8:43-9:25PM). Late start due to procrastination. Clouds in west, plus felt lathargic. W/PLW's encouragement, finally went. First tried Chas. Vil., but 5-d Moon too low. Hot & sticky. Accompanied at start by 3-piece jazz grp. Loud, but not very good, except attracted a lot of attention in slow scene. ALIGNMENT (Excellent, maybe thanks to new, non-magnetic cotterpin in tripod strut which allowed me to again use mag. compass.) 5-d. MOON (Theophilus, Cyrillus, Catharina: impressive!) ALBIREO (1X. Acq. 1st try.) PARKING AT HOME (Rarely can park on 36th St., and need to go to Frisby, where it may also becoming difficult!) \$7.00 (\$10.00/hr.) HH (Once I get myself moving, I can still deal with all the lifting/hauling and staying upbeat w/lookers, but is very hard work!)
- 2563) 09/11/13 (WED) FPT (8:05-10:02PM). Gd. sky, but very hot/humid. Slow scene. 6-d MOON (No special craters, but an awesome spread of them. Lookers impressed.) MOLLIE (1st time have ever done this. Arrived with a group of Israelis. She gave me a big hello, how long have I seen you here, etc. I did my best w/her 5 visitors. She then put a crinkled up bill in my hat and left. Picked up bill thinking it was \$5, but was a \$1. She must have crinkled it to hide the denomination! I was incensed! When she a group passed by 1/2-hr. later I called her over and, as diplomatically said I didn't think a \$1 contrib was adequate for the size of her group, whereupon she nervously agreed and came up with another \$6.00. Again, this was a first...first time I've complained an rec'vd an add'l contrib.!) TAPORA (A pretty young lady who asked one after another physics type q's, like how far does Earth's gravity extend; OR IF THE Moon is not that much smaller than the Earth, how come it has only 1/6th the gravity, etc. Amazing! She said she was not a scientist, just a curious person. Gave her my City Paper and speed of light handouts.) TOM PADWA and Wife, Joanne. They'd been at Wallops Is. for moon rocket launch, as their daughter had an experiment on board.) HH (In good form.) BUSTER (The local FPT handyman, who's been around since my day #1 and calls me "Bill Nye, the Science Guy". Weaseled \$5 out of me!) \$29.13 (\$14.94/WWW.LASTWORD ON NOTHING (Ann Finkbiner's site, which now carries her write up of me and which seems to have "legs", as is supposed to be on the blog Slate on Friday!)
- 2564) 09/14/13 (SAT) FPT (7:34-10:45PM). Grt. sky. Cool...wore trousers, sleeveless sweater, cotton jacket, beret. PARK (Tho arv'd 7:20PM, 1 WC slot open! At home prk'd in front hse!!) Busy scene. 9-d MOON (Tycho region...mainly @ 133X. Lookers wowed!) VISITS (Tucky Sweitzer, Peabody concert goer. In FPT to theater usher. Ed Johnson, from anti-war days, w/friend Stacy.) All in all, a gd night, except had some slow times. \$64.51 (\$20.29/hr.)

TOTAL THIS PAGE = \$ 189.84
 TOTAL THIS YEAR = \$3,258.78

2565)09/16/13(MON)GHAS.VIL.(7:38-10:10PM). Gd. sky. Mild. OK scene. HH(Again, didn't feel like going out, but prospect of a slow night at home combined with a great 11-d Moon rising, literally forced me to start loading the car!) 11-d MOON(Excellent. 80X w/Moon filter centered on Tycho region.) VISITS(Nice Catonsville couple who I sit with Sat. mornings at Frm's Mkt. UT, a JHU, computer sc. sophomore who has a 4" scope and was totally fascinated with what I was doing.) ALBIREO(For UT.) LOTS of no-pays. \$24.75 (\$9.74/hr.)

2566)09/17/13(TUE)C.V.(7:33-9:40PM). Grt. sky. Chilly. Ok scene. Had to park up by University Mart and wheel stuff to corner.) ALIGNMENT(Perfect by eyeballing brick sidewalk joint.) 12-d MOON(1½ days to full. Tycho + rim craters. Still awesome for lookers. Using full Moon photo to explain view. Telling the Tycho story...that he died before telescope, never knew about craters on the Moon nor that anything on the Moon would be named for him! Feel like am doing an excellent job intriducing the Moon to lookers!) VISIT(Katerina, a JHU M.E. student from Brazil. Would love to be an astro major and was fascinated by what I'm doing.) \$34.62 (\$16.18/hr.)

2567)09/19/13(THU)FPT(7:46-9:16PM). Grt. sky. Mild. V. slow scene. 5-min. wait to park. 14-d MOON(Rising beautifully down Thames St. as I was parking. Setup W. side of Sq., but Moon in trees for a few mins yet. 13-hrs. past full. Craters coming into view beyond M. Crisiu Began w/50X but then used 80X, shifting back & forth between Tycho region and rim craters HH(Feeling a bit depressed...maybe partly because I don't like doing a full MOON.) VISIT(Nicolas, who owns Herbalife store on Eastern Ave. and who is a frequent looker.) JIM PICKETT'S & MY 1990 FPT FESTIVAL POSTER!(Adjourned to Bopp Pizza where I was surprised to find it framed and on the wall near the door. Looks great! Will tell Jim.)\$23.04(\$15.36/) ALIGNMENT(Good, with magnetic compass.)

2568)10/14/13(MON)CHASVIL(6:52-9:04PM). 25-DAYS HIATUS(10d visiting Thomas/Cocky in Chicago, the 7d w/PLW in STL, then 10d clouds, + 2d couldn't make myself go.) GRT sky. 10-d MOON (Tycho region...again! Lookers liked. A few times Jura Mts.) URANUS(Wanted badly to do it but couldn't find.) HH(Ok physically, but a bit bored.) VISIT(Dan from Kinkos. Kevin, who works in city hall and says has looked for years.) \$37.59 (\$17.09/hr.)

2568)10/18/13(FRI)FPT(7:22-10:56PM. Cool.Gd. sky. PARK(Arv'd 6:40PM to find 3-WT slots open.) PENUMBRAL LUNAR ECLIPSE(Max. at 7:51PM. Lots of lookers aware of and wanted to see it, but was too faint to see. Explained situtation with downloaded diagram of eclipse.) 14-d MOON(Full. "Hunters' Moon". Used photos to show difference between full and less than full Moon. Mostly 50X w/filter, however I think can use further filtering!) ALBIREO(1X.) URANUS!(Thanks to aligning w/mag. compass acq'd after a few tries. Put up TONIGHT URANUS HAV-A-LOOKand gave out stickers. Lookers not very impressed w/view and went back to Moon. Need not to have competition when doing Uranus!) VISIT(Woman who has Uranus sticker in her scrapbook!). HH(With both the eclipse and full Moon, this was an extremely challenging stint due to all the explaining required. Kept up enthusiasm level, but it was tough going!) MOVIE 2001(With Tycho my full Moon main feature, I ask lookers if they've seen the movie. Disappointly, most don't know of it,while a few have a vague recollection of it. This makes my work even harder!) \$82.50 (\$23.17/hr....a \$20 + 2X \$5's)

10/26/13(SAT) DRY RUN TO CHAS. VIL. ACCU WEATHER showed clds. moving in mid-eve., but I guess I didn't believe them and put scope on porch to cool down. As time to leave got closer, I went into my terrible "should I, or shouldn't I" routine. After 1½ hrs. of it, decided to go. Just as I arrived in Chas. Vil., the predicted clds moved in. Hgd even moved stuff to corner...that's how quick it happened! ACCORDION(Have thought that if I play hooky from telescoping to accordionize, I can't concentrate fully on my music! FINGERLESS GLOVES(Thought left house with 2 of them, but when I got home had 1 fingerless and 1 black leather. Drove back to Chas. Vil., but didn't find it. Also went in to 7-11 where I'd bought a Tastycake. No luck. Maybe believing I had 2 was a hallucination! An all-around BAD night!!

TOTAL THIS PAGE = \$ 202.50

TOTAL THIS YEAR = \$3,451.28

he can see the man fighting in it. This made moon, and he asked the price. When I said 'One penny,' he says, 'I won't get a penny, but here's three halfpence, if that's the same to you;' and he gives it, and when I expected he was about to peep, he turns round and says, 'I'll be smothered if I'm going to look down that gallows long chimney! You've got your money, and that's all your business.' So you see there are some people who are quite indifferent to scientific exhibitions.

"There are, to the best of my knowledge, about four men besides myself, going about with telescopes. I don't know of any more. Of these there's only one of any account. I've seen through them all, so I may safely say it. I consider mine the best in London at present. Mine is a very expensive instrument. Everything depends upon the object-glass. There's glasses on some which have been thrown aside as valueless, and may have been bought for two or three pounds.

"The capital required to start a telescope in the streets all depends upon the quantity of the object-glass, from 8*l.* to 50*l.* for the object-glass alone.

"Nobody, who is not acquainted with telescopes, knows the value of object-glasses. I've known this offer to be made—that the object-glass should be placed in one sack and gold in the other to weigh it down, but then they wouldn't. The rough glass in Birmingham—before it is worked—any 12 inches in diameter, will cost 96*l.* China at Birmingham, is the principal maker of the crown and flint for optical purposes. The Swiss used formerly to be the only makers of optical metal of any account, and now Birmingham has knocked them out of the field, indeed they have got the Swiss working for them at Chaux-de-Fonds.

"You may take a couple of plates of rough glass to persons ignorant of their value, and he would think one shilling dear for them for they only look like the bits you see in the streets to let light through the pavement. These glasses are half flint and half crown, the flint for the concave, and the crown for the convex side. Their beauty consists in their pure metal and quite transparent and unstungy. Under the high magnifying power we use you see this directly, and it makes object smudgy and distorts the vision.

"After getting the rough metal it has to be years to finish the object-glass. They are done so correctly, that if the lens is destroyed 100th part of an inch out its value is destroyed. The well-known object-glass which was shown in the Great Exhibition of 1851, was Mr. Rose's banis (of Featherstone-bank, Holborn) for four years before it was finished. It was very good, and done him great credit. He is supposed to have lost by the job, for price is all eat up by wages pretty near.

"The observatory on Wandsworth-

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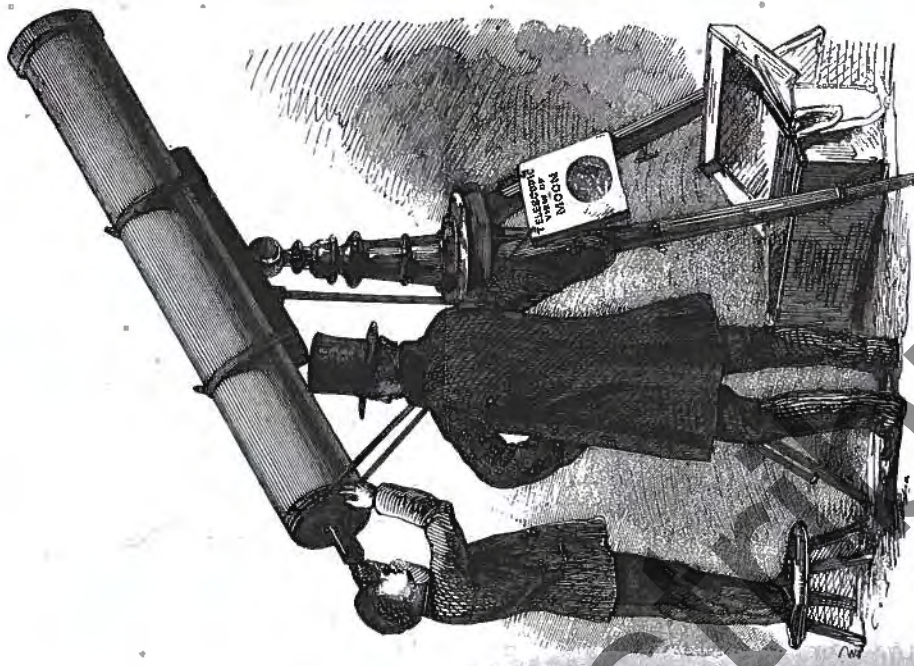
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"The observatory on Wandsworth-



STREET TELESCOPE EXHIBITOR.

[From a Photograph.]

2569) 11/01/13 (FRI) CHASVIL. (7:27-9:10PM). V. mild, dewy. Gd. sky, then shut down by patchy clds from south. Semi-slow scene. ALIGNMENT (Mag. compass seemed unreliable, so eyeballed bricks. Took 32-mins. to acq. Uranus. Read 1° low.) URANUS (Is an unmistakable small blue-green dot at 80X. Must remember that! Explained by showing lookers my Rense planets drawing, explaining Uranus looks this big (Mercury) but is this color (Uranus image). Most lookers appreciated view! Small star noticed by lookers S of U, but too bright for Titania's mag. 13.5. Gave out stickers/facts.) HH (In ok shape.) VISIT (Scott, JHU researcher. Helped me load car.) \$16.13 (\$9.22/)

11/03/13 (SUN) FELS PT (1:30-2:30PM) VENUS IN THE DAYTIME.... FAILED TO FIND IT! Tried and tried and tried! Finally decided to give it up and go home... maybe first time something like this has happened! Too bad, because I was attracting a lot of interest. Had position for a BOO, but was too demoralized to go for it. Also, scope's dec latch in bad need of attention at home. AT HOME DOUBLE CHECKED MY MTT FOR VENUS AND DISCOVERED WAS TWO HOURS OFF. I HAD 1:15PM WHEN IT SHOULD HAVE BEEN 3PM!!!! Stuff still in car and thought about going back, but was too demoralized. Beside, wanted to work on dec. latch which, I hope, is ok now. No contributions, therefore no stint #.

10/30/13 KAREN DUNNAM'S EXPLANATION OF HER COMMITMENT TO ORGANIZING AND CALLING DANCES: "The thing I do best, and the best thing I do." I think this characterizes my commitment over the years to my "street" telescoping.

2570) 11/08/13 (FRI) FPT (7:17-10:05PM). Gd sky. Cold... wore winter garb). PARK (WT) ALIGN (mag. compass... pretty good, not perfect.) LEVEL (Many adjustments... wasting a lot of time. Will try different bubble.) BATTERY (Taking an inordinate time to charge. Why?) HH (Felt physically good. Had plenty of enthusiasm!) SCENE (Slow at start, then OK. Picking up as I was leaving.) JUPITER (At home hi in NE @ 10:45PM. Probably could of scoped in FPT.) 5-d MOON (Theophilus-Cyrillus-Catharina... lookers very impressed. Ran out of "facts". Lost 9:40PM). URANUS (Acq'd 8:40PM when Moon eclipsed by street light. Acq'd again when Moon set. Lookers pleased. First showed Rense picture.) VISITS (Doc Hurley, who worked for HPL during my case and remembered it well. Deborah from the WIA) URANUS (Gave out stickers/facts.) \$60.35 (\$21.55/hr.) CITY PAP. BLURB--1 mention.

2571) 11/09/13 (SAT) FPT (7:25-11:59PM). Chilly, and had forgotten longjohns, so legs cold. BIG NIGHT! BILL SHUBRIDGE INTERVIEW (UMBC prof working w/his class on interviews of people in neighborhoods to be effected by coming Red Line rapid transit. On-line rpt. of clds. tonight, so was there strictly for interview, I thought. However in course of interview clds. disappeared and, as scope fully set-up, started having lookers! 1/2-do. students for interview, w/lights, video camera, sound recording system. Q's about me, what changes I've seen in FPT over the years, and the potential impact of the Red Line... about which, having paid little attn. to it, I had little to say. Interview lasted +/-10-mins.) SCENE (Slow at start but v. busy toward end!) LEVEL (Used old one, which made effort a lot easier!) BATTERY (Chg'd in normal time, happily!) ALIGN (Eye-ball. Good.) 6-d MOON (Used only 50X. Good choice, as beautiful, whole Moon image! Lookers awed, w/only 1 req. to make it "closer".) JUPITER... A SURPRISE APPEARANCE! (Moon set 10:23PM, and while preparing for Uranus spotted it rising over roof in NE. Is in GEM. As is easy to point out, had lots of lookers. Delayed by lookers 3-times as was trying to leave. Even w/no "facts" nor stickers, J worked well!) POLICE EXCITEMENT (Cop on bike pulled over cab, pointed gun at driver, cuffed him and had him sit on street. Offense was cab was parked at fire plug, and as cop was writing tkt cab tried to speed away.) VISITS (David Hunter, director of Spitzer telescope project. Ekhart, who having seen my CP blurh, expressed great surprise at my age! Shelly, a JHU grad std doing "extra-galactic" studies. Eris, a school teacher who's like to bake me cookies for my 26th yr.) HH (In good form throughout... somehow!) \$115.84! (\$25.40/hr.) HH's TRAFFIC STOP! (Went thru stop sign on Old York Rd. Suddenly, flashing lights behind me. License check and let go with a "Be more careful from now on," warning. Lucky!)

TOTAL THIS PAGE = \$ 192.32

TOTAL THIS YEAR = \$3,643.60

<http://eclipse.gsfc.nasa.gov/eclipse.html>

Penumbral
Saros 117

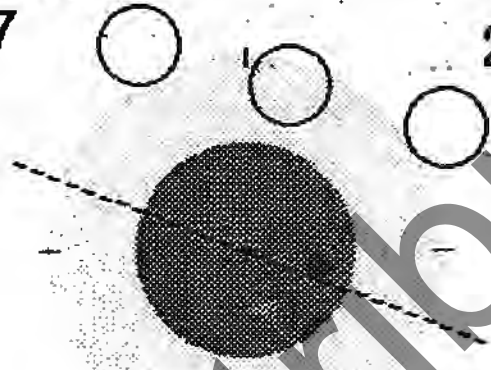
2013 Oct 18

23:51 TD

7:51 PM EDT

MR = 6:12PM
SS = 6:24PM

Hunter's Moon
Blood Moon
Sanguine Moon

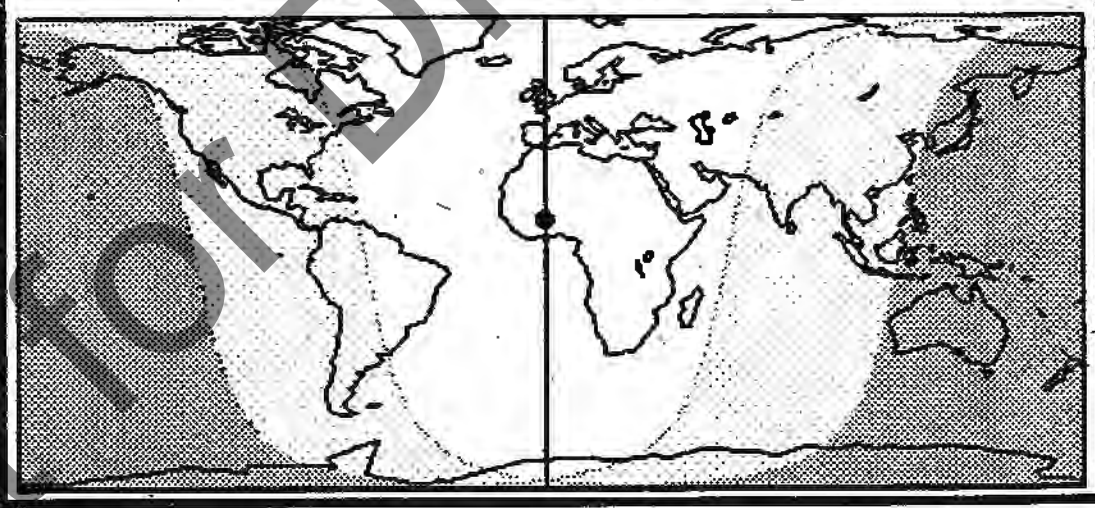


Pen. = 239m

U.Mag. = -0.2718

Gam. = 1.1508

P.Mag. = 0.7649



Five Millennium Canon of Lunar Eclipses (Espenak & Meeus)

NASA TP-2009-214172

October 18

is a relatively deep penumbral eclipse with a magnitude of 0.7649. It shows

of the Moon. The times of the major phases are listed below.

11/12/13(MON) Though I didn't telescope, today marks the end of my 26th year on the "street", which began 11/13/1987. In the absence of my best friend, Phyllis Weber, might take myself to a new bar in Hampden to celebrate. TOTAL STINTS SUMMARY Over 26 years have telescoped on the "street" 2,571 times. Total "hat" contributions = \$172,226.91, averaging \$6,624.11/year, 98.9 stints/year, and \$66.98/stint. (PLW has done 151 stints with me.) Assuming around 3-looks per \$1 contributed, I've given 516,581 looks! (My cumulative, year-to-year data can be found in the back of my "Fells Point" folder.) Over the years contributions per average stint have dropped from between \$70 to \$80 down to \$51.28 for my 26th year. It reflects my switch from Harbor-place back to Fells Pt. and Charles Village, as well as my putting in shorter hours. My health, enthusiasm, and stamina seem to be holding up, so I am looking forward to the start of my 27th year. Borrowing Karen Dunnam's description of her organizing and calling folk dances in Michigan, "It's the thing I do best, and the best thing I do." Next month I turn 83.

2572)11/14/13(THU)CHARLES VILLAGE(7:02-9:20PM) FIRST STINT OF MY 27TH YEAR! Intended to go to FPT but imagined a bleak scene so went to CV. Fairly busy scene, but it took 1/2-hr. for me to have a paying looker to make it an official, numbered stint. For a while was worried about a bomb out! Gd. sky. Semi-mild. 11-d MOON(Tycho region @ 80X. 134-mi wide Schikard making an awesome entrance! Lookers impressed.) URANUS(For Phil Lambdin. 35° hi. Later couldn't find at all, then later still @ +1° hi. I like doing Uranus!) VISITS(Phil Lambdin, a looker friend from 26 yrs. ago who I invited to visit. Scott Williams, a PhD biomed engineer who stops by regularly. Got a good Moon photo! Selwyn, from FARMERS MKT.Ethiopian stand. Jay, Algebra Proj. teacher.) HH(Even tho a semi-slow night, feeling ok.) \$30.21 (\$13.13/hr.)

11/18/13(MON) DRY RUN TO FELLS PT. Mild, blue-sky day + "clear" forecast for tonight. De-on FPT over C.V. figuring 15-d MOON would be doable sooner. Parked in WC slot and moved everything to Square. Moon ready to scope, but as scene was so slow couldn't get myself to setup. Would have been 1 passerby maybe every 10-mins! Also, a pretty stiff wind was building. Returned equip. to car and returned home. Actually, after packing up and putting car back in WC slot, walked down to The Point to see if Cindy bartending, but place closed.

2573)11/21/13(THU) CHAS. VIL.(7:03-7:47PM). Overcast, cool. INTERVIEW BY MELISSA GERR (503-527-8100) OF THE JEWISH TIMES FOR A 24-HOURS OF ACTIVITIES BY JEWS IN BALTIMORE. Art. to run end of Dec. Setup scope just as on a regular night. HH(Felt good, and felt good about the interview, during which photos were taken.) PARKING (Easy in CV, but at 8:05PM back home had to park around corner.) As recv'd some contributions during interview, am counting it as a numbered stint! \$4.00 (\$5.48/hr.)

TOTAL THIS PAGE = \$ 34.21

TOTAL THIS YEAR = \$3,677.81

TOTAL STINTS = 73

AVG./STINT = \$50.38

(awb) SC EXPENSES -- 2013

| | | |
|------------|---|----------|
| 01/11/13 | SP 5-photos of Fells Pt. Water Taxi parking space (CVS) | \$ 1.45 |
| 01/13/13 | SP 1-FPT parking photo (CVS) | \$ 0.31 |
| 01/19/13 | SP 3-sides SC handouts (JHU) | \$ 0.18 |
| 01/15/13 | POST mail letter to Water Taxi | \$ 0.90 |
| 01/21/13 | STA 2-pks handwarmers (CVS) | \$ 2.10 |
| 01/24/13 | SP 2-FPT parking photos (CVS) | \$ 0.62 |
| 01/24/13 | SP 1-colors copy of letter/photos to Water Taxi (Kinkos) | \$ 0.60 |
| 01/24/13 | POST mail letter w/photos to WT | \$ 0.45 |
| 01/11 & 24 | MILES 2 RT's to FPT for parking photos | \$ |
| 01/26/13 | STA bike repair (Twenty20Cycling Co.) | \$ 4.43 |
| 03/02/13 | SP 3-photoprints Comet Panstarrs data (CVS) | \$ 0.93 |
| 03/02/13 | SP 2-Panstarrs photocopies (JHU) | \$ 0.12 |
| 03/10/13 | SP SC handouts (Kinkos) | \$ 1.05 |
| 03/20/13 | SP SC handouts (4) (JHU) | \$ 0.24 |
| 03/29/13 | EQUIP new battery charger (Home Depot) | \$ 21.17 |
| 04/06/13 | SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 04/09/13 | SP FPT parking | \$ 1.00 |
| 04/09/13 | SP tip to car parker guy who returned my handtruck...my leaving it in the street! | \$ 5. |
| 04/15/13 | SUBS Physics Today + EOS (JHU membership-1 yr.) Cr. cd. | \$ 35.00 |
| 04/20/13 | SB Sc handouts (JHU) 10ea. | \$ 0.60 |
| 04/23/13 | SP FPT parking | \$ 1.00 |
| 04/26/13 | STA 1,200 post-it notes for "I Saw...." stickers (Dawns) (= \$0.0125/ea.) | \$ 15.00 |
| 04/26/13 | SP 13-sides SC handouts (JHU) | \$ 0.78 |
| 04/27/13 | SP FPT parking | \$ 0.75 |
| 05/02/13 | SP FPT parking | \$ 0.50 |
| 05/04/13 | SP 2-sides SC handouts (JHU) | \$ 0.12 |
| 05/04/13 | SP FPT parking | \$ 0.25 |
| 05/17/13 | SP SC handouts 16ea (JHU) | \$ 0.96 |
| 05/20/13 | MEMBR 1-year HAL membership (Ck # 1302) | \$ 25.00 |
| 05/22/13 | SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 05/26/13 | SP 4-sides SC handouts (JHU) | \$ 0.24 |
| 05/31/13 | SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 06/01/13 | SP 4-sides SC handouts (JHU) | \$ 0.24 |
| 06/01/13 | SP contribution to FPT flautist strest performer | \$ 1.00 |
| 06/10/13 | SP SC handouts 4ea (JHU) | \$ 0.24 |
| 06/11/13 | SP 7-sides SC handouts (JHU) | \$ 0.42 |
| 06/15/13 | SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 06/12/13 | SP FPT parking | \$ 0.50 |
| 06/26/13 | SP 8-sides SC handouts (JHU) | \$ 0.48 |
| 06/29/13 | FEES (ck#1323) Misc. Tax & Lic. Unit, renew St. Perform Lic. thru 6/30/14 | \$ 25.00 |
| 07/06/13 | SP 18-sides SC handouts (JHU) | \$ 1.08 |
| 07/13/13 | SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 07/15/13 | SP 8-sides SC handouts (JHU) | \$ 0.48 |
| 07/22/13 | SP 4-sides SC handouts (JHU) | \$ 0.24 |
| 07/26/13 | SP 20-sides SC handouts (JH) | \$ 1.20 |
| 07/31/13 | STA Post-it notes (1,200 x 2 = 2,400 = \$0.00528/ea.) | \$ 12.67 |
| 08/02/13 | STA Velcro strips for handtruck (Falkenhan's HRWE) | \$ 2.64 |
| 08/15/13 | SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 08/17/13 | SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 08/25/13 | SP 4-sides SC handouts (JHU) | \$ 0.24 |
| 08/29/13 | SP 8-sides SC handouts (JHU) | \$ 0.48 |
| 09/01/13 | SP 6-sides SC handouts (JHU) | \$ 0.36 |

PAGE = \$171.63

| | | | |
|----------|-------|---|-----------------|
| 09/06/13 | SP | FPT parking | \$ 0.50 |
| 09/09/13 | STA | 2-non-magnetic cotter pins (Falkenhan's Hdwe) | \$ 0.64 |
| 09/11/13 | SP | FPT parking | \$ 0.50 |
| 09/12/13 | SP | 3-sides SC handouts (JHU) | \$ 0.18 |
| 09/15/13 | SP | 8-sides SC handouts (JHU) | \$ 0.48 |
| 09/17/13 | SP | 10-sides SC handouts (JHU) | \$ 0.60 |
| 09/18/13 | SP | 8-sides sc handouts (JHU) | \$ 0.48 |
| 09/19/13 | SP | FPT parking | 1.00 |
| 10/05/13 | SP | 8-sides SC handouts (JHU) | \$ 0.48 |
| 10/15/13 | SP | 6-sides SChandouts (JHU) | \$ 0.6 |
| 10/20/13 | EQUIP | 25% trans Moon filter (Orion) | \$ 24.99 |
| 11/02/13 | SP | SC handouts 6ea. (JHU) | \$ 0.36 |
| 11/03/13 | SP | FPT afternoon parking...1:23-3:01PM (13 quarters) | \$ 3.25 |
| 11/08/13 | SP | 18-sides SC handouts (JHU) | \$ 1.08 |
| 11/10/13 | SP | 15-sides SC handouts (JHU) | \$ 0.90 |
| 11/18/13 | SP | 7-sides SC handouts (JHU) | \$ 0.42 |
| 12/11/13 | BOOKS | 1-OBSERVER'S HANDBOOK 2014 (Sky & Telescope) | \$ 37.90 |
| | | PAGE = | \$ 74.12 |

SUMMARY

| | <u>PAGE 1</u> | <u>PAGE 2</u> | <u>YEAR</u> |
|--------------|-------------------|-----------------|-----------------|
| SP | \$ 27.26 | \$ 10.59 | \$ 37.85 |
| POST | 1.35 | --- | 1.35 |
| STA | 36.85 | 0.64 | 37.49 |
| EQUIP | 21.17 | 24.99 | 46.16 |
| SUBS | 35.00 | --- | 35.00 |
| FEES | 50.00 | --- | 50.00 |
| BOOKS | --- | 37.90 | 39.90 |
| TOTAL | = \$171.63 | \$ 74.12 | \$247.75 |

2014

Not for Distribution

- 2574) 01/12/14(SUN)CHAS. VILLAGE(6:05-7:37PM). Thanks to weather, travel and holidays, first stint since 11/21/13. Lo 40'sF. Good sky. To acq. Jupiter right away, set up on SE corner of St. Paul & 32nd, it would have been blocked for 1/2-hr. on NE corner. SCENE(Fairly steady foot traffic at start, but almost none by finish. TRIPOD(Lowered it to make eyepiece more accessible. Was then way off level, but scope tracked ok, nevertheless.) JUPITER(3+1. Stripes. Lookers appreciated.) 13-d MOON(Too fuzzy due to heat from bldg.) HH(Can still do it! Physically & mentally in good form. Enjoyed being "on stage"!)
- 01/19/14(SUN...eve of MLK holiday) CURIOSITY RUN TO FPT. V. clear, low 40's, but couldn't get myself to load scope, so went to see what I was missing! Not a bleak scene. Noticeable no. of passerby. Bars crowded. Might have been a worthwhile stint. Stopped by River Drive for a free beer, but Cindy not there.
- 2575) 02/19/14(TUE) CHAS.VIL.(6:34-7PM). Late afternoon conditions "go". 47°F. However, at the moment of setup a strong cold wind arrived, scattering handouts into street. They were recovered by a girl who was waiting to look. Fairly busy scene, but stint cut short by wind. (PLW'S #152) JUPITER(4 on right, but moderate seeing + wind shaking scope.) SNOW & ICE! (Remaining from last wk's big storm. Had to shovel path to load car and traverse ice when unloading. Car parked in shoveled space "reserved" by traffic cone at home.) HH(A bit of left hip arthritis noticed. Unsure how this will manifest when scoping regularly.) \$7.00(\$16.28/hr.) SCOPE(Worked good!) HARD WORK!
- 2576) 02/21/14(SAT) FIELDS POINT(7:25-10:05PM). Cool, clear. PARK(Last watertaxi slot!) SCENE (Busy!). (PLW'S #153). JUPITER(1+3. Most lookers enthusiastic!) M42(For myself, but then several other lookers before returning to J.) SCOPE(Good.) HH(Top of my game! No arthritis) VISITS(Cpl. from Chas.Town, wife being an Eng. dancer. We did a "balance & swing"! Cpl. who rembr'd us from Chipolte corner. Lots of nice people!)\$100.70(\$37.88/hr.) We adjourned to Bopp for Pizzas.
- 2577) 03/10/14(MON)CHAS. VIL.(7:24-10:07PM DST). Good sky, low 50'sF. Fairly busy scene. On Chapolte corner. PARKING(Far end of blk, meaning had to handtruck everything at once to spot.) 9d-MOON with JUPITER to its upper right, making it easy to swing scope back and forth. Lots of enthusiastic lookers...*/-5 \$5 contribs. Gave out lots of stickers & "FACTS". HH(Hard work, but stayed enthusiastic throughout.) VISITS(Mike, bike rider who used to live on 35th St. Bill, a fellow Eddies coffee drinker.)\$74.15 (\$27.26/hr.)
- 03/15/14(SAT) DRY RUN TO FPT. Got parked ok, only to discover was St. Patrick's Day in FPT, with kids in green shirts ranging all of the place. Thought if I could telescope it would be a great money night, but decided that discretion is the better part of valor and headed to Charles Village. Would have been an extremely challenging night in FPT!
- 2578) 03/15/14(SAT)Chas. Vil.(7:24-9:50PM) Great sky. 50'sF, with cool wind at first. Moderately busy scene, but pretty steady stream of lookers. First lookers were 1/2-dozen very little kids...no fun. FULL MOON(Did only for the little kids. Otherwise, none of my adults asked to see it.) JUPITER(2+2, then 1+2. Stripes, Lots of very appreciative lookers! Gave out lots of stickers and FACTS.) HH(In good form...able to maintain enthusiasm. Manhandling scope ok.) VISITS(Tim Ward, who helped out with the little kids. Chris Eberhardt, who watched scopewhile I went for coat in car.) \$57.13 (\$23.52/hr.) VISIT(STSci Brazilian working on exoplanets, who was very excited to find me.) Lots of photos taken of me w/telescope.
- 2579) 03/21/14(FRI)FPT(7:55-10:25PM). Grt.sky. Dampish 40's. Semi-busy scene. PARK(Between WT and ZIPCAR, but too close to WT parker to open his door. Put sign in my window saying am in Sq. Driver came over mid-eve. complaining couldn't get into car. Said, "That's why I put sign in car!" He cooperated, and was able to take his slot.) JUPITER(1+3+4.5mag.star + easy. "stripes"...magnifique! Lookers wonderfully surprised by sight!) HH(Hi energy...very turned on by Jupiter!) VISITS(Adam, a cop who remembered me from +/-1990 and was pleased to see me again. Laurie DeWitt & friend Joe.) SOMETHING NEW (Guy w/black pig who solicited tips from people who petted it!)\$81.91 (\$31.75/hr.)

TOTAL THIS PAGE = \$347.46

TOTAL THIS YEAR = \$347.46

ENCORE.org

THE PURPOSE PRIZE
2014 NARRATIVE APPLICATION
Submitted Feb. 4, 2014

I applied but didn't receive (of course!) the prize, but this is a good narrative. HH

I USE LIBRARY COMPUTERS, DO NOT HAVE FILES, SO AM EMAILING PDF's.

HEYNERMAN2014PRIZE

Q1. Applicant Information

Name: HERMAN M. HEYN

Title: BALTIMORE'S STREET CORNER ASTRONOMER

Organization: SELF

Website: www.hermanheyn.com

Q2. PROJECT SUMMARY

Calling myself "Baltimore's Street Corner Astronomer", I set up my 8-inch astronomical telescope on street corners in downtown Baltimore, Md. and invite passersby to HAV-A-LOOK! (my trademark slogan) at a variety of celestial wonders--my main ones being the Moon with its awesome craters, Jupiter and its Galilean moons, and Saturn's incredible rings. Astronomy has been a serious interest since junior high school, so while at the eyepiece I can give my viewers accurate information about what they are seeing. So they don't leave with only a fading retinal image, I give each viewer a sticker with an image of what they saw. To viewers who are especially intrigued I give a short facts sheet. For children, beside facts sheets, I have a planets mnemonic, and for science teachers instructional materials. There are other "street" astronomers out there, but I believe I have raised the educational side of it to a new level. There is also an entertainment^{factor} present. Often I am told, "This is the best thing I've done tonight (sometimes, "in Baltimore!!)." As to my street telescope's significance, I'll let some of my viewers speak via comments they've sent to my website.

"Herman Heyn, the Fells Point street-corner astronomer. Always a treat to look through his telescope and chat with someone who just wants to share his love of the stars." Chris Godsick

"Our last few hours in Charles Village, and we spot one of the coolest Baltimore residents ever--The Street Corner Astronomer. Got to see the rings of Saturn. Always hoped to run into him one day." Cory Cone

"Even today, I can't stop thinking about the moon, Venus and Saturn you shared with us last night. What a wonderful, unexpected experience."Christine, 4/6/12

"Thank you for showing us Uranus. Our son Joseph is still talking about how now he's seen all the planets except Neptune." Mike Arida

"Have stopped by your telescope a number of times, but this was the first time with my kids. It's terrific what you're doing. Hopefully you've inspired some kids (not to mention adults) to take up stargazing." Gary Silverstein

ENCORE.org

THE PURPOSE PRIZE
2014 NARRATIVE APPLICATION
Submitted: Feb. 4, 2014
HEYNERMAN2014PRIZE

Heyn | Across the Universe

<http://acrosstheuniverseinnotime.com/tar/ym/>Tags: [Amateur astronomy](#), [Astronomy](#), [Herman](#), [Heyn](#), [Inner Harbor](#)[1 Comment](#)[Q2. PROJECT SUMMARY \(Continuation of viewers' comments\)](#)[Blog at WordPress.com](#). [The Mystique Theme](#).

Blog Archives

Finding beauty and purpose in the cosmos

The Street Corner Astronomer

JUN 27

Posted by [Tim](#)

A couple weeks ago I had a very pleasant surprise while visiting my soccer bar in Baltimore's Inner Harbor. I was at Slahte watching the United State's first World Cup 2014 qualifier match and upon leaving I saw something I did not expect. A blue Schmidt-Cassegrain telescope on a fork mount was set up right on the brick steps of the south end of Broadway Square! I immediately told my friend and his brother that I'd meet them back at his house to play some FIFA but I absolutely had to check out this display. The telescope was an 8" SCT and was owned by a man named Herman Heyn. Herman is an elderly man who brings his scope out on weekends whenever the weather is clear. He goes by the name of "Baltimore's Street Corner Astronomer" and has been setting up his telescopes in Baltimore since 1987! He is rather well-known among Fells Point regulars and residents by his blue SCT scope with the words "HAV-A-LOOK" printed on the side of the optical tube. Herman delights in letting people peer into his scope and see sights such as Saturn, Jupiter, the moon, Venus, the Pleiades, and some of the Messier open clusters. Most of the passerby are intrigued by the telescope having never had the experience before. While talking with Herman, I watched about ten people look into the scope and they all had the typical wow-factor reaction. The object of the night's observation was Saturn and the awestruck visitors were simply delighted to have seen Saturn for the first time in their lives! However, for every believer there is a doubter. Several people passing by tried to convince me it was a fake and that we were just looking at a picture of Saturn taped over the aperture. Those poor people. They've yet to experience the joy of gazing at a beautiful ringed planet almost one billion miles away.

While talking to Herman about our shared interest in astronomy I found out that he'd been interested in the subject since the 8th grade when his science teacher taught an astronomy lesson. I quickly developed a respect and admiration for Herman and his devotion to spreading the word about astronomy. His desire to spread his passion to random people is admirable and I wish there were more people like him in our hobby!

After taking a quick peek at Saturn at about 130x I dropped the remaining couple dollars from my wallet into his donations hat and regrettably had to leave. I spent about 20 minutes talking with Herman and I left very encouraged by the encounter! I hope to go down to Fells Point again very soon and hopefully HAV-ANOTHER-LOOK! Check out Herman's website at [hermanheyn.com \(http://www.hermanheyn.com/\)](http://www.hermanheyn.com/)!

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THE PURPOSE PRIZE 2014 NARRATIVE APPLICATION

Submitted Feb. 4, 2014

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HEYNERMAN2014PRIZE

93. YOUR ENCORE STORY

After decades of bouncing vocationally from pillar to post, on November 13, 1987, at age 56, I discovered my life's true calling--street corner telescoping. Astronomy was a serious interest since Miss Wicker's 8th grade general science class. However, due to an undiagnosed learning problem, I was unable to do college level work and win an astronomy degree, but it remained a serious hobby. Over the years I've had numerous photographs and articles published in Astronomy and Sky & Telescope magazines. (Google me for a wider view of my astro accomplishments.) My main telescopic activities were to entertain family and friends and, with an astro slide show, to visit schools. My motivation was to share my knowledge of the subject and, especially, to share my love of the night sky with others. Impulsively, on the above date, with Jupiter and the Moon prominent in an amazingly clear evening sky, I decided to try something new--take my telescope to a downtown street corner and invite passersby to look through it. It was a great success! Viewers were saying, "If you had a hat (ie. a street performer's "hat") we'd tip you." Next night I returned with a "hat" and collected \$42.50. That night my life dramatically changed for the better! I was working at a low paying, substitute teaching job but realized that if I street telescoped with a "hat" a lot more often, I had a way out! Not only that, as I soon discovered, that, combining my astronomy expertise with a new found ability to meet and greet the public, I was REALLY good at it! A few years later my Social Security retirement check began arriving, nicely supplementing my telescoping income. Along the way, I won a 4-year long legal battle with Baltimore City for the right to take my telescope to Harborplace, the city's premier tourist attraction. Now at age 83, in excellent health (am still able to lift my 36-lb. telescope onto its tripod!), by actual count having been on the street 2,574 times, I intend to keep it going as long as I can. In terms of addressing a social problem, I like to believe I am doing my part to address our country's well documented science illiteracy problem. Many of my viewers are innercity youths, and I am sure seeing the Moon's craters or Saturn's rings is a mind-expanding experience for them. the proof being that some put money in my "hat".

Page 3. The Purpose Prize 2014 Narrative Application

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THE PURPOSE PRIZE 2014 NARRATIVE APPLICATION

Submitted Feb. 4, 2014

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HEYNERMAN2014PRIZE

Q4. THE FUTURE, FOR YOU AND FOR YOUR ENCORE WORK

Halley's comet returns in 2061 and is predicted to put on a much better show than it did in 1986.* I am now 83 years old and will be 131 years when the famous comet returns. Nevertheless, I have every intention of staying around to see it a second time! In the meantime, I would like to keep my street telescope going for at least the next 3-5 years. As my 33-year old instrument continues to work well, except for a few new eyepieces I will not be spending much Purpose Prize money on it. In terms of taking my work to the next level, I think I can say I am already there. So long as passers-by continue stopping at my telescope, my Encore work (which began November 13, 1987) will be sustained. If Purpose Prize money does come my way, I will use the bulk of it to establish scholarships in Baltimore high schools for graduating seniors intending to pursue a science degree in college. I will start at my old high school, Baltimore City College. That will be the next phase of my social innovation, the first being the lasting effect my street telescope has had on some of its viewers.** Thank you for the opportunity to apply for the 2014 Purpose Prize!

*My Comet Halley photograph of 3/23/1986 and the newly named star formation (ie., asterism) it begot are on my website. Click on HERMAN'S CROSS.

**One of my favorite stories is the woman school teacher who, after looking through my telescope, bought her own telescope and eventually became one of the leading lights of the local astronomy club.

STREET CORNER TELESCOPE LOG -- 2014

- 2580) 03/22/14(SAT)FPT(7:37-10:45PM). Good sky. Cool. Busy scene! PARK(WT. For insurance, left home 6:05PM.) JUPITER(1+3, then 0+3 stripes. Background star...maybe mag. 6.5. J not as magnificent as last night.) LINE OF LOOKERS(Unending for 1st hour!) M42(For astroenthusiast woman, Sam.) HH(Not fully recovered, so not as hi-energy as last night.) VISITS(Astroenthusiast, Sam. Very hyped by astronomy and by what I do. A "groupie" I didn't realize I had! Dance Patty and daughter, Crystal. Sharon from 34th St.) HH(Required extra effort to sustain enthusiasm.) \$101.08 (\$32.29/hr.)
- 2581) 04/29/14(WED)CHAS. VIL.(7:35-9:30PM). Gd. sky. Mid-50's w/wind chill. PARK(1st spot. At home, neighbor George made room for me.) 10-d MOON(Both lookers and me impressed!) Jupiter(1+3+stripes. Sharp!) MARS(Opposition yesterday. 57M miles, 5-mins light. In Virgo. Spotted thru tree before 8:50PM acquisition. Small orange-red disc w/no detail, but lookers liked. Needs collimation & magnification. Gave out stickers reading "HARBORPLACE I saw...MARS! AT ITS 2005-06 OPPOSITION BALTIMORE, MARYLAND". Somehow I'd colored Mars orange! SCOPE(Battery prob. Not tracking. Ugh! Need to fix now!) VISITS (Debra Evans & husband, Lee. Briget, an 86-yr. old Irish woman thrilled by 1st ever look thru a scope. Crossed herself when looking at Moon.) HH(Hard work, but even after a strenuous bike ride and a short nap was able to do it, making me think I'm not sick!) \$28.31 (\$14.74/hr.) **Made "the sign of the Cross."
- 2582) 04/10/14(THU)C.V.(7:48-8:32). Cool but calm leaving home, but arriving at corner encountered a very strong, cold wind. Debated whether to set up. Did, but wind continued, I was not having fun, images were vibrating, seeing poor, so I packed it in early. JUPITER(Very nice early, then marginal. 1+3, then 1+2. Lookers ok w/it. 11-d MOON (Good, then moderately sharp.) TRACTING(Today at Bainesville discovered charger ok but battery dead. Bought new one, so had tracting back tonight.) \$8.00 (\$10.96/hr.)
- 2583) 04/12/14(SAT)FPT(7:20-10:45PM). Pirate Festival! Very busy scene, with Square filled w/vendors' tents and lots of people in pirate costumes. Sl. hazy sky at start, then gd. PARKING(Arv'd 6:35PM and got last WC slot...right next to a copy car! Worried cop would make me move or even give me a tkt. I opened hatch and stood there trying to act like I belonged there. Soon cop returned, paid no attention to me, sat in her car for a while and left. Was a LONG 25 mins! Was very relieved when 7PM arrived, at which point I began setting up. BATTERY(Conked out 10:35PM. VERY worrisome. Back home appears to be taking a recharge.) 12-d MOON(Tycho & rim craters. Lookers impressed.) JUPITER(2+2, the 1+2. Stripes. J now only 64% of dia. at Dec.'s opposition.) MARS(Spotted 8:20PM, shortly before it passed behind tower. Orangish, size of hole punch, slight shading. Tried for a while with sign, but was inferior to Moon and J. Gave it up, saying was not much to see in scope.) HH(In good form.) VISIT(Man whose paid job is standing in line at Supreme Ct. holding a spot of reporters. Is an employee of a line standing co. I told him "and I thought I had an unusual job!" Duncan, son of Yavonne...RIP, from yrs. ago.) TUESDAY MORNING'S LUNAR ECLIPSE(Many lookers said they heard there was to be a "blood moon", referring to the eclipse. I told them best looking time 2:30-3:30AM.) \$104.70 (\$30.61/hr.) Gave out lots of stickers & "facts".
- 2584) 04/19/14(SAT)FPT(8:15-10:35PM). PARK(WT). SCENE(Busy, then moderately so.) CLOUDS(Sky gray late afternoon but for a change, instead of using that as an excuse not to go, decided to take a change it would clear. It never cleared completely but thinned enough that Jupiter w/moons was doable. Still, at times was a bit touch & go!) JUPITER(3+1+ stripes. Many lookers exclaimed, "That's beautiful!" Gave out lots of stickers/facts.) VISIT(As a couple was walking by, the man turned and excitedly asked, "Is that a 2080?" referring to my telescope. I said, "Sure is!" Turns out they are avid telescopists from Orefield, Pa. and are great fans of Cherry Hill Park's dark skies, which they urged me to visit.) HH(In good shape all around.) \$42.43 (\$18.18/hr.)

TOTAL THIS PAGE = \$ 284.52

TOTAL THIS YEAR = \$ 631.98*

*Last yr. this time = \$581.11. 2012 this time = \$1,120.68.

04/20/14(SUN) DRY RUN TO CHAS.VIL. Good sky but intense wind. Remembering #2582,

- 2585) 04/21/14 (MON) C.V. (8:14-9:50PM). Good forecast but gathering clds. late afternoon. Went for it on hunch clds would dissolve, which they did. Mid-50's F. Moderately busy scene. HH (Dragging slightly, but put on a good show.) JUPITER (Amazing sight.....like I've never seen it before! 3 moons in a short, straight line, very close together, just off J's east limb! Europa missing. Lookers really liked. HH aghast!) MARS (Tried it several times. Finely focused at 220X I could definitely see the N polar cap. However only a few lookers could get a good enough focus to see it. I was pleasantly surprised at seeing it!) COLLIMATION (Happily, after messing with it Sat. night and thinking I'd screwed it up badly, it was fine on both J and M.) \$52.93 (\$32.83/hr.) (Incl'd a \$20, \$10, and \$5.)
- 2586) 04/24/14 (THU) C.V. (8:09-9:54PM). Clds. dissolved at sunset to a grt. sky. 50's F. PLW's #152. VISIT (Christina Jimenez, Linda Kovach's granddaughter, a graduating senior at JHU. With CJ's camera PLW took out picture, which CJ will send to Linda. Linda Heyn Kovach and I have been email and, occasionally, telephone friends for +/- 10 yrs., her having spotted my letter in EOS and contacted me wondering if we're relatives....which we're not.) JUPITER (2+2+stripes. Very nice.) Lost J at 9:32 and went to MARS. N. polar cap easy at 220X. Discovered (I think!) that my focus same as everybody's, making Mars a lot easier to deal with. \$31.38 (\$17.73/hr.)
- 2587) 04/27/14 (SUN) FPT (8:08-10:23PM). Having returned from Harry Kay's Bar Mitzvah week-end in DC. PLW's #153. Mid-50's. OK sky. We were discovered by Errol Webber and Eric, two "cinematographers" traveling around filming people composing haikus. They were totally hyped at finding us. Both PLW and I spoke haikus for them as instructed and prompted by them. In the midst of this, along came an actress, Diana Wilde, who gave them a great performance! JUPITER (0+4. Stripes a bit difficult.) MARS (When in sharp focus, N polar cap and albedo features easy, but focus difficult for some lookers.) VISIT (Woman from NL here for a global health conf. but didn't know Eve. Woman who saw Uranus thru scope and remembered it well. Otherwise, many interesting lookers.) \$73.33 (\$32.55/hr.)
- 2588) 05/04/14 (SUN) FPT (7:57-9:50PM). Having returned this afternoon by bus from a 3-d visit to Eve & Family in Brooklyn. PLW's #154. Mid-50's w/wind chill. Adverse w. rpt and late afternoon clds. Might not have gone had not PLW insisted! Gd. sky. 5-d MOON w/Jupiter 5° north. (Great craters. Lookers awed!). JUPITER 1+3. VG. With 3 moons in a fairly straight line a looker asked if J was next to ORI's belt...a first! MARS (Once, but not good enough to offer.) VISIT (Dimitry, a regular. Helped moving stuff to curb.) HH (In good form, despite arguing w/PLW on drive down.) \$42.00 (\$22.34/hr.)
- 2589) 05/06/14 (TUE) FPT (8:07-10:30PM). Mild. Grt. sky. PLW's #155. Quiet scene but steady stream of lookers. 7-d MOON (Good craters. Lookers wow'd!) JUPITER (3+1+stripes. Lookers impressed.) MARS (220X. Polar cap...sort of.) SATURN! (Acq'd 10:10PM. 80X and 220X. Having anticipated it for a while, finally seeing it gave me a deja vu feeling!) VISITS (Daughter of William Furman who, I believe, was at Park Sch. w/me. Mark A. Zondlo, engineering prof at Princeton who took a lot of interest in what we were doing. Told PLW what we were doing was remarkable and more important to young people than sitting in a classroom. Explained to HH why global warming at poles more rapid than mid-lats. Contributed \$10.) HH (In peak form...even after a strenuous walk w/Jim & Debbie from Belvedere Sq. to Chloe's house to visit Chloe and Thea & husband Mark.) \$75.00 (\$31.51/hr.) MORE (1/2-doz. threatening-looking young men on dirt bikes came to scope. All appreciated their looks. One, Aaron, was especially interested and had a lot of astro knowledge. Works at Hardroc Cafe. A woman who had a Mars sticker in her wallet and said she had lots more at home. Gave her several more! Also gave stickers to people to whom I pointed out Jupiter/Mars in sky w/o their looking thru scope. PLW finagled a free ice cream from Maggie Moos. Finally, a petite young woman opera singer. Studied at U. Pitt. To my Q. said doesn't need to know languages but just memorize lines...and then forget them! Studied at U. Pitt.)

TOTAL THIS PAGE = \$274.64

TOTAL THIS YEAR = \$906.62

HISTORY OF SCIENCE

He saw the light before anyone else did

Danish astronomer was first to gauge its speed

BY MARK WESTON

The man who first measured the speed of light died 300 years ago this week. That's right, 300 years. By the time Einstein published his Special Theory of Relativity in 1905, the speed of light — that's the C in $E=MC^2$ — was old news.

A Danish astronomer, Ole Romer, figured out how to calculate it in 1676, using just a telescope and a clock.

In the 1630s, Galileo had tried and failed to measure the speed of light as it traveled from one mountain to another. Light took less than $1/20,000,000$ th of a second to move between the two peaks that he chose, and no clock was even remotely accurate enough to measure that tiny duration. Galileo was baffled. Light seemed to have no speed at all, but to be instant.

Forty years later, Romer was invited to France to work at the Royal Academy of Science, where he taught physics to the eldest son of King Louis XIV. Soon after he arrived, French as-



PHOTO RESEARCHERS/ALAMY

Ole Romer used only a telescope and a clock to make his estimate.

bits of the planets for decades and knew the ratios of the distances between them. Once they knew the distance from Earth to Mars, they could calculate the distances to other planets. They also estimated the distance between Earth and the sun, which today we know to be nearly 93 million miles.

Meanwhile Romer, with the king's financial help, built a telescope 10 feet long. He liked to watch Jupiter, with its brown and white stripes, and Io, the

tra $3\frac{1}{4}$ minutes to move around Jupiter, so that after half a year it seemed to take 22 minutes longer to orbit Jupiter than it had taken before.

Then Io appeared to regain speed. Every month, for six straight months, Io appeared to take about $3\frac{1}{4}$ minutes less to orbit Jupiter, so that after half a year, Io's orbit seemed to have shortened by 22 minutes. The amount of time Io took to orbit Jupiter now seemed the same as it had been a year before.

both planets orbited the sun. When Jupiter and Earth were on opposite sides of the sun, light from Jupiter — and its moons — needed more time to reach Earth. When Io seemed to take 22 minutes longer to orbit Jupiter, it was because light was traveling the extra distance to Romer's telescope.

Romer knew that Earth was roughly 90 million miles from the sun, making its orbit about 180 million miles in diameter. That was the extra distance the light had to travel when Earth and Jupiter were on opposite sides of the sun. When the Royal Academy published Romer's findings in December 1676, it divided this distance by 22 minutes, and estimated the speed of light to be 130,000 miles a second, an inconceivably high velocity.

In fact, light travels even faster than Romer thought.

Within 30 years of Romer's discovery, astronomers with lighter telescopes determined that light crosses Earth's orbit in only $16\frac{1}{4}$ minutes, not 22, at a speed of more than 186,000 miles a second. They didn't change Romer's method of calculation; they just had better data to feed into it. Romer returned home to Copenhagen to marry, to be his

- 2590)05/08/14(THU)FPT(8:09-10:40PM). Mild. Gd. sky. PLW's #156. Fairly quiet scene. 9-d MOON(Copernicus just beyond sunrise. Impressive!) JUPITER(Only 1+1. Stripes. Loosing impact as moving farther away and lower over Adm. Fell Inn.) MARS(Pointed out often, but did not scope.) SATURN(Acq. 10:12PM. 136X. Orange background from street light. Gave out "I Saw....SATURN FPT" stickers.) VISITS(As he left work Mason, Kiosk workers, gave PLW a bag of pretzels and hotdogs. Couple from Relay, Md. who knew of telescopist Mike Hall. Woman from Wed. night contra dance. Couple staying at A.F. Inn who saw Moon earlier and returned later for Saturn.) HH(Feeling a bit tired.) \$58.87 (\$23.39/hr.)
- 2591)05/11/14(SUN)FPT(7:57-10:36PM). Mild. Grt. sky. PLW back in STL. Quiet scene but steady traffic. THE FELL'S POINTER(1st night after an "Under the Stars" cartoon of me in the May ed. No sponaneous comments however, when asked, Maggie Moos owner said he saw it.) 12-d MOON(Tycho and rim craters. 50X & 80X. I told a little girl looker that she might visit the Moon and we'd look at her thru my telescope, whereupon she said, "I'd like to take a field trip to ^{outer} space!") JUPITER(Surprised by 0+4 moons array. Nice!) MARS(Pointed out but didn't scope.) SATURN(Acq. 9:32PM. A bit murky due to lowness, but lookers liked.) HD162826(A sunlike star which supposedly formed from same gas cloud as Sun. Was asked about, has has been publicized. Public under impression is a "new sun" in our solar system!) VISITS(Denny Kisner, a young, Glen Burnie barber. Very impressed but a doubter. Returned several times trying to decide. Left believing! 1/2-dozen young Black men doubters. Became believers after I scoped Under Armour sign!) \$55.52 (\$20.95/hr.)
- 2592)05/16/14(FRI)FPT(8:32-10:15PM). Chilly. Fair sky. SCENE(Pre-Preakness night. Busy, but expected out-of-town lookers not in evidence.) HH(Not up to par. Maybe because being fooled by weather rpt. and not able to get late afternoon nap.) JUPITER(1+3. Planet looking ever smaller. Tried 136X, but seeing not good enough. Art. in Sun saying GRS in late 1800's 25,000 mi. wide but now only 10,000 mi.) SATURN(Acq. 9:15PM. Clouded out 9:45PM.) MARS(Briefly, after Saturn. No features.) Shut down by clds. Adjourned to Stuggies for a not so gd^d all beef w/kraut & mustard.) \$54.93(\$31.94/hr.!) VISIT(A family from Cyprus who gave me a big hello, though I had trouble remembering them. They reminded me that their daughter, Mariela (not on trip) was my 1st looker last summer!)
- 2593)05/17/14(SAT)FPT(8:20-10:30PM). Cool. Gd sky till shut down by clds. SCENE(Preakness night. Very busy, but little overt sign of race goers.) HH(In VG shape both mentally & physically!) PARKING(Dicey! WT slot, squeezed in next to huge ER truck hogging slots. Drove by once thinking not doable, but then realized could do it.) JUPITER(3+1+ stripes. Looker mentioned shrinking GRS, to whom I showed copy Sun art.) SATURN(Acq'd 9:25.... late because reluctant to lve. J. Both wows! and doubts lookers. 136X. Titan.) Too bad about clds, as place getting very busy. \$74.50 (\$34.33/hr.)
- 2594)05/19/14(MON)FPT(8:20-10:03PM). Mild. Gd sky, but as closing-up due to quiet scene, clds rolled in. PARKING(Nerve racking 15-min. wait before a prime spot near Kiosk. Almost left for C.V but glad didn't as was a ok night in FPT.) SCENE(OK for a Mon. Maggie Moos boss said Sun nite, which I missed for lack of go-power, was very busy. Ugh!) JUPITER(2+2+ stripes. Good!) SATURN(Acq. 9:06PM. The usual reactions to it.) HH(In pretty gd. form.) VISITS(1st lookers were Donny & wife Bobby, who said they look at Moon thru big binocs. Contrib'd \$5.00) CONTRIBUTIONS(4x\$5 + 1x\$20) \$54.93 (\$31.94/hr.) MISSING SCOPE BOLTS! (Cleaning up, was shocked to find they were not in hat, where I ALWAYS put them! Looked everywhere in & outside hse, but no luck. Incase I needed to replace them, PLW Googled local bolt suppliers. Drove to FPT to search Sq., but to no avail. At home picked up my last night's sweater from couch and, low & behold, they fell to the floor!! The sweater had been in the hat and I must have put the bolts on the sweater. At home, they traveled with it to the couch! Finding them was a HUGE relief!!)
- 2595)05/23/14(FRI)FPT(8:36-10:33PM). Mem. Day week-end. Cool breeze. Gd. sky. PARK(20min stress.) JUPITER(2+0, then 1+0. V. unusual!) SATURN(Acq. 8:53PM.) METEOR SHWR.(A new one predicted for bet. 2-4AM tmw. Amazing number of inquiries about. Debris Comet 209P/LINEAR.) HH(In ok form.) VISIT(Dancers Jean & Randy.) HOME PARKING(4th night in a row in front of hse!) Adjourned to Bop Pizza, where wait for my slice was way too long! \$30.51 (\$15.65/hr.)

TOTAL THIS PAGE = \$ 329.26
TOTAL THIS YEAR = \$1,235.88

2596) 05/24/14(SAT)FPT(8:40-9:20PM). Delayed by clouds, then shut down by clds! PARK(Lucky!) SCENE(As busy as have ever seen it! Too bad had to shut down as would have been a great night for me.) JUPITER(3+1+stripes. Smallish, but still doable.) SATURN(80X. Every looker wowed!) VISIT(Mike & Unica, bike riders who used to live on 35th St. Adjourned to the Giant for prune juice & other necessaries. \$25.31 (\$37.95/hr!) LAST NIGHT'S METEORS(Neighbor Tammy & her boy friend, responding to my Facebook announcement, drove to the Prettyboy Dam area. Had a good experience, seeing about 20 bright ones and one very spectacular one, they said. Space Weather reported 10/hr.)

2597) 05/25/14(SUN)FPT(8:35-11PM). MEMORIAL DAY EVE. SCENE(V. busy upon arrival, but gradual-wound down. SKY(Good.) PARK(Lucky!) HH(With all the lifting/hauling, setting up/break-down, cleaning/reorganizing equip. at home, replenishing handouts, what motivates me at my age to keep at it? Some possibilities...money, love of looking thru scope at beautiful things, enjoyment in sharing night sky with the public, fun meeting and greeting the public and being respected for my knowledge & know-how. But not just at my age, but because it is EXTREMELY hard, demanding, driving work?) JUPITER(0+4. Lookers liked. 135X. stripes a bit hard to focus on.) SATURN(9:23PM. Great! A 10-min. clds problem starting 10:03PM. Titan.) VISIT(Couple celebrating 18th wedding anniversary. She writes astro poetry and blogs at tycho girl.wordpress. Name Chris Rueter.) \$76.75 (\$31.71/hr.) HH(Add the parking problem to the above list of chores. I shouldn't mention it, but girl watching is motivational, too! I SEE MYSELF AS A REMARKABLE PERSON TO BE ABLE AT MY AGE TO BE PHYSICALLY ABLE TO CONTINUE THIS STREJIOUS, DEMANDING ROUTINE TIME AFTER TIME...WITH NO END IN SIGHT! NOBODY ELSE...NOT MY LOOKERS, FOR SURE...EXCEPT MAYBE PLW KNOWS HOW TOUGH IT IS! AND NOBODY ELSE KNOWS JUST HOW TIME CONSUMING IT IS. IT IS NOT A WHAM, BAM, THANK YOU, MAM, TYPE OF ACTIVITY!! I OFTEN THINK THAT THE PHYSICAL ACTIVITY INVOLVED WITH THIS WORK...ALL THE HEAVY LIFTING & HAULING, THE STUPPING AND STANDING FOR HOURS ON END IS AN IMPORTANT SOURCE OF MY... SO FAR...GOOD HEALTH!)

2598) 05/30/14(FRI)FPT(8:25-10:30PM). SCENE(Medium busy.) SKY(Unsteady.) CLDS.(Would have ended stint by 10:50PM.) IRREGULAR HEARTBEAT(Very noticeable Wed. afternoon. On PLW's advice, took myself to UMH ER, where I was kept overnight. Given lots of tests + saline IV drip. Did well on treadmill stress test. Left UMH with a heart beat monitor, which am supposed to wear for a month. Beat irreg. this PM at JHU, so was hesitant to telescope. Scoping, I felt normal, w/good energy level. Didn't check beats there, but back home some irregularity. Last time had this prob. was 2002.) JUPITER(1+1+stripes. Gd.) 2d-MOON(Thin but good. V. briefly.) SATURN(Acq.8:52PM. Somewhat rippling. Usual reactions. Titan.) Quit when no long"cost effective". Adjourned to Kiosk for hotdog. Was free. VISIT(Woman from York who reported getting 4 good photos of Saturn thru my scope last yr.) \$40.02 (\$19.24/hr.) PARKING(Lucky!)

2599) 05/31/14(SAT)FPT(8:48-11PM). Earlier attended Ellen Hochman's 60th BD party for Diane Friedman. Home for 1/2-hr. rest, then to FPT. PARK(Very lucky...back home, too!) SCENE (Busy.) SKY(Started v. mixed, then clear.) 3d-MOON, JUPITER, SATURN(Shifting clouds forced me to go back & forth from one to the other till sky finally cleared, at which time stayed with Saturn.) VISITS(Lots of interested & interesting lookers. A man who couldn't understand how he saw a rainbow and a friend in NY saw "it" simultaneously. Explained to him that rainbows are personal, that no two people see the same one!) HH(11PM heart monitor beeping. Called company but didn't understand explanation. Otherwise, felt pretty normal throughout stint.) Gave lots Sat. stickers. \$63.50(\$28.86/PLW(Lots of "Where's your wife?" Q's. Alternately said visiting STL and LD relationsp.))

* 2600) 06/01/14(SUN)FPT(8:10-9:45PM). TOOK FROM 12/14/12 (533-days) FROM #2500, MEANING WAS OUT EVERY 5.33-DAYS. SHOULD I QUIT NOW WHILE I'M "AHEAD", OR SLOG ON TO #2700? KNOWING ME, IT WILL BE THE LATTER. IT'S STILL WHAT I DO BEST IN LIFE! WHEN TALKING TO LOOKERS ABOUT MY TIME TELESCOPING, I ALWAYS SAY "THERE'S BEEN LOTS OF EXCITEMENT BUT, SO FAR, NO SERIOUS DAMAGE! I HOPE IT CONTINUES THAT WAY!! Great sky. MOON-JUPITER-SATURN. 9:40⁺ a doz. innercity kids on bikes went by. Concerned they'd find me, as well as it being a slow scene, packed up. Earlier, bought a CD for Penelope from a New Orleans style band on Square. Of course scene improved after I'd packed it in! \$35.50 (\$22.47/hr.)

NOTE: 533d = 76.143 wks., meaning TOTAL THIS PAGE = \$ 241.08
was out 1.31X's per week.

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- 2601) 06/03/14 (TUE) CHAS. VIL. (8:40-10:24PM). Due to WIA mtg. was too late for FPT. Adverse weather rpt. but ok sky...few scattered clds. Warm! Wore shorts 1st time this yr. 6-d MOON (Great, but briefly.) SATURN (Titan. Many amazed lookers.) SCENE (Mostly students.) HH (IRREGULAR HEARTBEAT, which took me to the ER on 5/28, seems to have ceased this afternoon. Am feeling more like my old, healthy self. Condition was demoralizing, making me feel closer to the end of my life. Will continue to wear the eCardio heart monitor for a while.) Adjourned to Univ. Mart for icecream! \$21.75 (\$12.55/hr.)
- 2602) 06/05/14 (THU) C.V. ((8:35-10:05PM). Cool breeze. Scattered clds. but gd. sky. HH (Ireg. HB returned late afternoon. Earlier had felt 100% cured. Scope activity not effected.) SCENE (On the slow side.) 8-d. MOON (Crater Archimedes & Apennine Mts. prominent.) SATURN (w/Titan. Appreciative lookers.) VISITS (Eddie, retired lithographer and C.V. resident... an old acquaintance. 1st. time at scope. Very enthused. Recruited lookers. Returned late with friend. Suzanne, who got my email address from Scott Dance of Sun weather pg. and emailed me a few days ago. Didn't believe Saturn real till I showed her the Moon!) Lots of no-payers. \$18.00 (\$9/hr.)
- 2603) 06/06/14 (FRI...70th ANNIVERSARY OF D-DAY) FPT (7:45-11:05PM). Warm...should have worn shorts! PARK (Lucky, again!) Grt. sky. 9-d. MOON (Sunset 8:30PM, but using polarizing filter started on 7:45PM. Emphasized Tycho. A man who said he is a great fan of the movie 2001 and has seen it 15 times was very excited at seeing Tycho, itself! Sunrise on Copernicus just beginning.) SATURN (Acq. 8:42PM. Titan. Not excessive # of doubters.) HH (Hard work, but held up ok. Presumably, no heartbeat prob.) RIGHT EYE (I'm R-eyed at scope. Been noticing that planets several magnitudes brighter in L-eye. Effect striking! Am guessing is due to R-eye damaged I've incurred using binocs on the Sun.) VISIT (Looker Dimitri, who was over anxious to help me pack up. I let him push handtruck to car.) SCENE (Big rush at start, then 1/2-hr. lull, then busy with Saturn, sometimes even a line!) \$123.43 (\$37.07/hr!)
- 2604) 06/07/14 (SAT) FPT (7:52-11:25PM). PARK (Lucky!). Warm...wore shorts. Clear but poor seeing. Both Moon & Saturn rippling a bit. 10-d. MOON (50X w/polarizer. Nice! With MARS 1.6° N of Moon, a beautiful, contrasting colors in finderscope. Showed a few times to lookers.) SATURN (Due to poor seeing, not at its best. Yet, lookers amazed.) ALIGNMENT (Something wrong! Spent 25 stressful mins. searching for, with a crowd of eager lookers asking, "Found it yet, found it yet?" One helped me find it by eye. Dec. reading 4° off! Terrible ordeal drained 3/4th's of my evening's energy allotment!) SCENE (Busy!) HH (Despite serious energy drain, had stamina to carry on forrest of stint. No apparent heartbeat problem.) VISITS (Sonia & Kevin from Owings Mills on their 11th wed. anniversary. Very happy to have found me. Stayed around long time. Took photos. CHARLIE THE BALOON MAN! Long time no-see. Looked great. With woman friend. Said is doing real well in HPL.) \$120.35 (\$33.90/hr.) New line to looker... "Aren't there any \$5's in circulation anymore?" VISIT (Roger Wesalo. Asked if I were John Heyn. I said I'M his brother, Roger once worked at Stansbury Photo in Mondawmin and knew John because he came in a lot. 'ps John says he never used Stansbury's in Mon dawmin!)
- 2605) 06/14/14 (SAT) FPT (8:50-11:10PM)...after a week of clds. & rain. PARK (semi-lucky.) SCENE (Very busy.) SKY (Clear but 4/5 seeing.) HH (Prior to leaving hse was feeling a bit dragged down by returned irreg. heartbeat, but at scope felt fine.) SATURN (Rings, Titan, maybe a 2dn moon, background star. Lookers wowed!). 17-d. MOON (V. bright and clear as was packing up. Temped to unpack for it, but didn't.) COLLIMATION (Seems to have lost its grip...maybe due to driving over cobblestones? Had to twice.) WEDDING PARTY (+/-50 guests holding sparklers formed a tunnel for bride & groom to walk thru as they left the AF Inn. An incredible scene! I invited bride's father to let then look thru scope and get souvenir stickers after he's looked, but it didn't happen.) Adjourned for free hotdog. \$99.32 (\$35.05/hr.) VISIT (Lee, who some yrs. ago as a Temple U. std. made a video of me.)
- 2606) 06/15/14 (SUN) FPT (9-10:30PM). Mild. Gd. sky. Easy parking. VISITED BY BROTHER JOHN, WHO I INVITED TO COME SEE ME IN ACTION. HE HAD A GREAT TIME...WAS AMAZED BY PEOPLE'S REACTION TO SATURN! HELPED IMPROVE MY PARKING SPOT. DID SOME CARRYING STUFF. SATURN (BIG trouble finding. Maybe too close to light, + alignment off?) MARS (Once for kid.) \$36.10 (\$24.07/

TOTAL THIS PAGE = \$418.95

TOTAL THIS YEAR = \$1,895.91 (last yr. \$2,034.56)

- 2607) 06/17/14 (TUE) FPT (8:53-10:15PM). 80's F, sticky. 4/5 seeing. Quiet scene. Intermittent traffic. HH (With heartbeat prob. almost didn't go. However, once set up felt good.)
- 10 SATURN (Titan. Equatorial band. Sometimes 220X. Fewer doubters than usual!) MARS (1X at 220X after collimation. No details.) VISIT (Carlton A. Evans, PhD w/wife and friend. Does TB research in Peru. Stayed at scope long time. Wife has small scope but said big prob. w/clds, + scope damaged. Will give Eve their info.) \$27.00 (\$19.71/hr.)
- 2608) 06/18/14 (WED) FPT (8:54-9:37PM). Shut down by approaching storm clds. 80's F. Sticky. Most quiet scene ever. SATURN (Very few lookers.) HH (Believe that when I am occupied, I don't obsess about my heartbeat prob., and it subsides.) \$2.86! (\$3.97/hr.)
- 9 VISIT (Pam and husband, Dave, Pam being only passerby to comment on my Fell's Pointer cartoon.)
- 2609) 06/22/14 (SUN) FPT (8:52-10:54PM). SUNSET 8:37PM. Pleasantly mild. PARKING (V. lucky!) SCENE (Busy upon arrival. Lg. crowd watching U.S. vs. Portugal World Cup soccer match from sidewalk thru Adm.'s Cup window. Game ended tied! Lots of passersby wearing American flag motif clothing.) TELESCOPE (Sat. night reset wedge and dec. circle in hopes of more easily finding Saturn. Tonight found it fairly quickly, but dec reading still low.) SATURN (Mainly 165X. Cassini Div., Titan. Good image.) HH (In good form.) ISS (Bright fly-over just before 9PM. 1/2-dozen excited watchers!) \$52.25 (\$25.74/hr.)
- 10 2610) 06/23/14 (MON) FPT (8:58-10:38PM). Quiet scene. OK parking. Cool breeze-needed cotton jacket. Sl. hazy sky. TELESCOPE (Despite my tweaks, Saturn dec. still -13° rather than -14.65°. Maybe alignment problem?) SATURN (Good show. Titan.) MARS (Once, for enthusiastic young looker, Nick.) HH (Before leaving hee. complaining to self about compulsion to do this, asking self what it would take for me to stay home when sky clear blue. Once in FPT was ok.) VISITS (Local man who said was reading Nat. Geo. article on whether there's life in outer space. Mentioned Drake Equation. Went home and brought back copy to show me. Is 7/14 issue. I declined offer to borrow it but, as am currently reading on that subj. will definitely find copy. Olivia, young British woman who, w/a friend, stopped at scope because she admired my socks!) \$28.00 (\$16.87/hr.)
- 9 2611) 06/24/14 (TUE) FPT (9:02-10:13PM). SUNSET 8:37PM. Moderately busy scene. Not lucky parking. Clouds approaching as leaving 721, but they dissolved at SS, only to return later. TELESCOPE (Even after tweaks, dec reading -13°. But left side dec reading correct -15° Prob. should align r-side dec. w/ L-side.) SATURN (Titan. Good.) VISIT (A big greeting from Anya, who said is from Phila. and saw Saturn a few yrs. ago. As usual from big greeters, she didn't tip. Lionel, a local who will bring his scope for me to examine.) \$20.85 (\$17.52/)
- 10 YEAR = \$2,026.87, so could be on track for a \$4G year.
- 2612) 06/27/14 (FRI) FPT (8:49-11:33PM). SS = 8:37PM. Busy scene. Parking luck, but not w/o a struggle. Adverse w/rpt, some clds. early, but then v.g. sky. On Saturn, L circle -14.5°, R circle 13.5°. As found B CYG using L circle, it is correct! HAT (On Alin's advice, started w/a \$5 (he starts w/4 \$5's!). 1st contrib. a \$5, but then normal contribs. SATURN (Good. Some doubters.) B CYG (Twice, first for man saying would give me \$10 to show him something else, but he only out in \$3.00.) HH (Good form.) VISIT (Daniel, a JHU std. on a "Connecting Science & Community" program. Said will be at Fms. Mkt. tmw. morn w/microscopes. Will send him "Street Microscopist" art. Photographers from Md. Tourism Office who took photos of both me and "Mr. Buckets" and, following our signing releases, paid us \$20 ea.) Adjourned for a Kiosk hotdog. \$85.12 (\$31.18/hr.)
- 9 2613) 06/28/14 (SAT) PATTERSON PK. CAMPOUT (9-11PM). SS/8:37PM. In field S. of Virginia Baker Ctr. Sponsored by Creative Alliance (ref.: Joe Di Mattina: jdimattina@cyberpointllc.com, 917-583-8078). +/-100 kids avg. age +/-5yrs.! +/-2-dozen family overnight tents. SCOPE (Tripod at lowest height. Even so most kids needed milk crate!) ALIGNMENT (Failed to get N w/compass so eyeballed it but was somewhat off, so had to frequently center image.) SATURN (80X. Titan brighter than from FPT. Had Sat. photo displayed for guidance. Most kids saw it well, I believe.) HANDOUTS (Sat. Facts, mnemonic, I Saw...sticker.) HH (Held up OK, except feet hurt from wrong shoes!) Parents looked, too. \$100 agreed upon + unexpected \$40 tip = \$140.00! (\$70/hr.)
- 9

TOTAL THIS PAGE = \$ 356.08

TOTAL THIS YEAR = \$2,251.99

STREET CORNER TELESCOPE LOG -- 2014

- 2614)06/30/14(MON)FPT(8:53-10:08PM). Warm...clammy. Slow scene, but I had fairly steady traffic. ALIGNMENT(Good, except tripod not level, thus delaying finding Saturn.)Lucky parking! SATURN(Titan. Pretty good image.) VISIT(Alex, a British heart specialist visiting Hopkins. Said would come back to see Moon. Father is an amateur cosmologist so gave him my City Paper letter to ed on why I don't believe in God.) 3-d MOON(Set behind A.F. Inn as I was setting up.) HH(Fedling a little funny in the heart dept. Some skips.)\$32.06(\$25.65)
- 15 2615)FOURTH OF JULY(FRI)FPT(10:05-11:45PM). Cool...mid-60's. SUNSET(8:36PM...boo!). Incredibly busy scene in anticipation of fireworks display. Gd. sky. ODYSSEY!(Intended to do fireworks viewers on Rotunda parking lot but arrived to discover is now a fenced off construction project...this after I'd advised folks on "Nextdoor Waverly" site was a good fireworks viewing location! Headed to Chas. Vil. Dead scene. Earlier had a TAM msg. from Alin saying would be setting up after fireworks so, w/that in mind, headed for FPT:GREAT DECISION! FWKS display 9:30-9:45PM. Shortly after got good parking, and setup.) 7d-MOON (WOW!) SATURN(+ Titan as a focus indicator. 135X.) HH(STAMINA! STAMINA! STAMINA! Earlier in day accordionized on Md. Accordion Club's Catonsville 4th parade, had a brief rest and supper at home, and headed out again. At home again, felt none the worse for wear!) \$109.68 (\$65.68/hr.!) At conclusion of FWKS, some in crowd shouted "USA! USA!" VISITS (Ashley, JH heart doc who's a regular looker. Woman astro from Buffalo.) B CGY (For Ashley, who seemed not impressed...maybe because she was a bit tipsy.)
- 9 2616)07/05/14(SAT)FPT(8:13-11:52PM). SS(8:36PM). Mild. Gd. sky. PARK(Lucky...WT). HH(Did ok, but feeling stressed from PLW problems.) 8d-MOON + MARS(Mars 0.2° N of Moon. Great paring Showed lookers thru finderscope. Contrasted w/white Moon, Mars' orange-red color very evident. Gd craters @ 80X.) SATURN(+ Titan. Usual reactions.) SCENE(V. busy. Lots of families/kids.) \$170.78 (\$46.79/hr.) HH(Lv. Mon. for STL so, right in the middle of my busy season, I'll be MIA till I return on the 17th!)
- 2617)07/22/14(TUE)FPT(8:53-10:44PM). Warm. SS=8:28PM. HH(Arv.'d on 7/17 from 10-d in STL. but this was 1st clear night.) SATURN(+ Titan. Usual reactions--doubt to excited amazement!) B CYG(Once for looker who's already seen Sat.) MARS(1X for young boy's req.) ALIGNMENT (Perfect...Saturn on 1st try...finally!) VISIT(Bill Preston, who is organing a new communist party. A very intense guy.) \$41.44 (\$22.40/hr.) HH(Gd shape, but scope getting heavie:
- 9 2618)07/25/14(FRI)FPT(8:45-10:16PM). SS(8:25PM). PARK(Difficult.). +/-80°F. OK sky the, after a cloudless day, shut down by clds. HH(Did Ok, but feeling a bit shaky, maybe due to undernourishment or to return of irreg heartbeats.) SATURN(1st try...which always feels good! Titan. A few doubters, many enthusiasticists. 133X.) \$41.50 (\$27.30/hr.)
- 20 2619)07/26/14(SAT)FPT(8:46-10:35PM). Warm. SS=8:24PM. Ok sky, then sucker holes, then shut down by clds. NEAR TRAGEDY!(Arv'd home to discover had left milk crate with all my stuff +lenses, wrench/bolts, battery, handouts, hat with money, in FPT!! Raced back, even go-thru some red lights. Had no idea idea what I would do if it was gone. Happily, found it sitting in street right where I'd parked, with everything in it. What a great relief!!) SATURN(1st try. Titan. Usual mix of looker reactions.) VISIT(Woman from Raleigh who has a 12" Orion doh and is club member there. Many "how long have you been doing this?" \$71.00 (\$39.23/hr.)
- 9 2620)08/04/14(MON)FPT(8:08-11:01PM). SS=8:16PM, Occasional thin cloud bands, otherwise gd. sky. 9-d MOON(Tycho + SR on Copernicus.) SATURN(+ Titan.) B CYG(Several times.) VISITS (Ania from Phila., who always gives me a big hello. Photoed Tycho region + us two! Kevin & Samatha, who returned several times. Contrib'd \$10. S also got Moon pix. 1/2-doz. 1/2-doz. enthusiastic Frenchpeople. Contrib'd \$10.00.) Busy stint. wanted to leave at 10PM but couldn't get away. Especially delayed by nerdy guy. HH(Good form.) \$66.50 (\$23.01/hr.) ACCORDION PLAYER(150' east on Thames. Polkas. 1st time hearing one in FPT.)

TOTAL THIS PAGE = \$ 532.96
 TOTAL THIS YEAR = \$2,784.95

STREET CORNER TELESCOPE LOG -- 2014

- 2621) 08/07/14 (THU) FPT (8:14-10:55PM). SS=8:12PM. PARK (Crazy, but quick!) Hi 70's F. Sl. hazy sky. STREET LIGHT! (The one near where have been setting up has been out all summer, allowing easy access to Saturn. Tonight, however, after setting up in my usual spot was shocked to discover it had been turned back on and was about to ruin my view of Saturn! Enlisted 3 young men to move scope eastward. However, new spot allowed only about 1-hr's view of Saturn till it was in the light. Hopefully, on next stint will be able to work around problem.) SATURN (Contrast diminished by light, but still usual awe by lookers. No Titan.) 12-d MOON (Tycho region. w/filter, 50X and 80X.) hh (Good.) \$52.75 (\$19.61/hr.) ALBIREO (For 3 self-described "nerdy" young women. Haze made difficult to find.)
- 2622) 08/08/14 (FRI) FPT (8:34-10:46PM.) Delayed set-up by haze. PARK (WT... 1st in long time.) Warm but not sticky. MAGGIE MOO'S CORNER! (With all the lights at the foot of the Sq. on, was only way I could acquire Saturn. Also, it looked to me like all the lights have been brightened. Was able to utilize the space ok, but did not have as good access to passers-by as on Sq.) 13-d MOON (Tycho outstanding. 50 & 80X w/filter.) SATURN (Acq'd 9:02PM then, for some reason, not again. Believe alignmt. ok.) VISIT (Rona, UMH audiologist with friend who has an astro brother in San Diego named Alberto Levy.) \$36.39 (\$16.54/) LOTS no-pays!
- 2623) 08/09/14 (SAT) HERRING RUN PK. SCOUTS CAMPOUT, AUSPICES RONALD N. BAILEY, 443-465-9876, RonaldN.Bailey@Baltimore City.gov. Accompanied by Starman Jerry Feldman with his 5" reflector. Clds early, then clear. RISING 14-d MOON (Great... a "supermoon"! Did w/my scope at 50X w/filter. Pointed out Tycho.) SATURN (w/Jer's 5". Nice image. Would work well in FPT.) SCENE (Had prepared for 100 lookers but probably had +/-35. Gave out Moon Facts while Jer did "Facts" and stickers.) Possibly only 1 curious kid. \$50. Got good alignment with magnetic compass.
- 2624) 08/10/14 (SUN) FPT (8:30-11:30PM). PARK (Lucky... close to intended spot.) Great sky. Mild. NIGHT OF THE "SUPER" FULLMOON. Added "SUPER DUPER" to my TONIGHT THE MOON sign. Made a 7 1/2" x 11 1/2" sign illustrating relative sizes of full Moons. SATURN (Full Moon available. Gd. alignment, as acq'd 1st try!) MOON (MR 7:43PM. Acq'd 9:00PM rising above Rec. Pier. Dist. 221,632mi vs. closest 221,439mi vs. avg. 237,082mi. vs. farthest 252,724mi. Mostly 50X w/filter. Tycho again main feature. Several lookers successful at photos. Everybody excited by view! Edge craters. Offset image more exciting, I thought.) VISIT ("John" got me icecream. Leon, who was a waiter at Woodholm CC and who then owned a chain of carry outs. Looked v. old but was born 1940.) HH (Peak performance!) \$89.94 (\$29.98/) No-nopays!
- 2625) 08/13/14 (WED) FPT (8:30-11:14PM). PARK (Immediate.) Grt. sky. Cool breeze. Set up on west side of Sq., figuring on catching rising Moon just as loosing setting Saturn... which happened! Fairly busy scene. SATURN (Acq. 1st try very close to light. Perfect alignmt! Due to bright background used mostly 80X.) 18-d. MOON (Acq. 10:27PM rising down Thames St. Lots of craters. 50X w/filter.) GLASSES ACCIDENT! (Being so excited by seeing Saturn, a woman gave me a bear hug, crushing my glasses which were hanging over my chest. Could still wear them, but left stem bent downward. At home discovered L stem screw missing. Replaced it, which improved glasses +/-85%.) VISIT (Zack, son of Marty Cohen, proprietor of Company 7 telescopes in Laurel. Told him of Marty's setting up an 8" refractor at my 1988 "Mars Party". Maria Cavacos, creator of my great "& Under the Stars" cartoon in the 05/10/14 Fell's Pointer.) HH (Good shape.) \$57.03 (\$20.86/hr.)
- 2626) 08/16/14 (SAT) FPT (8:16-10:30PM). PARK (Immediate.) Grt. sky. 80°F. Maggy Moo's corner. SATURN (Acq. 1st try... perfect alignment! 80X. Held 2h9m.) ANTARES (1X for looker wanting to see a star. VISITS (Dimitry w/friends. Says has gotten appointment in virology dept. Temple U. A U. Del. astronomer who said he discovered the Spitfire Nebula.) HH (Good form. M.M's corner "cool".) SATURN (Last 10-min affected by heat from Admiral's Cup.) SS = 8:01PM. \$71.00 (\$31.84/hr.)
- 2627) 08/17/14 (SUN) FPT (8:21-10:05PM). PARK (Immediate!) Grt. sky till clds. Warm. MM's corner. SATURN (1st try. Titan.) SURPRISE VISIT! (Alin Tolea w/friend, Valerie. Here to return daughter Bianca to mother. Per his practice, put a \$10 and \$5 in my hat and removed \$1's as they appeared! Don't know if had an effect. AT did some strong recruiting for me!) HH (A bit worn from last night.) \$72.63 (\$41.98)... some of which was Alin's. P.S. Met AT yrs. ago when he was JHU student. Has Ph.D. and is excellent telescopicist. Now does "street" scoping in DC.

TOTAL THIS PAGE = \$ 429.74

SS = 8:01PM

TOTAL THIS YEAR = \$3,214.69



STREET CORNER TELESCOPE LOG -- 2014

10 2628) 09/12/14 (FRI) FPT (8:50-10:15PM). Big hiatus due to weather, then 12d European trip for family reunion in Paris, then wk in Toulouse. PARK (Instant!...half expected not to find parking as is week of "Star-Spangled Banner" Bicentennial Celebration.) SCENE (Busy. Warship at pier, Scots pipe brigade, lots of people.) HH (Discovered can still do it...despite my fear of getting weaker from age.) COLLIMATION (Badly in need of. Hard with scope pointing straight up. Lower it and did "blind". Worked!) ALIGNMENT (Off 2°.) ALBIREO (My one and only evening's object. Did not recruit.) HAT (At start many nopays.) VISITS (Jean & Randy + Martha & Ed from dance scene.) \$20.23 (\$8.36/hr!!!) AURORA (Lots of "can we see the aurora? inquiries. Apparently TV news was reporting possibility of auroras this far south. Told them had to go beyond beltway to see.)

2 2629) 09/17/14 (WED) Chas. Vil. (7:50-9:40PM). PLW's #157. Gd. sky. Mild. Chipoles corner. Pretty steady stream of lookers, but lots of no-pays. ALBIREO (Usual pitch, starting w/ photo.) VISITS (Sayeed...who I emailed ahead because he wanted Jae, his girlfriend's 5-yr. old to look. But he came w/o Jae. Katie, nextdoor neighbor. Had invited both her a Molly to visit.) DECLINATION READING (+30° on right wheel. Must ck left.) \$26.40 (\$14.35) VISITS (2 male students from Saudi Arabia and Qatar who seemed especially interested PLW had a long conversation with one. Gave them Romer & SETI handouts.)

9 2630) 09/20/14 (SAT) FPT (8:00-10:45PM). PLW's #158. PARK (+/-15-min.) Gd. sky. Sl. breeze. accompanied for 1st hr. by a mello swing band and couples dancing on the bricks. Nice! Busy scene. ALBIREO (My usual routine of showing S&T photo, explaining double stars vs. binaries and "accidentals", of which this is one but, nevertheless, as double stars go it is an especially nice one because of its colors, etc. It is a very demanding routine!) URANUS (Tried 4-times w/o luck. Why, because had perfect alignment?) \$93.00 (\$33.82) VISIT (Sam, a very enthusiastic, regular looker whose name I must remember!) OVERVIEW (Based on the contribs, we must have done a very good Albireo job tonight!)

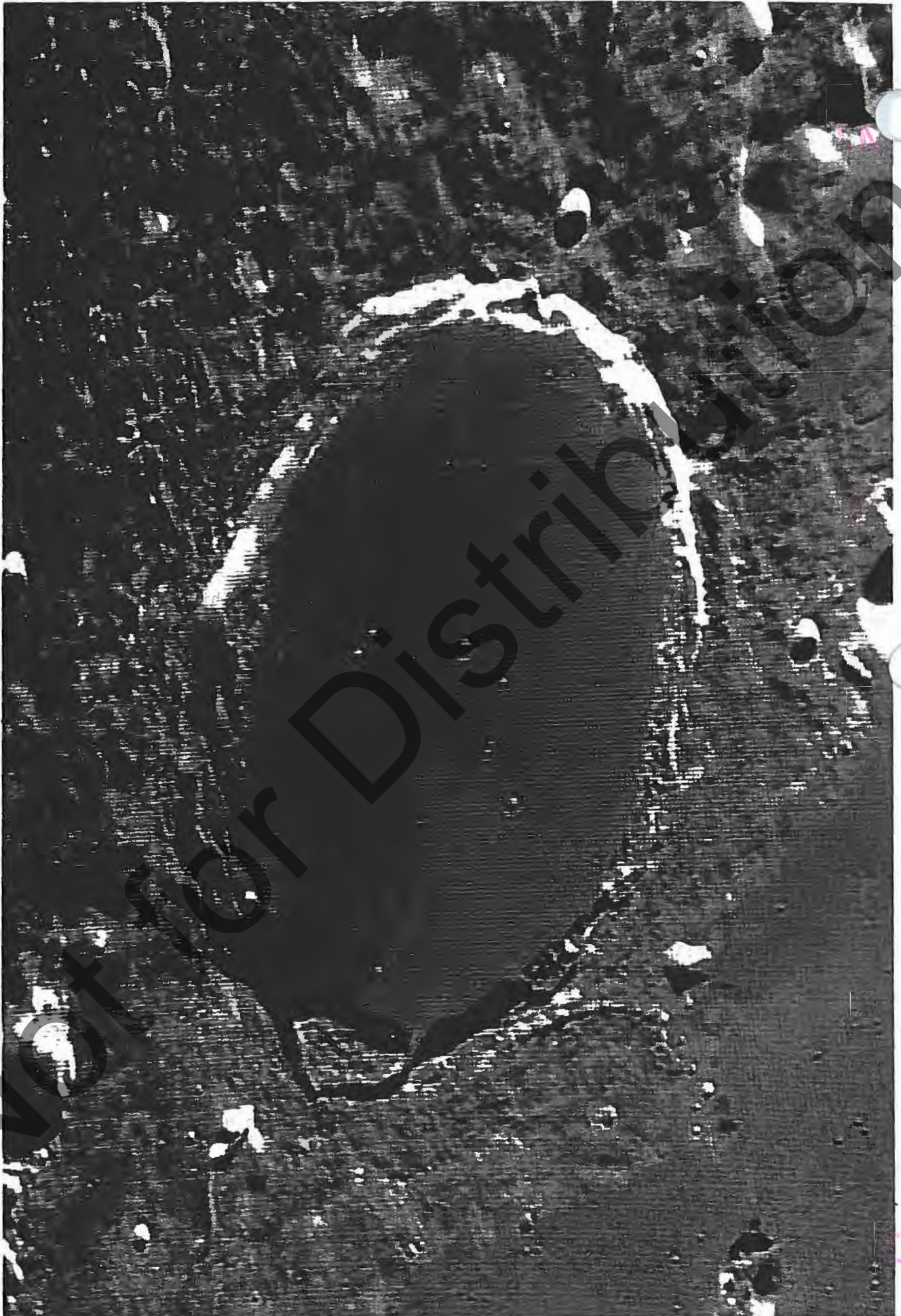
10 2631) 09/26/14 (FRI) FPT (7:53-11:08PM). PLW's #159. PARK (OK, w/PLW's help.) Gd. sky w/occasional haze. Mild. Semi-busy scene. ALBIREO (Worked hard at explaining. Feel have a pretty tight explanation.) URANUS (Acq. 10PM. Put up ALSO SHOWING-URANUS! HAV-A-LOOK! sign. PLW began handing out "facts" and stickers but then, despite right color, because object remained star-like at 220X, I became doubtful it really was U and returned to Albireo. Disappointing!) VISITS (Tom Langly, a totally hyped-up character who said he's a cosmologist and teaches math at BCCC. With chalk he drew 1/2-dozen math formulae on the bricks. and left his bag of chalk with me. Whew! Lisa, one of my dentist, Evan Padousis', techs who has worked on my teeth. Was very excited to find me. Nolan & Shay, who's recently honeymooned in Tanzania. Had a nice conversation w/PLW, who'd been there. 3 young women who work at STSci.) \$54.58 (\$16.79/hr.) Adjourned to Bop for 2 slices. VISIT (5-Spanish-English speaking young men dressed in expensive looking hip-hop clothes and w/lots of tattoos. Very polite. Guessing they were members of either a music group or a Central American gang.)

2 2632) 09/30/14 (TUE) Chas Vil. Gd. sky but approaching clds. in W. Figured not enough time for FP so CV. 7:36-8:15PM. HH (HH (Felt ungood when leaving house, maybe due to irreg. heart-beat. Telling myself should retire. However, strength was ok, and I performed well at scope. Back home had on & off IRhB.) PLW (Back in STL. Even after 159 stints she has no sense of teamwork, so each time I have to tell her how to help load/unload.) 6d MOON (Great!). ALBIREO (1X for Alex, an especially enthusiastic JHU student.) VISITS (C-Level Charles, who was 1st looker and gave \$1. Alex, majoring in both geology and biology. Very excited by looks thru scope.) Shut down by clouds. \$6.00 (\$9.23/hr.) Lots nopays.

33 10/08/14 (WED) TOTAL ECLIPSE OF THE MOON. Since would be a naked eye-binocs, before dawn event, I did not advertise my telescope services. Did it alone at Loyola Reservoir with my Canon digital. Totality 6:25AM. Arrived 6:15AM planning to try for a "selfie" with eclipsed Moon. After several tries, managed to get a good one as totality beginning... maybe at ISO 1600. The reservoir fence was a great help in my getting positioned for photos. By 6:55AM mid-eclipse, dawn twilight had totally obscured the Moon.

TOTAL THIS PAGE = \$ 200.21**

TOTAL THIS YEAR = \$3,414.90



- 2633) 10/08/14(WED) CHAS. VIL. (7:45-9:20PM). Gd. sky. Mild, till cool wind arrived. Moderate traffic. ALBIREO. 15-d MOON (Acq. 8:15PM after enlisting help in moving scope southward 5-6 feet. Very full, having just come off of this AM's total eclipse. 50X w/filter. Lookers liked it. Was often asked if I saw the eclipse, at which point I showed my "selfie" with it. Everybody said, "That's great!". Very few said they saw it themselves. HH (Feeling a little shakey from irregular heartbeat, but in good form. \$37.95 (\$23.97/)) TRACKING BATTERY (Totally dead so tracked manually. Hope overnight chg. will revive it!)
- 10/25/14(SAT) UNIVERSITY PKWY. BETWEEN GREENMT. & 33rd ST. (1:45-3:15PM) STREET PARTY SPONSORED BY WAVERLY MAINSTREETS. SUNSCOPE Big naked eye spot group. Easily visible thru shade #14 welders glass. Not a whole lot of interest (not many kids), but was glad I did it. Was able to park close by. VISITS (10-yr. old boy who asked if there are solar system with more than one sun. I wrote down Clark's Nightfall for him. I hope he reads it! Nathaniel Comfort, teacher of history of science at JHU, specializing in biology. HH (In good shape. Why don't I remember that I feel best when telescoping!) No hat.
- 2634) 10/25/14(SAT) CHAS. VIL. (7:35-9:35PM) Gd. sky. Mild. HH (17-day hiatus because I just couldn't get myself to go... partly because I don't have a good planet... but then I missed some good Moon nights. Tonight, hesitated because of irreg. heart beat. However, once in action on corner, I was fine... in good form.) ALBIREO. URANUS (Searched & searched, but couldn't find it... unless I had it and didn't recognize it. Intermittent traffic. Lots of pleased lookers... maybe due to my great explaining job! \$21.50 (\$10.75/hr.)
- 2635) 10/27/14(MON) FPT. (7:21-8:45PM). Arrived early to see from the pier a 6:45PM Wallops Is. rocket launch to the ISS and a 6:57PM ISS flyby. Incredibly, the launch was scratched due to a boat entering the restricted area! Iss came on time. Met dancers Steve Bilanow & Joyce Yensen on pier. Got a so-so photo of them watching the ISS. PARK (WT). Mild. Ok sky except for intermittent clds. Very slow scene. 4-d. MOON. ALBIREO (When Moon clouded out.) Lost Moon 8:37PM. HH (It seems I feel healthiest and happiest when telescoping. I wish I'd remember that when I'm procrastinating about going out!) VISIT (Brian, a young man who seemed especially interested. Took Moon photos.) \$21.00 (\$15/hr.) URANUS (??) On way home stopped at Fleet St. CVS to re-print Paris photos I mailed to Ken this AM.
- 10/30/14(THU) ASTRONOMICAL SOCIETY OF GREENBELT, BY INVITATION TALK. Contact: Martha Gay (martylou.gay@gmail.com, 301-526-7052). Talk about "street" telescoping with slide show of best astrphotos. Had organized extensively in weeks before but, of course, went way off script during talk. Nevertheless, the group of 20 attendees seemed to really enjoy my presentation. I was in good form... very upbeat. Gave out 12-Comet Halley rubber stamps + 6-Mark Twain posters. They provided projector. Supper + \$50.00 honorarium. Noted Isabel Beichl in 3/6/88 Sun art., asking if anyone knows her. Turned out her pianon tuner was in attendance! I became lost looking for our meeting place, the New Deal Restaurant, and ended up in front of an Am. Legion Hall. I intercepted a member leaving and asked if he knew the neighborhood. He invited me to follow him to the restaurant. I thanked him as a fellow vet, whereupon he thanked me for my service!
- 2636) 11/09/14(SUN) CHAS. VIL. (6:10-7:50PM). Gd. sky. Busy scene at start, which gradually slowed. Penetrating coolness. HH (In gd. form. Corner St. Paul & 32nd St. ALBIREO (Lookers liked. Early, ran out of "facts". At quitting time it had only 1/2-hr. before hitting roof VISIT (Sayed & friend & Jai.) Stomach muscles a bit out of shape for lifting! \$28.03 (\$16.67/hr.)
- 2637) 11/10/14(MON) FPT (7:10-9:10PM). PARK (WT slot.) SCENE (Slow, and stayed slow.) SKY (Sl. hazy the clear.) 48°F (Fingers a little stiff.) SCOPE (Perfect alignment.) ALBIREO (The usual routine.) URANUS (After haze cleared, first try! An unmistakable, british, blue-green dot... about size of a period on this page... clearly not a star! For me was beautiful... almost luminescent. Best at 80X, as higher mags. dimmed its luster. Acq'd 8:27PM. +/- 10 lookers, to whom gave stickers/facts. Put up "ALSO SHOWING-URANUS-HAV-A-LOOK" sign. HH (Irregular heartbeat and feeling bad when leaving home, but improved at scops.) \$15 (7.50/hr.)
- 11/12/14(WED). END OF MY 27TH YEAR ON THE "STREET"! WHEW!! No telescoping tonight. Was a vendor at the VLP's "Holiday Artisan Mkt!". (Less tax & fee, cleared \$55.95) As I often say about telescoping, "There's been lots of excitement but, so far, no serious damage!" But seriously, I don't know what my life would have been like without it, except not good, I'm sure. Can see myself aimlessly adrift in this world for all those years and into the future, if I were still alive. Thank goodness for the telescope! It saved my life.

SC EXPENSES -- 2014

| | |
|--|----------|
| 01/12/14 SP CV parking | \$ 0.25 |
| 02/23/14 SP 17-sides SC handouts @ 6¢/ea. (JHU) | \$ 1.04 |
| ** 02/24/14 SUBS Sky & Telescope 1-yr. from 3/16/14 | \$ 37.95 |
| 02/27/14 STA Wite-Out (Staples) | \$ 2.12 |
| 03/12/14 SP 20 sides SC handouts (JHU) | \$ 1.20 |
| **I'm guessing this charge didn't go through due to expired credit cd. I subscribed again with new card on 03/20/14. | |
| 04/10/14 EQUIP (new battery telescope from Baomesville Electronics #335054) | \$ 39.21 |
| 04/10/14 12 MILES (Bainesville Electronics for new battery) | |
| 04/11/14 SP (15-pgs SC handouts) JHU | \$ 0.90 |
| 04/19/14 SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 04/20/14 SP 10-sides SC handouts (JHU) | \$ 0.60 |
| 05/08/14 SP FPT park | \$ 0.25 |
| 05/11/14 SP FPT park | \$ 0.50 |
| 05/11/14 SP xerox composition of new Saturn sign (JHU) | \$ 0.36 |
| 05/16/14 SP 6-sides SC handouts (JHU) | \$ 0.36 |
| 05/25/14 SP 3-sides SC handouts (JHU) | \$ 0.18 |
| 05/31/14 16-sides SC handouts (JHU) | \$ 0.96 |
| 05/01/14 12-sides SC handouts (JHU) | \$ 0.72 |
| 06/03/14 MBRSHIPS renew HAL via PayPal -1 year | \$ 25.00 |
| 06/04/14 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 06/06/14 SP FPT. parking | \$ 1.00 |
| 06/07/14 SP FPT handouts (JHU @ 7¢/ea.) 17ea. | \$ 1.19 |
| 06/12/14 FEES renew street performers license | \$ 25.00 |
| 06/12/14 mail (above) | \$ 0.49 |
| 06/12/14 copy(above) | \$ 0.12 |
| 06/20/14 SP SC handouts 12ea. (JHU) | \$ 0.84 |
| 06/25/14 SP xerox and laminate Fell's Pointer & Eisenberg photo (Kinkos) | \$ 2.65 |
| 06/28/14 SP 25-sides SC handouts for tonight's Patterson Pk. gig (JHU) | \$ 1.50 |
| 07/05/14 SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 07/23/14 SP 13-sides SC handout JHU | \$ 0.91 |
| 07/27/14 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/03/14 MEMBERSHIP renew Planetary Society for 2-yrs. | \$ 67.00 |
| 08/07/14 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/09/14 SC handouts 33ea @ \$0.07/ea (JHU) | \$ 2.31 |
| 08/17/14 SP SC handouts 7ea. JHU | \$ 0.28 |
| 08/20/14 SP SC handouts (8) JHU | \$ 0.56 |
| 09/12/14 SP FPT parking | \$ 0.75 |
| 09/16/14 SP SC handouts 10ea. (JHU) | \$ 0.70 |
| 09/18/14 SP SC handouts 13ea. (JHU) | \$ 0.91 |
| 09/20/14 SP FPT. parking | \$ 0.50 |
| 09/21/14 SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 09/26/14 STA 1-typewriter ribbon + 1-Sharpie pen (Pikesville Office Supp.) | \$ 6.07 |
| 09/26/14 SP FPT parking | \$ 1.25 |
| 03/03/14 SP SC handouts 23ea (JHU) | \$ 1.61 |
| 10/17/14 SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 10/25/14 SP 5-sides SUN FACTS to today's Sunscope stint (JHU) | \$ 0.35 |
| 10/27/14 STA velcro strips for handtruck...replacements (Falkenhan's Hdwe) | \$ 2.64 |
| 09-10/30/14 SP film + processing + 30-copies for ASG talk preparation | \$56.12 |
| 11/09/14 SP Chas. Vil. parking | \$ 0.25 |
| 11/11/14 SP 2-sides SC handouts (JHU) | \$ 0.14 |
| 11/19/14 SUBS Renew Sky & Telescope from Feb. 2015 | \$37.95 |

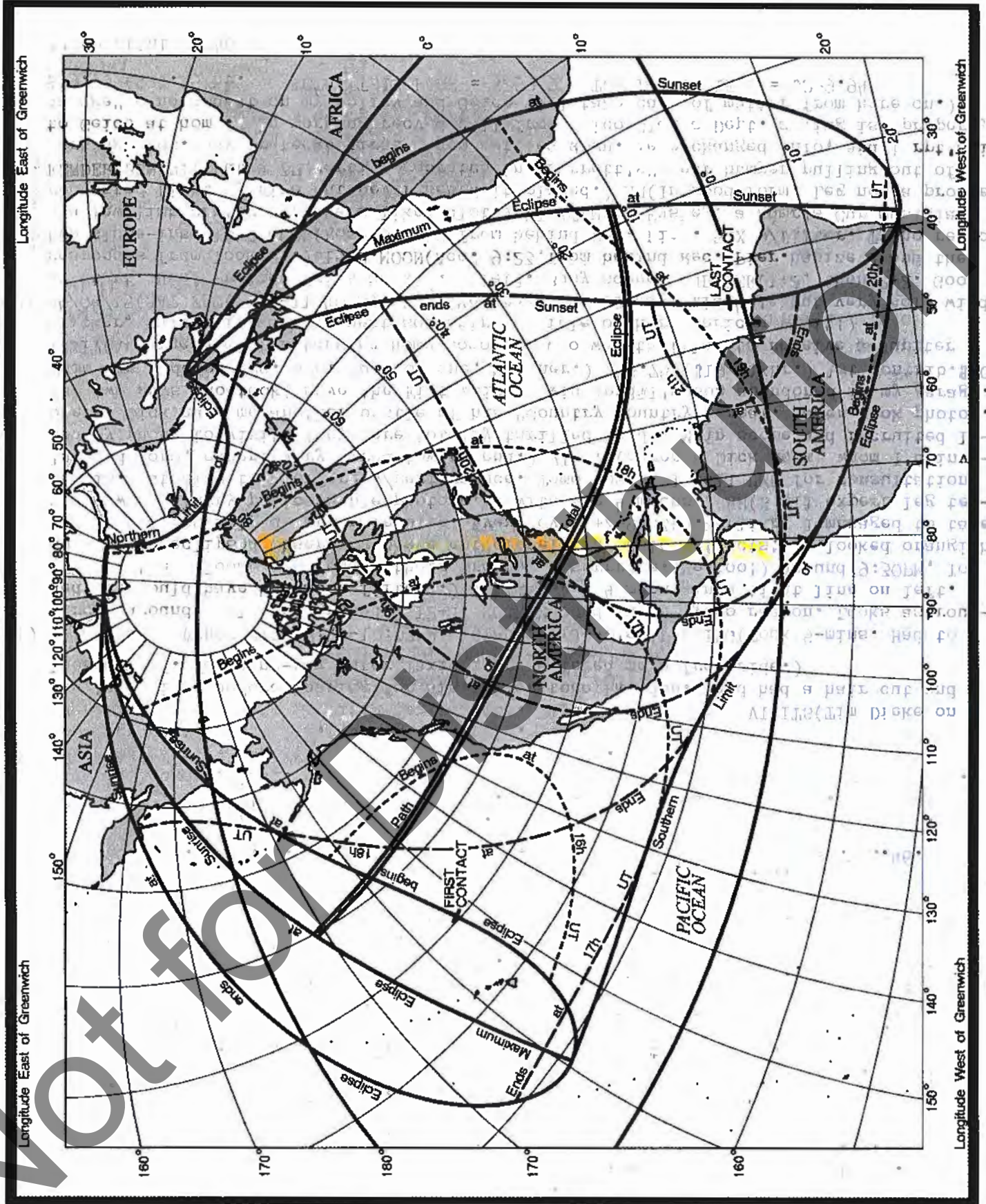
(OVER)

2015

Not for Distribution

- 2638) 03/08/15(SUN) START OF 28TH YEAR ON THE "STREET"! Due to cold and snow, 1st stint this year....since 11/12/14. Great sky, 40°F, slight humidity chill. PLW'S #160 Chas. Vil. HH(Happy to discover can do all the lifting and performing as in the past.) SCOPE(Worked fine, including collimation.) SCENE(Semi steady passersby traffic.) JUPITER(1+3+stripes. Great. Moons in a very straight line, which elicited lots of "why's". Explained is because they orbit J's equator which is now pointed directly at Earth...but not always that way.) LOOKERS(Most happily surprised it view. Lots of no-pays. \$:13-9:13PMDST.\$9.00 IT CAN BE DONE....guy with an iphone took a good photo of Jupiter and moons!
- 2639) 03/21/15(SAT)FPT(7:30-11:35PM). Iffy clds when leaving, as well as early in stint, but then great sky. PARKING(Water Taxi slot.) SCENE(Very busy!) Mid-40's F. No wind. JUPITER(Stripes. 2+2, then 2+1. Many amazed, enthusiastic lookers.) EYEPIECES(80X for a while, then added Alin's 50% focal reducer. Condensed image very nice. No lookers asked for higher mag. However, apparent field smaller than 80X, a bit as if looking thru a porthole. Worried about it, reverted to 80X.) VISITS(My frequent, enthusiastic looker, Sam, w/ husband? Kevin. Tim Dieke, saying he's leaving FPT for a permanent job in Yellowstone Pk. Incredible, given his spastic problem! Wayne & Melissa from TX. Wayne mentioned for work had lived on mid-Pacific, Wake Is. When I said I was there on my way to Korea they were flabbergasted, thinking I was only in my 60's!) HH(Held up ok, but in slow moments got bored.) "I Saw...." stickers(Ran out \$157.60 (\$38.60/hr....incl'd a \$20+\$10+5ea.\$5's) By 3/21/14 contribs = \$147.46.
- 2640) 03/29/15(SUN)FPT(7:10-8:30PM). SS7:27PM. Iffy clds leaving, but dissolved at SS. WT parking. Low 40's F but cold windchill. Clear. ok seeing. Slow scene. Some enthusiastic lookers, incl. enthusiastic no-pays! Family w/\$20 in icecream were no-pays. 9-d Moon(Fine.). JUPITER(5° N of Moon. 1+3+stripes. 80X) HH(Last few days suffering from tendonitis left leg, making me hobble. Was better during day and no problem this evening. Adjourned to Boppizza for a slice. \$10.00 (\$7.52/hr.) VISITS(Tim Dieke on his last night before leaving for his Yellowstone Pk. job. He'd had a hair cut and looked good. VJ, a no-pay Water Taxidriver. Offered me a free ride.)
- 2641) 04/01/15(WED)CHAS.VIL.(7:50-10:07PM). Clear, mid-40's. PARKING(Took 5-mins. Had to circle block till spot opened.) 12-d. MOON(Zeroed in on Tycho region. Lookers astonished! Bright....needed Moon filter.) JUPITER(All 4 moons in a tight line on left. The sight had lookers catching their breath in surprise.(Me too!) Around 9:30PM, Europa eclipsed Io. Observing the event closely for color effects;*Io looked orangish and Europe possibly a very pale blue. Event over +/-9:53PM. Earlier, I managed to take a somewhat blurry but passable photo of J with the 4 moons.) HH(Still with L leg tendonitis, but didn't interfere w/performance. Tomorrow will call UMH for consultation. In good form, except very tired toward end.) VISITS(Karen & Dick Cook, whom I'd invited by phone to visit. They were totally thrilled by J & M in scope and recruited lookers. Dick gave me another bottle of his homemade Country Cereal. Karen took photos. The two guys to whom I gave the Fiat which David Kendall's son abandoned in my garage. This was a dozen yrs. ago. Name of one, Meisner.) \$43.75 (\$19.11/hr.) 1st contrib.\$20. VISIT(A Chinese girl returning home tomorrow who was thrilled to receive a Jupiter sticker, saying it was the best souvenir possible of her American visit!)
- 2642) 04/04/15(SAT)FPT(7:58-11:40PM). PARK(Metered slot.) Clear, mid-40's but very cold wind at start. Used Pretzel Twist as wind-shield. Busy scene. JUPITER(1+2, then 2+2. Good responses from lookers. For a while used 133X, eliminating IV. to emphasize J and the two close-ins.) 15-d. MOON(Rose 9:23PM from behind Rec. Pier. 50X w/filter. Tycho region + a few limb craters. Lookers liked alot.) VISIT(Mark Easley, a Admr's Cup musician. I requested Light My Fire but never heard it played.) HH(In good form. Leg not a problem AFTO ACCIDENT!(Put a 3" vertical scratch in "Barrett's" rear bumper pulling out of parking slot. Guy irate at first, then settled down. We exchanged info, At home I rpt! accident to Geico. In morning recv'd call from Geico Claims Dept. saying is "property damage" w/no deduct on my policy and Geico will take care of matter from here on.) \$89.73 (\$24.25/hr.) TOTAL THIS PAGE = \$299.94 TOTAL THIS YEAR = \$299.94

TOTAL SOLAR ECLIPSE OF 2017 AUGUST 21



- 2643) 04/12/15(SAT)FPT(8:00-11:20PM). Clear, mid-40's, sl. wind at start. PARKING(After sitting for a while had to circle sq. By dumb luck found spot on W. side!) HH(A bit tired and a bit depressed, so had to work extra hard to keep my voice strong. Difficult!) JUPITER(0+4, then 1+3, Io disappeared in front of J 8:30PM and emerged 10:47PM. FACT-OID: Io orbits Jupiter at approx. 38,765MPH! 80X, then 135X, then back to 80X. Actually, lookers have no problem w/80X, tho I'd like 100X better. All lookers astounded!) VENUS (1X for visitors. Gibbous phase.) VISITS(Sonia, Jeff and nephew, Jay, a student at Stevenson Col. Bob, water taxi supervisor, who gave me 2 all-day passes! A big gang of physicists attending an American Physical Union conf., one of whom remarked "You picked the right night to be here!") PACKING UP PRECAUTION(Last lookers were 2 inner city youths, one of whom was showing a lot of interest in my "hat". They looked at J and I gave them stickers/facts. Worried they might accost me as I was heading for my car, left "hat" with Pretzel Twist to retrieve later.) HOME(Parked front of hse.!) \$140.04(\$42.05/) SATURN(12:30AM at home, spotted 20° high in SE. Hope to acq. mid-May in FPT.)
- 2644) 04/12/15(SUN)CHAS.VIL.(8:07-9:40PM). Intended going to FPT, but as hadn't recuperated sufficiently from last night, took the easier path. Clear, steady cool breeze. Good thing was wearing winter sweater & jacket. JUPITER(1+2, then 1+3). As usual, most lookers pleasantly surprised by sight. Gave out lots of stickers/facts.) BOLTS(A bit harder to remove, as scope tilted from my loosening main one first. Hope no damage! \$26.00(\$16.77/)
- 04/18/15 Oy vey! This morning discovered the aluminum stool have been using for years on the "corner" is missing. For a while have been leaving it in car from stint to stint, but since car is locked is doubtful was stolen from there. Am suspecting I left it on the sidewalk in Chas. Vil. last Sun. Drove by today, but no signs of it. Need quickly to get a replacement!
- 04/18/15 ANNUAL HOWARD CC GREENFEST FLOWER MKT. FOR SOLAR OBTAINING WITH HAL. Not wanting to lug it a fairly long way, left scope home and took my Banneker Museum poster and handouts, instead. Set up on my card table on a shady path near the HAL scopes. Not alot of traffic. Gave out about 20 solar eclipse fliers, but I enjoyed talking about it.... explaining it to people, which I'M very good at(!). 11A-2PM. 51.9 miles. Next year should take projector scope, as it would have been a welcomed addition to the peer thru VISIT(Gabriele Hourticolon, who was layed off a few mos. ago as a MSEL book shelve.
- 2645) 04/24/15(FRI)FPT(8:10-11:30PM). Windy as left home, but calmed down quickly w/dark. Lucky parking in WT slot. Gd. sky. Mid-40'sF. Scene slow at start but picked up nicely. HH(Physically good, but depressed voice till near end.) STOOL(Substituted my wooden one in place of vanished aluminum stool. Worked ok, but want one less bulky.) JUPITER(3+1. Observed III eclipse IV, but no colors noticed. Most lookers pleasantly surprised. 6-DAY MOON(Great. Sharp as a tack!) Gave out lots of Jupiter stickers/facts. \$100.02(\$30.04/
- 2646) 04/26/15(SUN)C.V(7:50-9:43PM). CV rather than FPT because of last night's downtown riots caused by the death in police custody of Freddy Gray of Sandtown. Cool. Grt. sky. HH(In good form.) STOOL(Wooden one good on corner but hard to carry. Need a strap to hold it to handtruck.) 8-d. MOON(A squigen past ♃. Great @ 50X w/filter.) JUPITER(2+2, then 1+2 + star below. Lookers thrilled.) PHOTOS(Girl got good one of J + moons w/iPhone. Using new 3" tube slipped over diagonal for steadiness, got a good Moon one @ 50X but failed on a steady Jupiter one because of my shakiness. Is like I'm spastic trying to hold camera still. VISITS(Neighbor Robin's son Christopher. Emile & Kathleen. Sharon Black, long-time political organizer.) \$39.15 (\$20.71/hr.) Lots no-pays holding pizza boxes!
- 05/02/15(SAT)8TH ANNUAL BALTIMORE-ANNAPOLIS TRAIL "PLANETS WALK" ORGANIZED BY NASA'S JIM LOCHNER.(10AM-2PM) (35.2 miles) Good sky w/next to no wind. Morning attendance passable, but afternoon very slow. SUN(With SUNSCOPE projector. 2-very small spots which I hyped as best I could. Save out Sun and sunspots facts.) TOTAL SOLAR ECLIPSE OF 8/21/17. (Set-up my display board. Gave out +/-18 fliers.) SCOPE(Seemed very bulky to operate. Required many adjustments. Hard work!) HH(Did my duty to astronomy, but not much fun.) VISIT(Starman Jer at Venus station. Acq'd Venus in his scope by "go to". Free icecream.

TOTAL THIS PAGE = \$305.21

TOTAL THIS YEAR = \$605.15

2647)05/02/15(SAT)CHAS. VIL.(7:50-9:40PM). Grt. sky. Mild. Very busy scene...maybe due to 10PM city-wide curfew due to Freddy Gray murder riots, with lots of students staying close to campus instead of going elsewhere. HH(Leaving house felt very beat from afternoon's "planets walk" event. Once set-up, however, revived and felt good...in good head.) NEARLY FULL MOON RISING(Gorgeous, both by eye and thru scope. Tycho.) JUPITER (0+3+stripes.) Most lookers blown away by both Moon & Jupiter looks. VISIT(Susie, the Japanese kamona vendor at the Fmrs. Mkt. Two city policeman.) \$48.04 (\$26.11/hr.)

2648)05/04/15(MON)C.V.(8:10-10:21PM). WOW!..a very busy night with a steady stream of appreciative lookers, many JHU students! Warm...70'sF. Mediocre seeing. HH(In good form....maintained needed energy level, articulate.) JUPITER(2+2 briefly, then 2+1. "Stripes" kind of murky.) FULL MOON(Acq.'d 9:45PM. A bit hazy. Tycho. May Smithsonian Mag. has art. on origins of movie 2001 "Monolith". I sent ltr. to ed. describing how it comes into my "street" telescope routine. Rec'vd ltr from mag. ed. suggesting I come to DC for coming 2001 showing.) VISITS(Ruth...an artist friend, Jennifer, a local minister, who asked if I were married. Utkarsh Singh, 443-970-8809, usingh@jhu.edu....a JHU grad std. seriously interested in astronomy and my work.) HOUSE(New roof installed today.) STORYCORPS(Call from Maya saying John Jr.'s and my interview of late last year to appear in a forthcoming NYT Sunday Magazine!) NEW 18mm EYEPIECE(Will probably return to Adorama, as is heavy, bulky, and smears easily.) VISIT(A big, friendly, interested Balto. policeman. 2nd visit.) \$djourned to the Giant. \$105.12 \$48.22/hr.)

2649)05/07/15(THUR)C.V.(8:07-10:03PM). Grt. sky. Mild 70's w/cool breeze. Moderately busy scene. HH(In ok form.) JUPITER(3+1+good stripes. Lookers very pleased. Could see white equatorial zone.) SATURN(Above roof 10PM, but maybe behind leaves or washed out by street light glare.) VISITS(Rebecca?, a really hyper, animated, JHU student of French lit. Left on a bike. My regular 2 police friends.) \$28.55 (\$14.79/) More normal for CV! VISIT(A pleased couple donated two bottles of beer.)

2650)05/08/15(FRI)FPT(8:25-11:04PM). First FPT stint since Freddy Gray riots. Normal, busy scene. PARKING(Immediate...dumb luck lucky again!) OK sky. 70'sF. Short pants weather. JUPITER(3+0+stripes.) SATURN(Acq. 10:30PM. Dec. reading 2° low. Bit murky image due to parked fire engines Lookers liked!) HH(Not feeling great leaving hse. Drove to Chas. Vil., but finding no parking spot and quiet looking scene; kept going to FPT. Good move!) HH(A bit depressed, I guess. Struggled to remain articulate. Maybe due to sluggish BM prob., which corrected itself immed. upon returning home.) VISITS(Emily, Emily & Gabby...JHH biomed workers who said they regularly attend the monthly STScI talks! Very nice, 20-somethings. Jointed later by friend Barbara.) \$111.26 \$41.98/hr.)

2651)05/10/15(SUN)FPT(8:10-9:51PM). WT parking. Gd. sky. Warm but breeze rattled scope continually. JUPITER(3+1+stripes. Good. A 9:45PM convergence of I & II, but not colors noticed.) HH(Missed last night having not thoroughly recuperated from Fri. night. In good head. Articulate.) VISITS(Selwyn & wife from Fmrs. Mkt. celebrating Mother's day. Selwyn bought my aurora print and continues to rave about how good it looks framed on his office wall. A man who had an "I Saw...Saturn..." sticker in his wallet from years ago!) Quiet scene. Few lookers toward end of stint. \$39.00 (\$23.21/hr.) OFTEN ASKED QUESTION("How long have you been doing this?" My answer, "There are actually two answers to that: since Miss Wisner's 8th grade general science class, and I've been setting up here off and on for 27 years.")

05/12/15(TUE)CV. DRY RUN, as hi, thin clds. kept coming even after sunset and corner was very windy. A few passersby gave me friendly greeting, asking if they could help. Arrived in CV from taking Peggy Price to BWI, for which she paid me \$25.00, maybe the same as I would have gotten telescoping, so the night was not a total loss!

2652)05/14/15(THU)CV(8:30-9:58PM). Coolish.Gd. sky.HH(Good!)Should have gone to FPT, but clds question + getting up early tmw. for Bike-2-Wk. Day. JUPITER(2+2. Great!)\$13.00(\$8.84/) Guitarist Merdolph playing near by probably lessened my contribs. Earlier in day I suggested try here. Mistake!

TOTAL THIS PAGE = \$332.10

TOTAL THIS YEAR = \$937.25

CLOSE ENCOUNTERS

With 18 Baltimore Oddities

By Timothy Krølder / Photography by Joseph Kohl

C

THE GATE AT YORK ROAD AND NORTHWAY

CLIPPER INDUSTRIAL PARK
6300 Clipper Rd.

WOMAN'S INDUSTRIAL EXCHANGE
333 N. Charles St.

THE SHRINE OF THE DOG-FACED GIRL

THE HOPKINS STEAM TUNNELS
Charles and 34th Streets (underground)

THE CATACOMBS
Westminster, Churchyard, Fayette and Green Streets

CUSTOM CAR SHOWS
Baltimore Convention Centre

THE ORPHEUM CINEMA
1724 Thimble St., Belts Point

THE HOUSE WHERE CHRISTMAS LIVES (SEASONAL)
34th Street and Chestnut Avenue

THE OFFICES OF STEPHEN L. MILES
11 E. Biddle St.

THE BALTIMORE CITY LANDFILL
Quarantine Road (yes, Quarantine Road)

THE BUTTERY
1 E. Centre St.

THE MAIL

IN A WEEK, MAYBE TWO, WE'LL MAKE YOU A STAR

I WAS GREATLY SURPRISED AND, after reading the article, highly honored to have discovered myself listed as oddity number 18 (right after George Figgs' wonderful Orpheum Cinema) in "Close Encounters With 18 Baltimore Oddities" (CP, 5/24). For the record, I and my telescope have been written about in numerous area publications, but never have so many friends, acquaintances, and passersby commented that they saw an article about me as with this one in *City Paper*!

Herman M. Heyn
Baltimore

Editor's Note: Herman M. Heyn is better known as Baltimore's Street Corner Astronomer.

THE RENDEZVOUS LOUNGE
203 W. 25th St.

"DANGER—FALLING OBJECTS" ALLEY
1209 Hollins St.

THE SPORTSMAN'S BAR
412 Park Ave.

THE STREET CORNER ASTRONOMER

Various locations—usually Fells Point (clear nights only)

You'll be hurrying to the bank machine between work and supper, or on the way to the Orpheum, and suddenly there he is, this affable, grinning fellow with his cap, glasses, frizzly grey beard, and big telescope. His name is Herman M. Heyn, and he is the secretary of the Baltimore Astronomical Society.

"Have a look," is his usual invitation. (Once I saw a couple decline and hurry by brusquely, as if they were getting by a beggar or some cheap con artist. Imagine. What kind of blind, earthbound creeps would do such a thing?) You may have to stand in a short line for a few seconds, waiting for one or two others to look and say wow (kids take the longest), but then it's your turn to squint through that little peephole, and suddenly you are looking at Saturn, live—or a couple of hours ago, which is much the same. You can see the rings—which Galileo called "ears," thinking that God must be playing a prank on him to rebuke him for peeping into His realm—and maybe the pinpoint of Titan, the largest moon in the solar system, with its thick methane atmosphere and temperatures that might be suitable for primordial life. Or maybe you'll see the stark, jagged terminator of the Moon, remembering how we left a flag, Richard Nixon's autograph, and some golf balls up there. Or maybe the Orion nebula, a faintly glowing blotch of fog 400 parsecs away, where stars are being born.

When the light from these stars left on its long trip through the interstellar vacuum to reach your eyes, it was the Year of our Lord 662. The population of the whole earth at that time numbered less than two hundred million. European nations were still squabbling over the remnants of the Roman Empire, and the word of Muhammad was just starting to spread. Beck then, North America was a vast, sprawling wilderness, and it would remain that way for another 1000 years. And as you look "up there," the astronomer's voice recites statistics from memory—a meticulous, loving litany of rotational periods, lengths of years, perihelions, numbers, and names of moons, names from myth and Shakespeare.

After you've had your fill, drop a dollar or two into his hat and move on to let someone else look through the telescope. Afterward, you may be walking more slowly, and you may need to pause for a moment to remember where you were going, momentarily overwhelmed by the utter insignificance of You. The streets and storefronts look smaller, somehow unreal, and the people rushing around you, so intent on mulling over their little mental lists or jobs or what time the movie starts or sex, seem profoundly silly. Of all the strange, petty, and often useless vocation I have seen on this planet, I think this man's job is one of the most important.

18—MAY 24, 1991—CITY PAPER

2653)05/15/15(FRI)FPT(9:20-9:43PM). Crazy stint! Left home hoping clouds would dissolve at sunset, but they didn't. However, after 1½-hrs sitting on a bench, clear sky drifted in, and I set-up, thinking I'd now be in business for the rest of the evening...which was not to be. Only 20-mins. later sky was again covered with clouds. Figuring the end had come, I picked up, only to discover back home it was again clear. Ugh! This was PRE PRAKNESS NIGHT, the scene was busy, and I was hoping for a good stint to make up for last night! PARKING(Near immediate. First tried squeezing into slot adjacent to Zipcar slots, but was too narrow. Backed out and went to my usual B'way waiting place. Moment I arrived a man came to my car, said he was leaving, gave me his parking receipt with 2-hrs on it, and ergo I had the 2nd spot from the Kiosk!) COLD!(While sitting on bench watching sky I was buffeted by a steady, cold wind. Walked up to the B'way Goodwill to buy a sweater but was closed. By setup time wind had diminished, and I was ok.) JUPITER (3+1. Great-while it lasted!) VENUS(Still there after J clouded out. Slightly gibbous. At 220X still needed light reduction filter.) SATURN(With both J&V gone went for it, but no luck...probably too early.) HH(In very good form, both physical & mental.) VISIT (Balloonman Charlie and wife, who I met outside a bar on my way back from Goodwill.) \$11.00 (\$28.70/hr.) P.S. While waiting on bench, somebody gave me a lemonade! VISIT (Had a good discussion with a young couple re life in outer space. He took the "to scale" position, that universe is so huge there's got to be lots of life out there. She agreed with me that life is extremely rare, even that we may be alone.)

2654)05/19/15(TUE)FPT(8:25-11:25AM). Warm. Gd sky. PARKING(Lucky! Car left WT slot just as I was arriving.) JUPITER(1+3, then 0+3. Striped. Good, except needed slight collimation.) SATURN(Starting 9:30PM, struggled to find it amid lights w/o success. Finally acq'd 10:20PM. Put up Sat. sign, gave our stickers. Gd at 80X.) VISIT(Stacie Votaw, sales dir. of Hotel RL, 207 E. Redwd., opening later this yr. Might be a good place for Eve & fam. to stay.) HH(Good, but wearing down toward end.) VISIT(John Spurrier of Chas. Village.) \$95.70 (\$31.90/hr.) SCENE(Slow at start but picked-up nicely.)

2655)05/22/15(FRI)FPT(8:26-11:00PM). Cool. Gd sky. PARKING(Instant WT slot. 4th lucky night in a row! Also, thankgoodness, because was very tired, got parked in front of house at home.) BOB'S KNOBS COLLIMATING SCREWS(Installed yesterday. Was worried image would be poor at start, but was ok on Moon. But then had to recal. on Jupiter and later on Saturn. Need time a lone w/scope to get it right. Is a lot different than old allen wrench operated screws.) 4-d MOON(Super. Lookers agast!). JUPITER(4+D+stripes. Some lookers agast!) SATURN(Acq'd. 10PM by eyeballing. Lookers thrilled.) Gave out both J & S stickers. Ran out of J Facts. HH(Tired leaving home, but once set up, rose to the occasion! Good voice.) FELL'S POINT(Feel privileged to have such an interested, interesting, polite clientele as I have there....and in my home town!) VISITS(Oscar, ..need "Brian". One time contra dancer, now an over-the-road truck driver. Says loves work. Lindsey Roylance. Happy to see me. Says now lives in FPT.) \$92.39 (\$35.95/hr.)

2656)05/23/15(SAT)FPT(8:17-11:10PM). Cool. Grt. sky. PARKING(5th lucky night in a row. Empty slot 5 from Kiosk. Beginning to think there's a FPT parking god looking out for me!) BOB'S KNOBS(Not nearly as firm as old screws. Needed to re-col. numerous times. Will try to firm them up, otherwise will go back to old screws/wrench.) JUPITER(2+2+stripes.) SATURN(Acq'd 9:50PM. Titan spotted by looker. Got good col., somehow!) HH(Dragged myself out the door, but was ok "on stage".) Lots of appreciative lookers.\$66.71(\$23.08/) STICKERS(Kinkos able to cut down my just bought 3"x3" to 2"x3", meaning don't have to cut down myself with linoleum knife. A great advantage!) VISIT(Dave of MdScCtr.)

2657)05/24/15(SUN...Mem.Day eve)FPT(8:16-11:13PM). Sl.cool. Clds threat, then gd.sky. PARK (Lucky again!) BOB'S KNOBS(Col. gd at start, but had to re-do several times. Getting a little easier.) 6d-MOON(Absolutely breathtaking at 50X! Woman got fairly decent iPhone twilight pix.) JUPITER(2+1+sortof stripes.) SATURN(Acq. 10:40PM. Gd. but w/oTitan.) VISITS(Joseph Kepler, who'd read up on K, agreed was most interesting person ever lived and claimed to be a distant relative! Ellen Sabol, who said we met once as she tried to sell me long term ins. Upheat lady! Josh Foti of Ryleigh's Oyster. Gave me his card w/ invite to free lunch. Enthusiastic looker! Still have his card from 06/03/11! Sabol said has lots of my note cds. Victoria, young lady who bought me lemonade.)HH(Dragged myself out the door but mustered necessary enthusiasm for gig.) \$127.80(\$43.32) Busy scene at first which had dropped off by +/-11PM

TOTAL THIS PAGE = \$393.60
TOTAL THIS YEAR = \$1,330.85



Aboard the *Cunard Adventurer* (seen at St. Thomas, Virgin Islands, in George Lovi's picture below), Herman Heyn obtained this unique picture of the entire eclipse on a single 24-by-24 frame of High Speed Ektachrome film, with a 250-mm. lens on a Mamiya C220 camera. The record begins at top left, and has north in the sky to the left.

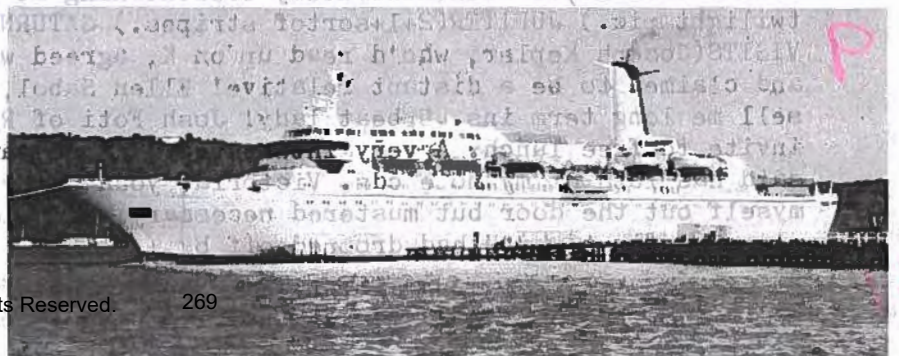
from the disappearance of the last bit of photospheric light to the reappearance of the first bit.

Cunard Adventurer. Since the motion of a ship would not allow the usual fixed-camera eclipse sequence, in which the diurnal motion shifts the images (as on page 147), passenger Herman M. Heyn of Baltimore, Maryland, adopted the array shown above. To aid aligning the images, he punched out every other square of six-line-per-inch graph paper and pasted it on the viewing screen of his

twin-lens reflex camera. Using the tripod's universal-joint head, he could center the sun in a hole for each exposure.

A neutral-density-5.3 filter was used

for the partial phases, 1/250 second at f/11. The diamond rings, without filter, were 1/250 at f/10; prominences at second and third contact, 1/250 at f/14; inner



2658) 5/29/15 (FRI) FPT (8:05-10:25PM). PLW'S #161 PARKING (6th in a row lucky! PLW spotted car leaving 2nd slot from Kiosk just as we arrived.) PARKING AT HOME (After years of wanting to put a traffic cone in front of house to hold spot for returning. It worked! Will do again when spot directly in front of house.) SKY (Moon ok at start but shifting haze forced a suckerhole situation.) 12d-MOON (Tycho + craters on S rim. Good when no haze.) JUPITER (Acq. 9:30PM! 3+1+stripes. Came & went in haze.) VENUS (Fall back from J. Half "moon". Nice at 166X.) BOB'S KNOBS (Collimation ok on all 3 objs. No coll. req'd.) VISITS (Looker from +/-1992. Saw Saturn with kids, one of which now a lawyer. Put \$\$ in hat, saying "Buy your wife a pastrami sandwich," to which I replied, "I already did today at the Suburban Hse", which gave him a big laugh. An inebriant claiming to be a physicist with a new Grand Unified Theory for which he will win a Nobel Prize and have his picture in the Baltimore Sun. Man saying he's invented a monthly Moon calendar consisting of images of the Moon's phases under which are hooks on which you hang numbers representing the cur phases dates. Man who dropped \$5.00 in hat saying had looked a while ago but not paid.) HH (Dragged out of house, feeling a bit tired, but performed well.) \$51.61 (\$22.06/hr.)

2659) 5/30/15 (SAT) FPT (8:04-11:35PM). PLW'S #162 PARKING (7th in a row lucky! I spotted car ready to leave. PLW spoke w/driver, who gave her his parking meter slip and left.) HOME (Tried "cone" again, but it was moved. Parked around corner.) Threatening clds. early, but then ok sky. Cool breeze. 12d-MOON (Tycho, etc. Lookers impressed.) JUPITER (3+1+sorta stripes.) VENUS (For some reason looker demanded to see it thru scope. I obliged. Wife put \$5 in hat. Gave looker Venus Facts.) SATURN (Could have been better image, but ok w/lookers. No Titan) B's KNOBS (Had to tweek 4-5 times. Am considering re-installing Meade's screws, which were good for long stretches of time.) VISITS (Christine & Peter Fillat, C. was extremely excited about seeing me again after a long lapse. Wrote "thanks Herman!" and christinafillat@verizon.net on my file card. Kevin McWha Steele, who was very anxious to look at Jupiter, saying he's just published a book of 300 poems, some of which concerned Galileo. Otherwise, lots of friendly, enthusiastic, appreciative lookers.) \$115.61 (\$32.94/ALIGNMENT (Near perfect, letting me easily find my planets "by the numbers".) YOUNG WOMAN WITH NO LEGS IN A WHEELCHAIR (Attending a bachelorette party with friends. When her time came, her friends placed her on my stool as I lowered the scope so she could HAV-A-LOOK! She was visibly thrilled by seeing Jupiter with its moons. Of course, she rec'd a sticker and "facts". Being able to bring such an unusual experience to such an incapacitated person was a very gratifying experience for both me and Phyllis.)

06/05/15 (FRI) DRY RUN TO FPT. CLOUDS THAT WOULDN'T LEAVE. Adjourned with PLW to Cat's Eye, because a telescope viewer had told her there was a sign there with a question, the ans. to which was "Port Arthur". Give the ans. and get a free beer. We didn't find the sign. Meanwhile, we had an extended conversation about his travels and Ethan's Rolling Stones job with a man from Greater Northwood (Mike) sitting at the bar. He took photo of us.

2660) 06/07/15 (SAT) FPT (8:15-10:36PM). PLW'S #163 (leaves tmw. for STL). PARK (Approaching sq. we turned left into top metered slot! Lucky #8! Leaving home placed parking cone in front of hse. Was there upon return!) Busy scene. Mild. Clds. blocking Jupiter, but waining crescent VENUS in view. 135X w/filter. Lookers liked! SATURN (Jupiter sign on scope but J still not avail. When believed S in clear I went for it. As near perfect alignment, acq d 1st try. Usual, awed reaction from lookers. No Titan.) JUPITER (Finally! 2+2+stripes. Breath-catching for lookers!) Spent end of stint hopping from Saturn to Jupiter to Venus Packed up when both J & V set. COLLIMATION (Having re-done at home, was good all night.) HH (Tired, but in very good form.) FELS PT. (Both the atmosphere and quality of lookers make it an ideal place for "street" telescoping. I feel very lucky to have it right in my own back yard!) Both a very busy and demanding night! \$109.46 (\$46.58/hour) VISIT (Matt, who worked at the Golden Temple healthfood store and now works at one on S. Light St. Inquired about Neil Hettleman. A young man who was very excited seeing the EDUCATION IS THE KEY bumper sticker on my scope case and photographed it.)

TOTAL THIS PAGE = \$ 276.68

TOTAL THIS YEAR = \$1,607.53

LONDON LABOUR AND THE LONDON POOR.

he can see the men fighting in it.' This made me laugh so, I very nearly let her tumble by taking my shoulder away from under her. But when she came down the steps, she said something quite moved me. She threw her hands up and cried, 'If this moon is so beautiful and wonderful, what must that God be like who made it?' And off she went. It was very fine, wasn't it?

"Sometimes when I'm exhibiting there is quite a crowd collects. I've seen them sitting down on the curb smoking and drinking, whilst they are waiting for their turns to have a peep. They'll send to the public-house for beer, and then they'll stop for hours. Indeed, I've had my business quite interfered with by the mob, for they don't go away after having their look. I seldom stop out after 12 o'clock at night."

"Sometimes when I have been exhibiting, the parties have said it was all nonsense and a deception, for the stars was painted on the glass. If the party has been anything agreeable, I've taken the trouble to persuade him. I've, for instance, placed the star on the very edge of the glass, and then they've seen it travel right across the field; and as I've told them, if it was painted it couldn't move and disappear from the lens."

"Most of the spectators go away quite surprised and impressed with what they have seen. Some will thank me a dozen times over. Some will say, 'Well, my penny is well laid out. I shouldn't have credited it with my own eyes.' Others, but there are very few of them, won't believe when they have looked. Some, when I can see the moon on their eye as they look in, swear they don't see it. Those I let go on and don't take their money, for the penny is no object. When I tell the people what the wonders of the heavens are, and how each of these planets is a world, they go away wonderfully grateful and impressed."

"I went down to Portsmouth with my telescope at the time the fleet sailed under Sir Charles Napier, and the Queen led them out in her yacht. I took a great deal of money there. I didn't exhibit in the day-time: I didn't trouble myself. I took two guineas showing the yacht the day she sailed, and at night with the moon. The other nights, with the moon and planets only, I took from 12s. to 14s. I refused 15s. for one hour, for this reason. A lady sent her servant to ask me to go to her house, and my price is one guinea for to go out, whether for an hour, or two, or three; but she first offered me 10s., and then the next night 15s. Then I found I should have to carry my instrument, weighing one cwt., two miles into the country, and up hill all the way; so, as I was sure of taking more than 10s. where I was, I wouldn't for an extra shilling give myself the labour. I took 12s. 6d. as it was. At Portsmouth a couple of sailors came up, and one had a look, and the other said 'What is there to see?' I told him the

moon, and he asked the price. When I said 'One penny,' he says, 'I ain't got a penny, but here's three halfpence, if that's the same to you;' and he gives it, and when I expected he was about to peep, he turns round and says, 'I'll be smothered if I'm going to look down that gallows long chimney! You've got your money, and that's all your business.' So you see there are some people who are quite indifferent to scientific exhibitions."

"There are, to the best of my knowledge, about four men besides myself, going about with telescopes. I don't know of any more. Of these there's only one of any account. I've seen through them all, so I may safely say it. I consider mine the best in London exhibiting. Mine is a very expensive instrument. Everything depends upon the object-glass. There's glasses on some which have been thrown aside as valueless, and may have been bought for two or three pounds."

"The capital required to start a telescope in the streets all depends upon the quantity of the object-glass, from 3l. to 50l. for the object-glass alone."

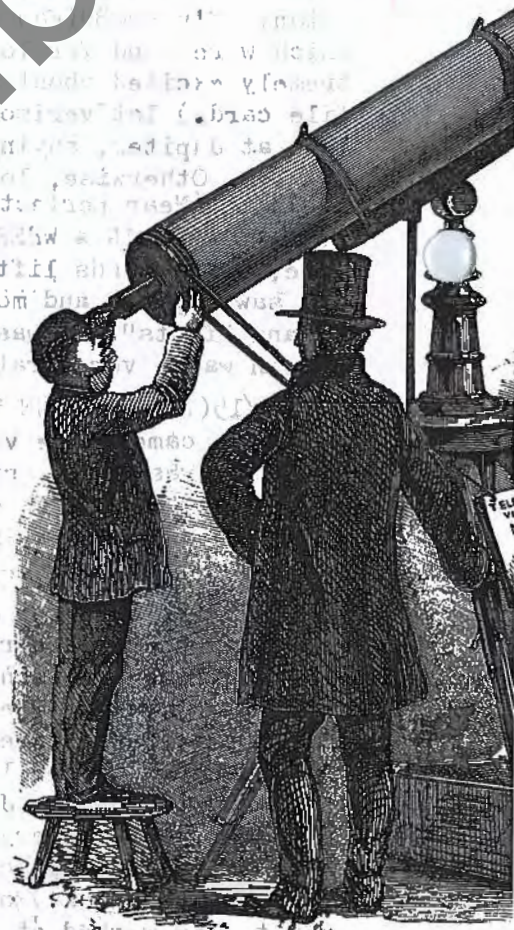
"Nobody, who is not acquainted with telescopes, knows the value of object-glasses. I've known this offer to be made—that the object-glass should be placed in one scale and gold in the other to weigh it down, and then they wouldn't. The rough glass from Birmingham—before it is worked—only 12 inches in diameter, will cost 96l. Chance, at Birmingham, is the principal maker of the crown and flint for optical purposes. The Swiss used formerly to be the only makers of optical metal of any account, and now Birmingham has knocked them out of the field: indeed they have got the Swiss working for them at Chance's."

"You may take a couple of plates of the rough glass to persons ignorant of their value, and they are only twelve inches in diameter, and he would think one shilling dear for them, for they only look like the bits you see in the streets to let light through the pavement. These glasses are half flint and half crown, the flint for the concave, and the crown for the convex side. Their beauty consists in their being pure metal and quite transparent, and not stringy. Under the high magnifying power we use you see this directly, and it makes the object smudgy and distorts the vision."

"After getting the rough metal it takes years to finish the object-glass. They polish it with setin and putty. The convex has to be done so correctly, that if the lens is the 100th part of an inch out its value is destroyed."

"The well-known object-glass which was shown in the Great Exhibition of 1851, was made by Mr. Ross's hands (of Featherstone-building, Holborn) for four years before it was finished. It was very good, and done him great credit. He is supposed to have lost by the job, for the price is all eat up by wages pretty near."

"The observatory on Wandsworth-commons



STREET TELESCOPE EXHIBITION

(From a Photograph.)

- 2661) 06/10/15(WED)FPT(8:26-10:28PM). PARK(5-min. T-cone at home...great help.) Cool wind at start, then warm. Grt. sky. Slow scene. Slow start, then better. VENUS(½ moon.) JUPITER 1+3+good stripes. Lookers liked.) SATURN(Nearby light hack on making it challenging, but could see in finder. Bright orange backgrn. in scope, but lookers awed.) COLLIMATION(Good HH(Forced self out of house but ok at "work".) VISIT(Ray, an upbeat young woman on bike who said my Moon Facts in her "memory box". She saw Jupiter and got J Facts and sticker for her box.) \$44.47 (\$21.80/hr.)
- 9 06/11/15(THU) DRY RUN TO FPT. High, hazy clds. arrived early evening. Went down on the gamble they'd dissolve at SS, but they didn't. Could have done Venus for a while, but couldn't get excited enough about it to set up. PARKING(Immediate! T-cone at home.)
- 10 2662) 06/16/15(TUE)FPT(8:39-9:56PM). Sticky hot! Shut down by clds. Park in WT slot after circling once. Slow scene. Adverse rpt, leaving home, but with +/-50% cld cover decided to go. Worked for a while! VENUS(Waning crescent. Nice.) JUPITER(2+2+stripes. Lookers liked SATURN(Acq.9:42PM. w/Titan. Real good while it lasted!) HH(Tired, + head fog, which I had most of day. Otherwise, performed well.) Adjourned to Bop Pizza for slice. \$28.03(\$21.90/TELESCOPE(Working real good.) HOME PARK(Traffic cone. Brigit moved her car for me.)
- 9 2663) 06/21/15(SUN) SUMMER SOLSTICE 12:38PM. SS 8:36PM. (8:30-10:25PM). PARK(WT, but in mirror saw car leaving Kiosk slot and quickly went there. TC parking at home. Great!) Hot and humid. Needed shower at home. Fairly busy scene. HH(Slight cough probably due to air pollution.) Challenging night! 5d MOON, VENUS, JUPITER, SATURN w/TITAN, + intermittent clds. which finally ended stint. Whew! PHOTOS(2 lookers got good Moon ones w/iPhones. I really should buy an iPhone adapter!) VISIT(Selwyn of Fhrs. Mkt. announcing has just been appointed Johns Hopkins personal director!) \$46.04 (\$23.98/hr.)
- 10 2664) 06/24/15(WED)FPT(8:25-11PM). EXCEPTIONAL NIGHT! PARK(Immediate!) Arrived to find a well attended ragae concert at north end of Square. Set up in center where concert goers could see me; letting Jupiter and Venus go in favor of the Moon and Saturn. I think it worked. Great sky, great planets, great lookers, HH in good form! 8d-MOON(Terrific in twl. @ 50X, then 80X and 133X.) JUPITER(Briefly. 0+3 in a tight line, prompting a looker to ask if they were Orion's Belt!) SATURN(Ring + Titan + Rhea. Happily, street light near Saturn is out!) VISIT(Joel and Ann, a couple who got engaged a yr. ago after seeing Saturn thru my scope and receiving stickers! A famous male actor, who's name I didn't learn.) BUNGEE SAGE!(At home discovered 2 bungees which hold scope to handtruck were missing. Was totally baffled! Found a substitute in basement to bring scope up front steps and into house. 4:30 AM drove to FPT to see if I left them on street where I'd parked. No luck. Breakfast at Jimmy's. Just as I left Jimmy's a man walked by holding a bungee, dropped it in a trash can, and went into Jimmy's. I picked it out of the can and discovered it was one of mine! Went into J's and asked him where he'd found it. He said in street out front and that he picked it up because once he ran over a bungee and got a flat tire! I looked and looked again but couldn't find 2nd one. Real pleased to retrieve at least one, as I now know what to buy at Falkenhans to replace lost one.) RUMINATION(Though most of my lookers will pay a lot more for an icecream, a CD, or concert tkt., then they will put in my hat, I feel extremely good about both the entertainment and education I am giving the public of all ages, races, sizes, economic & educational levels, nationalities, and more!) \$81.24 (\$31.49/hr. The public's enthusiasm is uplifting, plus I'm having a lot of fun! Doing what I do best!
- 9 2665) 06/28/15(SUN)FPT(8:26-11:05PM). PARK(Immediate.) SCENE(Semi-busy.) SKY(Sl. hazy.) TEMP. (Low 70's w/wind chill. Wore cotton shirt & beret.) Another busy night! 12d-MOON(Tycho. Gave talk on. Nobody'd seen 2001.) VENUS-JUPITER(Toghter in finderscope. Can do 7/1 syzygy from my Kiosk spot. V very crescent!) SATURN(2° S of Moon, making for easy acquisition ANOTHER BUSY NIGHT! VISITS(Bob Prokop of HAL, who now lives in FPT. Emily, who attends STSci talks w/twinsfriends Gabby & Daniele + others.) HH(A bit of "head fog". Makes good articulation more of an effort. Don't like it at all!) ALBIREO(1X for Emily & friend, who helped me load up.) Traffic cone at home worked. \$72.00 (\$27.17/hr.)

TOTAL THIS PAGE = \$ 271.78

TOTAL THIS YEAR = \$1,879.31

(LAST YEAR THIS TIME = \$2,251.99) (= +\$372.68)

- 10
2666) 06/29/15(MON)FPT(8:30-10:55PM). PARK(3rd B'way slot.) SCENE(Semi-busy.) TEMP(Mid-70's. Sl. wind chill.) SKY(Looming clds. in W which took out Jupiter & Venus but didn't travel eastward. Otherwise, sl hazy.) J&V(1° or so separation. Very eye-catching. Lookers surprised V not spherical, at which point I explain and show V orbital diagram.) 13d-MOON (Tycho and limb craters. 1 looker'd seen 2001!) SATURN(Good, but Titan barely vis.) HH (Somewhat depressed and having to push myself to maintain necessary energy level.) VISIT (Hal, sl. hyper Jewish guy w/son and friends. Has a dr. friend in Monkton w/a roll-off roof obsv. who he wants me to meet. As usual, people who remember me from years ago. \$101.10 (41.78/hr...included a \$20 & \$10 contrib.) Traffic cone at home still working. WITH 13.09", THIS MONTH SET THE RECORD FOR BALTIMORE'S RAINIEST JUNE.
- 9
2667) 07/02/15(WED)FPT(8:23-11:13PM). PARK(Immediate.) At home traffic cone removed but got ok space.) SCENE(Semi-busy.) Warm. Sl. hazy sky w/intermittent clds. JUPITER-VENUS SYZIGY (Above hotel. Lots of people aware of it. 0.4° separation. The on edge of field, both fit in my 40mm K eyepiece. Before they looked at V, I asked lookers that since it was a planet, what shape should it be. Most said "round" and were surprised to see a crescent. I explained to all why that was so and showed diagram.) SATURN(Sans Titan.) JUST SHORT OF FULL MOON(Tycho + a few limb craters.) VISIT(Ted Rouse, who seemed particularly interested in Venus story. Referred him to Koestler book.) HH(Not depressed, making articulation a lot easier and voice a lot stronger...and stint more fun!) \$73.99 (\$26.08/hr.)
- 2
2668) 07/11/15(SAT)CHASVIL.(8:33-10:32). Mid-70's. Grt. sky. Traf. cone worked. CV because want to do Venus, which was too low for FPT. VENUS(Good crescent. Lookers surprised. None were aware of historical significance of what they were seeing. I explained as briefly as I could. 135X/filter. Left 9:20PM. +/- \$25) SATURN(Had to totally pack up and move from Venus spot to corner, where I was greeted with two, very bright LED light high up on pole across 32nd St. Even so, could see Titan. Lookers impressed w/great image.) HANDOUTS (Gave out lots of both V and S stuff.) HH(In good shape, tho voice a bit weak. Discovered can still all required for a good stint. Pleased!) s = \$22.92. T = \$47.92 (\$24.20/hr.)
- 2
2669) 07/15/15(WED)C.V.(9:15-10:15PM) Late start due to not feeling up to it. However, when I looked outside and discovered a great looking sky, I just had to go! Warm, but with cool breeze, causing me to wear a cotton shirt & beret. PARKING(V. lucky in CV and traf. cone back home.) Moderately busy scene. Set up a yard+ north of usual spot to raise Saturn above LED lights across the street. SATURN(Slightly poor seeing, but lookers amazed. Titan barely viz. at 7-o'clock.) HH(In good form.) VISIT(Dwana Cobb, who writes a column for the Charles Villager. A student taking astro 101, to whom I gave all handouts. \$47(\$47/hr. Contribs included a \$5, \$10, and \$20! NEW HORIZONS(This was the day of the release of its up close on Pluto photos, but there was next to no discussion of it.
- 10
2670) 07/16/15(WED)FPT.(8:53-11:10). PARKING(Immediate, but had to squeeze by a big hole in street. Later, visitor Jay helped me back out w/o falling in! Traf. cone at home ok.) Semi busy scene. Warm. Sl. hazy sky. Set up E end of Sq. Later, w/Jay's help, moved farther E to avoid light. HH(Sl. depressed, requiring extra effort to sustain hi energy pater. Why? Maybe because didn't really want to be there?) SATURN(Lookers astounded. Titan barely vis. Used 166X somewhat.) B SCO(Just 2° S of Saturn and sl. E, but couldn't find. Why? Haze? Frustrating!) VISTS(Maren Rey on bike. A regular. Jay, visitor from day 1, who both helped me move scope and back car outto avoid hole in st.) \$67.00 (\$29.26/hr.) PLUTO(A number of "Can you see Pluto?" comments from passerby.)
- 9
2671) 07/18/15(SAT)FPT(9:10-9:50PM). Clds. threat leaving home so went to CV, but it looked so bleak I continued on to FPT. PARKING(Dumb lucky! Car pulled out just as I arrived.) HH (Not depressed, Felt good. Patter w/confidence came easily. Wish I were this way every night!) SATURN(Fine at start, then gradually by clouds. Too bad, Would have been a good night.) VISIT(A man who came across a "street" telescopist in Belize. When he told him there is one like him in Baltimore, the man responded, "Oh, I know of him. His name is Herman Heyn." I was both flabbergasted and pleased!) \$17.00 (\$25.50/hr.)

TOTAL THIS PAGE = \$ 354.01

TOTAL THIS YEAR = \$2,233.32

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A) MASON AND DIXON AND THE COMING TRANSIT OF VENUS

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Princeton University Press, 2000
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BOUNDARY LINES OF THE STATES OF MARYLAND, PENNSYLVANIA, & DELAWARE**
Gidson and Co., Washington, 1850
E157.B7 C7

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February, April, and June 2004 issues

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Princeton University Press, 1959
QB509.W75 1959

<http://sunearth.gsfc.nasa.gov/eclipse/transit/TV2004/city-USAL.html>

<http://www.transitofvenus.org>

EUROPEAN SOUTHERN OBSERVATORY
<http://www.eso.org/outreach/eduoff/vt-2004>

**"ACROSS THE SUN'S FACE, GOOD OBSERVATIONS OF THE TRANSIT
OF VENUS. Crowds Viewing The Rare Phenomenon—Smoked Glass
And Telescopes In Demand—Observations Taken At Columbia
College And Elsewhere." The New-York Times, December 7, 1882.**

**"TRANSIT OF VENUS OBSERVATIONS....observers connected with the
Johns Hopkins University succeeded in obtaining good observa-
tions of the second contact..." The Sun, December 7, 1882.**

B) BENJAMIN BANNEKER

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Maryland Historical Society, Baltimore, Maryland 1999 (2nd. edition)

Mark, John T.
MARYLAND, THE SEVENTH STATE: A HISTORY
Creative Impressions, Glen Arm, Md. 1998 (4th edition)

AUTHOR CONTACT: hermanheyn@hotmail.com

4
 07/19/20 (SUN) DRY RUN TO FPT W/LAURA MALICK (8-12MN). Laura (who in 1997 wrote "The Night Shift" biography, which is in my "street corner" album) called early eve, saying she'd found my City College '49 yearbook and asked if I wanted it. I said I would and then invited her to go telescoping tonight. She accepted, and I picked her up 8:45PM. SUDDENLY, AT BONAPART & HARFORD, CAR BEGAN TO ACT VERY STRANGELY. MADE IT TO THE 1500 BLK. E. NORTH AVE., WHERE IT DIED! WHAT TO DO!!!! Luckily I had my cell phone, with which Laura called Larry Bingman, a friend w/a pick-up truck. Larry arrived, and with a phillips screw driver extracted my key from the ignition, in which it was stuck. We then loaded scope stuff in to Larry's truck, and drove it to my house. Larry who, it turned out, is an AAA member called for road service. We returned to car to await road service's arrival, which took 1.5-hrs. Larry was pretty quiet, but Laura, a retired teacher, and I discussed school problems. Her main theme is that all the bad actors should be transferred out so the serious students can get on with their studies. Larry and Laura conversed with two gentlemen who live on the block. Getting impatient waiting for road serv., I asked Larry to hot-shot my battery, think-I could drive to Mid-Atlantic, my repair shop. He'd diagnosed the problem as the alternator and said I wouldn't get very far on battery alone, but he agreed to do it. I tested it, and the car seemed ok. Just then the tow truck arrived. Rob, the driver, agreed to follow us to Mid-Atlantic. At 25th St. car died. Rob loaded it onto his tow truck and we left it at Mid-Atlantic around midnight. I tipped Rob \$20, and Larry drove me and then Laura home. Unbelievably, we three stayed "cool" and in good spirits throughout the ordeal! 8AM Mon. I pedaled to M-A to describe the problem. By noon they's installed a new battery and new alternator = \$519.06. Peggy Price drove me to the 5th Regiment Armory, where I had a 10AM appt. with Off. Dooley in regard to my search for the flag my 12-yr. old father described in his 05/01/1907 article "The History of A Flag" in the Baltimore News. No flag found, but got some info I can follow up on. Otherwise, all day Mon, I was recuperating from last night. Amazingly, in my 27+ yrs. telescoping, this is the 1st time I've had a serious car problem! Also, it was TOTAL DUMB LUCK that I had both my cell phone and Laura with me who used it to call Larry...who was home! Without them both, I would have been really up the creek!

10
 2672)07/22/15(WED)FPT(8:30-10:02PM). Mix of clds/blue sky leaving home, but took a chance. Good for a while, then shut down by thick haze. PARKING(Immediate, next to ZipCars.)HH (Quite depressed. Forced patter. No fun. Why, as wasn't depressed during day. Is it psychological or physiological, or both?) 6d-MOON(Mostly at 50X. Great!) SATURN(Titan, barely. Lots of astonished lookers.)PHOTOS(A woman got Moon ones w/iPhone.) \$60.00 (\$39.22/hr.!) NEXT MORNING(Got somewhat depressed and dizzy writing this report.)

9
 2673)07/23/15(THU)FPT(8:45-10:45PM). PARK(15-min wait.) Great sky, warm but not sticky. WOW! (One of busiest nights ever...including lots of families w/kids and a group of +/-20 teacher .) 7d-MOON(Just short of 1/4. Awesome at 50X.) SATURN(Cassini Div. + Titan, 166X.) HH(NOT DEPRESSED, THANKFULLY, AS MADE HANDLING SO MANY LOOKERS FAIRLY EASY, AS WELL AS FUN! BY END WAS VERY TIRED.) VISITS(Gail, who was in one of my JHU sessions yrs. ago. Was leading the 20 teachers. Win Westervelt and brother, Mark. Win was a dancer and now lives in Alaska. Mark is administrator at Jemicy School.) K452B(A Goldilocks zone, Earth-like planet 1,400LY which made today's news and elicited lookers' remarks and q's.) \$83.00 (\$41.50/hr.)

10
 2674)07/24/15(FRI)FPT(8:48-10:52PM). PARK(Bad! Lost 1/2-hr. scope time. Bad at home, too. Trf. cone space squeezed. Had to park around corner.) 8d-MOON(1/4. Startling to lookers!) SATURN (Some "I don't believe it" reactions.) CLOUDS(Arrv'd 9:38PM. Decided to wait it out. Trained scope on Under Armour logo sign. Sky doable again 10:15PM.) HH(Good.) VISIT(Jason, a CV looker who called late afternoon saying he hadn't paid and wanted to find me tonight. Showed up and "paid" \$10.) \$55.62 (\$26.87/hr....incl. 37m clouds time.)

9
 2675)07/28/15(TUE)FPT(8:30-10:55PM). PARK(Slot between ZipCar & WT.) SCENE(On arrival slowest in memory.) Warm-sticky. Gd. sky. 12d-MOON(Tycho & vicinity craters. Pretty good for lookers.) SATURN(1 looker who just couldn't believe was real. Otherwise, many captivated lookers.) HH(In good form.) VISITS(Ingo Hessel of Ottawa, specialist in Inuit art. A couple from Chicago who know of Thomas' restaurant, and who said they'd look him up.\$50.95(\$21.05/hr.) VISIT(3 large Indian families to contributed a total of \$2.00.)

TOTAL THIS PAGE = \$ 249.57

TOTAL THIS YEAR = \$2,482.89

MASON & DIXON

& THE COMING

TRANSIT OF

VENUS

HERMAN M. HEYN

© 2004

10 2676) 07/31/15 (FRI) FPT (8:47-11:35PM). PARK (Lucky!) Busy scene. Warm. Good sky. DETOUR (Coming down Wolfe St. encountered monthly bicycle massing. Detoured to B'way. Delayed me +/- 15-mins.) Night of the Blue Moon. However, Moon behind Rec. Pier till close to 10PM. Lots of Blue Moon comments. Should have rigged a paper towel roll w/blue celophane for lookers to see Moon blue. Next time! SATURN (Ok, with Titan. Usual responses.). 15-d MOON (Craters south of Tycho. Discovered lookers more impressed with 165X on limb craters that whole Moon view!) HR (In good form. Experiencing anxiety attack late afternoon which subsided as I loaded car.) VISITS (Emily, who called ahead, w/friends. Myles Honig and wife, Brandy. Ann, a freq. enthusiastic looker.. Zena from Liberated Singles.) PACKING UP (Half packed to leave when a couple put \$20 in hat, saying they wanted to see Moon. Re-setup, after which whole thing started again for another 25-mins.) VISIT (Ron Legler and Donna, who put the \$20 in my hat. Also gave me a blue glass heart. Ron is manager of the Hippadrome Theater. Wants me to tell my Hipp. stories to bd. of directors.) \$123.50 (\$44.11 ISS (Thought I saw on Space Weather was due 10:19PM. Had lots of people gathered, but it never appeared. Why? Embarrassing!))

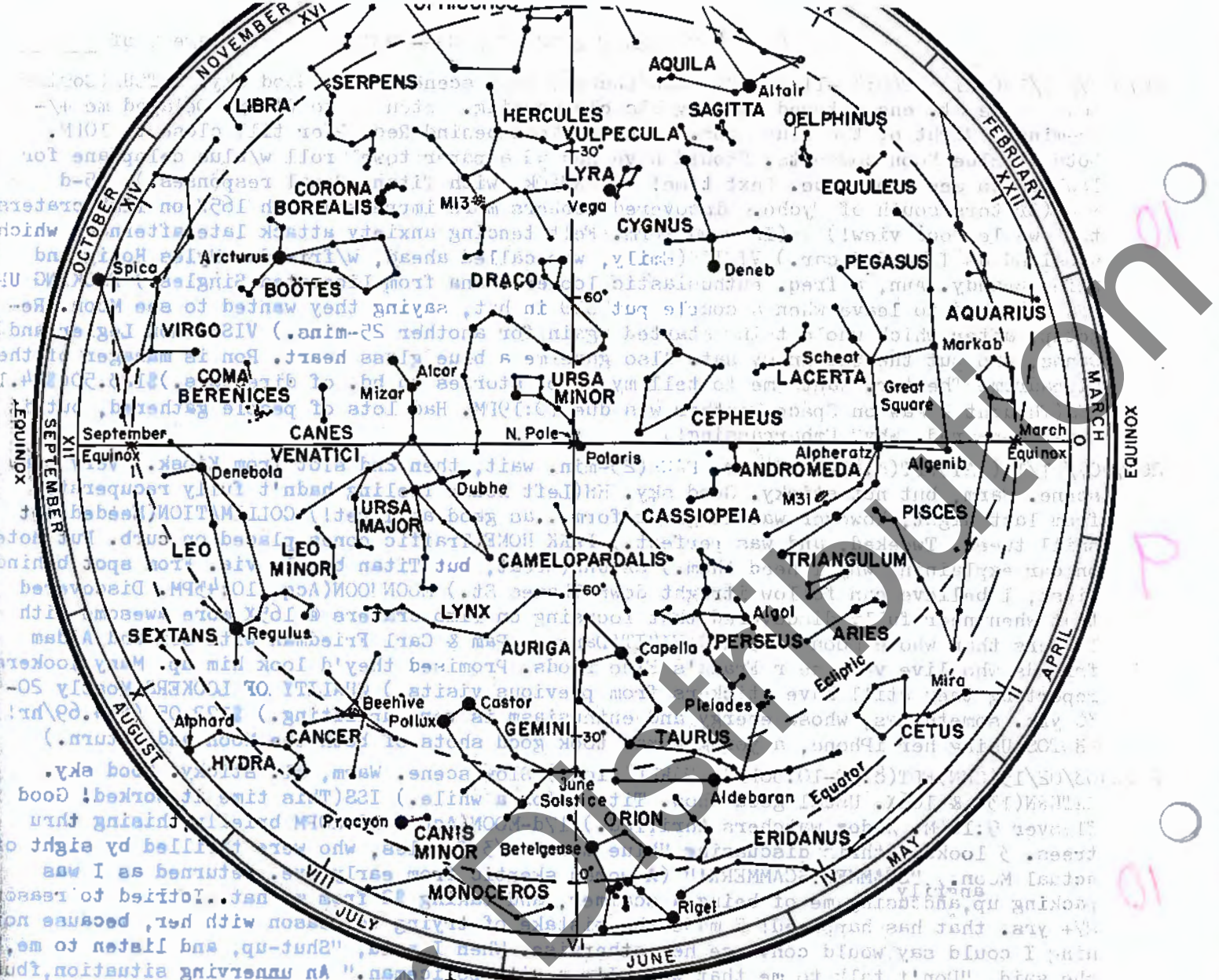
9 2677) 08/01/15 (SAT) FPT (8:43-12:34AM). PARK (25-min. wait, then 2nd slot from Kiosk.) Very busy scene. Warm, but not sticky. Good sky. HR (Left house feeling hadn't fully recuperated from last night, however was in great form...as good as I get!) COLLIMATION (Saturn not quite there. Tweaked, and was perfect.) PARK HOME (Traffic cones placed on curb. Put note on car explaining why I need them.) SATURN (Great, but Titan barely vis. From spot behind Kiosk, I believe can follow it right down Thames St.) 16d-MOON (Acq. 10:45PM. Discovered that when near full, discovered that focusing on limb craters @ 165X more awesome with lookers than whole Moon at 50X.) VISIT (Dancers Pam & Carl Friedman with son and A'dam friends who live very near Frank's Fine Foods. Promised they'd look him up. Many lookers reporting they still have stickers from previous visits.) QUALITY OF LOOKERS (Mostly 20-30 yrs. somethings, whose energy and enthusiasm is very uplifting.) \$172.05 (\$44.69/hr!) PHOTOS (Using her iPhone, a young woman took good shots of both the Moon and Saturn.)

10 2678) 08/02/15 (SUN) FPT (8:30-10:30PM). PARK (Quick.) Slow scene. Warm, sl. sticky. Good sky. SATURN (133 & 166X. Usual good show. Titan, for a while.) ISS (This time it worked! Good flyover 9:16PM. 1/2-doz watchers thrilled.) 17d-MOON (Acq'd 10:20PM briefly, rising thru trees. Happened as was discussing "blue moon" w/3 females, who were thrilled by sight of actual Moon.) "SCAMMER! SCAMMER!" (A woman skeptic from early eve. returned as I was packing up, ^{angrily} accusing me of being a scammer, and taking \$2 from my hat...only 2nd time in 27+ yrs. that has happened! I made the mistake of trying to reason with her, because nothing I could say would convince her otherwise. When I said, "Shut-up, and listen to me," she said, "Don't talk to me that way, I'm a city policeman." An unnerving situation, from which I was reminded to simply take an "as you wish" position w/such people.) \$50.89 (25.45)

9 2679) 08/05/15 (WED) FPT (8:47-11PM). PARK (Quick.) Moderate scene, Warm but comfortable. Sl. hazy, sl. unsteady sky. HR (Sl. depressed.) LIGHTS (10:15PM all lights on square went out. Made for mello scene but due to haze didn't greatly improve view.) SATURN (+Titan. No really insistant doubters, but used my new toilet paper roll "The Read Deal" scope several times.) VISIT (Rouse. We taled about stolen bikes and the Perseids, for which he'll be in Alaska.) \$48.00 (\$21.62/hr.) PARK HOME (Traffic cones worked.) VISIT (Erica, who used to live on 36th St. but moved to get married. With husband.)

10 2680) 08/08/15 (SAT) FPT (8:30-11:45PM). PARK (Lucky!) Busy scene. Great sky...lights still out, making a mello scene and letting me follow Saturn all the way down! HR (Feeling no so good all day, but top of game at scope!). Milt temp...even cool. SATURN, aSCO and B CYG once each. PARK AT HOME (Met by cop, saying had received complaint and that I can't do it any more. Big blow! Need to invent a new system...maybe w/signs on curb.) VISITS (Dancer Lee Brown. Brian Cool, a serious, young telescopist from Ecoust Pt. Dr. Omid Noroozian + his mother/father from Iran. Omid a postdoc at Goddard, an astronomer & scope maker. Knows of Babek. Has Dutch mother. We took family photos. #POPSCOPE...3 young people doing "street" scoping in Balto. w/a 90mm AA refractor. Very interested in me, as I am in them. We'll soon talk.) \$135.67 (41.74/hr.) LEAVING TOWN TMW. FOR 10-d IN STL W/PHYLLIS. VISIT (Dr. Tawil, my primary c. phy.)

TOTAL THIS PAGE = \$ 530.11
TOTAL THIS YEAR = \$3,013.00



10
P
10
10
48

- 2681) 08/21/15(FRI)FPT(8:17-9:48PM). Shut down by clds, which cleared 2-mins. later! PARK (6-mins.) PARKING AT HOME(Since a cop ordered me not to put traf. cones in street, I put them on the curb and tacked a sign to the tree saying PLEASE SAVE THIS SPACE/THANK YOU! It worked! Space open when I arrived home.) FPT(Semi-busy scene. Slow at scope.) 7-d MOON(A surprise, as had forgotten about it! Great draters, but "sucker hole" views SATURN(Thru sucker holes.) PLW(1st night back from 10-d's in STL w/PLW.) HH(Good form. ISS(Good flyby at 8:33PM, +43°. viewed w/Bob Prokop and a passerby cpl.) \$17.26(\$11.36/
- 9
- 2682) 08/22/15(SAT)FPT(8:22-11PM). PARK(Nerve racking 8-mins.). HOME(Worked again!) SCENE (Increasingly busy, but interest in me dropped toward 11PM.) SKY(Good. Temp. warm but not sticky.) 8-d MOON(Startling at 80X!) SATURN(Few °'s W of Moon, making it easy to acq.) HH(Not fully recuperated from last night. Voice weak.) VISITS(DOMINICK, my across the st. neighbor who's been in jail for last year! He asked if I remembered him. It took a few secs., but then I did. He looked good. Was wearing an ankle monitor and may have been with some other young men. Said would return later, but did not. KATHERINE HOLTER, young woman who works in development at Md. Hist. Soc. Was VERY excited by my routine, promising I'd hear from her. ANDY, who lives in FPT and works for NASCAR. May have met Steve Weber.) \$81.75 (\$31.08/hr.) SATURN(Lost 11PM.)
- 10
- 2683) 08/23/15(SUN)CHASVIL(7:55-9:15PM). PARK(Convenient.) HOME(Not to over stay my welcome, didn't post cones & sign. Had to park end of blk.) DISFUNCTIONAL PEOPLE(Have to deal w. more in CV than FPT!) 9-d MOON(Sunrise on Copernicus. Good as it gets on the Moon. Lookers stunned.) 167X) SATURN(TOILETPAPER ROLL TELESCOPE! Couldn't find w/scope. The man of the family waiting to see S said, "If you had a toilet paper roll, I could see it and you could follow ~~me~~ with your telescope." And that's what happened! I set the scope at the angle he was holding the roll, scanned a bit, and there it was. Amazing! Otherwise, S its usual impressive. +Titan) HH(CV because not fully recuperated from last night. Otherwise, in good form.) VISIT(Said...1st looker. JHU profs Ellen & Joel Robbins.) KIDS(A few, who I did very good with.) \$25.00 (\$18.80/hr.) SHUT DOWN CLOUDS. *These days I have a toilet paper roll with me as a joke on Saturn doubters. I tell them, "Ok, it's a slide. To see the real Saturn, use this." It gets the msg. across.
- 2
- 2684) 08/25/15(TUE)CHASVIL(7:55-9:54PM). PARK(After driving around blk. once, got best spot. HOME(Visitor to Bridget took my spot as I left. Back home discovered my space saved w/ my 2 traf. cones. Thank you Bridget!) 11-d MOON(Tycho quite prominent. Talked it up.) SATURN(+ Titan. Acq.8:13PM. Terrific till degraded by building heat. HH(Good form, but sore right foot dragged me down a bit. Doc. appt. Thurs.) \$30.39 (\$18.42/hr. VISITS(Chris Eberhardt. Steffy, a very enthusiastic looker. Alice, who saw a glowing Facebook pnskyon me by Monday night lookers. Guessing was my toilet paper roll family.)
- 2
- 2685) 08/26/15(WED)FPT(8:40-10:20PM). PARK(Worst ever! Lost 40-mins. scope time. Ended up on Lancaster St. beside Jimmy's.) HOME(Cones+sign worked!) Grt. sky, mild. SCENE(Pretty busy.) 10-d. MOON(80X on terminator craters. Good!) SATURN(Excellent! Some doubters. Used toilet paper roll to good effect!) HH(Rattled at first from parking stress but then good.) VISITS(Elle & Rey at start, but never returned. Tearful, ~~stagnant~~ young woman saying her Boy friend thru her wallet in the "ocean". I'daid, "Well, I guess you don't want to see him again," whereupon she said, "I do, because I love him.") \$53.00
- 9
- 2686) 08/28/15(FRI)FPT(8:03-11:02PM). PARK(Immediate...WT + few inches into Zipcar.) SCENE (Busy.) SKY(Great, warm.) HH(Tired. Effort to stay articulate.) STORYCORPS RADIO INTER VIEW(Me, w/Johnny Heyn my interviewer. At least a doz. very positive comments. Also re cv'd many phone calls and emails. CBS News may come down to film me. Invite from British Embassy to give lunchtime talk.) SATURN(+ Titan at first. Lost in lights 10:30PM.) 13d MOON(Rim craters at 50X & 80X. Tycho prominent)VISITS(Elle & Gabby. 4 young women very excited by interview. Got great "selfie" w/me, then disappeared.) \$83.00(\$27.85/) PARK HOME(Good, but 2 of 3 tacks holding sign on tree were removed & stuck on tree!) VISIT(Two members of POPSCOPE, Seth & ?. Helped me load up. Said would contact.)
- 10

TOTAL THIS PAGE = \$ 290.40

TOTAL THIS YEAR = \$3,303.40

*VISIT(Janet from the accordion club & husband celebrating one or another's birthday.)

P

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042

I researched and wrote this article intending to share my fascination with the history surrounding transit of Venus with the public. I mailed or announced it (can't remember which) to newspapers in towns along the Mason-Dixon Line. But alas, none responded. The Md. Historical Society has a copy.

I researched and wrote this article as a way to convey the fascinating history behind the June 4, 2004 Transit of Venus to the public. I mailed it to newspapers for publication in towns all along the M-D Line. But alas, to my knowledge, none the best of my knowledge, none used it. Both the Md. Historical Society and the Pratt Maryland room have copies.

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9
09/05/15(SAT) DRY RUN TO FELLS PT. Set up and searched for Saturn, but thanks to lights and clouds, no luck finding. Too bad because was a VERY busy scene. PARKING(Bags of trash blocking two WT slots. Moved them and took one slot.) STORYCORPS(Recv'd at least 1/2-doz. good reviews. 9:45PM at home rec'd phone call from SC listener wondering if will be out tomorrow night! No, because will be at Deck Buster party.) HH(High energy.) Took in \$1 for U.A. logo view. CLOUDS(Pulling into Giant 9:30PM sky full of clds. 15-mins. later was clearing.) "Wood & Strings", a terrific folk music group playing on corner. I invited to D.B. VISITS(Lauren ? who heard me on SC. Susana Deustua, Ph.D. of STSci who heard SC and is both an amateur and professional astronomer.

09/06/15(SUN) DRY RUN TO KURT & CATHY MILAM'S 33RD ANNUAL AND LAST BACKYARD "DECK-BUSTER OLD TIMEY MUSIC PARTY. Have set-up scope 4-5 times previously. Is a tough hauling situation but decided I should do it for this final one. Firstly, was worried about how I'd get the scope from wherever I parked to the party. INCREDIBLY, AS I DROVE DOWN THEIR STREET I SAW A SPACE RIGHT IN FRONT OF THEIR HOUSE, AND TOOK IT! Huge number of addendees. Lots of friends, some of who heard me on StoryCorps and give me good reviews. Planned to do Albireo. However, as time drew closer to set up, I became more and more hesitant. In the past I welcomed challenging, unusual situations, but apparently no more, as I decided after some handringing not to setup. In any case would have been a good sky. At 8:30PM went to car to leave, but a doz. people were leaning on it listening to a front porch concert. I gave them the benefit of another 45-mins. of listening. Finally I said, "Anybody want to buy this space, I've got to leave." Everybody laughed and let me leave. Another reason for not setting up was that I was feeling dizzy and a bit wobbly when walking. Absent that, might have done!

10
2687) 09/07/15(LABOR DAY MONDAY) FPT(7:55-10:10PM). PARK(Immediate.) SCENE(Slow). SKY(Grt.) HH(Tiptop! As usual, telescoping solves all my ills and doubts!) SATURN(Acq.'d immediately, thanks to perfect alignment. 9:42PM hit light; 9:47PM ok again. 9:55PM writhing, so gave up. All in all a surprisingly good run!) B CYG(Collimated on. By no very slo scene, so gave it up after 2 lookers.) \$47.00 (\$20.89/hr.) VISIT(Joel Green of STSci. After I said I attend monthly talks, he asked if I'd heard him a few mos. ago, on planet formation. Embarrassingly, I couldn't remember!) SATURN(That it was so doable greatly surprised me. Was assuming Saturn season was kaput!) STORYCORPS(Rec'vd. +/-1/2-doz. "Heard you on the radio...you were great!" reviews.)

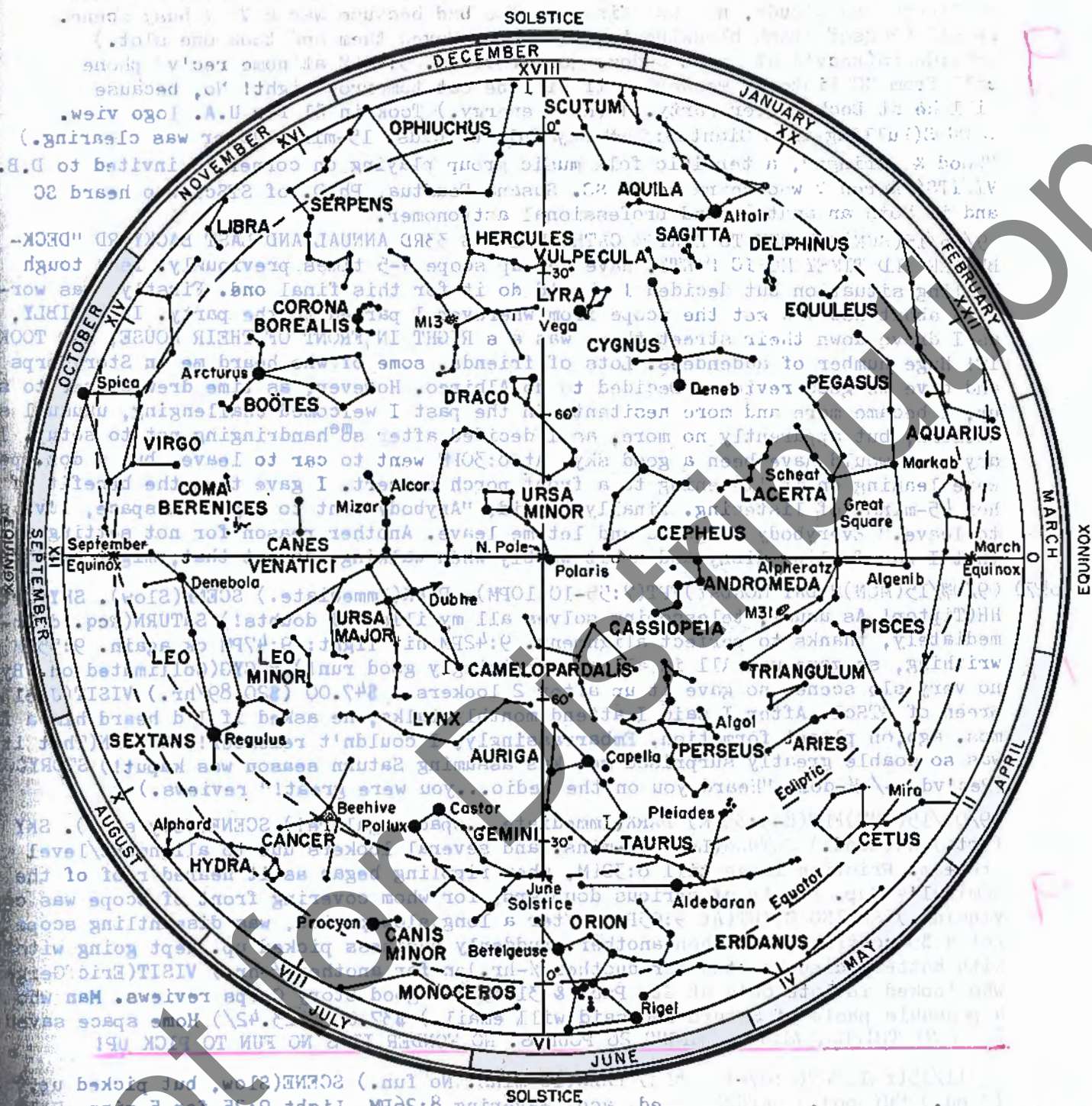
9
2688) 09/08/15(TUE) FPT(8-9:35PM) PARK(Immediate...spaces galore!) SCENE(Very slow). SKY(Grt.) HH(Good.) SATURN(Lost 10-mins. and several lookers due to alignment/level problem. Pristine image till 8:30PM, when rippling began as it neared roof of the Admiral's Cup. A pair of serious doubters, for whom covering front of scope was convincing.) ENDING STINT(At 9:05PM, after a long slow period, was dismantling scope when got a \$5 contrib., and then another. Suddenly business picked up. Kept going at 80X with battery disconnected and case laying open for another 1/2-hr.) VISIT(David Geiger, who looked in late 80's at St. Paul & 31st. 3-4 good Story Corps reviews. Man who took a passable photo of Saturn and said will email.) \$37.00 (\$23.42/) Home pk space saved
NOTE: MY TRIPOD, ALONE, WEIGHS 26 POUNDS. NO WONDER IT'S NO FUN TO PICK UP!

10
38
2689) 09/11/15(FRI) FPT(8:07-10:38PM) PARK(18-mins. No fun.) SCENE(Slow, but picked up.) SKY(Good.) HH(Good.) SATURN(Immed. acq. Wavering 8:26PM. Light 9:25 for 5-mins. Held till 10:10PM. Set 10:37PM. Amazingly, even as it was getting pretty murky looking, I had amazed lookers and even some doubters!) B CYG(Briefly, but as traffic was slowing gave it up.) VISITS(Emily Lavell who, w/sister Gaby, are regs. A few more good Story Corps reviews. Young man who remembered me from childhood.) \$56.07 (\$22.34/hr.) ICECREAM(Visit by 5 members Maggy Moo owner's family. I asked for icecream in return and got a good one. Gave kids ed. mats.)

TOTAL THIS PAGE = \$ 140.07

TOTAL THIS YEAR = \$3,443.47

CONSTELLATIONS AND STARS — NORTHERN HEMISPHERE



- 2690) 09/14/15 (MON) FPT (8:15-9:33PM) PARK (Instant.) SCENE (Slow.) SKY (Great) HH (Good.)
 9 Arrived early intending to photograph Saturn. Wasted 15-mins. unable to find! Then, couldn't hold camera steady enough. Finally, battery died. Dropped that project and began recruiting lookers. SATURN (Amazingly sharp. Reading -20% . Gave it up when hit 2nd light.) VISIT (Ariel & Kara of PopScope.) \$15.00 (\$11.54/hr.) VISIT (You woman who attended HAL's Perseids watch and saw lots of them.)
- 2691) 09/15/15 (TUE) FPT (7:49-9:44PM) PARK (2-mins.) SCENE (Slow.) Mild. HH ("Dizzy" all afternoon but OK w/scope and nearly OK back home. In good form.) PARK HM. (Worked.) SATURN (Acq'd 1st try. Aligned by eyeballing downspout on Max's Bar. -19° . Image not as sharp as she higher but definitely doable. Hit light 9:07PM, then recovered. Gone 9:44PM. Set 10:22) VISITS (Ellen Tinen & Sara From Mass., here for a natural foods conf. Ellen heard me on StoryCORPS and was totally ecstatic at finding me. We took a photo which Ellen will email. Greg Paul and friend, Lisa. Greg was in a totally different personality than in the library...very animated...like a real person!) \$27.00 (\$14.14/hr.)
- 2692) 09/17/15 (THU) FPT (7:54-9:27PM) PARK (Stressful...finally beside Jimmy's) SCENE (Busy.) SKY (Good.) PARK HM (OK.) HH (Bit of a cold, but in good head.) 4d-MOON (Terrific @ 80X & 135X!) SATURN (Acq.'d late due to Moon. Good alignment. Shut down when it got too murky.) VISITS (Several StoryCorps listeners. Just because they rave about my piece is no guarantee they'll contribute! Mosoud from Kuwait, a patient at HMD Hospital. Complained about how backward Kuwaities were by not believing in evolution. Gave him all my stuff Adjourned to Bop Pizza for a slice. \$50.00 (\$32.26/hr.) DRUM CORPS (Just as I was starting, a doz. young, innercity young men lead by a woman arrived and began drumming. They were very loud, attracted a good bit of attention. Played for about 1/2-hour.)
- 2693) 09/18/15 (FRI) FPT (7:56-9:41PM) PARK (10-mins. of stress, then an opening.) HM (OK.) HH (Extreme dizziness + some bronchitis but performed as required.) 5d-MOON (Fine. Lookers awed. At 80X an saying is equivalent to 2,965 miles away.) SATURN (SE of Moon. Usual reactions. Moon was 1st priority.) VISITS (Emily, Gabby and their friend, Marta. Kristen Finn, a photographer. Extremely efusive over finding my setup.) \$69.00 (\$39.43/hr..... included a \$20.00 contrib. Otherwise lots & lots of no-pays.)
- 2694) 09/19/15 (SAT) FPT (7:47-9:58PM) PARK (10-stressful mins., then relief.) HM (Sign & traffic cones still working well.) HH (With a mild bronchitis + head cold. Should have stayed home, but couldn't resist a great Moon. Performed excently.) STORYCORPS (My appearance with Johnny Heyn on 8/28/15 still getting many enthusiastic comments. I will email SC letting them know they are being heard!) Busy scene. Good sky. Mild. 6d-MOON (Elicited much amazement. It's as if most of the public had no idea of what the Moon would look like thru a telescope. Of course, it amazes me, too!) SATURN (Easy, as just a swing to the right from the Moon. No longer a pristine image.) VISIT (First was a very enthusiastic Jackie "O" celebrating her 30th. Emily Lavell, looking great in a black dress. Helped me take stuff to car.) Shut down by clouds just before Moon-set. \$97.75 (\$44.63/hr.) Incl. \$21
- 2695) 09/23/15 (WED) CHAS. VIL. (7:05-8:45PM) PARK (OK). HM (Space taken!) SCENE (Fairly busy.) SKY (Good, then sl. hazy.) Mild. HH (Good, physically & mentally.) AUTUMNAL EQUINOX DAY. Mostly student lookers. 10d-MOON (50X w/filter. TYCHO easy to point out and explain.) SUNDAY'S LUNAR ECLIPSE (Told most lookers would be here, weather permitting...except our look not too go.) VISITS (Nick, youngman w/a Newtonian. Invited him to join me for ecl. A young woman who took photo of Moon and me w/scope.) \$23.50 (\$14.07/hr.)
- 09/27/15 NIGHT OF TOTAL LUNAR ECLIPSE. I totally screwed up and feel bad about it! Adverse weather rpt., mid-eve. sky solid clds. Settled in to accordion. But clds. breaking up +/- 9:45, w/eclipse underway. Feel bad especially because today's Sun Md. WEATHER BLOG announced would be on St. Paul St. Also said public could snap photo thru scope. Turned out to be a good eclipse, but I just couldn't make myself load up and go.

MARYLAND WEATHER BLOG SCOTT DANCE

Tonight's lunar eclipse should be visible to the naked eye after 9:40 p.m., weather permitting, according to Baltimore's "Street Corner Astronomer," Herman Heyn. The moon will be in total eclipse from 10:11 p.m. through 11:23 p.m. It can be seen with the naked eye and enhanced with binoculars or a telescope. Heyn and his telescope will be in the 3100 block of St. Paul St. for you to take a look, or even snap a photo through its lens.

ONLINE Follow the weather blog online at baltimoresun.com/weather

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Page = 282.25
 year = 2015.72
 49

10 2696) 10/11/15(SUN)FPT(7:26-8:57PM) PLW's #164 PARK(Immediate.) SCENE(Slow.) Cool, grt. sky. ALBIREO(The few lookers we had were fascinated by it. PLW used her i-Phone's Skyguide app to help lookers locate it in sky.) URANUS?(Acq'd something in the right place w/sort of right color, but it seemed to lack a real disc. Panned it off a U, anyhow. Neglected to bring "I Saw....Uranus" stickers. VISITS(Chunka Tenzing, from Nepal and on a fellowship at Hopkins in cardiology. He assumed we were married, but when PLW told him we are "significant others" the term was new to him and he wrote it down for future ref. PARSA AND ROYA SHAMS! Drove over from DC. A great reunion after 5 yrs. from their last visit. Stayed at scope for a while, then we adjourned to Berthas for beer, crab soup and mussels. We talked about Essi and many other things. A great time! As neither PLW nor I had any money or credit cards, Parsa paid our Bertha's bill.) \$17.00 (\$11.18/hr.)

9 2697) 10/12/15(MON)FPT(7:45-9:33PM) PLW's #165 PARK(Quick.) SCENE(V. slow.) Mild, grt. sky, then shut down by clds. LOCATION(Set up where I thought Uranus would be light-free, but it was not the case. After a short time on B CYG, packed up and moved eastward to Kiosk, which was a lot of tiring work. New loc. better but hardly perfect.) ALBIREO(Briefly to check alignment.) URANUS(New location still not perfect...lights glare. Quickly found object which seemed right color but, I thought, looked too small. "Sold" it for a while to lookers, then fished around and came up with another obj. which we sold to lookers as Uranus. Having reviewed 2014 experience, am thinking first one was the real Uranus. Per 2014, is size of period on this page and a luminescent green. Think color tonight diluted by background glare. Am thinking should give up on U till is above lgts. VISIT(Man who has Jupiter sticker on his wall at home. Teachers from Oregon here for a conf.) URANUS(Lookers taking photos of TONIGHT URANUS sign...some with me in it.) \$18.00(\$10/)

11/03/15(TUE)EXPLORATORY VISIT TO FPT. A mild, blue sky day and mild clear evening. All day intended to telescope, but as time to go got closer started to have visions of a very slow, lonely stint. After deciding not to telescope, drove to FPT to see the scene. WT parking, but otherwise was tight. Not entirely a slow scene around 7:30PM. However, people passing by my spot only intermittently. Would have been slow for me. Adjourned to STScI talk on distant galaxies. Met Met Emily & Gabi Lavell & friend, Ryan. We adjourned to observatory, where we scoped B CYG, Uranus and M45.

2 11/04/15(WED) DRY RUN TO CHAS. VIL. Upon setting up realized B CYG behind bldg. and Uranus too low. Packed up for FPT, stopping home first. At home, much to my surprise, sky had clouded up! Called it a night. HH(Discovered can still handle scope.)

10 2698) 11/08/15(SUN)FPT(7:50-9:30PM). PARK(Instant) HOME PARK(Car in my "Please Save" space. Parked around corner.) Cool...+/-45°F. SKY(High clds., then good. SCENE(Slow, but not dead.) Great Beattles music at Admsr. Cup!) B CYG(Spent 35-frustrating mins. searching. due to my miscalculating DST! 29.5° Once found was main feature.) (MUS. After closing down B CYG. Disappointed that even w/focal reducer, my 40mm K couldn't get it in one view.) VISIT(Ryan, friend of Ellie & Gabi, who I met at STScI Tuesday's talk. Gene Skeens, who was thrilled to meet me, having been turned on to telescoping by me around 3-yrs. ago. Contributed \$10. Will be happy to participate in 11/20 Voice of America interview. Gave me tel.# and email. HH(Good in all respects.) \$19.51(\$11.68/hr.)

9 2699) 11/12/15(THU)FPT(8:04-9:45PM) END OF MY 28TH YEAR STREET TELESCOPING. HAVING STARTED IN FPT NOV. 13, 1987! I WAS IN A VERY "UP" HEAD ANNOUNCED IT TO ALL LOOKERS, RECEIVED CONGRATULATIONS FROM ALL AND A FEW EXTRA CONTRIBUTIONS, I SAID TO MANY LOOKERS. "I'VE HAD LOTS OF EXCITEMENT, MET MANY INTERESTING PEOPLE AND, SO FAR, HAD NO SERIOUS DAMAGE TO EITHER ME OR MY TELESCOPE." PARK(15-mins. of stress, but OK at home.) SCENE (Surprisingly busy.) Cool and damp. Shut down by gusts of cold wind. ALIGNMENT(Tried compass, but something on scope throwing it off. Must do a better job eyeballing B'way) B CYG(1st try. Whew! Was my sole obj. of the evening. Most lookers impressed. Showed sky map and gave out FACTS.) VISITS(Mel D. Berry, a CCB Eng. prof. Impressed w/my story. Took photos of me. Ben Burgandy, who has my StoryCorps interview on his Facebook page. Buster, the FPT handy man. Said to him we've know each other for 28 years, he saluted me but said he's been here 20 yrs. Sharon, a regular visitor. Ryan, Elie's & Gabi's friend. First spotted him jogging by looking like Olympic material!) \$26.50(\$15.77/hr.)

40 TOTAL THIS PAGE \$ 81.01

TOTAL THIS YEAR \$4,006.73

2700) 11/15/15(SUN)FPT(5:23-7:27PM) START OF MY 29TH YEAR, HAVING BEGUN 11/13/1987. PARK (Easy) Cool, sl. damp. Grt. sky. Started early to catch a setting 4-d Moon. Slow scene with knots of passersby. "Please Save" spot at home worked for a change! 4-d MOON(Great at 50X. Most lookers wowed. Let it go +/-20-mins. early as dead scene.) HH(In energized mood. Tried recruiting all passersby.) VISIT(A couple who's looked thru Alin's scope on the Georgetown Pier. A dozen jittery kids on bikes. All glanced and took off.) \$36.49(\$17.66/hr.) PARK(Arriving so early, had to put \$6.00 into the parking meter.) VISIT(Matt, friend of Neil Hettleman who worked at the Golden Temple healthfood store in Chas. Village.) Given a rose by the Roseman who always looks thru scope. Put in vase at home.

11/20/15(Fri)HOME(1:30-6PM)Chenxing and 2 assistants from Voice of America here to interview me for a broadcast to China. Later we will go to Fells Point for an interview at my telescope. Also, three of my astronomy friends, Teresa, Steve Rifkin, and Gene Skeenes will be coming here to be interviewed. The VOA three brought a light, camera and clip-on mikes. Was a very intense experience, with Chenxing (a woman) interviewing me at great length about my job, astronomy and family histories. She took photos of many, many of my documents and photographs. In their interviews, my 3 astro friends commented effusively on how important I was in introducing them to astronomy and telescopes and how great a public asset I am. I gave Teresa a framed copy of my log page of 02/22/99 describing her arriving at the Rotunda with a telescope, asking if she could set up next to me, and my slightly hesitant ok. She was very pleased. The 3 and I adjourned to Potbelly in Chas. Vil. for supper. (Chenxing Zhang: czhang@voanews.com)

2701) 11/20/15(FRI)FPT(9:08-11:17PM). Low 40's w/wind chill. Winter jacket but still a bit cold. PARK(Just as we arrived, a car left the WT strip, and we got very tight but side-by-side parking slots. Otherwise, we would have had to park on a lot. Happily, traffic cones and sign worked at home.) SCENE(V. slow at start but gradually picked up.) Chenxing and crew photographed and interviewed +/- 1/2-hr., when they ran out of batteries. Chenxing said she be returning to continue shoot. HH(Despite intense afternoon, in good shape.) 9d-MOON(50X with filter. Copernicus the main feature. Lookers very impressed.) VISITS(Locals Ashley & husband who are regulars. 2nd looker a U.S. Marine in full dress uniform with many ribbon who contributed \$5. For a photo-op, Chenxing had him recontribute it! Al, with whom I had a deep discussion on cosmology. An EE, he was very knowledgeable.) \$36.30 (\$16.88/hr.)**

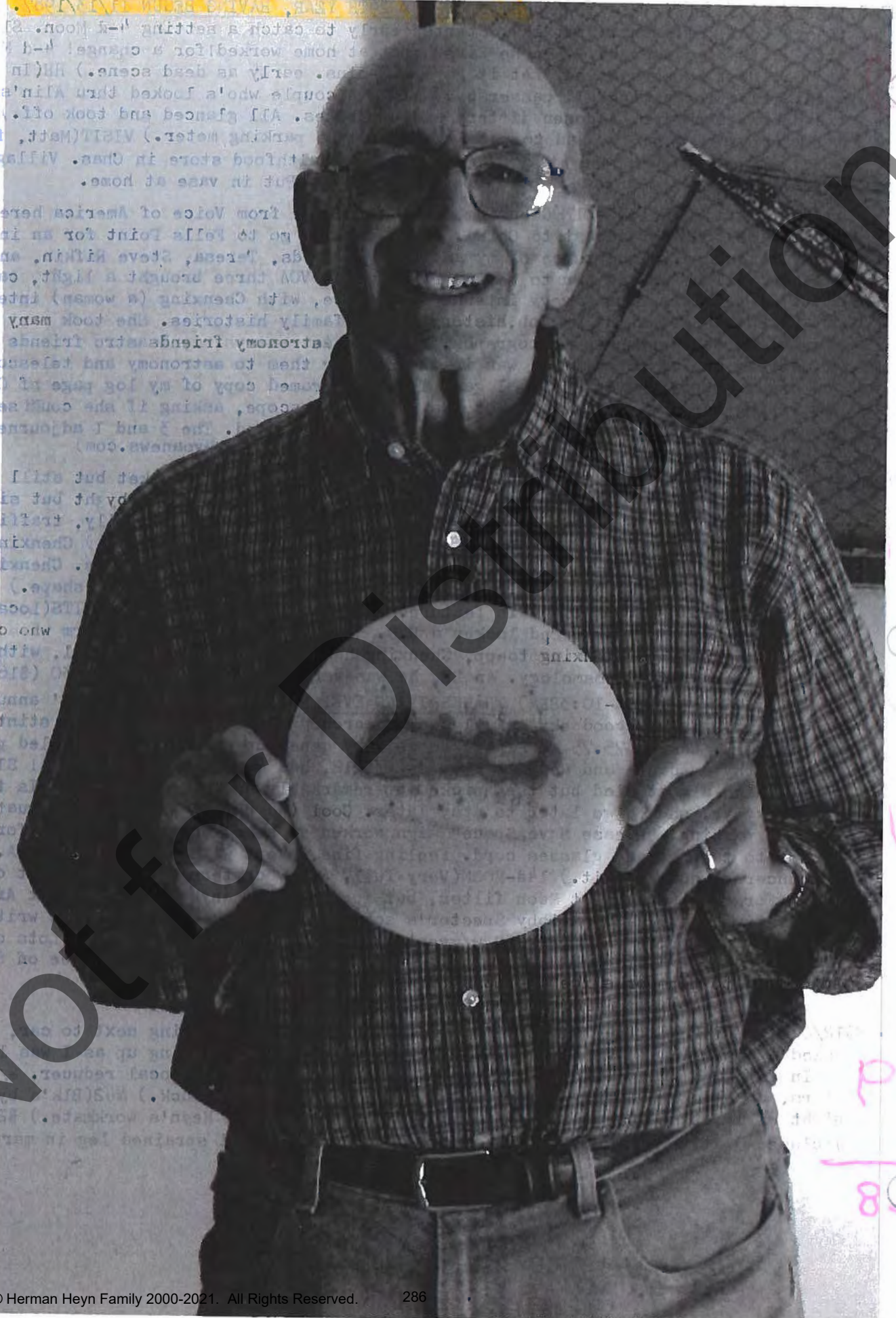
2702) 11/25/15(WED)FPT(7:20-10:32PM) THANKSGIVING EVE! . Planned to attend BFMS' annual Homecomi dance, but w/such a good sky + full Moon, searched Log for a previous TG stint and found one in 2012, Was a \$75.75 evening w/"some very generous contribs!" Cancelled plans to ferry Cathy to dance and went to FPT. As w/2012, had many generous lookers! Slow scene at first which almost died but then picked-up remarkably as evening wore on. Is telling me that next yr. should go later to stay later. 40°F and clear. Was dressed adequately. Immediate parking. "Please Save Space" sign worked at home. Whew! HH(In good form, except forgot to take granny glasses cord. Feeling fine, event with my now 18.48 PSA....which ha me concerned quite a bit.) 14d-MOON(Very full, A few craters on top rim just coming in to view. Forgot to take best Moon filter, but looked awed, anyway. Pointed out Aristarchus and Tranquility.) VISITS(Libby Spector's ^{Mark}son. Others whose names I didn't write down. Several StoryCorps "I heard you" w/great reviews.) \$100.36!(\$31.36/hr.) Lots of \$5&\$10's. Even given \$10.00 by a guy I was talking with after packing up! Xmas tree on Square.being being used as photo backdrop. HH(Adjourned to Bop for slice of pizza.)

**Had an unusual number of successful iPhone Moon photographers.

2703) 12/04/15(FRI)FPT(8:17-10:17PM). PARK(Lucky. Saw 2 women standing next to car, talking. Asked if were leaving. Said in 1-min.) 45°F. Slow scene, picking up as I was leaving. HH(In good all around form.) M45 PLEIADES(40mm Kellner w/50% focal reducer. +/-1/2 amt. of stars, but lookers liked. Quite bright looking.) URANUS(No luck.) M42(Blk's by light. Tmw night will set up to acquire. (VISIT(Larry Shockley, John Heyn's workmate.) \$26.50(\$13.25/hr.) Included 3 "five's". VISIT(Emily & man friend. Sister Gabi sprained leg in marathon.)

TOTAL THIS PAGE = \$ 199.65

TOTAL THIS YEAR = \$4,206.38



2704)12/05/15(SAT)FPT(8:05-11:05PM). PARK(Total luck! Cones/sign worked at home, too.)
 Low 40'sF? Was over dressed. Didn't need gloves. SCENE(Pretty busy. Early on lots of families with small children, thanks to a Santa Clause.) HH(Peak form in all respects. Right arm-shoulder problem from last night by lifting tripod improperly was gone, thanks to ice & aspirin.) Located to do Orion Nebula (M42) at start, but due to lights couldn't acq. till 10:45PM. Then, could see Trapezium but not nebula which, in past remember seeing from FPT. Used photo to explain. M45 PLEIADES(Again was my main feature. 40mm Kellner w/50% focal reducer, lowering magnification to 25X. Shifted image to include an additional bright member. At start couldn't find M45 "Subaru" photo, thinking had stupidly left it home. Made do w/o till discovered was on reverse side of M42 photo. Much relieved! Many lookers surprised at Subaru analogy. Surprised by how few were Subaru owners. As a fallback, M45 works pretty good.) EYEPIECE FOG!(Early on discovered 40mm K being fogged up by lookers, I guess due to combination of its large looking glass and the cold. To be sure was clear, fanned it w/M45 photo before each look.) VISITS(Gene Skeens w/lady friend, Kelly. Emily & Gabi Lavell, to whom I gave a token of friendship comet card. Had someone take photo of us in front of Xmas tree. Several who heard my StoryCorps interview, one of whom was excited enough to have her picture taken with me!) \$55.00 (\$18.33/hr.)

PAGE TOTAL \$ 55.00

YEAR TOTAL \$4,261.38

10
 YEAR = 571 Miles

SC EXPENSES -- 2015

| | | | | | | |
|-------------|-------|--|--|--|--|------------|
| 01/08/15 | EQUIP | Bob's Knobs (Paypal) | | | | \$ 16.95 |
| 02/08/15 | SP | 6-sides SC handouts (JHU) | | | | \$ 00.42 |
| 02/08/15 | SP | 5-sides SC handouts (JHU) | | | | \$ 0.35 |
| 03/25/15 | STA | 4-typewriter ribbons (Oregon Toner Co.) (from eBay) | | | | \$ 4.48 |
| 03/26/13 | STA | 2-3-ring binders to consolidate Street Corner logs (Staples) | | | | \$ 11.65 |
| 04/02 | STA | 1-new bolt for securing hat to tripod (Ace) | | | | \$ 0.35 |
| 04/05/15 | SP | 30-sides SC handouts (JHU) | | | | \$ 2.10 |
| 04/11/15 | SP | FPT parking | | | | \$ 0.75 |
| 04/13/15 | SP | 6-sides SC handouts (JHU) | | | | \$ 0.42 |
| 04/18/15 | STA | 2-sets screws & nuts...spares for diagonal (Ace) | | | | \$ 0.93 |
| 04/27/15 | SP | 12-sides SC handouts (JHU) | | | | \$ 0.84 |
| 04/30/15 | STA | Velcro strips to hold stool on to handtruck (Ace) | | | | \$ 5.29 |
| 05/04/15 | STA | white-out (FedEx) | | | | \$ 1.37 |
| 05/05/15 | SP | 8-sides SC handouts (JHU) | | | | \$ 0.56 |
| 05/04/15 | EQUIP | New 18mm eyepiece from Adorama Inv.#16731852 | | | | \$ 58.99 |
| 05/11/15 | POST | Return eyepiece to Adorama (FedEx) | | | | \$ 8.13 |
| 05/12/15 | SP | 13-sides SC handouts (JHU) | | | | \$ 0.91 |
| 05/18/15 | SP | 10-sides SC handouts (JHU) | | | | \$ 0.70 |
| 05/22/15 | SP | "stickies" (Staples) | | | | \$ 6.35 |
| 05/23/15 | SP | To cut 3" "stickies" (post-its) down to 2" wide (Kinkos) | | | | \$ 4.23 |
| 05/23/15 | SP | 8-sides SC handouts (JHU) | | | | \$ 0.56 |
| 05/23-24/15 | SP | FPT parking | | | | \$ 0.50 |
| 05/29/15 | SP | FPT parking | | | | \$ 0.50 |
| 06/01/15 | SP | 19-sides SC handouts (JHU) | | | | \$ 1.33 |
| 06/11/15 | SP | 8-sides SC handouts (JHU) | | | | \$ 0.56 |
| 05/15/15 | EQUIP | (credit from Adorama on ocd for returned eyepiece) | | | | (\$ 47.54) |
| 06/26/15 | EQUIP | replacement bungee cord for one lost in FPT (Falkenhan's) | | | | \$ 4.55 |
| 06/27/15 | SP | 13-sides SC handouts (JHU) | | | | \$ 0.91 |
| 07/05/15 | SP | 12-sides SC handouts (JHU) | | | | \$ 0.84 |
| 07/15/15 | SP | 6-sides SC handouts (JHU) | | | | \$ 0.42 |
| 07/19/15 | SP | 6-sides SC handouts (JHU) | | | | \$ 0.42 |
| 07/23/15 | SP | 2-sides SC handouts (Kinkos) | | | | \$ 0.25 |
| 07/24/15 | SP | 18-sides SC handouts (JHU) | | | | \$ 1.26 |
| 07/30/15 | SP | 7-sides SC handouts (JHU) | | | | \$ 0.49 |
| 08/02/15 | SP | 10-sides SC handouts (JHU) | | | | \$ 0.70 |
| 08/07/15 | SUBS | Physics Today thru 12/16 (ck#1516) | | | | \$35.00 |
| 08/07/15 | SUBS | Sky & Telescope thru thru 2/17 (ck#1517) | | | | \$69.95 |
| 08/21/15 | SP | 10-sides SC handouts (JHU) | | | | \$ 0.70 |
| 08/22/15 | SP | 7-sides SC handouts (JHU) | | | | \$ 0.49 |
| 08/26/15 | SP | 1,800 Post-It Notes (Staples) | | | | \$ 10.60 |
| 08/26/15 | SP | cut 1" slice off of each end of above 6" Notes (FedX) | | | | \$ 5.72 |
| 08/27/15 | SP | 10-sides SC handouts (JHU) | | | | \$ 0.70 |
| 08/29/15 | SP | 8-sides SC handouts (JHU) | | | | \$ 0.56 |
| 08/30/15 | STA | bolt & nut for repairing handtruck (Ace Hdwe) | | | | \$ 0.56 |
| 08/03/15 | SP | 5-SC handouts (JHU) | | | | \$ 0.35 |
| 09/14/15 | SP | FPT parking | | | | \$1.00 |
| 09/15/15 | SP | FPT parking | | | | \$1.00 |
| 09/16/15 | SP | 6-sides SC handouts (JHU) | | | | \$0.42 |
| 09/18/15 | SP | 10-sides SC handouts (JHU) | | | | \$0.70 |
| 09/18/15 | SP | FPT parking | | | | \$1.00 |
| 09/19/15 | SP | FPT parking | | | | \$1.25 |
| 09/20/15 | SP | 6-sides SC handouts (JHU) | | | | \$0.42 |

| | PAGE 1 | PAGE 2 | YEAR | |
|---------|----------|---------|----------|---------|
| STA = | \$ 24.63 | \$ 0.83 | \$ 25.46 | \$ 0.84 |
| EQUIP = | \$ 32.95 | 6 | \$ 32.95 | \$ 0.42 |
| POST = | \$ 8.13 | -- | \$ 8.13 | \$ 0.42 |
| SUBS = | \$104.95 | -- | \$104.95 | \$ 0.25 |
| SP = | \$ 98.82 | \$22.08 | \$120.90 | \$ 1.26 |
| BOOKS = | -- | \$33.97 | \$ 33.97 | \$ 0.49 |
| TOTAL = | \$269.48 | \$56.88 | \$326.36 | \$ 0.70 |

(O V E R)

PAGE TOTAL = \$269.48

(Paypal) (Kirkos)

09/27/15 SP 4-sides SC handouts (JHU) \$0.28
 09/11/15 SP Fpt parking \$1.75
 10/30/15 STA whiteout (FedEx) \$0.83
 11/11/15 SP SC handouts 8ea. @ \$0.07/ea. (JHU) \$0.56
 11/12/15 SP Fpt parking \$0.75
 11/13/15 SP SC handouts (JHU) 4/ea. \$0.28
 11/15/15 SP Fpt parking for 3-hrs. @ \$2/hr. (JHU) \$6.00*
 *I don't have the pking tkt because I gave it to someone wanting to take my space as I was ready to leave.
 11/25/15 SP 5-sides SC handouts (JHU) \$0.35
 11/25/15 SP Fpt parking \$2.00
 12/04/15 SP 5-sides SC handouts (JHU) \$0.35
 12/05/15 SP Fpt parking \$0.75
 12/06/15 BOOKS 2016 OBSERVER'S HANDBOOK (Sky & Telescope) \$33.97
 12/06/15 SP 1/2-ream of card stock - shared with photo business (JHU) \$9.01
PAGE TOTAL \$56.88

02/27/15 SP 10-sides SC handouts (JHU)

02/27/15 SP 8-sides SC handouts (JHU)

02/27-28/15 SP Fpt parking

02/27/15 SP Fpt parking

06/11/15 SP 8-sides SC handouts (JHU)

06/27/15 SP 13-sides SC handouts (JHU)

07/12/15 SP 12-sides SC handouts (JHU)

07/12/15 SP 6-sides SC handouts (JHU)

07/12/15 SP 6-sides SC handouts (JHU)

07/27/15 SP 2-sides SC handouts (Kirkos)

07/27/15 SP 18-sides SC handouts (JHU)

07/30/15 SP 7-sides SC handouts (JHU)

08/07/15 SP 10-sides SC handouts (JHU)

08/07/15 SP 10-sides SC handouts (JHU)

08/07/15 SP 7-sides SC handouts (JHU)

08/07/15 SP 1,800 Post-It Notes (Staples)

08/07/15 SP cut 1" slice off of each end of above (FedEx)

08/07/15 SP 16-sides SC handouts (JHU)

08/07/15 SP 8-sides SC handouts (JHU)

08/07/15 STA Post-It for repairing handtruck (Ace Hardware)

YEAR 1 PAGE 2 YEAR 1 PAGE 1
 \$24.46 = \$24.46 \$0.83
 \$22.95 = \$22.95
 \$8.13 = \$8.13
 \$104.95 = \$104.95
 \$150.90 = \$150.90
 \$23.97 = \$23.97
 \$256.48 = \$256.48
 \$256.36

2016

Not for Distribution

2 2705)01/14/16(Thur)CHAS.VIL.(7:20-7:00PM). 46°F. Good sky. PARK(Good. At home, sign/cones worked. Semi slow scene. HH(Did ok. Being age 85 didn't seem to have much of an effect on my ability lift and haul. In a good head w/lookers. 4-d MOON(Great! Awesome sunrise on Theophilus! Lookers very impressed.) First looker: was man named Greg, with 3 young children. VISITS(Ralph Moore & granddaughter. Across the street neighbor Mary Cianbrone. Dancer Chuck Montigue.) \$36.00 (\$2156/hr.) HH(Working on my 29th year on the "street!") CHIPOLTLE(Not nearly as busy as before its food poisoning episode, but still probably busier than most restaurants in area. Stock \$426.24, down from around \$800.)

9 2706)01/16/16(SAT)FPT(7:35-9:40PM). 41° + wind chill. Sl. haze. PARK(Both good.). Fairly busy scene. 6-d MOON(Quarter. Sunrise on Ptolemaeus. Lookers impressed.) HH(Cold! Intended to close down after 1-hr. but somehow stuck it out for 2-hrs. Pretty slow business.) VISITS(Nearby elec. guitarman, who didn't look but said he saw Jupiter one and contrib. \$1.00. Dancer Holly Harris & friend.) \$26.60 (\$12.73/hr.) HH(Amazed by my stamina!) VISIT(4 very well dressed Chinese. Girl here for high school interview.) JUPITER! 15° up as I arrived home around 10:15PM. Won't be long now!

13 02/05/16(Fri) Drive to Baynesville Electronics to purchase new drive battery.

10 2707)02/20/16(SAT)FPT(6:58-11:08PM). Mild/chilly. Needed heavier sweater. PARK(WT slot; saved space at home. Busy scene. Clear, but only fair seeing. Near perfect alignment. New drive battery. 12-d MOON(50X. With few details and fair seeing was difficult to get good focus. Ended up using Raccoli, a big crater on right rim for lookers to test focus. Lookers impressed w/Moon.) JUPITER!(Opening night! Rose 7:15PM and spotted low over Thames St 8PM. Murkey at first. Moons: 2+1, then 1+1, then 2+1. Stripes. Lookers amazed.) HH(At 85.17yr. still can do all that's required. Maintained enthusiasm, throughout. All in all...HARD WORK!) VISITS(Seth of PopSCOPE. Woman from Celia's "gang".) Gave lots stickers/"facts". \$150.53 (\$36.19/hr.) Bills: 1-\$20, 3-\$10, 10-\$5's. EDUCATION(Feel like I did some real good by giving my "speed of light" and "search for life..." handouts to two middle school aged sisters. Also did a lot of explaining on various astro topics to lookers.) STORYCORPS(A passer-by said he heard me and that I was "great".

9 2708)02/27/16(SAT)FPT(7:48-10:50PM). Low 30'sF. Hands weak link. Needed pocket warmers. PARK (WT slot. At home somebody took by "Please Save..." space. Parked 3 spaces away.) Slow scene at first that picked up nicely. Clear. No wind. JUPITER(3, then 2, then 3 moons. Most lookers surprisingly impressed. "Stripes". 80X.) HH(In good form). VISITS(Fatima and sister from Fmrs. Mkt. apple stand + 4 friends. Young woman accountant for Earnst & Earnst bought me a hotdog.) \$120.26 (\$39.69/hr.)

2 02/28/16(SUN) 8PM. Dry run to Cgas. Vil. to check Jupiter observability. Definitely doable, but will have street light background for another 45-mins.

10 2709)03/08/16(TUE)FPT(7:38-9:38PM.) Mid 50'sF. Hard to believe after last, freezing cold stint Parked in WT slot. Space at home saved. Fairly slow scene, but for first hr. had good traffic. HH(Kind of dragged myself out of house, but once there was fine...in good head. JUPITER(Retreated 10'-12' north from lights which really lessened background glow from street lights. 2+2...classic! Lookers awe struck. Stripes. Compared it with Sirius to demonstrate planets steady while stars twinkle. VISIT(Had a good discussion with looker on life in outer space question.) \$43.75 (\$26.87/hr....thanks to a \$20.)

2 2710)03/09/16(WED)CHAS.VIL.(7:45-9:45PM). Here because of feeling I didn't have the "go power for FPT. Mid 70'sF! Set up too far north, losing 15-min, w/Jupiter blocked by Chipotle sign. Several times made-do w/Sirius. JUPITER(2+2+stripes. Usual frequent inquiries re GRS. Am only able to say has shrunk & faded, and that I haven't seen w/my scope for several years. Need to research for better ans. Lookers wowed by view!) VISITS(Anthony Noth, the one person who showed up per Scott Dance's Sun blurb that I'd be in CV for the 9/27 15 lunar eclipse and who emailed me about it. Said saw ok naked-eye. Matt ?, who asked about PLW, saying she knows a lawyer friend in STL.) HH EYES(w/right eye, J's sky is kind of bright, while w/left eye is black, telling me problem is my eye and not eyepiece Happily, now know lookers get black sky view!) \$29.85 (\$14.93/hr.) CHIPOLTLE(A line, as in the old days before food poisoning scare. Stock \$506.63. +18% since 01/14.)

TOTAL THIS PAGE = \$406.99

TOTAL THIS YEAR = \$406.99

2711) 03/11/16(FRI)FPT(7:31-12:15AM). Lucking parking; home good. mid-40'sF. Was underdressed. Slow scene which slowly improved. HH(As physically & mentally demanding as as it is, that I could keep it up for nearly 5-hrs. proves that I'm in good health!) JUPITER(2+2+stripes Sucker holes for 1/2-hrs., then clear. Lookers astounded. It continues to amaze me that so few of the public know Jupiter has moons or that it can even be seen in the sky!) MUSIC-MAN(Plays scratchy, loud, discordant guitar nightly. Tonight, performed closer to me than usual. When I asked him to please turn it down, he went ballistic...not to be reasoned with! Eventually moved. Will probably be a continual problem.) VISITS(Mark Walker, puppet theater performer, FPT. booster, and supporter of me. Kevin Louis, JHU prof. of planetary science Pleased to find me, having heard about me. PHILOSOPHICAL DISCUSSION with a man who believes that the world is so complex it must have been created, I countered with my position that the world and universe is so complex that not even a supreme being could have dream it up. I think I gave him pause to reflect. Gave him my handouts. SKY...an enthusiastic 8' DOB owner from Eldersburg who is looking fwd. to the May 9th Transit of Mercury.) Slow night, moneywise, which is why I stayed so long. \$106.25 (\$22.37/hr.)

2712) 03/16/16(WED)FPT(8:15-10:15PM). 10 mins. of stress to park; home good. Mid-50's, with penetrating dampness. Good sky. HH in good form. 8d-MOON(Apenine Mts. in good relief.) JUPITER(2+2+stripes. Good show!) VISITS(Early on a dozen lookers from the American Physical Soc. meeting in Balto, some very interested in my operation. MAVI, woman who took a really nice photo of me a yr. ago in Chas. Vll. Emailed it to me for my use. Two JHU maternal health nursing stds. Knew of daughter Eve's employer, Concern Intl. Gave them Eve's email address.) \$43.69 (\$21.85/hr.)

A-1) 03/17/16(Thur)FPT(6:45-9:45PM). ST. PATRICK'S DAY WITH MY ACCORDION! Have been wanting to try this for a long while. Late this afternoon, planning not to telescope, I realized this would be an ideal time to give it a try. Wore Gandy Dancer t-shirt and greenish wool cap. Took chair, big tin pot, fingerless gloves (needed!), camera, cell phone. Removed 3 barrels to park in WC slot. Low 60's w/cold wind chill. Set up close to sidewalk near Kiosk. Among others, played "When Irish Eyes Are Smiling", "Danny Boy", "Harrigan", "East Side, West Side"...improves. Not at all nervous. Wish I had wider repertoire...except it made no difference, as nobody stood around to be concertized. Was a fun experience, but after 3hrs. of playing I was wearing down....+ business had slowed alot. Adjourned to Bop for a slice. VISIT(Steve Lampretti, who was encouraging.) \$52.60....incl. 1-\$10, 4-\$5 + \$1's + cab. Visits from a few telescope lookers. 9.5 ml.

2713) 03/18/16(FRI)FPT(7:40-11:23PM) Park WT slot; home good. Mid-40'sF. Great sky, except for a brief period of clds. around 10PM. HH(In good form. Held enthusiasm level throughout.) Is important to match the energy level of my lookers, most of whom are 20 & 30 "somethings". 10d-MOON(Sunrise on a luminescing Jura Mts. Scene noted by many lookers.) JUPITER(O+4+ stripes. Pretty spectacular!) VISITS(John Raby, a young man on a skateboard who assists Mike Potter at his Orion sound studio. Many very nice, friendly people!) \$125.91 (\$33.91/) VISITS(Convention over but a dozen physicists from AM. Physical Soc. meeting.)

03/22/16(TUE)CUB SCOUTS AT 1ST ENG. LUTHERAN CHURCH,(7-8:30PM). Some pretty sharp kids. who knew some answers to my Q8s. Did Saturn inside w/3". Did Jupiter (3+1) and 15d-Moon outside w/3". HH(I winged it, slightly loosing my train of thought several times. Also faltered slightly on facts & figures. However, Dan Strickler*who invited me said "You were great. You really held their attention." HANDOUTS(It was about a doz. kids and some parents. They took all but 2 of my Hubble photos but only half of the 30 star maps and "facts blurbs/Moon history xeroxes I'd worked so hard on. Should have handed stuff out myself!)

2714) 03/23/16(WED)7:46-10:25PM(FPT). Park WT; home good. Mid-50'sF. Great sky. JUPITER(O+1, then 1+3. Incredible sight as emerging I, II, and III graced J's limb. Lookers gasped! 15d-MOON(Acq'd. 8:30PM. VERY FULL.) VISIT(Owner of a 14" SCT. Very active in a club 40mi north of Chicago.) \$56.58 (\$22.81/hr.) HH(J so great, had trouble making myself leave!) *dbstrick1@gmail.com

TOTAL THIS PAGE = \$ 332.43
TOTAL THIS YEAR = \$ 739.42

- 2715) 3/24/16 (THU) CHAS. VILLAGE (8:07-9:37 PM). PARK (There & home ok.) Low 70's (!) w/wind chill, which tried to blow away my Jupiter facts. C.V. due to weather uncertainty. HH (Dragged myself out da door but OK once there.) JUPITER (Lost +/-10-min. by again misjudging Chilpoltle sign. Ugh! Otherwise, great sight. 2+2. 135X. All lookers pleased. Gave everybody sticker and Facts.) VISITS (Cortney, young woman working on James Webb Scope. Said I'M "famous" at the Space Science Telescope. Man who took a perfect Jupiter photo with his iPhone! Emailed it to me. Darrell, middle aged man with a indecypherable story about Afghanistan. Kept crowding in on me. Otherwise, harmless.) \$41.40 (\$27.60/hr.)
- 2716) 04/11/16 (MON) CHAS. VIL. (8:20-8:57 PM). PARK (32nd St. corner, finally! Home, good.) Mild 68°F. Late start due to clouds Q's. Shut down by clods. Decently busy scene. NEW SUBARU OUTBACK (1st stint with. Old car leaking oil. Repair ests. too big for car's age. Sofar, not happy with new one. Feels larger than old one, + too many "bells & whistles" Yr. 2010 w/54,749mi. \$17,980.94. Ouch!) 5d-MOON (Lookers awed!) JUPITER (1+3+stripes. Lookers surprised.) HH (OK. Canstill do it.) \$18.00 (\$29.19/hr.) Included a \$10. Visit (Teacher who has a school & garden in lower CV. Want me to visit this summer. Gave him my card.)
- 2717) 04/12/16 (TUE) CHAS. VIL. (8:22-9:35 PM). PARK (Circled blk. 5x's before a close one opened up. HOME...down the blk., as Beverly was in my usual spot and refused to move when I asked.) 52°F w/wind chill. Work winter sweater & jacket.) 6d-MOON (3 awesome craters @ 135X.) JUPITER (2+2+stripes+7th mag. star between J and Galisto. Lookers pleased with view.) Usual semi-slow scene but steady stream of lookers. HH (Good.) \$58.16! (\$48.07/1) CAR (Push button key battery dead at end of stint. Have back-up but need new battery.)
- 2718) 04/13/16 (WED) C.V. (8:24-10:07 PM) 43°F w/no wind. Haze for a while, then clear. PARK (Took 1st spot, which was almost at end of blk. Home, good.) 7d-MOON (1st qt. North to south craters. Impressive!) JUPITER 1+3+star. J moved +/-10' west of star since last night.) VISITS (Avi Kumar, my VA oncologist cum urologiat, who has been wanting to visit scope for a while. At today's visit, we set it up. Got photos of J and Moon + had one taken of us. Contrib't \$10r CHIPOLTLI: rec'v free meal tkt from worker. \$40.66 (\$23.64/hr.)
- 2719) 04/14/16 (THU) FPT (08:10-10:08 PM). Mid-50's F. Grt. sky. PARK (WT by moving barrels. Is great if barrels are permanent fixture, as they reserve a spare for me! Home: good.) 8d-MOON (Awesome!) JUPITER (1+2+star, which J is moving west from, making it the last moon. HH (Kind of tired & shaky leaving home but ok. 47-mins. from close to home.) \$71 (\$36.22/ CONTRIBUTIONS (Like squeezing blood from turnip! V. slow, but then a sudden big bill.)
- 2720) 04/15/16 (FRI) FPT (8:22-11:00 PM). Mild, then chilly. Grt. sky. PARK (WT, but truck partly blocking, had to drive around blk. and approach from Ann St. Moved barrels. HOME was difficult, too.) 9d-MOON (Awe-inspiring to lookers!) JUPITER (Eventually 4 moons + stripes.) PHOTOGRAPHERS (So many trying for iPhone Moon shots began thinking need a 2nd scope just for them! Most got decent results.) HH (TONIGHT MET MY MATCH! Between parking and need to maintain level of enthusiasm to match lookers', was about my hardest night eye! At home felt shaky. HOW MUCH SHOULD/CAN AN 85+YR. OLD BODY TAKE!) VISITS (Briefly, Rabbi Druk with a big contingent of yarmulke wearers. We shook hands. Gene Skeen with lady friend.) \$105.75 (\$40.21/hr.) Maybe Saturday night in Charles' Vil. A DOUBTER (Didn't believe Jupiter. After confirming w/iPhone, he contrib'd \$5.00.) STORYCORPS (At least 2 lookers who'd heard me, one surprised to actually meet a subj.)
- 2721) 04/16/16 (SAT) C.V. (7:54-10:02 PM). Here because not ready to face FPT's challenges again just yet! PARK (Real close. Home good.) Mild/chilly. Grt sky. Semi busy scene. 10d-MOON (50X. Asusual, lookers awed.) JUPITER (2+2+stripes. 1st looker, a woman, teared up, overwhelmed by the scene's beauty! Between sunset & dark, which it was, the air is especially steady and planetary images especially clear.) SCORPS (1 ref.) PARADE MAGAZINE (w/a salary of \$6423, I'm in its annual "What People Earn" ed. No refs., however.) HH (Happily, recovered from last night's ordeal.) VISIT (Gray. Woman who wks at MdScCtr. Very excited by Jupiter view. Will "hello" Rich for me.) \$79.19 (\$37.18/1) Sp. Fair wkend.

TOTAL THIS PAGE = \$ 414.16

TOTAL THIS YEAR = \$1,153.58

2722) 04/17/16 (SUN) FPT (8:00-10:10PM). PARK (Lucky. Home good.) H1 50's. Grt. sky. Slow scene but steady traffic. HH (Good... none the worse for wear, as is 7th night in a row!) 10d-MOON (Good w/lookers. Not so exciting for me.) JUPITER (1+2+stripes. Lookers liked alot. VISITS (Charles, who works for NASA and knows me better than I know him + his family. Mike Potters apprentice.) \$87.08 (\$40.13/hr.) VISIT (Robb, father of Carly.)

04/18/16 Rec'vd from the White Family for 04/01/16 telescope birthday party weather delay. \$50.00. Mailed them a "thank you" comet card.

2723) 04/19/16 (TUE) FPT (8:24-10:03PM). PARK (Lucky again! Home good.) H1 50's. Grt. sky. Slow scene. HH (Good, but again aware that is time for a lighter scope, especially because back home having to pull scope on handtruck up 7 steps.) 12d-MOON (Tycho limb @ 135X to show remaining craters. Lookers very impressed.) JUPITER (2+1+stripes. Again, a woman looker saying she was getting teared-eyed.) VISIT (Man who was happy to see Europa as he works in the Antarctica and has observed test runs on a machine being tested to penetrate its icy surface. United Airlines stewardess who got a good iPhone moon shot. Man who said he will mail me a tip. First time has happened!) \$31.67 (\$19.19/hr.)

2724) 04/20/16 (WED) C.V (8:25-9:32PM). PARK (Headed for FPT but at 25th St. decided on CV, as could scope a beautiful rising Moon quicker. But when arriving was totally blocked by an ambulance in front of Chipotle. Drove around blk. and backed down street to parking spot! At home, car in my "Please Save" spot; parked around corner.) Mild. Grt. sky. Slow scene. JUPITER (2+2+stripes. Moon looked unusually bright. Great scene!) 13d-MOON (135X on limb below Tycho where a few craters. A not too bad scene.) CONTRIBUTIONS (Lots of no-pays. Also, am tiring of lookers who are glad to see me, thank me for being there, enjoy their view, and then put only a buck in hat. Maybe if I greeted them in a less friendly way they'd contrib. more.) Giant on way home. \$16.94 (\$15.26/hr.)

2725) 04/23/16 (SAT) FPT (8:39-11:13PM). Breezy. Used Kiosk as windbreak. PARK (Challenging. Home ok.) Gd sky. Busy scene. 1st 1/2-hr. almost no lookers. HH (OK.) JUPITER (3+1+stripes Widespread. Gave out lots of stickers.) VISITS (Mike, young man who said he first looked thru my scope in HPL and had to stand on my milk crate! Paul, who said he shares and birthday w/Copernicus. Adam, who bought me an icecream in lieu of cash.) JUPITER was due south at 10PM. Rising Moon as was packing up. \$75.57 (\$29.40/hr.)

STORYCORPS BOOK. CALLINGS: THE PURPOSE AND PASSION OF WORK. On 12/08/14 StoryCorps taped an interview of me by nephew John Heyn, which was broadcast nationally on NPR 08/28/15. The book contains 52 StoryCorps interviews, of which John's and mine is the very first. 04/21 was a book & author session at DC's Poetry & Prose Bookshop. David Isay, founder of StoryCorps led the event. Standing room only crowd. John & I seemed to have been the only interviewees present. Our photo was projected on to a screen and our interview played in full for all present. I spoke for 3-4 minutes. My openline was "That's a hard act to follow!", referring to the just played tape. I'm not sure what I said, but I got a lot of laughs and applause. David and I each signed bks. I probably signed 50 to 75. To each purchaser I gave my street corner handbill + an I SAW...SATURN Fells Point, Baltimore, Maryland sticker. I signed, for ex., "Mary, here's wishing you many, many starry nights--and days, too!, Herman Heyn" It was a very exciting event, with lots of enthusiastic attendees. This write-up doesn't do it justice!

04/24/16 Telescoped Jupiter for Eve, Aren, Will & Leah on the 39th St. sidewalk. They wanted to see me in action in FPT, but after supper at Joe Squared, there wasn't time.

2726) 04/25/16 (MON) FPT (9:00-10:20PM). Lucky parking. Hm. ok. Mid-60's. Gd sky, but 17m clds. problem. Late start, as tried CV, couldn't park, went to FPT. HH (Good. Actually, wanted to stay home, but with nice sky beaoning, couldn't! JUPITER (1+3. Great!) VISIT (Sagar... works w/Emily Lavell in brain lab Hopkins. Knows sister Gabby.) \$38.00 (\$28.51/

TOTAL THIS PAGE = \$ 299.26

TOTAL THIS YEAR = \$1,452.84

05/09/16(MON.)07:12-08:12AM. TRANSIT OF MERCURY Mild temp. Hazy sky, but TOM somewhat doable for a while. Thickening haze forced shut down 1-hr. earlier than planned. Accompanied by Starman Jer Feldman with his Ha scope. I used my SOLARSCOPE 3" refractor rigged as a projector with a 20mm eyepiece. We saw transit begin at 7:12AM. After that it came and went in the haze. (Midpoint 10:58AM. End 2:42PM.) I was intending to leave lake*at 9AM, Pick-up Phyllis at BWI, and set up again St. Paul & 32nd Sts. at 1PM. However, clouds did not allow the second round. The Sun's Scott Dance did not do an art. announcing the event nor observers' locations. I advertised it on Facebook and Next Door, but nobody showed up. We had 2 passerby lookers, Hector, followed by Heather, who were able to see Mercury. Gave them literature. I intended to set-up my 08/21/17 Total Eclipse display, but due to lack of public presence, did not. I managed to obtain a few photos of Mercury on the Sun as projected on my screen. Despite haze problem, it was a fun experience.....actually something, as astronomers, "Jer & I had to do!!" Next TOM Nov. 11, 2019. *"Lake" was the east end of Lake Montebello:

THE TRANSIT OF MERCURY, MAY 9, 2016 (07:12 to 14:42 EDST)

In astronomy a transit is the passage of a small heavenly body across the face of a larger one. They include passages of planets Venus and Mercury across the face of the Sun. While TOV's may be separated by 122 yrs. (next in 2117), TOM's occur on avg. every 7 yrs. The possibility of V & M transits was predicted by Johannes Kepler (1571-1630). His predicted 11/07/1631 TOM was observed from Paris by Pierre Gassendi (1592-1655). His first observed TOV was 12/04/1639 by English astronomers Jeremiah Horrocks & William Crabtree. Edmund Halley (1656-1742) devised a means of using TOV's to calculate the then unknown distance of the Sun. His instructions were followed for the TOV of June 6, 1761 by Charles Mason (1728-1786) and Jeremiah Dixon (1733-1779), who a few yrs. later surveyed our Mason & Dixon Line. NOTE: Due to its small diameter (3,030mi) and distance (51.26 million mi.), Mercury's transit can be viewed only through a properly filtered telescope, such as HAL's at Alpha Ridge Park. This historical background composed by Herman M. Heyn, Baltimore's Street Corner Astronomer: hermanhey@hotmail.com; hermanhey.com

MARYLAND WEATHER BLOG SCOTT DANCE

Mercury will make a rare pass directly between the Earth and the sun tomorrow. The entire transit, as it is known, will be visible from Maryland from 7:12 a.m. to 2:42 p.m. But don't try to watch it with the naked eye; you need a telescope or strong binoculars equipped with proper solar filters. NASA will broadcast it live online, and the Maryland Science Center is holding a free event to watch on its telescope.

ONLINE Follow the weather blog online at baltimoresun.com/weather



MARYLAND WEATHER BLOG SCOTT DANCE

As early as the 1600s, astronomers used events like today's transit of Mercury to learn about the sizes of and distances between objects in the inner solar system. "Scientifically, it's not important as it was centuries ago," said Nancy Chabot, a planetary scientist at the Johns Hopkins Applied Physics Laboratory in Laurel. But it will still have scientific value - several NASA satellites will be watching and using the transit to calibrate their bearings.

ONLINE Follow the weather blog online at baltimoresun.com/weather



2787)05/13/16(FRI)FPT(8:37-11:35PM). FIRST DOABLE SKY IN 18-DAYS! PLW's #166 (She found a parking space for me, gave out stickers and "Facts", chatted up lookers.) Mild. Good sky. HH(Can still do it! Requisite enthusiasm level!) JUPITER(2+2. Some lookers extremely moved by sight.) 7-d MOON(1st qt. 80X and 136X. Lots of craters. Lookers surprised by sight.) MARS(A&q. 10:40PM Bright, low, writhing a bit. Maybe a polar cap.) SATURN! (Acq. 11:13PM. Low. A bit fuzzy. Lost it and couldn't acq. again.) VISITS(Fatima from Fnr's Mkt. apple stand and friends. Gaby Lavell, soon heading for an MIT brain lab. Nicholis Weber, briefly. Several StoryCorps mentions.) \$98.05(\$33.13/hr.)

TOTAL THIS PAGE = \$ 98.05

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2728)05/16/16(MON)FPT(8:30-9:35PM). PLW's #167 Very iffy early evening sky, but we took a chance. Good thing, because it was an exceptional night! Mild. Partly cloudy sky until shut down by clds. Good parking both there and back home. 10-d MOON(Tycho region. Lookers impressed.) JUPITER(0+4+stripes. All lookers astounded!) VISITS(FINALLY, AFTER ALL THESE YEARS, A LOOKER FROM YEARS AGO WHO BECAME INTERESTED IN SPACE SCIENCE HAVING LOOKED THROUGH MY TELESCOPE! FINALLY!! IN LATE 20's, JHU MASTERS IN ENGINEERING, IM- PROBABLE NAME OF ELAN HOURTICOLON-RETZLER, HAS APPLIED TO THE ASTRONAUT CORPS! Six-yr. old girl, Lenee, who couldn't get enough of the Moon! Several people, as well as Frank Roylance via email, who heard a rebroadcast of my StoryCorps interview this AM.) \$50.00 (\$46.30/hr!)

2729)05/24/16(TUE)FPT(8:40-11:23PM) PLW back in STL. Quick parking in FPT and my spot saved at home. Mid-60'sF°. Most raindays in May since 2003(Sun,6/25). Good sky. Busy scene. No lookers for 20-mins., then steady traffic. JUPITER(2+2, then 2+1. Stripes, which I use as focus test. Lookers impressed.) MARS(No detail except white area on right limb. Bright orange-red. Closest in 11 years. 46.9M) SATURN(1-looker before leaving.) VISITS (4/-10 inncercity skateboarders. One, Aaren, who was badly misinformed about the Earth and sky, asked if I believe in god. I said, "No really," upon which he said, "I don't either. I was stunned...1st Black atheist I've ever met! Gave him my City Paper letter and other stuff. I hope he comes back! Couple from N.C. celebrating 36th wed anniversary the man of whom had been an 8th-grade gen. science teacher. Of course, told him about Miss Wicker. Emily and Gaby, briefly. A reg. lookers with her parents from Israel. HH (In good form. As usual, am amazed I can still do it!) \$97.00 (\$35.75/hr.)

2730)05/25/16(WED)FPT(8:46-10:59PM). PARK(Immediate at WT. Home ok.). Bricks very warm from sunny day. Should have worn shortpants. Good sky. Busy scene. HH(Feeling a bit shaky from returned irregular heartbeat. Should put in stre. for dismantling scope on case in case I become incapacitated while scoping! NIGHTTIME LEG CRAMPS have returned since scoping again disrupting my sleep. Definite connection. Got to find remedy!) JUPITER(2+2 widespread. Perfect straight line remarked upon by many lookers.) MARS(Bright in SE. Avoided scoping, telling lookers because has no detail. Gave some Mars stickers, anyway) SATURN(10:45PM. Acq'd by dropping 1.5° below Mars and slewing eastward. BOX.) VISITS (Woman who'd read STORYCORPS book interview. Excited to find me, saying she never expected to! 4 professional astronomers, one of whom studies super novae, %. Duane Hunt, Balto. Environmental Svs., w/a long interest in astronomy. Will put in toucj w/HAL. 8-yr. old Marques, who was fascinated by his look at Jupiter.) \$102.00 (\$46.15/hr.)

05/28/16(SAT)HERRING RUN PK.(10:00-11:30PM). SUNSCOPE FOR STEVE CUNNINGHAM'S MD FREE- STATE TREASURE CLUB. Sunny & hot. One tiny sunspot. 13-members, most of whom took a break from scanning the field with their magnetic detectors to glance at Sun's image. Gave 08/21/17 eclipse blurb and website card to all. Several had looked thru FPT scope. VISITS(Jim Hooper, who remembered me and Gren Whitman from anti-Viet war days. Patty Dowd of Md. Nat. Hist. Soc, who wants me to bring scope to mtg.) No hat.

2731)05/28/16(SAT)FPT(8:52PM-12:50AM!). PARK(20-mins of stress. Good at home.) Shorts + short slv. shirt. Cloud threat at start, the good sky. SNITCH(When my back was turned during set-up, she rifled my contribs. hat looking for \$\$). Jay, who was visiting shooed her off!) HH(I did what had to be done on a busy, long stint!) JUPITER(4+0. Incredible!) MARS(A few times. 99% sure saw polar cap. 166X) SATURN(Difficulty finding, then its usual remarkable self.) STICKERS(All lookers rec'vd one....or two.) INCREDIBLE HAPPENING! Kyle Rupp, JHU std. from Rola, MO, said he'd read that I started telescoping 11/13/87, the day he was born! Both he and I were very excited that we met. He was with his parents, Susie & Tim, the latter praising me profusely for my work.) VISITS(2 young techs. from STSci who were very excited at seeing the real thing.) LOOKERS IN GENERAL(One and all are very friendly & upbeat...a pleasure to be around!) \$135.25 (\$34.15/hr.) PARADE MAGAZINE(1-mention.)

TOTAL THIS PAGE = \$ 384.25

TOTAL THIS YEAR = \$1,935.14

Look- . . .
Phyllis Weber

Phyllis Weber

Thu 5: 6102/12/12/2016 3:45

Inbox

To: hermanheyn@hotmail.com

2 attachments (320 KB)

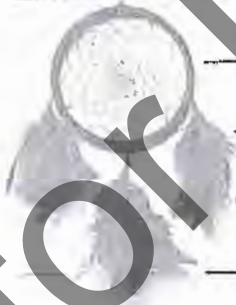
IMG_0898.JPG; ATT000

2/19/20

Dear Doctor Beale, Just thought you'd like to know that the photo you took of me and my telescope 06/30/16 (see p.10) in Baltimore's Fello's Point has legs. As, after 31 years, I've retired, you won't find me there any more. However, thanks for finding me, and glimpsing Saturn.

Clear skies, Herman

Encl. "Charles Villager",
Street Corner Log, Saturn
sticker, business card,
Hale-Bopp photo



- 2732) 05/31/16 (TUE) FPT (08:50-11:35PM). Warm. Gd. sky. Slow scene. PARK (5-mins. Home good.) TALL SHIP (Spanish, Juan Sebastian de Eicano, tied up along B'way pier. With Mars overhead, a beautiful sight.) JUPITER (1+3. A great as ever!) SATURN (Acq. 10:24PM. Directly E of Mars by 1-hr. As awesome as ever!) MARS (Demanded by lookers! Closest in past 11-yrs. 165X w/ND filter. No shading but maybe a polar cap...maybe.) \$65.73 (\$23.90/)
- 2733) 06/01/16 (WED) FPT (8:53-11:11PM). Comfortable. Gd. sky. Slow scene. PARK (20-mins. Home good.) TALL SHIP (Took photos w/Mars over it.) JUPITER (1+3. Great!) MARS (Pointed it out but didn't scope.) SATURN (Acq. 10:23PM. 15° due east of Mars, making it easy to acq. Lookers surprised and amazed.) VISITS (Marshall Perrin of STScI, whose specialty is exoplanets. Paul D. Beale, Chair U. of Colorado Physics Dept. Stayed for an hour. Took lot of photos. Specialty statistical mechanics.) \$32.24 (\$14.02/hr. Reasonably busy but received no \$5 or \$10, only \$1 contribs, which is unusual.) PARKING (The 5 Water Taxi slots fenced off for Recreation Pier construction project.) FIRST TIME EVER! (Back home I left everything but my basket with the money and lenses in the car till the next morning. I was just too tired out for another round of heavy lifting. Since my new car has dark tinted windows, I figured it was ok to leave the scope and tripod in it.)
- 2734) 06/09/16 (THU) FPT (8:43-11:10PM). Mid-60's. Gd. sky. Semi-busy scene. PARK (10-mins of stress. OK at home, except my "Please Save This Space" sign was missing from tree! Will make another and hope it stays.) 4-DAY MOON (Great!). JUPITER (2+1+stripes+bright star. Great as always.) SATURN (Offset from Mars. Titan. Fine!). MARS (220X Some shading + polar cap. Worthy of public viewing.) HH (Leaving home a little shaky from irregular heartbeat, but no problem on the "bricks".) VISIT (Rob Styles, a pro photographer, who has a great interest in astronomy. Gave him a full tour of objects and all my handouts. \$78.00 (\$31.84/hr.) Very first contrib. was a \$20.00!
- 2735) 06/10/16 (FRI) FPT (8:43-11:20PM). Mid-60's. Gd. sky. Very busy scene. PARK (10-min. Someone was about to take a space but saw I'd been waiting for it and ceded it to me! At home, neighbor Durrell the barber helped me unload.) 5-D MOON, JUPITER, MARS SATURN. A very hard night as had a steady stream of lookers from very first minute! VISIT (Owner of The Admiral's Cup. Told him I love his music but want more Beatles! Rec'vd lots of "I heard you on NPR" comments. Ted Rouse visited for Saturn in particular.) \$97.50 (\$37.36/hr.) VISIT (Emily Lavell, who got a real good Jupiter + 4 moons photo.)
- 2736) 06/11/16 (SAT) FPT (8:51-11:30PM). T-shirt temp. Good sky. Very busy scene. PARK (10-min. stress. Home OK.) 6D-MOON (Awesome!) JUPITER (4+0+stripes+Leo star. Lots of amazed lookers.) SATURN (Good at 136X.) HH (Straining to keep up with a steady stream of lookers. Really need a night off to recuperate...inability to get enough sleep being the start of my fatigue.) LEG CRAMPS (2nd night in a row w/o any...maybe thanks to my Dr. Scholls sneakers w/2 layers of sole padding.) \$135.95 (\$51.30/hr.!! Ugh...measure of intensity!)
- 2737) 06/14/16 (TUE) FPT (8:30-10:20PM). LS-shirt temp. SS=8:34PM. Gd. sky. Slow scene. PARK (lucky. Home gd.) First stint after Sunday morning's mass shooting in an Orlando gay bar killing 49 people. I stayed home Sun. night out of respect for the victims. Shooter (deceased) reported as saying he wanted the U.S. to "stop bombing my country" (Afghanistan.) 9d-MOON, JUPITER, SATURN (Acq'd 9:40PM. View improved by light out across st.) HH (OK, but w/slight irregular heart beat.) \$33.00 (\$18.03/hr.)
- 2738) 06/17/16 (FRI) FPT (9:15-11:45PM). Late start due to surprise clds. followed by cool wind. PARK (12-min. stress. Home ok.) Busy scene. Stint started with a bang and never stopped! Back & forth among Jupiter, Moon, Saturn and a few times, Mars. HH (Body feeling strong, but voice a bit weak.) Mercifully, shut down by clouds! VISITS (Danielle, a new M.D. who is heading for N.C., w/her family. D very enthusiastic. Family contrib'd \$50! Emily Lavell. Alice Brock's granddaughter, Michelle. Steve Schulhoff & friend, Steve telling me "You look great!" JUDY COLBERT w/friend. Judy is writing a book ONE HUNDRED INTERESTING BALTIMOREANS, which will include me. She came to see me in action. Rec'vd. a 3/4-empty bottle of wine from Duncan Hutchins, the UNC grad who send me the letter spoofing my Parade Magazine mention.) \$142.48 (\$56.99/hr!)

TOTAL THIS PAGE = \$ 584.90

TOTAL THIS YEAR = \$2,520.04

67
Miles

Re: Sun's "Hall of Fame" invitation

Steve Rifkin

Thu 2/11/2016 4:00 PM

[Redacted]

OK, need to know...

Are you a member of HAL? or do you just use the email list? List is open to the public.

Were you ever working for JHU's astronomy dept?

What was your school background (what did you study in school for career)

Have you contributed photos for Sky & Telescope? And for other mags?

Have you contributed articles for Sky & Telescope? And for other mags?

That's all I need. Please email me back to me as soon as possible with that info.

Steve

On 02/11/2016 03:32 PM, herman heyn wrote:

- > Steve, it's 3:30PM Thurs, and just got to "my" computer at MSEL.
- > Will be here for next 2-hrs, so you can email me here if you want. Otherwise, should be home by 5:45PM, from where can call you. Best regards, Herman

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NOT FOR DISTRIBUTION

- 2732)06/19/16(SUN....Eve's 53rd!)FPT(8:57-10:00PM). PARK(4-mins stress. Hm ok.) Slow scene. Sl. hazy sky. JUPITER(2+2+stripes. Looker got a good photo.)14d-MOON(Rim craters. Good.) SATURN(w/Titan. Lookers impressed.) HH(Performed ok, but dealing w/irregular heartbeat. Worrisome.) VISIT(Janet, from Accordion Club. Cypriot couple who are opening a restaurant in the Broadmore.)\$28.00 (\$26.67/hr.)
- 2733)06/25/16(SAT)FPT(8:51-11:45PM). PARK(12-mins. stress. 3 cars left at once! Hm good.) Clear but sl. unsteady sky. ss 8:37PM. JUPITER(Lookers liked. 2+1, then 2+0.) SATURN (Replaced HAV-A-LOOK! on sign to THE REAL DEAL! Not sure made any difference. Got one comment. Titan + star. Mostly wow's!) VISIT(Carl & Diane Friedman w/friends Mike and Ilene!) HH(As hard as the heavy lifting is maintaining the energy level to match that of my lookers. Not as spontaneous as it once was.) \$106.51 (\$36.73/hr.) FUNNY INCIDENT (Buxom woman insisted I retrieve a \$1 bill from her cleavage which, after a bit of confused hesitation, I did. She and her husband had a big laugh & described to them Jim's cartoon of me with a buxom looker and said would send it to them if had an email address VISIT(Jerry Reitzig's son, Nathan.)
- 2734)06/26/16(SUN)FPT(8:51-10:35PM). PARK(1-min. Hm. good.) Slow scene. Gd. sky & very pleasant ambience.) JUPITER(3+1+stripes. Lookers marveled at it!) SATURN(Great @ 165X. Effect of "Real Deal!" sign undetermined.) Some out-of-town vacationers saying, "This is the best thing we've done in Baltimore." HH(As unhappy as I was about telescoping before leaving home, once set up and in action, I felt great! See Jupiter thru the telescope is a real "upper" for me!) VISIT(Elderly cpl. who are VLP supporters. Told them about Next-door Waverly website where I'll announce my 7/10 Chas. VI. Saturn event.)\$34.25(\$19.80/)
- 2735)06/29/16(WED)FPT(8:50-11PM). PARK(3-min. Hm. good.) Semi-slow scene which picked up. Had steady stream of lookers. Chilly. FALSE JUPITER!(While trying to eyeball Jupiter, people assisting were saying that there are two things up there. Finally got one in scope and, big surprise, it was a drifting balloon. Had a black strip and was dangling a cord with something shiny at its end.) JUPITER(3+1. As great as ever!)SATURN(165X. Titan. No serious doubters.) HH(Head a bit foggy. Trouble articulating.) VISIT(An enthusiastic elem. school principal from SC. Worker from Admiral's Cup who said she's seen me out here and been wanting to take a look for a long time. Saw Saturn.) \$70.50 (\$32.49/hr.)
- 2736)06/30/16(THU)FPT(8:49-10:20PM Shut down by clouds.) Semi-slow scene which never got rolling. PARK(5-min. Hm. good.) Semi-cloudy sky. Mild. SS still 8:37PM. ALIGNMENT(After weeks of perfection, since yesterday have been off nearly 2°. Probably am misjudging 3° offset.) JUPITER(2+1 moons. Good "stripes". Lookers liked.) SATURN(Acq. 9:45PM, but soon lost in clouds.) VISITS(Emily Lavell and Jen. E. helped me load car.) HH(Head ok at start but gradually became a bit fussy.) \$35.42 (\$23.46/hr.) "NPR" Almost every night several people excitedly say, "I heard you on NPR, you're famous!"
- 2737)07/05/16(TUE)FPT(8:51-9:38PM. Shut down by clds.) PLW's 168. Very slow scene. 2-min. parking. Hm. good. Warm. Clds. at setup which eventually closed us down. JUPITER(0+4+ stripes. Q's about Juno probe which arrived yesterday at J following a 7-yr. journey.) SATURN(Acq.'d 9:12PM. Great till blotted out by clds.) VISIT(Christian, a man who'd heard me on StoryCorps. Rey, a frequent looker.) HH(God shape.) \$22.00 (\$28.21/hr.) VISIT(During setup, Shelly & Jeff Hettleman in FPT celebrating their 29th anniversary.)
- 2738)07/09/16(SAT)FPT(8:30-11:05PM). PLW's #169. PARK(OK. Home, misjudged space and parked around corner.) SCENE(Very busy.) Warm but comfortable. SS 8:35PM. 5-d MOON(Good, but briefly.) JUPITER(2+2. Good, but briefly.) SATURN(Main feature. For a change, no doubters! Titan.) HH(Up for the job, except voice a bit weak.) VISITS(Emily & Jess. Along w/ me, Emily won a prize at last night Baltimore's Underground Science Slam-II. Looker who I inspired to learn the constellations using his iPhone's sky app!) \$144.25 (\$55.91/hr.!) HH(TODAY IS THE 71ST ANNIVERSARY OF MY SEEING MY FIRST SOLAR ECLIPSE, A PARTIAL SEEN JULY 9, 1945 AT MAINE'S CAMP KENNEBEC. I WAS AGE 14. MAY STILL HAVE PROJECTION PHOTOS.)

TOTAL THIS PAGE = \$ 440.93

TOTAL THIS YEAR = \$2,960.97

STREET CORNER TELESCOPE LOG -- 2016

2739)07/10/16(SUN)CHAS. VIL.(8:31 10:10PM) SS 8:34PM. Warm. Slightly busy scene. Scattered clds. As a treat for the neighborhood, I announced a "Saturn Party" for tonight at St. Paul & 32nd Sts. Result was a bit disappointing...maybe 6-8 lookers...and no families with children, as I announced "scope accommodates little people." Most lookers passersby. PLW's #170. 6-d MOON(Lookers impressed.) JUPITER(2+2+stripes. Slightly murky.) SATURN(clds. delay, then good, then shut down by clds. Lookers excited by view.) MARS (Once by request.) VISITS(Duncan, a Carmas regular. Brent, who intends to video me at work. Ron Cassie, old friend and Balto. Mag. writer. Took notes for a mag. blurb. 2 PopScopers.) HH(Head sl. fussy. Not my sharpest.) \$57.50 (\$36.39/hr.!) PARKING(Back home someone took my "Please Save For Heavy Load" traffic coned space.)**

2740)07/11/16(MON)FPT(8:25-10:28PM) Warm, slightly hazy sky. Immediate parking. Hm. ok. Nicely busy for a Mon. night. 7d-MOON(Totally awesome at 50X w/polarising filter. Lookers gasped! JUPITER(Briefly. About the end of my 2016 Jupiter season, which began 02/20/16. It has been in Leo. Will miss him!) MOON(A looker got a gorgeous Moon surrounded by blue sky i-Phone photo at 50X!) SATURN(Fine, but more adamant doubters than usual!) VISIT(Brother John Heyn, who stayed thru the whole evening and, I'm sure, had a great time! We had a long lull mid stint, following by lots of very animated lookers. PLW too tired to scope tonight and stayed home. First time shes done that!) \$69.00 (\$33.66/hr.)

07/12/16(TUE)PLW & I took Water Taxi to Canton for a crab cakes lunch. On WT ride back to Harborplace we discovered that a Black young man deck hand had looked thru my scope years ago and was inspired to minor in astronomy in college and is now studying for a masters in engineering. Makes it all worthwhile!

**VISIT(Bob, Ednor Gdns. neighbor w/ eyepatch, and wife.)

2741)07/14/16(THU)FPT(8:22-10:32PM). PARKING(From the corner of Lancaster & B'way (1-way north saw that a slot 10 down was empty. Turned left and faced for it going wrong way on 1-way north street. Was immediately stopped by a woman cop in a white city car. I expected to get a hefty tkt., but happily she was friendly, saying "Since you're a senior citizen, I won't ticket you this time, but just don't do it again." She even told me that since it was past 8PM, I didn't have to pay for a meter! I explained my situation and gave her my card. Whew....a close call! Home ok.) Warm, slow scene at first which picked up nicely. PLW's #171. She's become very helpful with loading/unloading. 11d-MOON(Luminescing Jura Mts. caught the eye of many lookers.) SATURN(Acq. 08:51PM. Some lookers saw 3 moons.) THIEF!(Reaching for hat, spotted by PLW who shouted, "GET OUT OF THERE!", which drove him off.) VISITS(A large family from The Camerouns which included an autistic young man. Family didn't think he'd see another, but he did see Saturn. A woman food journalist who was very interested in my act and asked many q's. Didn't know of Michael's book.)\$66.01(30.56. CLOSING DOWN(Half-way done a man arrived with 2 young kids saying they were visiting from Va. and he wanted them to look thru scope. I accommodated them w/Moon and Saturn.)

2742)07/15/16(FRI)FPT(8:40-11:30PM). PLW'S #172. She's a big help loading/unloading/handing out stickers/"facts". Will miss her when she's back in STL! PARK(Instant. Ok home.)Due to looming, thick clds, hesitated leaving home, but on PLW's urging we went. Good thing, as clds eventually left and sky was good. 12d-MOON(Tycho very prominent. Mentioned Tycho history and "2001" connection many times.) SATURN(Good @166X. Titan. Appreciative lookers; few doubters.) VISITS(A large Indonesian family w/several bright children. Went all out for them. Contrib'd \$40. Ted Gross, mgr. of Stadium Place, who I complimented on his work. Larry, co-worked of Johnny Heyn at the Nat. Archives. Attempted photo. Very enthusiastic PhD Public Health School student. We took a photo.) \$111.02 (\$39.23/hr.)

2743)07/17/16(SUN)FPT(8:20-10:30PM). PLW back in STL. Instant parking. Hm good. Semi-busy scene. Warm. SS 8:31PM. SCOPE(Ever heavier. PLW suggests selling to PopScope and buying lighter one. Good idea, if!) 14d MOON(Terrific...crowned by Tycho.) JUPITER(Briefly.)SATURN(166X. Titan. Lookers awed.) ALIGNMENT(Very good for past week, as have been directly eye-balling B'way.) VISITS(Jeff from S.F. who'd read about me and considers me his "hero". Pasad & fam. from Owings Mills. Read my "Callings" interview and has been emailing me. 2 bright children. 2 enthusiastic Portugese men.) HH(Bit fatigued.) \$85.50(\$39.40/hr.)

TOTAL THIS PAGE = \$ 389.03

TOTAL THIS YEAR = \$3,350.00

Balto's Magnetic Streets

Science Slam-II

07/08/2016

1) Senior Citizen Joke

2) Trading as Balto's SC Astronomer for going on 29 years #2737 times. My main features are the Moon, J & S.

3) For my scope to work right - it has a tracking motor which compensates - must be level and lined up on true north. A simple bubble level takes care of the first 4 discovered if I eyeballed any N-S street in Balto. City and rotated my tripod a smitten to the right (East), scope would be pointing very close to true north.

5) Miss Wicker

6) Geological Survey

7) AGU poster session, Balto. 1997

8) Sun article

9) Backsights - Surveyor's Historical Society 2012 Fall

10) To this day I'm still using the "eyeballing street method to locate true north"

- 2744) 07/20/16 (WED) FPT (8:45-10:45PM). PARK (Both ok.) Warm. Busy scene. SUZANNE LEBOVIT (Theme of her water ballet troupe's performances this year is "Science Fair!" Coordinating with me, she held a "astronaut icecream for sale" fund raiser near me. Only 2 water ballet'ers showed up, but 10 or so Catholic Relief members did who had seen her advertisement on Facebook. All were enthusiastic lookers. 10 pks. ice cream sold.) Cls. at start, then great sky. JUPITER (Very briefly.) MARS (Briefly.) SATURN (Main feature. Enthusiastic lookers! One took a fairly decent iPhone photo. HH (In good head. Back home humming over & over line from Old Man River.... "body all ach'in & racked w/pain.") \$55.30 (\$27.65/hr.)
- 2745) 07/21/16 (THU) FPT (8:50-10:40PM). PARK (Immediate... followed woman holding keys. Home ok.) Slow scene. Mild. SS 8:28PM.) SATURN (+ Titan. Need to move eastward as is approaching street light.) HH (Good form.) VISIT (Family from Nicaragua, father having a small scope. Very interested in my set-up. Took selfie w/me.) \$41.00 (\$22.28/hr.)
- 2746) 07/29/16 (FRI) FPT (8:58-11:15PM). 8-day hiatus due to heat wave and not wanting to stress myself. PARK (10min. Followed man w/key in hand. Hm ok.) Good sky, but hot/sticky. LO-CATION (Set up near Kiosk but soon realized would loose Saturn too soon. Enlisted sturdy young man to help me move further eastward.) MARS (Briefly, on way to Saturn.) SATURN (Great at 136X. Titan, barely. A few doubters.) STEPHEN LAMPREDI (Stayed with me all night, bringing in lookers with an energetic, carnival barker act. Gave him a ride hm.) HH (In good shape, except voice a bit weak. Due to age?) \$70.93 (\$31.11/hr.) NOTE (Have known Steven since year one, when he busked playing sea chanties on his concertina. He works at the Admiral Fell Inn and at the Fells Pt. Visitor Center.) VISIT (Young man who said first looked thru scope as a child and still has stickers received then.) VISIT (Brief one by Emily Lavell and her friend, Jess.) SATURN (Temped to go to 166X, but since everyone was impressed at 136X, decided to stay there, as 166X would have dulled it a bit
- 2747) 08/20/16 (SAT) FPT (8:23-11PM). FIRST STINT SINCE VISITING THE KEN & FRANK HEYN FAMILIES IN FRANCE AND THE NETHERLANDS. PARK (10-mins. A car in "Please Save" space at home. Parke on Frisby, but when I wheeled stuff to house, space was available!) SCENE (Very busy!) Gd sky. Set up on SE corner of Square. In Sq. was a drum line with pom-pom girls, which drew a big audience. So loud couldn't hear if tracker working after long hiatus. It was! SATURN (1st try! Many awed lookers 135X. Nobody mentioned seeing Titan.) 18-d MOON (9:55PM noticed rising in tree down Thames St. Acq'd 10:43. Great!) HH (Very hard, intense work, but can still do it... was worried about after long hiatus.) BALTO. MAG. (Looker said saw art. about me in current issue. Ron Cassie interview 07/10/16.) \$78.00 (\$29.77/hr.)
- 2748) 08/22/16 (MON) FPT (8:21-10:00PM). VERY TIRED AFTER HPL LUNCH w/OLD NEIGHBOR & GOOD FRIEND LORINDA RIDDLE, VISITING FROM DENVER: LOTS OF WALKING & BUS RIDING. BUT SKY SO GREAT, I FORCED MYSELF TO GO. AMAZINGLY, HELD UP OK! PARK (Instant. Hm ok.) Moderately busy scene. SATURN (w/Titan. Sharp! To keep image flat, set tripod low to avoid rotating star diagonal. Acq'd 1st try.) VISIT (Nice talk re jet engines w/engineer named Levi.) \$45.00 (\$27.27 *We visited Barnes & N., where LR bought "my" Story Corps book, Callings.
- 2749) 08/23/16 (TUE) FPT (8:25-10:14PM). Again, left hse. tired-from doing laundry, but with a good sky, I had to go! SCENE (Slow, but had a very steady stream of lookers.) PARK (Instant. Hm. good.) SATURN (Titan. Usual surprised responses.) MARS (1X. Several reqs, but for some reason, had big trouble finding.) \$45.12 (\$24.93/hr.)
- 2750) 08/26/16 (FRI) FPT (8:18-10:20PM). PARK (Unexpectedly for a Fri... immediate! Home ok.) Busy scene. Warm/sticky. Gd. sky. SATURN (Many surprised lookers... as if they hadn't known such a planet existed!) HH (In ok shape, having taken last night off.) VISITS (Michael & Anette Saxon, M being a childhood chum of Johnny Heyn. Kenne Ann Dibner, Ph.D., a science ed. researcher w/Nat. Academy of Sc. I'll try to work w/her. "Jay", a young man who'd just read my StoryCorps piece and was excited to actually find me. Took photos. Hulio, a very excited (overly!) looker from S.F.) \$71.99 (\$35.46/hr.) SATURN (Quit when hit light

TOTAL THIS PAGE = \$ 407.34

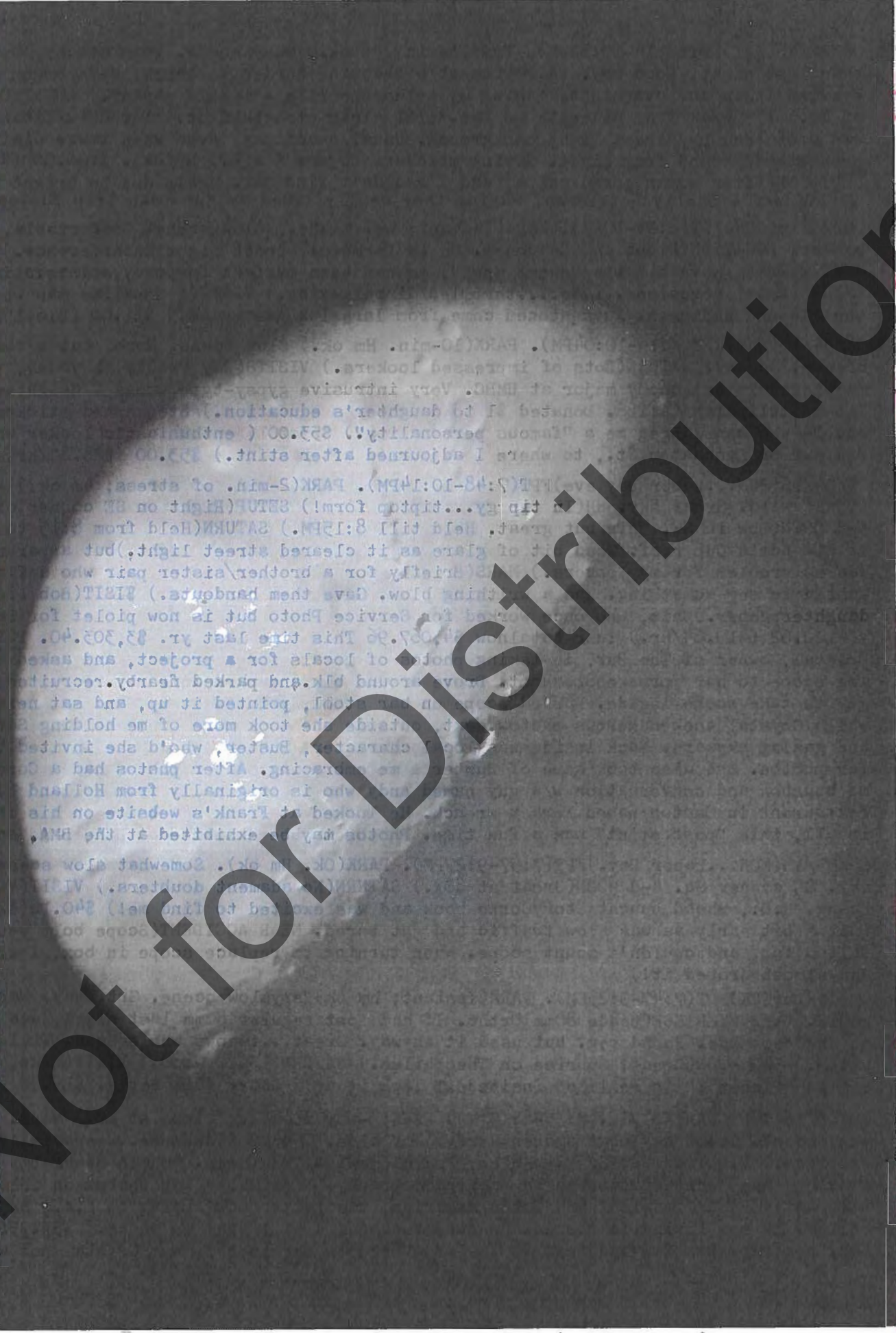
TOTAL THIS YEAR = \$3,757.34

- 2751) 08/27/16 (SAT) FPT (8:14-10:32PM). PARK (3-min. Hm ok.) Busy scene. Warm/sticky, but better than last night. Good sky. TRIPOD (As it's becoming harder to carry, have begun simply leaving it in car overnight, making my telescope life a little easier.) LOCATION (East 14th of Sq., 15' back from sidewalk so Sat. will clear street light.) SATURN (w/Titan, till it was smothered by street light background. Usual reactions, even when image diminished by orange background from light. Giving stickers to one & all.) HH (ok). \$106.00 (\$46.09/hr). SHUTDOWN (After woman moved scope, and I couldn't find Sat. again due to bright background.) VISIT (Jeff & Shelly Hettleman, saying they really liked my European trip photos.)
- 2752) 08/28/16 (SUN) FPT (8:05-10PM). PARK (Instant; hm. tight.) Slow scene. Comfortable, w/slight breeze. LOCATION (Right on SE corner. Ok in terms of street light interference.) ALIGNMENT (Seem to have hit its "sweet spot", as has been perfect for many, consecutive stints SATURN (Usual mixed reactions....thrilled/disbelieving.) VISIT (A Nepalese man who works in the diamond business. Says stones come from Israel & Amsterdam.) \$31.00 (\$16.15/hr.)
- 2753) 08/30/16 (TUE) FPT (8:14-10:04PM). PARK (10-min. Hm ok.) Slow scene. Warm, but w/cooling breeze. Gd sky. SATURN (Lots of impressed lookers.) VISITS (Roy Prouty, a young, very knowledgeable astronomy major at UMBC. Very intrusive gypsy-type woman & daughter selling lit-up, flashing tulips. Donated \$1 to daughter's education. Autographed stickers for couple who considered me a "famous personality". Crystal, enthusiastic looker who owns BAR pub on Lancaster St., to where I adjourned after stint.) \$53.00 (\$28.80/hr.)
- 2754) 09/04/16 (SUN...Labor Day eve) FPT (7:48-10:14PM). PARK (2-min. of stress; hm ok.) VERY BUSY SCENE! Mild. Great sky. HH (Hi energy...tiptop form!) SETUP (Right on SE corner of Square. 3-d MOON (Low in SW. Thin but great. Held till 8:15PM.) SATURN (Held from 8:15 to 9:57, when it hit Adm's Cup roof. Good bit of glare as it cleared street light, but apparently it was no problem for my lookers.) MARS (Briefly for a brother/sister pair who definitely wanted to see something. Was a writhing blow. Gave them handouts.) VISIT (Bob Prokop w/ adult daughter. Chip, who once worked for Service Photo but is now piolet for Spirit Air) \$120.62 (\$19.64/hr.) Year total now \$4,067.96 This time last yr. \$3,303.40. POST STINT! Crystal, owner of The Bar, is taking photos of locals for a project, and asked me to bring scope to bar for a photoshoot. Drove around blk., parked in front, recruited a big guy to take scope inside. Parked scope on bar stool, pointed it up, and sat next to it while Crystal took numerous photos. Next, outside she took more of me holding Saturn sign and gazing skyward. Back inside was local character, Buster, who'd she invited to come by for photos. She also took some of Buster & me embracing. After photos had a Corona & shot of bourbon and conversation w/a guy named Andy who is originally from Holland but owns a restaurant in Canton named Fork & Wrench. He looked at Frank's website on his iPhone. All in all, this "post stint" was a fun time. Photos to be exhibited at BMA, says Crystal.
- 2755) 09/05/16 (MON...Labor Day.) FPT (7:57-9:27PM). PARK (Ok. Hm ok.) Somewhat slow scene. Grt. sky. SE corner Sq. 4-d MOON (Great at 80X.) SATURN (No adamant doubters.) VISIT (Vivian Huang, M.D., who'd bought StoryCorps book and was excited to find me!) \$40.16 (\$26.77/hr) Quit a bit early as was slow traffic and got bored. NEAR ACCIDENT (Scope bolt was screwed in too far, and couldn't mount scope. When turning to replace scope in box, I stumbled and almost dropped it!)
- 2756) 09/06/16 (TUE) FPT (7:47-9:25PM). PARK (Instant; hm ok) Very slow scene. Grt. sky. Warm, bit humid. "NEW" EYEPIECE (Made 80mm Ortho. If had lost regular 80mm last night, was planning to use this one. Found reg. but used it anyway. Great....shows whole Moon. Will keep on using.) 5-d MOON (Great! Sunrise on Theophilus.) SATURN (136X. Good.) VISIT (Mike, who insisted "Planet X" is real and insisted I look it up!) Slow; quit early. \$19.00 (\$11.59/hr)
- 2757) 09/08/16 (THU) CHARLES VIL. (7:55-8:15PM). PARK (1/2-way up blk.; tight at hm.) Warm. Moderately busy scene. Great sky, but sudden arrival of clds. 7-d MOON (Awesome...especially w/"new" eyepiece.) VISIT (Farhad Pashakhanloo, PhD biomedical engineer. As his specialty is MRI imaging, has serious interest in astrophotography. Nice Milky Way photos on iPhone. Knows personally Babak Tafrihi and Oshin Zakarian, the latter now living in L.A., he said. I believe BT now living in Boston. Am sure Farhad & I will stay in touch.) \$33.75 (\$101.25/4; 1st. contrib. was \$10 and next \$20!). Adjourned to Bar in FPT, but Crystal not working.

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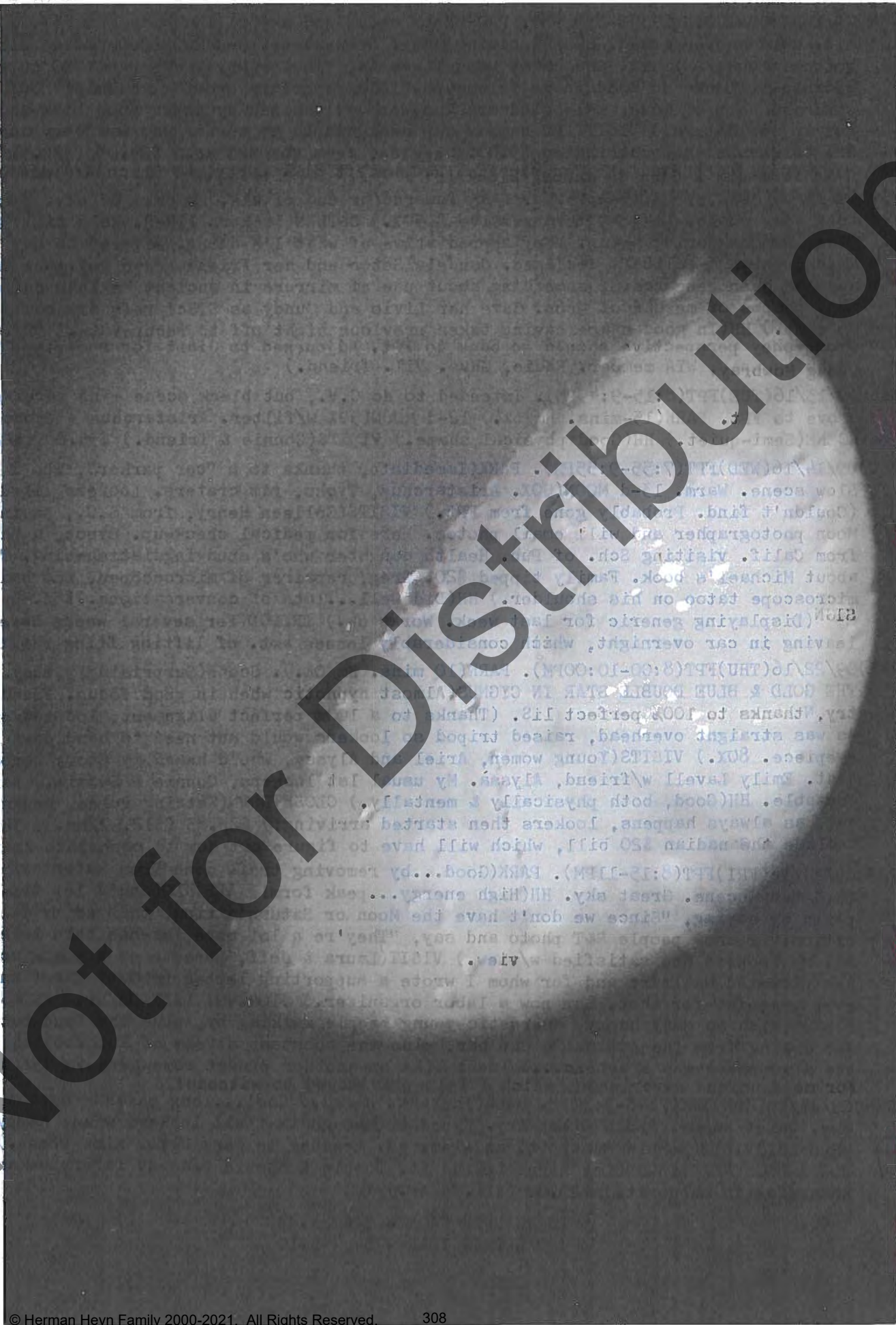
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- 2758)09/10/16(SAT)C.V.(7:40-8:50PM). PARK(Both ok.) Good sky till clouds arrived. Hot and humid. Cold shower immed. upon arriving home. Slow scene. 9-d MOON(Copernicus with Park bottom. Lookers liked. One of my Moon lines is, "That's why they spent \$20B to go there, because it looks so good in my telescope." Always gets a knowing chuckle!) SATURN(Acq. with the help of four, male students, who were galvanised by their Moon look and very eager to see Saturn.) VISIT(JHU campus cop assigned to my corner who was very curious about the telescope and contributed \$5.00. Charles, an MSEL regular.) \$24.00 (\$20.51/hr.) NOTE: Came straight from Jim & Deb's annual Cedarscroft blk. party at which decided not to set up
- 2759)09/12/16(MON)C.V.(7:45-9:15PM). PARK(Toward far end of blk. Hm ok.) Gd sky. Warm. Moderately busy scene. 11-d MOON(Impressive @ 50X.) SATURN(Lookers liked. Held till 9PM.) VISITS (Sue, around during setup. Very appreciative of what I'M doing. Offered to buy food or drink, which I politely declined. Candela Sotos and her friend Arpan Roy. She is Spanish and has been researching something about use of mirrors in ancient Mexican culture. Took many photos of me and of Moon. Gave her Livie and Gundy as STSci refs she could call using my name.) HH(In good shape having taken previous night off to recuperate.) \$22.00(\$14.67/ From money perspective should go back to Fpt. Adjourned to Giant for shopping. VISITS (Doug Mowbray, WIA member. Eddie, Chas. Vil. friend.)
- 2760)09/13/16(TUE)FPT(8:15-9:49PM). Intended to do C.V., but bleak scene + no parking spot, so drove to Fpt. PARK(15-mins. Hm ok.) 12-d MOON(50X w/filter. Aristarchus + Tycho. Good.) SCENE(Semi-quiet.) HH(Good physical shape.) VISITS(Connie & friend.) \$35.00 (\$22.29/hr.)
- 2761)09/14/16(WED)FPT(7:55-9:55PM). PARK(Immediate, thanks to a "car parker", who I tipped \$1. Slow scene. Warm. 13-d MOON(50X. Aristarchus, Tycho, rim craters. Lookers liked.) SATURN (Couldn't find. Probably gone from Fpt.) VISITS(Golleen Henry, from S.C., saying she's a Moon photographer and will email photos. Here for medical check-up. Byron, a physician from Calif. visiting Sch. of Pub. Health daughter who's studying dieting. Told her about Michael's book. Family tipped \$20. Greg, repairer of microscopes, who had a big microscope tattoo on his shoulder.) HH(Did well...lots of conversations.) \$53.00(\$26.50/) SIGN(Displaying generic for last week. Works ok.) TRIPOD(For several weeks have been leaving in car overnight, which considerably lessens amt. of heavy lifting required.)
- 2762)09/22/16(THU)FPT(8:00-10:00PM). PARK(10 mins. Hm OK.). SCENE(Surprisingly busy.) ALBIREO, THE GOLD & BLUE DOUBLE STAR IN CYGNUS. IN ABSENCE OF THE MOON OR BRIGHT PLANET, ALBIREO IS ONE OF MY FALLBACK POSITIONS. (Thanks to a 100% perfect alignment, located on 1st try. As was straight overhead, raised tripod so lookers would not need to bend down to reach eyepiece. 80X.) VISITS(Young women, Ariel and Alyssa, who'd heard my Story Corps broadcast. Emily Lavell w/friend, Alyssa. My usual 1st lookers, Connie & Suzie.) Warm but comfortable. HH(Good, both physically & mentally.) CLOSE DOWN(Getting bored, began at 9:34PM but, as always happens, lookers then started arriving!) \$25.83 (\$12.92/hr.). This doesn't include a Canadian \$20 bill, which will have to figure out how to cash into American!
- 2763)09/23/16(FRI)FPT(8:15-11PM). PARK(Good...by removing traf. cone from Watertaxi stop. Hm. Ok.) Busy scene. Great sky. HH(High energy...peak form!) ALBIREO(Acq'd 1st try. I explain by saying, "Since we don't have the Moon or Saturn's ring, this is my fallback position." I show people S&T photo and say, "They're a lot more intense thru telescope." All my lookers are satisfied w/view.) VISIT(Laura & Jeff, parents of a young man who yrs. ago picketed Walmart and for whom I wrote a supporting letter to City Paper and are forever grateful for that. Son now a labor organizer.) \$104.40! (\$37.96/hr.) FELLOWS POINT AMBIENCE(With so many happy, energetic young people walking by, plus the loud but great music coming from the Admiral's Cup bar, plus the constant stream of automobiles going by, the atmosphere was electric...almost like on another planet somewhere in the universe! It was a unique experience, which I felt privileged to have had!)
- 2764)09/25/16(SUN)FPT(7:48-9:30PM). PARK(Instant. Hm gd.) Cool...long pants + cotton shirt. Gd. sky. Quiet scene. ALBIREO(1st try. Hyped it enough that all lookers were happy w/it.) HH(Good.) VISIT(Robbin Bancroft, an elem. ed. teacher in Park Hgts. Nice woman.) STORY CORPS BOOK "CALLINGS"(1st night taking it. Connie & Suzie read my interview and were enthusiastic about it.) \$20.00 (\$11.76/hr.)

TOTAL THIS PAGE = \$ 284.23

TOTAL THIS YEAR = \$4,445.10

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2765)10/06/16(THU)FPT(8:05-9:15PM). PLW's #173(She did great....finding a parking space and recruiting some good paying lookers.) Hm. park good. Mild. Grt. sky. Slow scene, but picking up at quitting time. 5-d MOON(Awesome! All lookers liked.) 11-d hiatus due to various obligations and impediments. \$29.00 (\$24.79/hr.)

2766)10/12/16(WED)FPT(8:03-10:15PM). PARK(Assisted by a car parker. Hm good.) Lg. pants & sweater weather. Dewy. PLW back in STL. SCOPE(Clock drive not working! Moved scope by hand. Back home drive worked when plugged into wall outlet. Whew! Battery in need of recharge. Hope everything workes next stint.) 11-d MOON(A few craters on SE limb. Many lookers awed by view. Mainly 50X. As forgot filter, very bright image. I often responded, "That's why they spent \$20 billion to go there, because its looks so great in my scope!" HH(Tiptop shape...high energy!). SCENE(Somewhat busy. With naval ship at pier, many sailors in uniform in area, but none looked thru scope.) \$52.71 (\$23.96/hr.)

2767)10/15/16(SAT)FPT(7:40-11:45PM). PARK(Missed 2 pullouts as I arrived. Discouraging, but then a 3rd! 2-mins. Hm. OK). SCENE(Very busy. Colorful mix of regulars and sailors from U.S. Navy ship docked at pier.) 14-d MOON(Reminded by looker...a "Super Moon", as near perigee. Use in my pitch. 50X. Began showing entire Moon, but then offset to bottom 1/2, emphasizing Tycho.) PITCH("The Moon is covered w/1000's of craters, but with a full Moon like this, they melt into the background. The one feature we can see is the Crater Tycho with its starburst effect. Tycho Brahe was the last important astronomer before the invention of telescopes in 1601. He died never knowing about craters on the Moon nor that anything on the Moon would be named for him. If you ever saw the movie 2001, it's the crater where they found the Monolith." Few people today have seen the movie. I tell them, "It's the best SciFi movie ever made, so see it when it comes back." One looker enthusiastically recalled the scene when the bone thrown up in the air, morphed into a space ship heading for the Moon. I joined in his enthusiasm!) VISIT(Peter & Deb Beyrodt from Essex. Mentioning that in 1986 I took my best Halley's comet photo from Wilson Pt., they immediately mentioned Richard & Phyllis Murphy, who live on the point, commenting what great people they are. I told my story about out falling out, as I showed up one night with 20 uninvited guests. Peter & Deb urged me to reconnect with them. I also told them about my ceding our identical Halley's photos to them for publication in S&T Magazine.) STORI CORPS(At least 2 refs.) HH(Despite feeling blah and almost not going, was in GREAT shape...articulate w/high energy!) \$128.82 (\$31.57/hr.) OVER NIGHT(Relying upon my car's dark glass, for a month have been leaving tripod in it over night. Last night left scope, too. If can continue this, will make my telescope life a whole lot easier!!) Adjourned to Bop Pizza for a slice.

2768)10/16/16(SUN)FPT(8-8:55PM). PARK(Instant. Hm ok). 15-d MOON(Rose 7:09PM; acq'd 8PM. Edge-on craters M. Crisium limb. 50X. Lookers liked. H1 clds. approaching, + slow scene, so shut down.) Sailors still around. From Cruiser Leyte Gulf. A few looked. One contributed \$5.00. VISITS(While setting up I pointed out the ISS to a Latino family with two sub-teenage boys. They watched me set-up scope but had to catch WT beofe I could acq. Moon. Claire Regan & friend, Weston. Arrived during set-up and said they'd return later, which they did as I was closing up. We adjourned to The Bar. She is in nursing grad school.) \$19.00 (\$20.73/hr.) LONGEVITY(Every night several people ask, "How long have you been doing this? I was here twenty years ago (for ex.), and you were here." My reply is, "It will be 29 years on Nov. 12th. As I put it, it's been lots of fun, lots of excitement and, so far, no serious damage to either me or my telescope!")

10/18/16(TUE) DRY RUN TO FPT. Bleak scene. Pretzel Twist closing just as I arrived. Convers w/homeless couple, Maria & Darian. HH)Feeling uninspired. Head kind of logy...maybe due to being awakened in middle of afternoon nap. Also, did not want to sit alone getting bored. Finally, as Moon not rising till 8:41PM, would have been relegated to BCyg & Uranus.

2769)10/23/16(SUN)FPT(7:25-8:45PM). PARK(Immediate)SCENE(Bleak.)Mild but sweater weather. Sl. hazy sky. ALBIREO(Lookers satisfied. Showed map, then photo.)HH(OK.) \$11.00 (\$8.27/hr.) VISIT(Man with family who'd just celebrated his 15th City College reunion.)

TOTAL THIS PAGE = \$ 240.53
TOTAL THIS YEAR = \$4,685.63

- 2770) 10/29/16(SAT)FPT(8:00-10:12PM...shut down by clds.)MILD,with increasingly hazy sky. PARK(Immediate luck.in heavy traffic! Home good.) ALIGNMENT(Perfect!) ALBIREO(Very nice for a while, then dimmed by haze, the "sucker holes....then quit. Lookers liked....had no complaints.) HH(Great form!) HALLOWEEN! (A really BIG one! Lots of people in costumes, ranging all over the place. Had I anticipated it, I would have tried to decorate myself, somehow.) PHOTO(A couple w/man with skeleton on should got a photo of them with me and Connie. I said would like a copy, mentioning that next to no photos taken at scope and promised ever show up. They assured me this one would, but whatdayaknow, it didn't. Am wondering if my JHU computers won't accept photos from iPhones.) VISIT(Connie, my long time, almost nightly visitor stayed around a lot longer than usual, taking more interest than usual in my operation. Carried stool to car. Also fascinated by costumers, about whom we compared notes.) Adjourned to The Bar. Traffic so heavy leaving FPT that I was forced to sit in car for 45-mins. before I ventured to leave. Got home 1PM. \$45.01(\$20.46/
- 2771) 11/04/16(FRI)FPT(8:08-10:34PM,) PARK(Watertaxi slot. Home=good.) SCENE(Very slow at start, but picking up nicely at shut down time. 50°F. Wore winter jacket, heavy socks, gloves. 5-MOON(Lookers awed. Held till 9:22PM.) URANUS!(Finally, after many previous tries.Thanks to offsetting from e Psc. 136X. Held till a looker complained he wanted to see something prettier. Held 9:30 to 9:50PM. Lookers ok with it but not excited by it. Smiled at sticker) ALBIREO(Acq'd 9:50PM. Discovered is a lot more impactful at 136X than 80X!) VISIT(Mike Potter's young assistant. Took Moon photo which I asked him to show to Mike. Fern, who thanked me for supporting the Baltimore Brew blog..which I don't remember doing.) HH (In good shape, both mentally & physically.) \$34.81 (\$14.27/hr.) Should of stayed longer.
- 2772) 11/05/16(SAT)FPT(7:50-11:40PM,) PARK(Tense 2-mins. Hm...space taken.)SCENE(Busy.) TEMP. (Comfortable cool.) HH(Fuzzy head, forced articulation. Maybe a bit depressed.) 6d-MOON (Theophilus-Cyrrillus-Catharina...good. Lost 10:05PM.) ALBIREO(Good.) VISITS(Lots of conversational lookers. Angel Acevedo, who'd looked in HPL 20-yrs ago and has clear memery. He and others amazed at my age. Woman who's heard my SC interview and was excited to find me. Richie, who's bought the SC book.) Adjourned w/Angel to The Bar.) \$87.70 (\$22.84/hr.) 11/14 "SUPER MOON"(Lots of inquiries. Showed earthsky.org's comparison photo, which satisfied inquirers' curiosity. Also mention nickel-quarter comparison. MOON PHOTOS W/SMART-PHONES(Some partial successes and one perfect shot.)
- 2773) 11/06/16(SUN)CHAS.VIL.(6:16-8:30PM...RETURN TO EST.) PARK(Immediate...close. Hm ok.) Mid-50's°F. Here to get early start with EST. Sunset 5PM. Moderately busy scene. 7d-MOON(80mi. wide Albategnius front & ctr. Lookers awed. Meade 25mm w/filter. Lens smeared a bit. I wonder if this could be a health problem.) HH(In good head...articulate...not depressed.) VISITS(Erin, a woman who's parents live in the 4-Corners area. Asked her to email me so I could email her my 1950 NM photo. "Pop Corn", who teaches ballet at the 33rd St. "Y". Is giving me a Moon book, which I'll stop by for.) Quit when Moon sunk below roof. MARS(After looker asked, "what's that star below the Moon."I didn't know it was there! Did it for him and his family, then it sunk below roof. Very small.) A surprising \$41.88 (\$18.98/hr.)
- 2774) 11/07/16(MON)CHAS.VIL.(5:44-7:45PM) Early start due to both great sky and Moon. Also, remembering how early I started in CV back in the late 80's. PARK(Immediate & close. Hm gd) Mid-50's°F. 8d-MOON(Quarter. Appenines, Archimedes, Plato. Lookers awed. Lots of Q's re: next Monday's "Supermoon". Explained w/comparison photos.) HH(Ok head.) VISITS(Regina Boyce. Alec, an especially interested cop. Woman from JHU News-Letter who said she'd like to do an-art.) Lots of no-pays. \$25.07 (\$12.41/hr.)
- 2775) 11/10/16(THU)C.V.(5:43-9:10PM)PARK(Immed...close.)SCENE(Semi-busy.)SKY(Sl. hazy.) Low 50's Good night...lots of interested & interesting lookers. HH(Tiptop shape.Part of what made it a good evening was me! I really enjoyed how articulate I was.) 11d-MOON(whole Moon, then Rainbow Bay @ 135X, Then Tycho region @ 135X. Image sl. mushy. Searched and finally found a star on which to collimate, which improved image.) SUPERMOON(Explained many times. Suggest both 11/13 & 11/14 are good nights, that moonrise best time to see, and front of JHU libra best place in neighborhood to view from.)VISITS(Sue, Carol, Sandy, Kattie V. JHU fluid mechanics prof. who wanted to see Archimedes. W/help of my Moon map was able to show it to him. Thanked me for my support of science.) \$52.67(\$15.27/hr.) As lookers kept coming, I had a hard time getting packed up to leave. HOME PARKING(Space taken by same red car two nights in a row.)

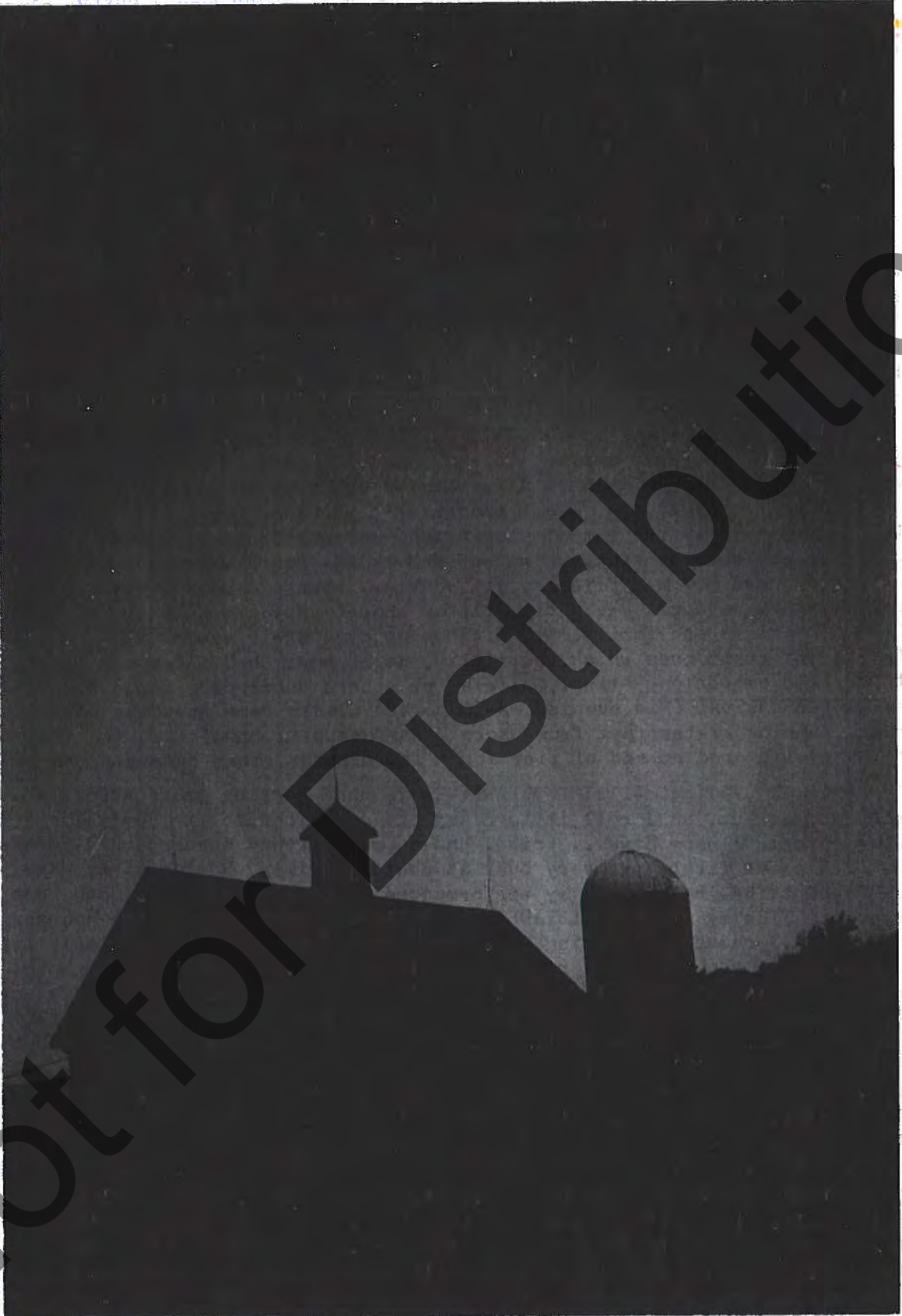
PAGE TOTAL = \$ 284.14

YEAR TOTAL = \$4,969.77

- 2776) 11/12/16(SAT)FPT(8:10-11:30PM) PARK(WT. Hm OK.) SCENE(Busy.) SKI(V. clear.) 40°F. CONCLUSION OF MY 29TH YEAR STREET TELESCOPING, HAVING BEGUN 11/13/87. Mentioned it to lots of lookers, who congratulated me. Might have encouraged some extra contributions.) HH (In spite of all, was slightly depressed...as indicated by forced articulation.) 13d-MOON(Lots of "Supermoon" inquiries. Show comparison photo, and mentioned nickel to quarter analogy. Suggested they look toward NE, starting at 4:40PM Sunday evening. Said tonight's Moon only a "silly millimeter" away from being a Supermoon. 50X filtered. Shifted around trying for ideal view. Ended up using 80X on "south pole" region. Bright Moon! NEAR ACCIDENT(As removing scope from tripod, east leg collapsed, producing a dangerous tilt. Fortunately, I saved scope from toppling. Caused by cold fingers being too stiff to adequately tighten screws on that leg.) NIGHTMARE!(That when taking down scope, everything got very confused and scattered. Ended up heading for scope on JHU campus, lost, nude, uncomfortably embarrassed, and using a piece of cardboard to hide my privates!) VISITS(Many interesting, enthusiastic, complementing people. Woman from Jim P's neighborhood who has 12-yr. old very interested in astro. Woman who'd earlier heard Judy Colbert mention me in a TV interview. Marlene & fam. Longtime lookers.) \$115.00 (\$34.53/hr) *This year's contributions now \$5,084.77. 2015's grand total was \$4,261.38.
- 2777) 11/13/16(SUN)FPT(5:05-6:58PM) START OF MY 30TH YEAR STREET TELESCOPING, THE NIGHT OF THE SUPERMOON! Didn't have a plan, except I wanted to avoid a big parking meter toll, and I wanted to acq. the SM as soon after its 4:40PM rise as possible. A big fair of some sort was occupying the Square, + all spaces were parked. Took a chance on getting a parking tkt. and parked in the 1st WT slot which, serendipitously, was within feet of a great place to see the moonrise, which was at 4:40PM. Acq'd w/scope at 5:05PM. Big Moon, but no color. Used 50X w/2 filters. Filled view. Even w/o noteworthy craters other than Tycho, lookers enjoyed. HH(In tip, tiptop shape! Very articulate; very energized.) VISIT (Again, Marlene and family, all of whom enjoyed their visit.) \$32.11 (\$16.99/hr.) PHOTOS (A man got great ones which, hopefully, he'll email and I can use in the S&T street photo article am contemplating. Quite a few others succeeded, too.) Dead scene at end. MOTORCYCLE BRIGADE(Mid evening +/-50 motorcyclists came speeding down B'way and onto the pier, passing +/-ten feet from where I was setup. I simply trusted they'd avoid hitting me. They lingered at end of pier for a few minutes, then came sipping by me again.)
- 2778) 11/18/16(FRI)FPT(8:08-11:10PM) PARK(WT. Is hard getting stuff across st. to square, but easy to pack-up, as I roll it to B'way and drive car to it. Home: Put out cones but for got to post "Please Save..." sign. Had to park around corner.) Mid-50's F. Mild but dewy SCENE(Slow at first, but very busy at shutdown time.) HH(Top of my game. Q? Were the 2 \$20's contribs. because of my or the scope's performance? Ans. Both, but I think the scope is like my stage!) PLEIADES!(My fallback position sans the Moon or bright planet. 50X w/focal reducer, yielding 25X. Nice, bright stars, but could only fit in 1/2 of the group. Maybe can add a 2nd reducer? Will ask Alin. Showed lookers photo; gave out 46 PLEIADES FACTS blurbs.) 18d-MOON(Acq'd 10:45PM. Terrific at 25X! Will use 25X more often on it.) VISITS(Qasem Bataineh, from Jordan. Father of a rose seller. Retired prof. computer sci. Stayed for +/-1.5 hr. We had on-going conversation. He became enthusiastic enough to recruit lookers. Ashley, a regular, enthusiastic looker, w/husband. A Danish cpl. here for daughter's wedding. Had read about me someplace. Lainie, an Outward Bound instructor in Leakin Pk. Told her to contact me re doing a program. SCOPE(Brought it in to dry out. In cleaning corrector plate discovered an accumulation of black soot!) \$100.00 (\$32.89/hr.) Adjourned to Bop for a slice of pizza. Price increased to \$3.18!
- 12/05/16(MON) Two dry runs to Chas. Vil. Leaving home, 5-d MOON looked slightly hazy but doable. At CV, it was too hazy to set up. Back home it again looked doable, so returned to CV, only to find it again too hazy. Had a bun at Starbucks and returned home to stay. BIG PUZZLE(Can't find my stool. Not in car; not in house. Demoralizing event. Also can't find my HEAVY LOAD COMING-PLEASE SAVE THIS SPACE SIGN. Doubly demoralizing.)
- 2779) 12/07/16(WED)CV(5:12-7:12PM) ss=4:41PM. 48°F. Sl. hazy. Slow scene but getting busier. 7-d MOON(Eratosthenes & Plato. 50X w/filter. No focal reducer, as it had a ghost Moon image.) VISITS(Chris Eberhardt. Steve Allan, city planner). HH(Maybe sl. depressed.) \$20.07 (\$10.04) THIS PAGE = \$267.18 THIS YEAR = \$5,236.95. SCOPE(Bolt not out enough. Put it back in case, unscrewed it a bit, tried again but still in too far. No strength to try again, so slowly loosed w/wrench to let it slide into place. Not good!. So unnerved that forgot to insert other 2 bolts!) Had no Moon Facts, so apologized and gave Pleiades Facts.

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AURORA BOREALIS (NORTHERN LIGHTS) OVER BALTIMORE COUNTY
NOVEMBER 6, 2001, 2:00AM. PHOTO BY HERMAN M. HEYN

Not for Distribution

Handwritten notes and markings on the right margin, including the number '10' and a checkmark.

| | | |
|----------|---|----------|
| 01/14/16 | SP Charles Village parking | \$ 0.50 |
| 01/15/16 | SP 12-SC handouts (JHU) | \$ 0.84 |
| 01/16/16 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 01/16/16 | SP FPT parking | \$ 1.50 |
| 02/05/16 | EQUIP battery for driving telescope (Baynesville #403015) | \$ 39.21 |
| 02/18/16 | SP 8-sides SC handouts @ \$0.07/ea. (JHU) | \$ 0.56 |
| 02/26/16 | SP 15-sides SC handouts (JHU) | \$ 1.05 |
| 02/28/16 | SP 15-sides SC handouts (JHU) | \$ 1.05 |
| 03/02/16 | SP 6-sides SC business cards (JHU) | \$ 0.42 |
| 03/10/16 | SP 19-sides SC handouts (JHU) | \$ 1.33 |
| 03/11/16 | SP Fpt. parking | \$ 1.75 |
| 03/18/16 | SP 25-sides SC handouts (JHU) | \$ 1.75 |
| 03/21/16 | SP 38-sides handouts for cub scout mtg., 3/22/16. | \$ 2.66 |
| 03/24/16 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 03/24/16 | STA small screw & nuts for 3" scope; fastener for SC "hat"(ACE) | \$ 3.60 |
| 04/12/16 | SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 04/17/16 | SP 22-sides SC handouts (JHU) | \$ 1.54 |
| 04/17/16 | SP FPT parking | \$ 0.50 |
| 04/18/16 | SP 15-sides (JHU) | \$ 1.05 |
| 04/19/16 | STA Liquid Paper (FedEx) | \$ 1.89 |
| 04/19/16 | SP tip to woman guard in bar for bathroom use | \$ 1.00 |
| 04/21/16 | STA Pen (Artist Craftsman) | \$ 1.81 |
| 04/30/16 | STA stamp pad ink for "I Swa..." stickers (Stamples) | \$ 2.98 |
| 05/15/16 | SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 05/13/16 | SP To Buster for cleaning my area in FPT | \$ 3.00 |
| 05/12/16 | STA 1)Sharpie pen + 1-art (cutting) board | \$ 2.13 |
| 05/25/16 | SP 19-sides SC handouts (JHU) | \$ 1.33 |
| 05/27/16 | SP 900 Post-it notes (staples) (= \$0.01707/ea.) | \$ 15.36 |
| 05/27/16 | SP Cut Posts-its down to 2" (FedEx) (now = \$0.0187/ea.) | \$ 1.49 |
| 05/29/16 | SP 8-sides SC handouts (JHU) | \$ 0.56 |
| 06/05/16 | SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 06/12/16 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 06/19/16 | SP 5-sides SC handouts (JHU) | \$ 0.35 |
| 06/26/16 | SP 6-sides SC handouts (FedEx) | \$ 0.89 |
| 06/29/16 | SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 07/10/16 | SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 07/11/16 | STA 1-Bungie strap for holding scope to handtruck (Ace Hdwe) | \$ 3.70 |
| 07/11/16 | SP To derelict for help loading car FPT | \$ 1.00 |
| 07/14/16 | SP (DITO) | \$ 1.00 |
| 07/15/16 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 07/17/16 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 07/16/16 | SP 1,000 "stickies" notes | \$ 10.59 |
| 07/21/16 | SP 2-sides SC handouts (JHU) | \$ 0.14 |
| 07/22/16 | SP 12-sides SC handouts (JHU) | \$ 0.72 |
| 08/21/16 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/28/16 | SP Fpt parking 8/27 & 8/28 | \$ 0.75 |
| 08/29/16 | STA 10-sheet protectors for SC album (FedEx) | \$ 4.23 |
| 08/31/16 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 09/04/16 | SP Fpt parking | \$ 0.51 |
| 09/05/16 | SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 09/05/16 | SP Fpt parking | \$ 0.75 |
| 09/06/15 | SP Fpt parking | \$ 1.00 |
| 09/09/16 | SP 12-sides SC handouts (JHU) | \$ 0.84 |
| 09/11/16 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 09/15/16 | SP 15-sides (JHU) | \$ 1.05 |

PAGE TOTAL = \$127.01

EQUIP = \$39.21 STA = \$18.53 SP = \$69.27 T = \$127.01

STREET CORNER EXPENSES -- 2016

| | | | | | | |
|----------|-------|--|--|--|--|----------------------|
| 09/15/16 | SP | FPT parking | | | | \$1.00 |
| 09/22/16 | SP | FPT parking | | | | \$0.50 |
| 09/23/16 | SP | 8-sides SC handouts (JHU) | | | | \$0.56 |
| 09/23/16 | SP | FPT parking | | | | \$0.25 |
| 09/24/16 | SP | 15 sides SC handouts (JHU) | | | | \$1.05 |
| 09/25/16 | SP | FPT parking | | | | \$1.00 |
| 10/06/16 | SP | FPT parking | | | | \$0.50 |
| 10/10/16 | SP | 6-sides business cards (JHU) | | | | \$0.42 |
| 10/12/16 | SP | to FPT car parker | | | | \$1.00 |
| 10/12/16 | SP | FPT parking meter | | | | \$0.75 |
| 10/15/16 | SP | FPT parking | | | | \$1.50 |
| 10/16/16 | SP | 8-sides SC handouts (JHU) | | | | \$0.56 |
| 10/16/16 | SP | FPT parking | | | | \$1.00 |
| 10/23/16 | SP | FPT parking | | | | \$2.00 |
| 10/22/16 | SP | 6-sides business card (JHU) | | | | \$0.42 |
| 10/15/16 | BOOKS | Observer's Handbook 2017 (Sky & Telescope) | | | | \$27.95 |
| 10/29/16 | SP | FPT parking | | | | \$0.75 |
| 11/05/16 | SP | FPT parking | | | | \$1.00 |
| 11/06/16 | SP | 13-sides SC handouts (JHU) | | | | \$0.91 |
| 11/07/16 | SP | 6-sides SC handouts (JHU) | | | | \$0.42 |
| 11/07/16 | SP | CV parking | | | | \$0.50 |
| 11/11/16 | SP | 16-sides SC handouts (JHU) | | | | \$1.12 |
| 11/16/16 | SP | 12-sides SC handouts (JHU) | | | | \$0.84 |
| 11/20/16 | STA | 1-Liquid Paper (FedEx) | | | | \$2.49 |
| 11/23/16 | SP | 8-sides SC handouts (JHU) | | | | \$0.56 |
| 12/04/16 | SP | 4-sides SC business card (JHU) | | | | \$0.28 |
| 12/07/16 | SP | CV parking | | | | \$0.75 |
| | | | | | | TOTAL \$50.08 |

THIS PAGE: SP = \$19.64 BOOKS = \$27.95 STA = \$2.49
 YEAR: SP = \$88.91 STA = \$21.02 EQUIP = \$59.21 BOOKS = \$27.95 TOTAL = \$177.09
 MILES: 697

2017

Not for Distribution

2780)01/25/17(WED.)CHAS.VILLAGE(5:55-8:23PM). Good sky. HI 40'sF. PARK(Both OK.) HH(1st stin since turning 86 yrs. old. Hi energy...articulate. Handled equip. ok, except stomach muscles out-of-shape for lifting scope on to tripod. Need to do sit-ups!) BATTERY(For some reason not driving scope, so had to track by hand, which meant lower mag. than I wanted.) VENUS(80X double filtered. Nice gibbous "moon". Lookers liked.) ORI's Belt through finderscope. Pleiades thru finder. M42 thru scope. Nebula not vis. VISITS(Brent & Bederka and Katy. Kady, an M.D. with some astronomy background especially enthusiastic. Stay a long time, and helped me load up. Ruth, a long-time looker. Teaches 8th grade at Waverly MS. VENUS(In tree by 8PM.) \$20.98 (\$8.53/hr.) TENDINITIS(Have been experiencing it in right arm for a month. Maybe brought on by accordion or computer mouse, or both. While it is receding, still feel it, but was able to work around it tonight.)

2781)01/31/17(TUE.)C.V.(6:14-7:45PM). clouds around, but at late afternoon sight of Moon & VENUS side-by-side (4° apart), had to go out. Intermittent clds. HI 40'sF. PARK(Both OK 3-d MOON(25X. Fine.) VENUS(Kept at 80X, for lack of battery drive. Don't think it inspired much excitement. Toward end was in clouds, which allowed filterless view.) VENUS SIGN(Left it home, which discouraged me from recruiting.) 3"x5" OBJECTS CARD(Also at home. I seem to be out-of-step with my normal routine!) RIGHT ARM(Am experiencing a good bit of pain when I move it certain ways. Try to work around it when handling scope and tripod. Might be a case of "mouse shoulder"...aka tendonitis, caused by upper body strain from manuvering computer mouse. Along with no battery, is kind of discouraging. Appt. w/Dr. Tawil 2/10.) BATTERY(Have an email from a neighbor saying he has 12V charges! Hopefully will be chg'd in next few days!) \$16.39 (\$10.78/hr.)

60 Miles driven traveling back and forth from home to Battery Warehouse and Home Depot on Joppa Rd. and other places in search of a solution for my battery problem. Solved at the moment by the purchase of 8ea. size D Duracells from Micro Center on Joppa Rd.

2782)02/06/17(MON)C.V.(5:59-7:25PM). Good sky, but w/slowly increasing haze. Mid 40's. PARK 1st spot. Hm space saved w/cones. HH(In good shape. Since have begun doing sit-ups and leg raises, my stomach muscles are in better shape for lifting scope on to tripod. BATTERY (Now using 8-D batteries in battery holder I last used in 1990. Worked well!) VENUS (Began @ 80X double filtered, but later discovered it was nice at 50X. Very noticeably crescent. Showed diagram of V's 19-mos of phases, and gave out Venus facts. Lookers like but not noticeably amazed. Educated them about Galileo's BIG discovery's import.) 9-d MOON(Lookers liked. Copernicus & Jura Mts. 50X and 25X.) SCENE(Quiet, but picking up as I was closing down!). HH(Right arm tendinitis seems to be curing itself. Probably won't use pills and physical therapy recommended by Dr. Tawil.) VISIT(Katy & Brent, who I'll see tmw. night at STSci talk.) \$12.00 (\$8.33/hr....included a \$5 contrib.)

2783)02/18/17(SAT)C.V.(5:45-7:30PM). Clds. began breaking up 6:15PM, then clear. Low 50'sF. PARK(Both OK.) Pretty busy scene. ACCOMPANIED BY PARSA SHAMS(Came from DC with his brand new U.S. Citizen document. 1st thing he did with it, he said, was to stand in front of the White House and shout at Trump! We took photos. Parsa really enjoyed telescoping and was a great help loading/unloading! Afterwards we had supper at Cyprianna. While I took a short nap, he read my album, which he gave a rave review.) VENUS(Took 1/2 hr. to acq. Clds.; possibly a poor dec. fig. I'd calc'd +8.7, but it was at +10.5! Ugh. All lookers seemed satisfied. Was a very strong crescent. At greatest brilliance. 40M mi. Lost behind bldg. 7:30PM.) HH(Hi energy, articulate.) Ran out of VENUS FACTS! VISIT(A pretty young woman named Sierra & boy friend. There before V acq'd, went for supper, and returned. Contrib'd \$10.) \$49.75 (\$28.83/hr.) *Also, giving out VENUS FACTS! (D batts. working)

2784)02/19/17(SUN)CV(5:50-7:33PM). Mild & very clear. Scene not as busy as last night. VENUS (1st try, having rotated tripod +/-3.5° eastward. Lookers surprised by crescent shape. Now 34-days till Inferior Conjunction w/Sun. Moved scope 1.5 yds. forward, but held V only 3 add'l mins. Used 80X only, w/mild filter.) HH(V.G. shape.) VISITS(Sierra & Mike from last night. Sara?, with whom posed for photo. Woman who saw my Venus announcement on Next Door Waverly website.) Ajourned to the Giant. \$44.03 (\$25.60/hr.) 4.91 BATTERY HRS

TOTAL THIS PAGE = \$143.15

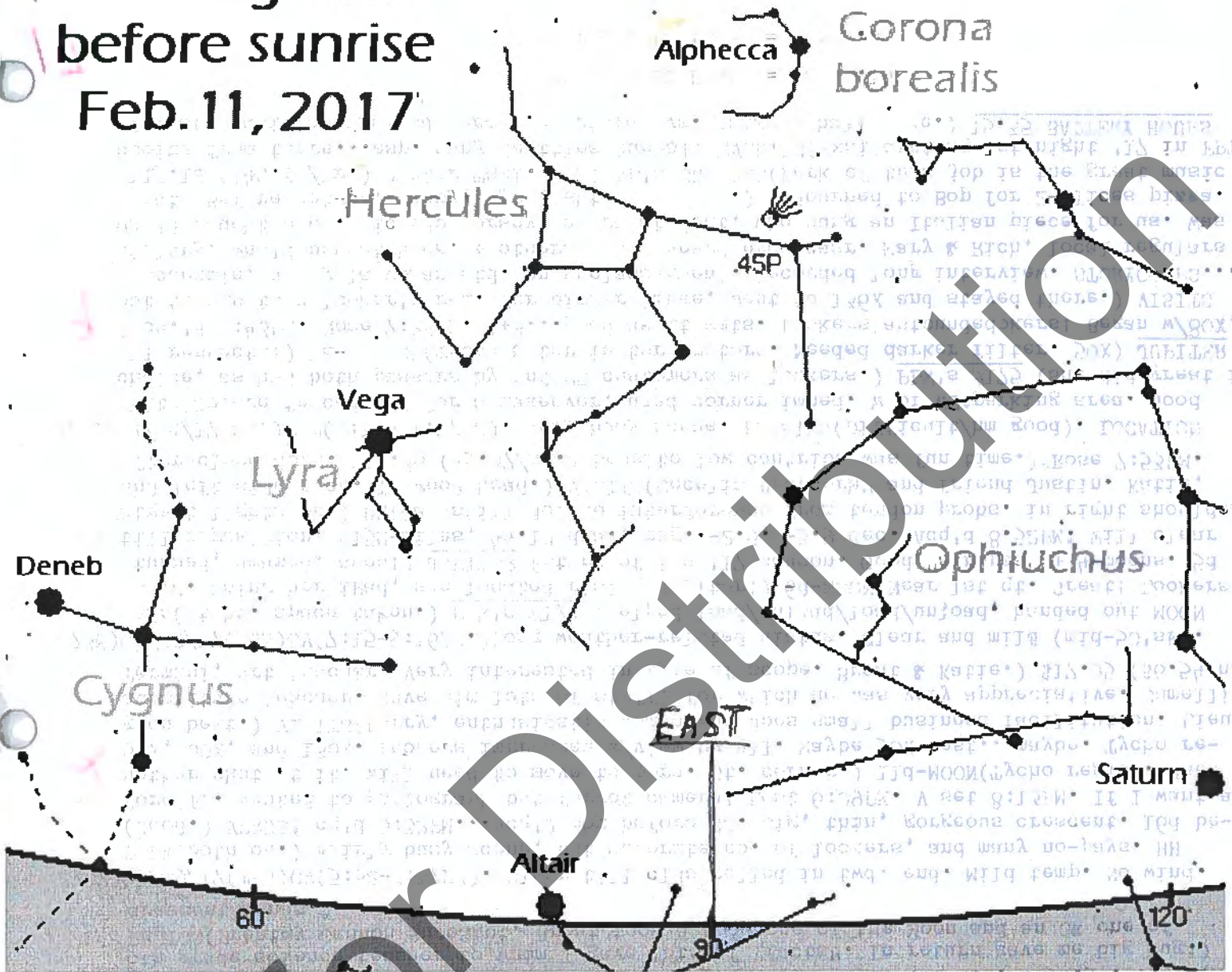
TOTAL THIS YEAR = \$143.15

- 2785)02/23/17(Thu)CV(6:05-7:21PM). Clear, despite ACCUWEATHER rpt, otherwise. Hi 50'sF. Easy parking...both. Fairly busy scene. VENUS(1st try. +11 $\frac{1}{2}$ °. Bigger, but not yet real thin. Telling lookers it looks like the Moon, but w/o craters. Lost 7:15PM.)
 2 HH(Good. Intended to go out last night but just couldn't make myself do it. Am thinking 3 night in a row is too much for me. Need recuperation time. VISIT(Dave Harding and friend. Walked right past, prob. not noticing me. Spotted me when returning. Duncan one of the late afternoon regu;ars at Carma's. \$16.86 (\$13.28/hr.) After loosing Venus, looked for M45, but no luck. Got Ori's Belt in finder, but decided had enough. 6.18 B.Hr)
- 2786)03/05/17(SUN)CV(5:42-7:15PM). Clear. Mid-30'sF. Fairly busy scene. PARK(Both OK.) 7-DAY MOON(1st Qt. Many lookers awed by sight @ 50X. Using my camera, frequent looker Brent Bederka got a nice photo.) VENUS(Acq'd 5:45 1st try. Nice, big crescent, even at 50X. Now 31 million mi. from Earth. Sets 8:31PM, 2H28m behind Sun. Lost 6:23PM.) HH(Good.) VISITS(Brent & Katy...~~as~~ enthusiastic as always! Adrienne Morris from Bufalo, NY. Contacted JHU Astro looking for someone to share last night occultation of Aldebaren and was referred to me. We did it from near her daughter's hse. on W. 41st. St. She's an amateur with a 6" reflector. We ajourned to Barnes & Nobel, where she bought me a sandwich FRANK, who was at B&N. Remembered me from yrs. ago in Fpt. Enthusiastic.) 27.39(\$17.67/ VISIT(Young man who printed my MN 1950 photo at TechLab.and really likes it. I said if he's send me an email, I'd send him a copy.) CRESCENT VENUS(Both Brent & Katie said they could see V as a crescent. I tested them and have not doubt. V's dia. = 50.5". VISIT(A 6th grade science teacher to whom I gave lots of "Facts". In return gave me big hug!) PHOTOS(With my Cannon SureShot, Brent took a good one of the Moon and an OK one of crescent Venus.)
- 2787)03/09/17(THU)CV(5:32-8:17PM). Clear till clds rolled in twd. end. Mild temp. No wind. PARK(Both ok.) Fairly busy scene, but moderate no. of lookers, and many no-pays. HH (Good.) VENUS(Acq'd 5:32PM...acq'd 36m before SB. Big, thin, gorgeous crescent. 16d before IF. Wanted to photograph but forgot camera! Lost 6:09PM. V set 8:13PM. If I want another shot at it, will need to move to 33rd. St. corner.) 11d-MOON(Tycho region. Used 50X, 80X, and 136X. Lookers impressed w/view by all. Maybe 50X best...maybe. Tycho region best.) VISITS(Barry, enthusiastic woman who does small business facilitation. Lieun substitute teacher. Gave him lots of stuff, for which he was very appreciative. Camellis Termini, art educator Very interested in type of scope. Brent & Katie.) \$17.95 (\$6.54/hr
- 2788)04/02/17(SUN)CV(7:15-9:16PM.) Long weather-related hiatus. Clear and mild (mid-50'sF). PARK(At hm. space taken.) PLW's #174 (Helped load/unload/load/unload, handed out MOON FACTS. Using her iPad, she located rising Jupiter!) 6d-MOON(Near 1st qt. Great! Lookers stunned, amazed, awed!) JUPITER (Start of its '17 season. Good "stripes" + 4-moons. 5d till opposition, 415M-miles, 44.1" dia., mag. -2.5, -5.9 dec. Acq'd 8:52PM. Will clear street lights ok.) HH(Can still do! No interference from tendon probs. in right shoulder and left side neck. In good head.) VISITS(Cecelia "popcorn" and friend Justin. Katie, after close down. \$11.86 (\$5.87/hr.) Despite low contribs was fun time.) *Rose 7:53PM.
- 2789)04/08/17(SAT)FPT(8:16-11:07PM). Very busy scene. PARKING(Difficult/hm good). LOCATION (With Square fenced off for a makeover, used corner immed. W of WT*parking area. Good choice, as had both passers by and WT customers as lookers.) PLW's #175 (She did great i all respects!) 12-d MOON(Tycho & terminator craters. Needed darker filter. 50X) JUPITER (Acq'd 8:48PM. Rose 7:25PM. 1+3...good as it gets. Many astounded lookers! Began w/80X, but thanks to a looker's req. for bigger image, went to 136X and stayed there.) VISITS (MacKenzie, a Loyola woman std. on an assignment. Recorded long interview. STORICORPS... Hillary, who'd bought book, + others who's heard broadcaster. Mary & Rich, local regulars who'd bought book. Ricardo Horsey, opera student, who sung an Italian piece for us. Was Great! Before set-up, Bummy, Myra, Rbt. & .) Ajourned to Bop for 2-slices pizza. \$115.10 (\$40.39/hr.) *Water Taxi. ADMIRAL'S CUP BAR(Perk of this job is the great music coming from there...esp. many Beattles tunes!) EVENING(Exhilarating 1st night '17 in FPT VISITS(2 families from NJ here for Orioles vs. Yankees ball game.) 15.35 BATTERY HOURS

TOTAL THIS PAGE = \$189.16

TOTAL THIS YEAR = \$332.31

looking east
before sunrise
Feb. 11, 2017



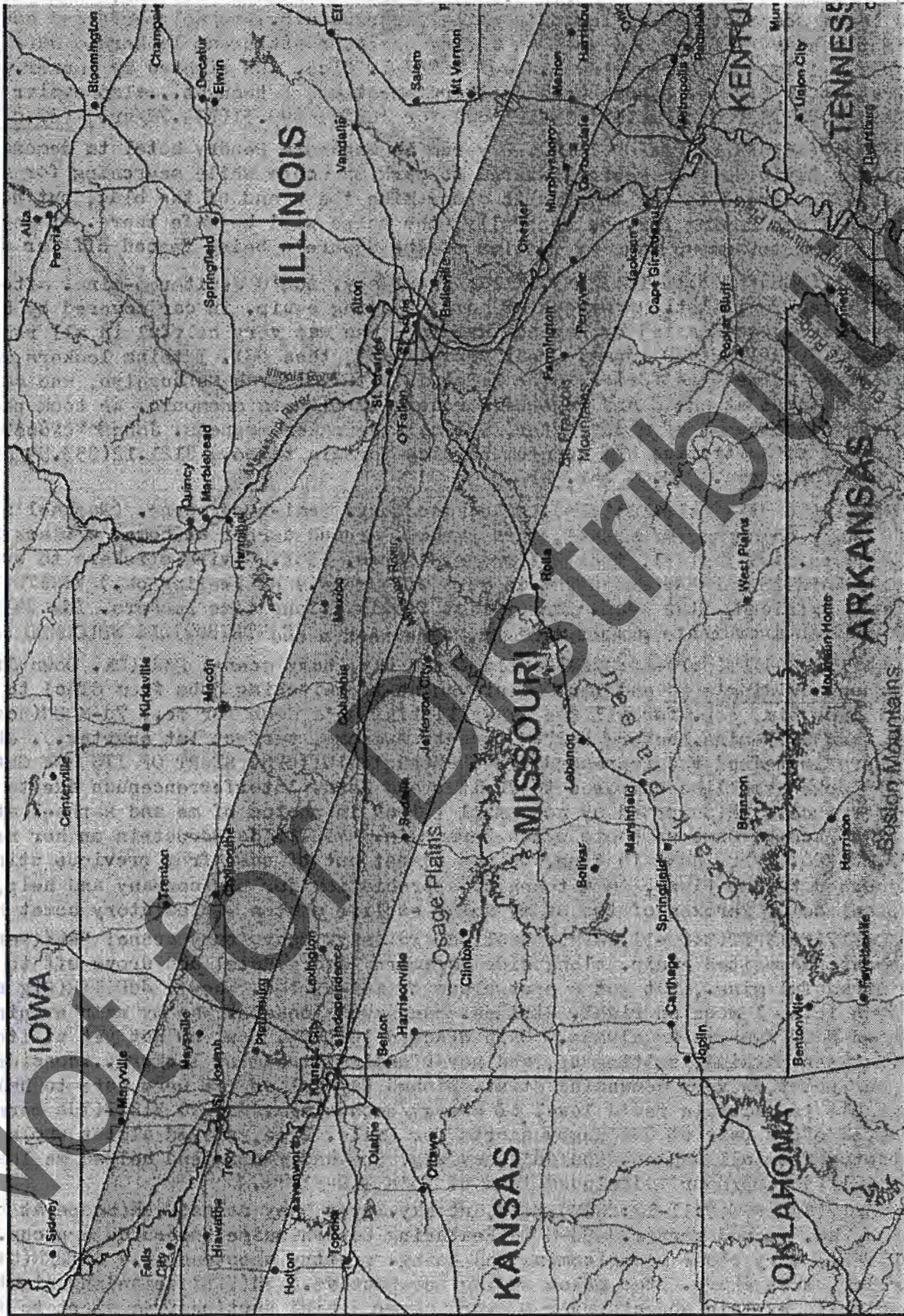
From your balcony, East is slightly to the left.

- 2790) 04/12/17(WED)CV(8:15-10:55PM). Fair, mid-60's. PARK(OK/not ok.) Semi-busy scene. JUPITER(3+1 moons. Mushy at start, then good. GREAT RED SPOT noticed by looker, then by friends. I finally saw it @ 166X. Smallish, reddish, bottom edge of SEB. Must stop saying is not vis. in my scope!) 15-d MOON(Acq.'d 10PM. Briefly. Good terminator craters.) VISITS(Rafael Hviding, Dartmouth astronomy major temporarily at STScI. Stayed whole stint recruiting lookers with an enthusiasm equal to or better than Frank Sommer STScI's Tue. night MC! Brent & Katie, who helped me pack-up.) HH(Feeling a bit tired but sustained req.(d energy level.) PLW back in STL. \$43.00 (\$16.11/hr.)
- 2791) 04/14/17(FRI)CV(8:50-10:20PM). Late start due to clds. in east blocking Jupiter. Decid to cancel and food shop. But on Giant parking lot noticed Jupiter cutting thru clouds, so rushed home, packed up, and went to CV. Clds., then fair. Low 60's F w/slight wind. Slow scene. PARK(Ok/not ok. Will make bigger "HEAVY LOAD COMING Please Save This Space THANK YOU!" sign.) JUPITER 1+3 moons close-in in an eye-catching array. Am hoping looker were so intrigued they'd want to return for another Jupiter look! \$51.00 (\$34/hr.)
- 2792) 04/17/17(MON)CV(8:16-9:50PM). Fair, low-60's F. PARK(OK/not ok. Put up larger "Kindly Save This Space" sign on tree, but it didn't work.) Slow scene. JUPITER(1-3. Nice.) HH(ok.) VISIT(A local blown mind, Terry Lee Hawkins, who hung around a long time spouting nonsense and who, at one point, sat on nearby steps and wrote a long poem for me.) \$24.00 (\$15.38/hr.) Was hoping to cover today's \$25.15 P.O. chg. Almost! (21.08 bat.hr First looker stayed while I set up. Turned out his name was also "Herman".
- 04/18/17(TUE) Dry run to Fpt. Too windy to set up. Accompanied by Raphael Hviding, who would have helped me set up. We walked around a bit checking out my possibilities, A-journaled to Bop, where he had a slice of pizza. At PLW's suggestion, today emailed manager of Sagamore Pendry Hotel, Joan Marte, asking permission to leave scope in alcove to right of front door for 5 to 15 mins. while I parked car. If I get an ok, can push equip down sidewalk to my new spot.
- 04/26/17(WED). Drive to FPT to photograph Pendry-Sagamore Hotel entrance for letter to Kevin Plank requesting permission to leave scope there while parking.
- 2793) 04/28/17(FRI)CV(8:27-9:47PM). Mid-70's F. Sl. haze, then clear. PARK(Drove around blk. times, then got a good one. At home signs & cones worked for a change.) SCENE(Busy, thanks to its being JHU's Spring Fair week-end.) HH(Not especially incumbered by neck & shoulder problems...thankfully!) JUPITER(2+2. Fine. Lots & lots of totally amazed lookers. Shut down by clds. which disappeared while loading car. But enough was enough!) VISITS(Donna Keck, who watched me set-up and had first look. Buffalo amateur Adrienne Morris, back for a granddaughter's christening. Stay whole stint. Ray, a JHU copy who is a regular looker.) \$64.72 (\$48.66/hr. Incl'd a \$20 + 3x\$5.00) SCOPE STORAGE(Decided would make life easier if could leave all but basket in car, which has tinted windows. To make equip. invisible, covered all with a jet black sheet bought in Fpt. the other day. Had trouble spreading sheet to cover all. Am worried about scope in car in hi temp.
- 2794) 04/30/17(SUN)CV(8:23-9:45PM). Mixed weather rpt. + early eve. clds. However, having been fooled last night into missing a grt. sky, decided to go for it, come what may. Was right decision! Ok sky; chilling breeze. Slow scene, but steady line of lookers. HH (In good form, despite several neck and R shoulder hurts.) JUPITER(2+2. Real good.) 4-d MOON(Fine, till set behind bldg.) PARKING(CV good. Space taken at home. Parked down street, and covered tripod & scope w/black sheet. Am hoping that with tinted windows & the black sheet, equip. will be invisible and safe left in car. \$51.06(\$37.27/hr.) VISIT(Shannon, a regular woman looker.) (23.78 battery hrs.)
- 2795) 05/03/17(WED)CV(8:37-10:10PM). Mid-50's F. Clear. PARK(OK/down st. w/black sheet covering RAFAEL HVIDING(Had him do all the work--unloading, setting-up, pointing, recruiting, breaking down, & loading. Made my evening a lot less demanding! He really enjoyed the opportunity.) JUPITER(1-3, stripes. Great!) 4-d MOON(4TH. Only at 135X. Awesome!) HH (After a long, strenuous day, but ok.) SCENE(V. slow) VISIT(Raphael's co-worker, Chris.) \$9.50 (\$6.13/hr.) PARKING TKT.(Given to woman who parked illegally to look thru scope. I offered to return her \$2.00, but she didn't accept it.)

TOTAL THIS PAGE = \$244.43
TOTAL THIS YEAR = \$576.74

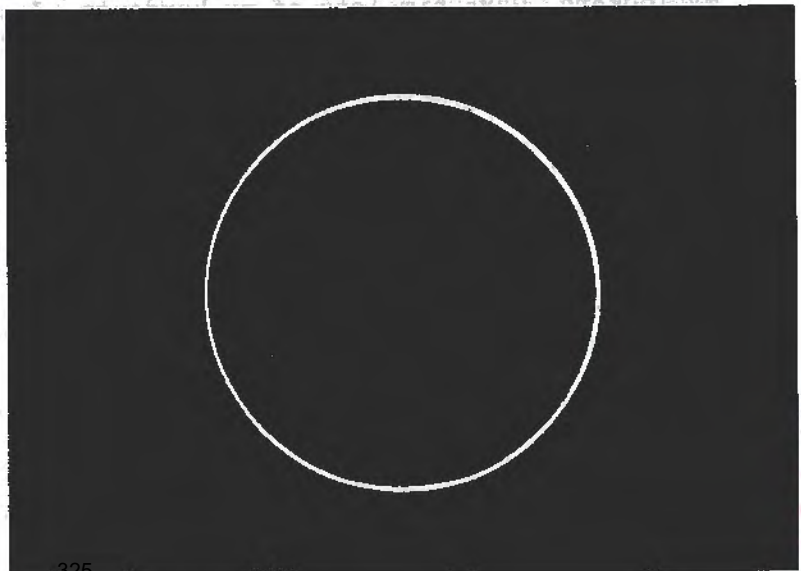
(25.33 battery hrs.)

- 2796) 05/08/17(MON) FELS PT.(8:37-11:07PM). Clear; Mid-50's. PARK(OK/around corner with black sheet covering scope/tripod.) Accompanied by Raphael Hviding, which allowed me to leave scope at set-up location while I parked car. Raphael performed most of the night's heavy lifting, as well as aiming scope, chatting-up lookers.) HH(A bit tired, a bit chilly, but performed ok.) JUPITER(3+1. Nice. GRS sighted by looker.) 12d-MOON (Craters on S. rim. Jupiter much more interesting, I thought...also easier to explain.) VISITS(Ophthalmologists in town for conf.) \$99.31(\$39.72/hr.) (27.83 bat.hrs.)
- 05/10/17(WED) FELS PT.(05:15PM). Dry run to Sagamore Pendry hotel to demonstrate to manager David Hoffman where I wanted to park my scope while searching for a parking space. He agreed to let me park it along side the W end of the bldg, but not in the alcove I was hoping to use. Hopefully, the scope will be safe there. At any rate, this is a start toward solving my problem of the Square's being fenced off for a makeover.
- 2797) 05/15/17(MON) FPTS(8:16-10:32PM). Mild; great sky. Acq'd Jupiter 3-mins. after sunset. PARK(Water Taxi slot. Up street at home, leaving equip. in car covered by black sheet Busy scene. Accompanied by Raphael Hviding, who was very helpful in all respects. His time #6.) JUPITER(4+0 moons. Great array! 135X, then 80X. I think lookers as impressed by latter as much as former. Star below J.) VISITS(Sarah McLaughlyn, who said she looked thru scope at age 8 and remembers receiving planets mnemonic. We took photo. Steve Freedman, somewhat of a character, who said he makes magnets. Ida Bernstein, an animated mathematician w/a quantum physics formula tattoo.) \$121.12(\$53.59/hr!) Adjourn to BOP for pizza. (30.09 bat. hrs.)
- 2798) 05/16/17(TUE) FPTS(8:13-10:18PM). Mild, good sky. Semi-busy scene. (Raphael's #7). Drop off scope on corner w/Raphael, then parked. At home, around corner w/black sheet covering scope. JUPITER(3+1, then 2+1 moons. Stripes. 135X. Giving stickers to everyone.) JUPITER PHOTOGRAPHERS(2nd night in row with none.) HH(Feeling ok.) VISITS(Emilie Lavell w/friend, Stan Heck. The Cypriot family...long time lookers. Ida. \$43.43(\$20.88, NO PAYS(An inordinate number tonight. Maybe need a CONTRIBUTIONS WELCOMED badge.)
- 2799) 06/01/17(THU) FPTS(8:10-11:07PM). Mild, good sky, busy scene. PARK(Ok. Down St. at home. (Raphael Hviding's #8 and last stint, as he is switching jobs from STScI to Goddard. Will miss him, esp. for all the heavy lifting he's done for me.) 7d-MOON(Using polarimeter, acq'd 17-mins. before 8:27PM sunset. Awesome, perfect 1st quarter.) JUPITER(1+3. Lookers surprised and impressed.) SATURN(Acq'd 10:13PM. START OF ITS NEW SEASON. At 135X looked smallish compared to Jupiter and Moon. Not a good launch due to clouds interference.) HH(Surprised by how small I look in photos of me and Raphael standing next to scope. Same w/ photo w/Ida Bernstein.) VISIT(Ida Bernstein on her nightly jog. \$77.02(\$26.11/hr. Just in time, as was almost out of cash from previous stints.) Adjourned to Bob Pizma. As a token of appreciation for his company and help, gave Raphael color xeroxes of two of my solar eclipse photos + a salutary comet HB card.
- 2800) 06/02/17(FRI) FPTS(9:00-11:22PM). Coolish, gd. sky. Busy, busy scene! PARK(Per its agreement, deposited equip. along side Sagamore Pendry Hotel and drove off to park. Took 25 stressful mins., but got a spot close to set-up loc. Whew!) JUPITER(Big and bright, w/3 on left, 1 moon on right. Stripes. Many awed lookers. Was my main evening's feature.) 8-d MOON(Awesome as always.) SATURN(Acq'd 10:16PM. Low, so not yet at its best.) HH(Between parking, setting up, and never ending stream of lookers...considerable line at one point, A very demanding stint. Wished Raphael or PLW were here to help. However was able to maintain req'd level of energy/enthusiasm. Whew!) VISIT(Ida Bernstein, who dropped off a pair of USA Rugby shorts for Emile. Bree, stayed almost whole stint taking photos from all angles. Wouldn't say why! She and man friend helped me load car.) \$153.21 (\$64.65/hour!! Included lots of \$5's + 2-\$10's.)
- 2801) 06/03/17(SAT) FPTS(8:11-12:20AM). Mild, Grt sky. Super busy scene! PARK(Scope at hotel, car quick, hm. around corner.) 9d-MOON(Featuring post-sunrise Crater Copernicus. Wowed!) JUPITER(3 very close moons coming and going. pretty spectacular.) SATURN(Clouded out earlier, then sharp. Star below adding perspective.) HH(VERY demanding night, including needing to explain objects over & over & over again! Routine from start to finish doesn't seem to adversely effect my shoulders/neck problem.) VISITS(Woman who, at my req., bought me hard candy to stave off low sugar attack. Franz Schneiderman, ex. Sun letter editor, w/friend. Woman from hotel who was impressed with my act and said she's talk to the management re my setting up there. Bike rack builder & neighbor Marcus Robinson, with girlfriend, Tracey and his mother.) \$246.22!!!(\$59.33/) 41.64 BAT HRS.



- 2802) CONTINUED. Something that made this evening an especially exciting one was that bright Jupiter was just 2° below the Moon, their making for an eye catching pair. VISIT) Emily Lavell, who hung out for quite a while, bought me a hot dog, and helped pack-up. We adjourned to the Adm. Fell Inn bar for beer. 41.64 BATTERY HOURS
- 9 2802) 06/08/17(THU)FPT(8:43-10:45PM). Cool breeze, good sky. Semi-busy scene. PARK(Unloaded at hotel, then 9-min. finding ok spot. Hm. across str.) 14-d MOON(Nearly full. Lookers like JUPITER(4 moons on right. Offsetted left to keep Callisto in view. Good "stripes". 135X.) SATURN(Acq'd 9:45PM and stayed with it, except for req.'s for Moon & Jupiter. Lookers surprised but not wowed. HH(Up to meeting & greeting lookers, but having trouble picking up 42# case w/scope. Surprised by how difficult it has suddenly become! VISITS(Stephen predi. Darcy & Steve, FPT woollen:merchants. Vinny Zarek, veteran of the Gandy Dancer Sailoon. Emily Lavell, w/Jess & Sam.) \$102.50 (\$50.49/hr.). 43.67 BATTERY HOURS. Per passed experience, am anticipating a max. of 50 hrs. Contemplating whether to let them die on street or to replace before hand. Or, have a new set w/me to do replacement on the street VISIT(David A. Vanko, PhD. TSU Physics Dept. head.)
- 8 2803) 06/09/17(FRI)FPT(8:46-11:37PM). Mild, good sky except for some thin haze in Moon-Saturn area. PARK(Hotel spot blocked by catering trucks. Parked across st., moved equip in 2 lifts to hotel spot, then down to set-up spot. Reversed order when leaving. SCENE(Busy!! HH(Between parking and never ending stream of lookers, was a very challenging night. Realizing that in addition to standing most of the time, continually having to explain is very wearing on me. JUPITER(2+2. Good.) FULL MOON(A few time, mainly on request. Lookers liked SATURN(A hit diminished by haze, but ok. One serious doubter woman. Think proved Saturn b showing her the Moon.) BATTERIES(Died 10:20PM, after working for 45.23 hrs. Duracells. Operated scope manually till end, which worked, but will buy 8 new "D"'s.)\$158.02 (\$55.45.
- 9 2804) 06/10/17(SAT)FPT(8:45-11-45PM). Mild, somewhat hazy sky. PARK(Water Taxi slot. Entire WT space blocked by limo. Asked him to move so I could park, which he did. Hm.ok.) BATTERIES(8-Energizer D's, 4 new and 4 old, but which tested ok in flashlight. When plugged in, scope motor sounded very perky!) JUPITER(4 moons, then 2. Lookers seemed to like both equally.) SATURN(Still somewhat diminished by haze.) 16-d MOON(Only a few times. Rim craters @ 136X.) SCENE(Extremely busy. Few times had a 10-deep line.) HH(Eventually feeling very worn down, probably due to no breaks from lookers.) VISIT(Adrian, a Waverly resident and slate roof contractor. An elem. sch. teacher very enthusiastic about me and my work. Name Caroline, I think. Gave me several hugs!) \$187.85 (\$62.62/hr.) 3.0 BATTERY HRS.
- 8 2805) 06/11/17(SUN)FPT(8:40-10:45PM). Warm/humid. Gd. sky. PARK(Something new. Left scope & tripod on corner, parked, and carried basket & stool back to corner. Maybe is better than leaving everything at hotel spot. Hm. around corner.) JUPITER(1+2+stripes. Good.) SATURN(Acq'd +/-9:30PM. Good.) HH(Spent most of day recuperating from last night, so felt ok. With less traffic, like in the old days could sit on stool for a while to rest. Nice!) VISITS(Ed, from the Admiral's Cup band. Per my req., band played more Beattles than usual. On break, Ed returned and attempted some Saturn photos. Kevin Lewis, Professor of Planetary Science, JHU. klewis@jhu.edu/ Stayed for quite a while conversing with one of my lookers. Gave him lots of my handouts. Jess, at end of a 5-mi. run. Helped w/loading. Otherwise, just a lot of nice people.) \$64.22(\$30.72/hr.) VISIT(Rob, who bought me water, as I'd forgotten to bring my own.)
- 9 2806) 06/15/17(THU)FPT(8:55-10:20PM). Gd. sky, but extremely strong wind--maybe 20-30MPH. Delayed setting up hoping it would diminish, but it never did. Let handouts stay in "hat", and stuffed contribs in back pants pocket. Even with a light jacket, the wind made me feel cold. During the max. wind, scope's image vibrated only slightly. PARKING(Dropped scope/tripod on corner. In 1 min. found a slot, and walked back to corner w/basket & stool. Around corner at home.) JUPITER(1+3+stripes, pleasing most lookers.) SATURN(Acq'd 1st try at 10PM. Good image. At op. in Sgr. @ -21.97°.) VISITS(Lots of people expressing appreciation for what I'm doing. Young man saying has stickers on frige.) HH(OK.) \$51.00 (\$36.17/hr.) VISIT(Connie, wanting to help me with tripod...thinking it would tip over.)HH(Thanks to wind, a not very happy camper!) 6.83 BATTERY HRS.

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 TOTAL THIS PAGE = \$ 563.59
 TOTAL THIS YEAR = \$1,880.64



The southeastern United States was center stage for May 30th's annular eclipse, but elsewhere observers also had interesting views. *Clockwise from above:* Herman and Kenneth Heyn were in Paris where they photographed the Sun through a No. 14 welder's glass held at arm's length. Maurizio Eltri recorded the eclipse above the western skyline of his home city of Venice, Italy. Roberto Toledano photographed the eclipsed Sun setting at his observatory in Verona, Italy. William Dellinges was part of the Moonshadow expedition to El Ricon, Mexico. The group enjoyed an unbroken ring at central eclipse, a phenomenon that was not visible in the United States.

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2807)06/17/17(SAT)FPT(9:18-11:58PM). Warm w/ slight breeze. Gd. sky. PARE(Left scope/tripod on corner, followed by 12-mins. of stress, then carried basket & stool back to corner. Hm. ok.) Delay due to clds. hesitation at home, then by trying to eyeball Jupiter in wrong part of sky until corrected by a regular looker. JUPITER(2+2, stripes. Lookers liked.) SATURN(Acq'd 9:40PM and stayed with it. Put up its sign. Hi enough now to look good. However, due to brighter sky than before, Titan not visible either by me or lookers. Most lookers amazed, with few doubters.) VISIT(Ida Bernstein w/woman friend. We took photo.) PACKING UP(Enlisted man to carry scope to curb. A taxi cab driver loaded it into car for me. Scope in case is getting ever more heavy for me to handle.) \$152.08 (\$56.96/hr. P.S.(For a change, Ida wearing a pretty dress rather than jogging outfit.)(9.50 BAT. HRS.

8 06/20/17(TUE)FPT. Dry run. Scattered clouds when leaving home. Gambled they'd dissipate at sunset, but they did not. Quiet scene compared to above, but prob. would have been ok.

9 2808)06/26/17(MON)FPT(8:35-10:27PM). A few hrs. back from a 3-d visit to NIC for grandson Aren Moss' high school graduation. PLW's #176 BATTERIES DIED JUST A FEW MINS. INTO STINT.FORCE TO MANUALLY TRACK, WHICH ADDS TO WORK LOAD. Cool breeze. Plagued by passing clouds for whole time, but managed to do Jupiter & Saturn thru sucker holes. VISIT(Mike, a young man who said he's been waiting years to find me. Several astronomers in town for dark matter conf. Pro photographer Greg ^{ape} & wife Kelly, who took movies of me. \$44.75 (\$23.93/hr.)

8 2809)06/27/17(TUE)FPT(8:45-10:01PM). Incredibly intense day, starting with ^{cousin} Beatty Levi's funeral, followed by a visit to Towson Twn. Ctr. for PLW's iPhone problem, then to a 5PM JHU Club reception for Beatty, ending with FPT! Cool breeze at start, then comfortable. Grt. sky. PLW's #177 Left everything with her a spot, took 20-min nap in car. BATTERKES(Bought 8 Energizer D8s from ShopRite @ \$1.38/ea. Installed 4 with 4 Energizers bought 06/10/17. Upon plugging in, scope motor sounded strong.) 4d-MOON(Great at 8OX.) JUPITER(2+1, then 2+2. Lookers blown away!) SATURN(Many lookers also blown away!) HH(Glad we decided to be there. Good form. PLW handled all the handouts, which was a load off of me.) VISIT(Old friend, musician Robin Bulloch and woman friend.) \$66.00 (\$51.97/hr. (1.27 BAT. HOURS) PARKING(PLW found one in FPT. At home got last spot on Frisby.)

9 **2810)06/29/17(THU)FPT(8:42-10:52PM). Another intense day thanks to VA visit for bone and CT scans re possible (but hopefully not) prostate g's. Warm, sl. hazy, strong wind at start. PLW's #178 Fairly busy scene. PARKING(Left scope at spot, then parked in a slot PLW saw and held open for us. Hm. good. Taxi driver helped w/loading up.) 6d-MOON(8OX. Lookers awed.) JUPITER (2+2. Lookers thrilled.) SATURN(Many, "Is that real?") SPOT(While setting up, accompanied by 2 women in costumes from movie Frozen, who were soliciting tips for photos taken with them.) VISITS(Ellen Hochman, who's called ahead. Back from her Across S.D. bike trip. Ida. Enthusiastic Columbian family. Friends of Loyola student, MacKenzie, who on 04/08/17 made a podcast of me & PLW. One std. had briefly attended Brooklyn Tech High School, but not when Aren Moss was.) \$55.00 (\$25.35/hr.) SUNSET(Still 8:37PM EDT)

**PLW On all three above nights, she quickly found good parking spots!

9 2811)06/30/17(FRI)FPT(9:12-10:54PM). Late start due to clds. hesitation then long parking wait PLW's #179 Sl. hazy sky. Busy scene which got busier. 7d-MOON(lookers amazed.) JUPITER(2+2. Lookers excited. 'Lost' behind Admiral's Cup chimney 10:38PM. Despite its advantages, objects are lost too early from new spot.) SATURN(Very nice, but clouded out soon after acquiring.) VISITS(Emily & friend, Laura. Dr. Tawil, my GP, w/wife Sharon and her girlfriend, also named Sharon. Doc was quite pleased with his looks thru scope.) \$53.10 (\$31.20/7/01/17(SUN) Dry run to FPT. Clouds. Toe-bad, as we left Ellen H's party early for this.

9 2812)07/02/17(MON)FPT(8:55-10:54). PLW's #180 Sl. late start due to clds. ?'s. Warm, with intermittent haze interruptions. Busy scene: PARK(3-min., but around blk at home...which is becoming the usual.) Sunset still 8:37PM. 9d-MOON(Plato, Copernicus, Tycho. Many lookers amazed.) JUPITER(2+2, stripes. Some "beautiful" comments.) SATURN(Acq'd after struggling with haze. Nice. My line is, "It's really there, just not in the books!") VISIT(Astronomer Jim Pickering, visiting STScI from the MMT in Az. Recognized my Edmund RKE eyepiece, as was his on his first scope, an Edmund Astrocan. Stay for a long time.) \$48.00 (\$24.24/hr.)

TOTAL THIS PAGE = \$ 395.17

TOTAL THIS YEAR + \$2,275.81

(7.12 BATTERY HOURS)

Astronomy



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Astronomy

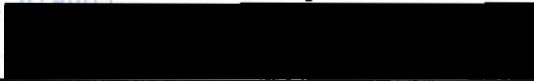


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- 2813)07/07/17(FRI)FPT(8:35-12:02AM). PLW back in STL. Lots of clouds while driving down, but decided to chance it. Immediately acq'd rising Moon. PARK(Left equip. on curb. 5-mins. to park. Home good.) Busy scene which got ever busier. Passing high clde, but managed to keep going by moving from object to object. Very warm. 13d-MOON(Only a few rim crate, but lookers liked.) JUPITER(2+2+stripes. From this location, its season is winding down.) SATURN(Nice, but small at 135X. Will try 166.6X again. Lookers surprised.) VISITS Regulars Emile ? and Zack and Ashley & Dan. Gordon Schmidt, who once lived on Ednor Rd. and knew Leah. Musician Ed.) HH(Tough stint. Very busy. Took an extra 39-mins. before w able to pack-up. Due to very heavy traffic, was a big challenge to get car to where I could load up. A\$ home my body felt really wracked!) \$141.53(\$41.02/hr.) (10.57 BATTERY HRS) PACKING UP(Reason it took so long was that when I was half packed, a man came along wanting to see Saturn who, when I said I was finished for the evening, asked, "What's a good tip for showing me Saturn?" I said "\$5.00", but he gave me \$20.00. Lesson learned! If a similar situation arises, ask for \$20.00! Once he left, a new line of lookers had formed)
- 2814)07/09/17(SUN)FPT(8:36-10:23PM). PARK(Water Taxi slot; home ok.) Semi-busy scene. Great sky. Warm w/low humidity. JUPITER(2+2. Succumbed to street light 9:45PM.) SATURN(136X. Briefly tried 166X, but lookers seemed satisfied with former, so stayed with it.) HH (Leaving home and on drive down was feeling sorry for myself and not wanting to set up. However, once in action I felt great. Lesson learned for the 100th time!) VISIT(Ed, Admiral's Cup musician and enthusiastic supporter. Helped w/packing up. His band tonight did an incredibly good rendition of Sgt. Pepper!) TONIGHT(An ideal stint....great sky, & weather, while not overwhelmingly busy.) \$88.58 (\$49.76/hr.) (12.35 BATTERY HOURS)
- 2815)07/15/17(SAT)FPT(8:42-11:28PM). GETTING THERE(A huge, Mardi-gras-like event along 33rd St. and around to Harford Rd. forced me to make a wide detour to reach Wolfe St. and thus to FPT.) PARK(Instant. Ok at hm.) SCENE(Very busy!) SKY(Great! Comfortable temp.) JUPITER(1+3, stripes. Great, till 9:32 when I had to give it up due to street light.) SATURN(166X. Seemed to work ok. Cassini Div., Titan. Some doubters, but mostly wowed lookers.) LEAVING(Due to stalled traffic, took 20-mins. to drive car around square to load scope.) HH(The driving challenges, plus my injecting hi energy into my presentation made for a very demanding stint. Whew!) VISITS(Ben & Darcy Emerick, who's bought an 80mm refractor having looked thru my scope. Are very pleased with it. Jenifer & Mark Bolster who's looked thru scope 30-yrs. ago and were surprised to find me still at it!)STICKERS (Ran out of Saturn...maybe 1st time ever this has happened.) \$150.91 (\$54.48/hr.) Driving home thru Clifton Pk., I saw a huge amt. of trash from the earlier event which city workers were trying to pick-up. (15.12 BATTERY HOURS) SOLAR ECLIPSE 08/21/17(More & people asking about it, gave overview blurb to all? Woman w/plans for Carbondale, IL)
- 2816)07/16/17(SUN)(8:40-10:42PM). PARK(Instant. Hm good.) Mild, great sky. Semi-busy scene. JUPITER(1+3+stripes. Gorgeous! Gave up early and went to Saturn for benefit of a group of eager 10-12 yr olds.) SATURN(Its usual self. 136X. Some doubters. Titan.) VISIT (Dmitry, who hung out with me yrs. ago. Now living in Moscow and is chief scientific officer for a biopharmaceuticalco.) HH(Put my all into it!) \$81.12 (\$39.96/) (17.15 BH) STICKERS(Tossed cheap Dollar Store ones and began using Post-It Notes again.) VISIT (Bob Prokop, Howard Astro League member and FPT resident.)
- 2817)07/18/17(TUE)FPT(8:57-10:55PM). PARK(Good. Hm around corner.) Quiet scene. VG sky. HH (Didn't intend to go, but not wanting to watch TV another night, and noticing sky was looking better, went into zombie mode and did it.) JUPITER(4+0. Really impressive while it lasted.) SATURN(166X. Some doubters but most impressed.) VISITS(Annie Rouse, who is teaching a kids astro summer class at APL. Gave her all my stuff. Karen, ex. asst to STSci director. Ahmed Jamil. Very interested. In knife mfg. business in S. Balto.) \$70.00 (\$35.53/hr.) (19.12 BATTERY HOURS) THIS YR. = \$2,807.95. 2016 = \$3,350.00.
- 2818)07/19/17(WED)FPT(8:55-10:22PM). PARK(Ok. Hm rnd. corner.) Quietest scene. Hot, humid, hazy sky. JUPITER(3+1. Abandoned when getting mushy from bldg. heat. Too bad, as is always a good show!) SATURN(166X. Good. A few doubters. My new line..."The most unique sight you can see thru any telescope, anywhere!") VISIT(Stephen Lampredi, who complimented my improved presentation over the years. Other interesting, enthusiastic lookers.) HH(Wondering how I can get this monkey off my back!) \$58.25(\$40.17/hr.) (20.57 BATTERY HRS.) VISIT(Frank Pratkan & Duncan.)

TOTAL THIS PAGE = \$ 590.39

TOTAL THIS YEAR = \$3,398.34

8 2819)07/30/17(SUN)FPT(8:27-10:11PM). 12-day adverse weather delay. PARK(3 times around the block, then just beyond Zip Car space. Hm ok.) Great sky; comfortable temp.) SS 8:20PM Semi busy scene. 7d-MOON(Qt. Lookers wowed!) SATURN(166X. Lookers amazed. Titan at 4 o'clock.) HH(Tired after long day, which included attending a Gilbert & Sullivan sing along....per Stephen Lampredi's invitation.) VISITS(Connie, who stayed with my stuff while I parked. Dave, who said he first looked thru my scope as a small kid. Joel(SS Green, an STScI planetary formation specialist. Stayed for a good while.) \$49.89 (8:20) (\$28.84/hr. All \$1's.) (22.3 BATTERY HOURS)JUPITER(Season over from this location.) Per offer of free beer by bartender Crystal, adjourned to THE BAR.

9 2820)07/31/17(MON)FPT(8:23-10:32). Slow scene. PARK(Just past Zipcar. Hm. around corner.) Warm. Grf. sky, but moderate seeing, maybe due to lrg., smoky fire in Sparrows Pt. HH (In good form.) 8d-MOON(I think it evokes more excitement in lookers than does Saturn! SATURN(Acq'd 8:40PM. Sometimes sharp and sometimes unsteady image. Titan.) VISIT(Sandy a young start-ups investor who lives in hse. next to Adm.'s Cup. \$84.51 (\$39.31/hr.)

8 2821)08/04/17(FRI)FPT(8:33-9:55PM). Delayed setting due to threatening clds. in west, but th moved away. However, was shut down by clds. PARK(Again, 1st spot beyond ZipCars. Hm ok. SCENE(Not quite as busy as most Fridays.) 12d-MOON(Lookers really liked it. Aristarchus and Tycho prominent.) SATURN(At first blocked by haze, but then fine. Lookers impressec HH(Able to do what had to be done!) VISIT(Jess Mayhugh of Baltimore Magazine, who said my interview re the eclipse is on their website, and that I should listen to it.) BIG COMPLIMENT(As I was packing up, a middle aged woman came up to me and said, "We really appreciate what you are doing," As she was turning around to leave, I said "Thank you. That makes it all worthwhile.") \$44.15 (\$32.23/hr.) (25.82 BAT.HRS. They're keeping scope tracking ok, but motor doesn't sound as strong as when this set was new. Will keep them working, and simply hand guide on the night they go dead.) At home on TAM, had a call from FOX 45's Joy Lambert, saying she wants to interview me in FPT re the eclipse

9 2822)08/05/17(SAT)8:33-11:25PM)FPT. PARK(10-mins. of stress. Hm around corner.) Very busy scene, Warm. Ok sky. HH(Between parking, the number of lookers, having to track by hand because my tracking batteries died, the traffic jam encountered when trying to return to spot to collect equip from the curb..tonight ranks among my hardest ever stints. Am thinking I don't need to go out anymore just to look thru scope, but it's mostly for the money and somewhat for entertaining and educating the public.) BATTERIES(Died at start....25.83 BAT. HRS. Have replacements, but maybe it's time to reconsider my old rechargeable system which worked so well for so long.) 13d-MOON(Even only one slightly rough edge, lookers impressed.) SATURN(135X to reduce its drifting speed. Ok w/lookers. \$126.94 (\$44.23/hr.) Saturn nearly finished by roof at closing time. TELESCOPE PERKS (Up close and personal tonight with some very attractive young ladies. Also, received big, appreciative hugs from two of them.THIS WAS MY 43RD STINT OF THE YEAR. 08/06/17 INSTALLED 4 ENERGIZERS PUR. 6/27/17 + 4 DURACELLS OF UNKNOWN PROVENANCE. NPR(Several lookers said, "I heard you on NPR," to which I asked, "Story Corps?" "Yes." VISIT(Emily Lavell, who retrieved money from my "hat" when I was too busy to do it.)

8 2823)08/08/17(TUE)FPT(8:41-10:09PM). PARK(5-min. A problem I often face is people who get in to a car, start it up, and then don't move. Stressful! Hm. around corner.) Perfect sky. Slow scene. Mild, air conditioned-like night. SATURN(Sharp.) VISITS(Ellen Hochman with Oregon friend, Bryant, here for a hernia op. Chris, one of the four of us at Celia's supper in Canton +/-a year ago.) HH(A bit depressed today but in good form once I start dealing with my lookers.) NEW BATTERIES(Motor sounded strong.) \$53.50(\$36.39/)(1.47 BH' Adjourned to Bop for a slice of pizza.

9 2824)08/09/17(WED)FPT(8:27-10:11PM). PARK(5-min. stress, esp. because was competing w/ice cream store mgr. for space. I won. Happily he got one right away. Hm. Around corner.) Quiet scene. Gd. sky. SATURN(Sometimes at 220X, which seemed to work.) BATTERIES(Died at 9:30PM, forcing me to hand track. Why? Motor sounded peppy when plugged in. Confusing and discouraging. Maybe it's the wiring?) HH(Hard work, but ok.) \$57.68 (\$33.34/hr.) STICKERS(1st time ever forgot to bring them! Didn't seem to effect contributions.)

TOTAL THIS PAGE = \$ 395.62

TOTAL THIS YEAR = \$3,793.96

The Fell's Pointer

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POINT'S PRIME CHARACTERS-XI

Night Watchman Brought Heavenly Bodies to Broadway

By Mark Walker

On a crisp November night in 1986 the Walker brothers inadvertently attended a star-studded premier at the foot of Broadway featuring Herman Heyn, soon to be known as the Street-Corner Astronomer. He had set up an eight-inch, \$1,200 telescope and was giving moonstruck onlookers a close-up of the heavens.



Photo by Lew Dzugald
Astronomer Herman Heyn
undimmed by lights of Broadway.

pursued the peerage of the Inner Harbor. But, now 75, he was back for an encore on the Square recently, offering exclusives of Saturn and its rings.

Until 1950, Heyn's father owned Heyn's Clothing Store at 415 South Broadway, next to G.C. Murphy's. When his

father took Herman to New York on a business trip he saw a man at Times Square let people in on the moon through his telescope for 10 cents. Another inspiration came in the astronomy lessons of Miss Wicker at Garrison Junior High. In 1946, his father bought him a telescope.

After Heyn graduated from City College, his astro interest waned for 18 years—as he served in the Korean War, management and substitute teaching. But in the early '70s he bought another telescope, and in 1986 Haley's Comet made a return visit.

A year later Heyn started lugging his 42-pound equipment to Charles Village and the Rotunda Shopping Center, and for over a decade his "Hav-A-Look" Schmidt-Cassegrainian telescope lit up the dusk at the foot of Broadway several nights a week. I was always in line when Heyn was in Fell's Point.

Underneath the tripod lay an inverted straw hat soliciting tips for his science, affability and entrepreneurship. A sign requested \$1 but the impecunious could peep through the reflex telescope free of charge. Soon the courtly Heyn became a constellation in the Fell's Point firmament. Lately he's

In 1988, to celebrate Mars coming closer to Earth than it had for 17 years, he threw a "Mars Party." Despite gray skies, hundreds of people showed up for a look at celestial bodies as youngsters and adults joined in a masquerade contest—bug-eyed moth costumes, Mr. Spock' elf ears, antennas protruding from the back of heads. Miss Solar System won the contest.

For children, Heyn supplies a milk crate to stand on, souvenir galaxy stickers, a constellation map, and a mnemonic for the planets: "My very educated mother just sent us nine pizzas" equals Mercury, Venus, Earth, Mars, Jupiter, Saturn Uranus, Neptune, and Pluto.

"Some things just stick in your memory," Heyn said the other evening. "I remember one Fell's Point gentleman saying, 'If I die tomorrow, I'll die content knowing that I at least got to see one of Jupiter's moons before I went.'"

For a number of years Heyn rotated between the Inner Harbor and Fell's Point after winning in 1992 his four-year battle to set up at Harborplace. Eventually he moved his entire operation there because the tips and hours were better, and Harborplace gives street performers free parking. A Waverly resident for 28 years, Heyn continues supplementing his social security income with a photography business and of course his stargazing. Now with 19 years in space, he said he'd like to retire at 20. There's talk of a sunset reprise in Fell's Point—and, who knows, maybe a Saturn Soiree on the Square for the man who has brought the heavens to the foot of Broadway.

Partnership with a grant from the City is offering jazz in the gazebo of Thames Street Park on Thursday, July 20 at 6-9PM. Peabody musicians will play in the 'Point's central park, which GAP has taken up as an improvement project. Plans for a major overhaul will be displayed during the concert. Picnickers welcome.

9/11 NOMINEES DUE AUG. 10

9/11 Selfless Community Service Award submissions are being accepted until Aug. 10 by Jack

Schedules

Garbage Bags Are No Longer Allowed

TRASH

Place trash outside in cans or after 6AM on Mondays and Thursdays. All Trash must go in cans!

RECYCLING

Place outside by 7AM on collection day. Glass, metal and plastic in blue plastic bags on the second and fourth Monday of each month.

Paper and cardboard in paper bags, cardboard boxes or tied with string on the second and fourth Fridays of each month.

NEIGHBORHOOD MEETINGS

FPCO Regenerates: The Fell's Point Community Organization has a new president, Floyd Sowell, and a rededication to causes along Aliceanna Street between Broadway and Ann. The group will meet on Tuesday, July 11 at 7PM at The Preservation Society, 808 South Ann. Dan Winner and Dave Holmes head the agenda with their proposed development plans for the 600 block of Broadway and Sowell said the scope and particularly the height of the proposal are of major interest to the group—along with imminent destruction of buildings at St. Stan's.

A sign of FPCO's renewal is posted along its streets in the form of residential parking permit notices that embrace eligibility for merchants.

to create eclectic elements furniture store.

HARD TIMES—NO HARD CRABS

With the closing of Crabby Dick's, 'Pointer will have to find hard crabs in Canton this summer. Patrick Russell of Kooper's had vowed to take up the slack but wriggled off the

With the mitered Mark Walker in the fore, opponents of plans for demolition of most of the ex-St. Stanislaus Church property take to the harbor with a



BATTERIES(In view of last night's failure, have removed the 4 Duracells of unknown provenance, retained the 4 just installed Energizers of 06/27/17, added Energizers of 06/10/17 and 05/17/17 and 2 used Energizers of 06/27/17. Hopefully will work sufficiently well to show problem not in the wiring.)

2824 continued) VISIT(A teenager to whom I'd handed a SATURN FACTS looked at it, and excitedly exclaimed, "You use a typewriter!" Surprised, I asked, "Do you use one?" He said he didn't, but that he loves them. I asked if he collects them, but he said he didn't. An unusual encounter at my telescope!)

2825) ^{Sunday} 08/12/17(FPT)(8:25-10:18PM). PARK(Instant. Ok hm.) Busy scene. Great sky. HH(In good form. Last stint before leaving Thurs. for STL to view Monday's "Great American Eclipse" with Phyllis and Dick & Hildi Eliasberg. Totality +/- 50mi SE of STL.) BATTERIES(Motor sounded good at start but, as with previous stint, they died shortly after start...45m after. Tracked by hand. This is very discouraging. Am thinking that when I'm back from STL will return to rechargeable battery system and hope it works!) SATURN(Mostly at 165X. Many awed lookers.) VISIT(Briefly, Ida Bernstein. Joe Fleischman, who says he has an 8" Newtonian with which he's done astrophotography. Works as a DJ in a strip club east of town. A woman who appeared as I was packing-up, praised me for what I'm doing, and put \$5.00 in my hat. Same as what happened at #2821!) \$67.47 (\$35.89/hr.) SATURN SEASON(From my location near the Water Taxi pier, unless the Square reopens--which doesn't look likely, by the time I return from my eclipse trip on 08/24, Saturn will be setting behind the Admirals Cup roof not very long after I set up. With no where else decent to go, what then HALE-BOPP CARD(Woman said she loved her's but gave it away and asked if I had more. Gave her my card and said if she contacted me I'd send her another.) CHARLOTTESVILLE(This is the day after the clash there between fascists and anti fascists over the planned removal of a Rbt. E. Lee statue, during which one of the anti's was killed and 20 injured by a car drive into the crowd by a Nazi sympathizer. I was pretty bummed out by this news and considered here not telescoping. However, once in action, it left my mind plus, it seems, those of my look

08/25/17 Drive to Battery Warehouse. Cockeysville for new rechargeable battery.

2826) 08/26/17(SAT)7:40-10:33PM. Back from STL to view the Great American Total Eclipse with Phyllis, Richard & Hilde Eliasberg, Nate Spöhe (whose advertising business, Almanac, there a Fri. evening the 18th pre-eclipse street party), and Nate's friends in Perryville, MO.) PARK(Instant...WT slot. Hm. good.) SCENE(Pretty busy.) SKY(Sl. hazy, but ok.) 7d-MOON(Reluctantly gave it up for Saturn.) SATURN(166X, then 136X as it approached roof. Closed down before roof, as I was tired and S was losing its luster.) HH(Dragged myself out of my house, but once in business was fine. Hard work, but in good form.) VISITS(Autumn, a FPT pedal bus driver. Enthusiastic! English dancers Gene & Randy. Hettlemans...Shelly, Jeff & Rachael...celebrating R's birthday. Staying at FPT Pendry hotel.) \$130.72 (\$45.23/hr.) NEW BATTERY(Was a bit nervous as I plugged it in, but it worked fine.) MUSIC(Tchaikovsky's 5th on drive down and 6th on drive home. Couldn't ask for better!) BATTERY RECHARGE(Took 2.58hrs., which is 87% of running time. Probably can use 100% as rule of thumb.)

2827) 08/27/17(SUN)FPT(8:23-9:35PM). PARK(Ok, both.) Warm, the cool wind. SCENE(Very slow.) Delayed by clouds questions, then distracted by a woman who used brother, John, as a home inspector and couldn't stop talking about how great he was. SATURN(As usual. Some doubters. 8d-MOON(Great, but only a few times, as people want to see Saturn.) MUSIC(Adm's Cup band did a great Sargeant Pepper!) VISITS(Tanya Hollander Hicks, as ref'd above. Peter, a German who's taken great eclipse pics from Wyoming.) *ECLIPSE PHOTO(Had mine printed on cardstock and others on xerox paper which I gave away.) \$26.14(\$21.78/hr.)

TOTAL THIS PAGE = \$ 224.60

TOTAL THIS YEAR = \$4,018.56

*Somehow, Peter and I got in to a discussion re intelligent life in the universe, his believing given the size of the universe that there must be lots of it. I countered with my rare Earth position, plus adding that with the universe being 9 billion years older than Earth, they've had plenty of time to find us, but they haven't. Gave Peter my handout on the subject.

BATTERY: After 1.2 hrs. of use, it would not take a rechg, as green light remained steady.

09/03/17 Took a 20-min. charge.

- 2828)09/03/17(SUN...Labor Day eve)FPT(7:53-10:51PM). PARK(OK both.) SCENE(Very busy) Great sky. Comfortable, the cool breeze. 13d-MOON(Still good terminator craters. Lookers impressed at 136X view. SATURN(Acq. 7:59PM. Mainly 136X. Though smaller than 166X, is a brighter, sharper image. Lost +/-10:30PM below roof.) HH(As always, very hard work, but managed to treat every new looker as if they were the first of the evening.) VISIT(3 young men from India who are touring the U.S. Fascinated! Did both Moon & Saturn for them, plus gave them handouts.) \$143.01 (\$48.15/hr.) BATTERY: 3.05 hours use. BATTERY CHG. = 2.37hrs. = 2h22m = 78% of running time.
- 2829)09/04/17(MON...LABOR DAY)FPT(8:05-10:20PM). PARK(Ok both.) SCENE(Slow, but picking up. Comfortable. SATURN(136X, which seems to satisfy. Nobody asked to make it bigger. One determined doubter, but rest impressed.) 14d-MOON(Acq'd. late, as was blocked by tree. Very good at 50X, double filtered. Not quite full, as a few terminator craters visible. Lookers very impressed.) VISITS(Lueth Akuak and Paulo Chavez, late 20-somethings who'd been high schoolers together somewhere in Va. Former a Starbucks worker, the latter a cyber security person. Paulo had great eclipse pics on Iphone. Stayed 20-mins. asking me personal Q8s and for life advice.) Gave out 2 more eclipse xeroxes. Surprising no. of lookers had been to total eclipse.) HH(Ok.) \$54.00 (\$24.00/hr.) BAT: 2.25/1.38=61%
- 2830)09/09/17(SAT)FPT(8:10-9:55PM). Began evening at Jim & Debbie's Cedarcroft block party, where in past yrs. have telescoped. Could have done Saturn from there, but who knows if there would be any interest, so had supper and left for FPT. While there had nice talk with Deb's artist brother, Marchal, to whom I gave an eclipse photo. Also left one for J&D and for grandchild, Nathan. PARK(A nutty sequence of events, but landed in a WT slot. Home ok.) Only semi-busy scene. Good sky. Steady cold wind. Wearing sleeveless + heavy cotton shirt, but still cold. SATURN(1st try. Lots of surprised lookers and no serious doubters. 135X.) 19d-MOON(Rose straight down Thames St. as was packing up, but had enough, so let it go. Probably would have been lucrative!) VISITS(Connie and Joyce to both of whom gave eclipse photos. Jess, Emily's friend, with guy. Pedal car driver, Autumn. Paul C. Bird of HAL.) \$36.00, which incl'd 7-\$5's. (\$30.43/)BAT=1.84hr. Chg=62.5% STORYCORPS(Woman asked, "Weren't you on StoryCorps?" I said, "Yes, in 8/15." She said, "They played it again at the time of the eclipse.")
- 2831)09/10/17(SUN)FPT(8:04-9:50PM...could have started +/-15-min. earlier.) PARK(Quick. OK home.) SCENE(Very slow.) Great sky. Cool but w/o wind. SATURN(166X, then 136X to brighten. Many surprised lookers.) HH(Bored. Considered leaving early, but couldn't while Saturn still up.) VISIT(Admr's Cup musician, Ed. Always an enthusiastic looker. Give him eclipse picture + Romer handout.) \$37.45 (\$21.28/hr.) BAT: 1.76hr. CHG. = 64.2% THE SQUARE(Looks to me like the renovation won't be ready in time for the FPT Festival ALIGNMENT(Seems have found true N "sweet spot", as has been near perfect for a while.)
- 2832)10/06/17(FRI)FPT(7:15-8:30PM). Cloudy. There to be photographed for an article about me by Judy Colbert to appear in Jmore Magazine. (Photographer Steve Ruark: www.ruarkphoto.com/) Rec'd a \$1.00 contrib., so am counting it as a real stint! PARK(After some man-fusion, 1st WT slot. Busy scene. The Square, which has been closed all year for a make-over, now half open. Looks pretty nice, with trees, benches, and concrete floor.) VISITS(Joe, who works at a local strip club. Has nice M42 photos on his iPhone taken through his 8" Newtonian. A young man who had eclipse photos on his iPhone taken from Columbia, MO.) HH(After a long hiatus due to a trip to Amsterdam with Phyllis to attend the Grand Opening of son Frank's new restaurant, discovered I can still manhandle telescope as before.) Gave facts & mnemonics to several families w/little kids. \$1.00 (\$0.80/hr)No Bat
- 2833)10/20/17(FRI)FPT(8:25-10:35PM). HH(Reluctantly, as is now much more for \$\$ than for education and performing.) Square now open, but bright as daylight. Very Sterile looking. Nothing like the old square. Set up across street where have been all year.) HH(Physically can still do it, w/not pain from neck prob. Able to maintain enthusiasm.)SCOPE(Performing well in all respects. Perfect alignment.) ALBIREO(Trouble finding, maybe due to MTT miscalculation. I explained it well and everybody enjoyed it.) URANUS(Too close to light.) PARK(10-min. Hm OK.) \$44.00 (\$20.37/hr.)

TOTAL THIS PAGE = \$ 335.46

TOTAL THIS YEAR = \$4,354.02

Lots of inquiries about the Orionids meteor shower, most thinking it is tonight. According to the Spec 2017 Weather site, tomorrow night into Sunday AM, and best after midnight toward dawn. I told people they're really not visible from the city.

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Not for Distribution

8 10/27/17 DRY RUN TO FELLOWS POINT. All day was looking forward to telescoping the 7d-MOON. Got an immediate WT parking slot, but at my set-up spot encountered a brisk, cold wind, making passersby walk quickly by. Also, estimated would have Moon for only 1 1/4 hrs. Walked to The Bar to see Crystal, but learned she doesn't work there anymore. Returned to my spot, couldn't get myself to set-up, drove home. Am thinking I'm not my old self--hungry for some bucks, wanting to meet and greet the public, as well as to simply look through my scope. I don't think it's over, but it's not as imperative as it has been for nearly 30 years.

11/02/17(6:45PM). Is a beautiful, clear and mild (69°F) evening, one on which in the past I'd be rusing out the door to telescope. Not tonight, however. Whether it's the amt. of work involved, loss of interest in looking thru the scope, feeling I've entertained enough people over the years and I'd be just reinventing the wheel, or whatever, I have lost the imperative to go out. Can think of only two things which would interest me in going out tonight, making some money (and therefore avoiding taking some from my bank account) and wanting to see Uranus. I feel a bit uncomfortable about this state of affairs; however I do have things to do at home, including practicing for Saturday's Accordion Club mtg. and writing a letter to ex-sec. of defense, Rbt. Gates, with my solution to the current U.S.-DPRK imbroglio. *I'm experiencing withdraw symptoms tinged with a feeling of guilty. On the other hand I had loads I wanted to do at home, tonight, such as writing a ltr. to ex-Sec. of Defense Rbt. Gates with my formula for solving the Korean imbroglio and to upgrade my holiday cards to make them easier to cut out on the JHU Level C slicer. These two projects took all evening, meaning I didn't get to practice for Saturday's Accordion Club.

3 2834) 11/28/17(TUE)(5:30-6:30PM). FIRST STINT OF MY 31st. YEAR! PARK(Forced by traffic on Greenmt. Ave. to take long way around. Then had to circle blk. 2X to get a space.) Moderate scene. Low 50's w/wind chill. Gd. sky. HH(Once again, discovered that, despite my neck problems, I can still do it ok!) LEVELING SCOPE(For some reason an having increasing trouble..Took 5-mins.+ tonight.) 10-d MOON(Jura Mts, Copernicus. All lookers impressed. One took a good photo. 50X). \$9.21 (\$9.21/hr.) Drove home; dropped off basket, loaded accordion, drove to the Song Swap meeting on Harford Rd. Gave out song sheets and led the assembled 18 people in Waltzing Matilda.

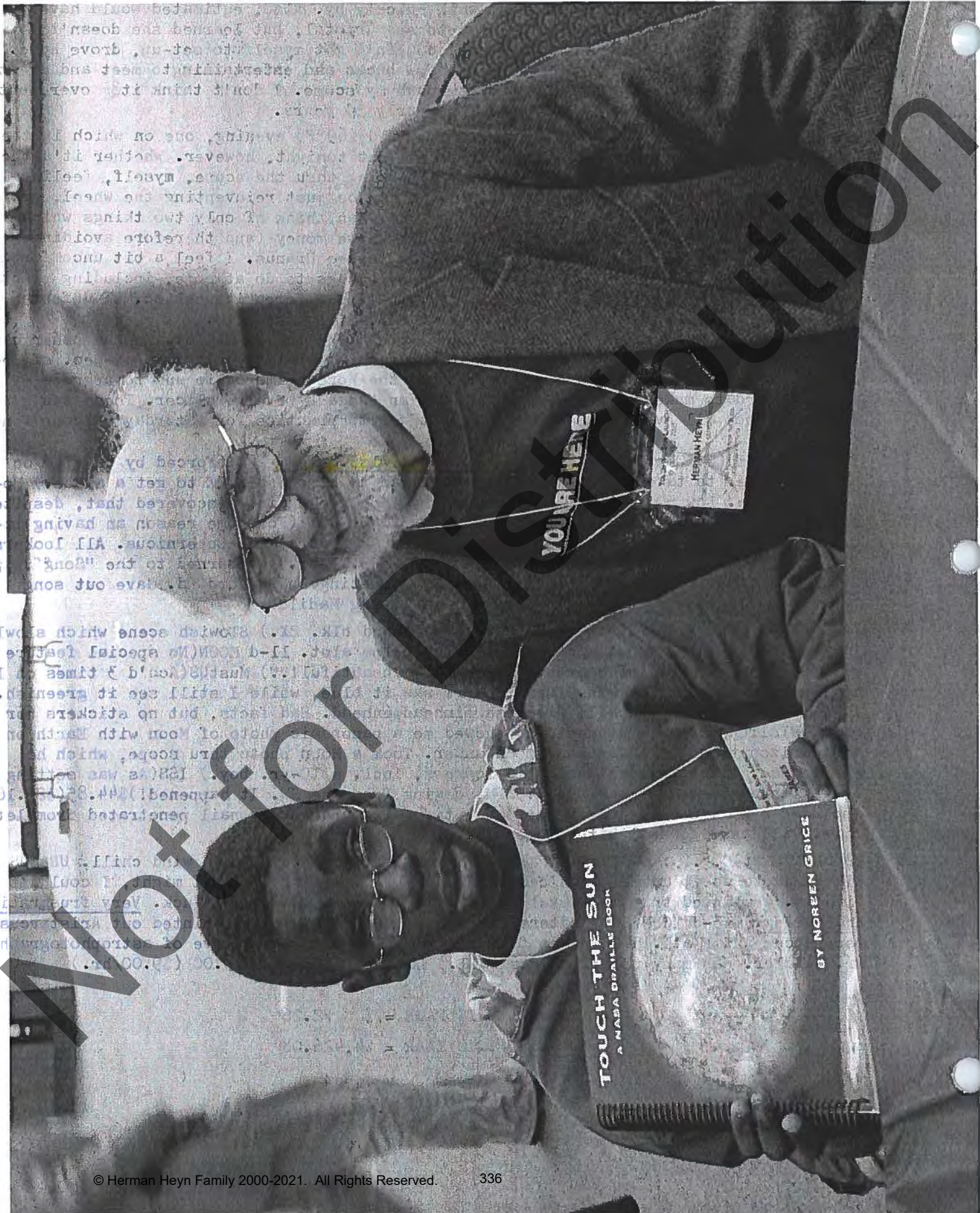
2 2835) 11/29/17(WED) CHAS. VIL.(5:38-7:45PM). PARK(Around blk. 2X.) Slowish scene which slowly picked-up. Hi 40's, w/no wind chill, which helps alot. 11-d MOON(No special feature pointed out. Majority of comments were, "It's beautiful!") URANUS(Acq'd 3 times on 1st try, but no luck on the 4th. Why? Lookers saw it blue, while I still see it greenish. A 80X, an unmistakable, small, solid, greenish pnhead. Had facts, but no stickers nor sign. VISIT(A Japanese student who showed me a panoramic photo of Moon with Earth on the horizon taken by a Japanese moonlander. Took a Moon photo thru scope, which he emailed me. Otherwise, enthusiastic lookers, incl. a 10-yr. boy.) ISS(As was setting up, a man announced it was due 5:32PM, coming from the SW. It happened!) \$44.85(\$21.16/Included a 20 + 2-5's.) Coming up 36th St., a lg. upholstery nail penetrated front left tire. Ugh! Will deal w/it, tomorrow.

2 2836) 12/01/17(FRI) C.V.(5:45-7:45PM). PARK OK. Semi-slow scene. 37°F, No wind chill. URANUS (Intended to do it until Moon became available. However, try as I might, I couldn't find it. Realigned tripod several times, and re-leveled, but no luck. Very frustrating and waring.) 13-d MOON(Offset scope to show a few rim craters. Pointed out Aristarcus, Copernicus and Plat1. 50X w/deep filter.) VISIT(Shasha, a relative of astrophotographer Dr. Handler. Has many photos on his wall.) Lots of no-pays. \$18.00 (\$9.00/hr.)

TOTAL TJIS PAGE = \$ 72.06

TOTAL THIS YEAR = \$4,426.08

15
Year = 5/6



STREET CORNER TELESCOPE EXPENSES -- 2017

| | | |
|----------|---|----------|
| 01/22/17 | EQUIP 4-legged stool to replace lost one. (Naya Basu-Sen, 4124 Westview, 973-390-3339) | \$15.00 |
| 01/25/17 | SP C.V. parking | \$ 00.25 |
| 01/25/17 | STA file cards 3"x5" Barnes & Nobel | \$ 00.63 |
| 01/27/17 | SP 3-sides Venus phases chart (JHU) | \$ 0.21 |
| 01/31/17 | SP 9-sides Venus Facts (JHU) | \$ 0.63 |
| 02/03/17 | SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 02/04/17 | EQUIP 8ea D Batteries to power scope (MICRO CENTER)(Duracells) | \$ 12.70 |
| 02/06/17 | SP 8-sides SC handoutd (JHU) | \$ 0.56 |
| 02/19/17 | SP C.V. parking | \$ 0.25 |
| 02/19/17 | SP 17-sides SC handouts (JHU) | \$ 1.19 |
| 02/20/17 | SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 02/23/17 | SP CV parking | \$ 0.25 |
| 03/02/17 | STA whiteout (FRREX) | \$ 2.64 |
| 03/03/17 | SP 27-sides "Winter Hexagon" handout for Judy Colbert talk (JHU) | \$ 1.89 |
| 03/06/17 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 03/09/17 | SP CV park | \$ 0.05 |
| 04/09/17 | SP 26-sides SC handouts (JHU) | \$ 1.82 |
| 04/13/17 | SP 19-sides SC handouts (JHU) | \$ 1.33 |
| 04/15/17 | SP 1,200 POST-It Notes (Staples) (\$ 10.0088/ea.) | \$ 10.60 |
| 04/18/17 | SP cut 1" off of 1,200 Post-It notes (FedEx) | \$ 3.16 |
| 04/26/17 | EQUIP 1-black bed sheet to cover scope in car overnight (Super Linens) | \$ 12.72 |
| 04/26/17 | SP Photograph & print Pendry Sagamore Hotel entrance + xerox copy to accompany request for space letter to Kevin Plank.(CVS+JHU) | \$ 1.21 |
| 04/27/17 | SP Enclosures for Kevin Plank letter (FedEx) | \$ 1.21 |
| 05/09/17 | SP 20-sides SC handouts (JHU) | \$ 1.40 |
| 05/15/17 | PERMITS Postage and xeroxing for Sagamore Pendry parking permission | \$ 2.00 |
| 05/18/17 | SP 12-SC handouts (JHU) | \$ 0.84 |
| 06/01/17 | SP 4-photo prints for Robin Smith's book about me (CVS) | \$ 1.40 |
| 06/03/17 | SP FPT parking | \$ 0.50 |
| 06/04/17 | SP 40-sides SC handouts (JHU) | \$ 2.80 |
| 06/06/17 | SP 4-sides business card (JHU) | \$ 0.28 |
| 06/10/17 | EQUIP 4-new "D" batteries to drive scope (Ace Hrd) | \$ 9.53 |
| 06/12/17 | SP 7-sides SC handouts (JHU) | \$ 0.49 |
| 06/15/17 | STA water for telescope stint (7-11) | \$ 1.50 |
| 06/18/17 | SP 1,200 Sticky Notes for handouts (CVS) | \$ 4.00 |
| 06/18/17 | STA 3-Sharpie pens (CVS) | \$ 3.18 |
| 06/19/17 | SP slice 1" off each end of Sticky Notes pkg. (FedEx) | \$ 3.16 |
| 06/26/17 | SP tip to Buster for cleaning area FPT | \$ 3.00 |
| 06/27/17 | SP 10sides SC handouts (JHU) | \$ 0.70 |
| 06/27/17 | EQUIP 8-new "D" batteries (ShopRite) (= \$1.38ea.) | \$ 11.07 |
| 06/20/17 | STA red flair point pen (Rite Aid) | \$ 2.43 |
| 06/30/17 | SP 10-sides sc handouts (JHU) | \$ 0.70 |
| 07/11/17 | SP 13-sides SC handouts (JHU) | \$ 0.91 |
| 07/16/17 | SP Tossed out 950 ea. inferior sticky notes pur. 06/18 | ----- |
| 07/16/17 | SP Pur. 900 Post-It notes (Staples) | \$ 15.36 |
| 07/16/17 | SP Slicing 1" of 900 Post-Its (FedEx) (cost ea. = \$0.022/ea.) | \$ 4.23 |
| 07/16/17 | SP 21-sides SC handouts (JHU) | \$ 1.47 |
| 07/18/17 | SUBS Astronomy Magagine Eclipse Issue (Giant) | \$ 7.44 |
| 07/19/17 | SP 21-sides SC handouts (JHU) | \$ 1.47 |
| | | # 150.26 |

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|--|----------|
| 07/28/17 STA Liquid Paper (FedEx) | \$ 1.32 |
| 07/31/17 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/08/17 SP 9-SC handouts (JHU) | \$ 0.63 |
| 08/09/17 SP 6-sides SC handouts (JHU) | \$ 0.42 |
| 08/25/17 EQUIP New rechargeable for telescope (BATTERY WAREHSE) | \$ 28.61 |
| 08/27/17 SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 08/27/17 SP FPT parking | \$ 0.25 |
| *10705 York Rd., Cockysville. "Mike" | |
| 09/03/17 SP FPT parking | \$ 1.25 |
| 09/07/17 SP 1200 Post-It notes (staples) | \$ 10.60 |
| 09/07/17 SP Cut Post-Its down to 2"x3" (FedEx) | \$ 3.16 |
| 09/07/17 SP 18-sides SC handouts (JHU) | \$ 1.26 |
| 09/10/17 SP FPT parking | \$ 0.75 |
| 10/07/17 SUBS S&T THRU APRIL 2020 (CK#1745) | \$ 29.85 |
| 10/29/17 SUBS Am. Inst. Physics (50/50 sub/contrib)ck#1756 | \$ 29.85 |
| 10/26/17 SUBS 2018 Observers Hdbk. (credit cd) | \$ 34.93 |
| 11/17/17 STA 1-typewriter ribbon (Staples) (half of price chg'd) | \$ 4.24 |
| 11/28/17 SP Chas. Vil. parking | \$ 0.50 |
| 11/29/17 SP Chas. Vil. parking | \$ 0.50 |
| 12/01/17 SP Chas. Vil. parking | \$ 0.50 |
| 12/18/17 SP 2-sides business cd. (JHU) | \$ 0.14 |

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|---------|----------|-----------|
| | P2 | \$ 195.69 |
| | P1 | \$ 150.26 |
| | T = | \$ 345.95 |
| | Total | \$ 89.63 |
| Equip | # 61.83 | \$ 28.61 |
| SP | # 69.42 | \$ 21.64 |
| STA | # 10.38 | \$ 5.56 |
| Subs | # 7.44 | \$ 139.88 |
| Permits | # 2.00 | \$ 2.00 |
| ST | # 150.26 | \$ 195.69 |

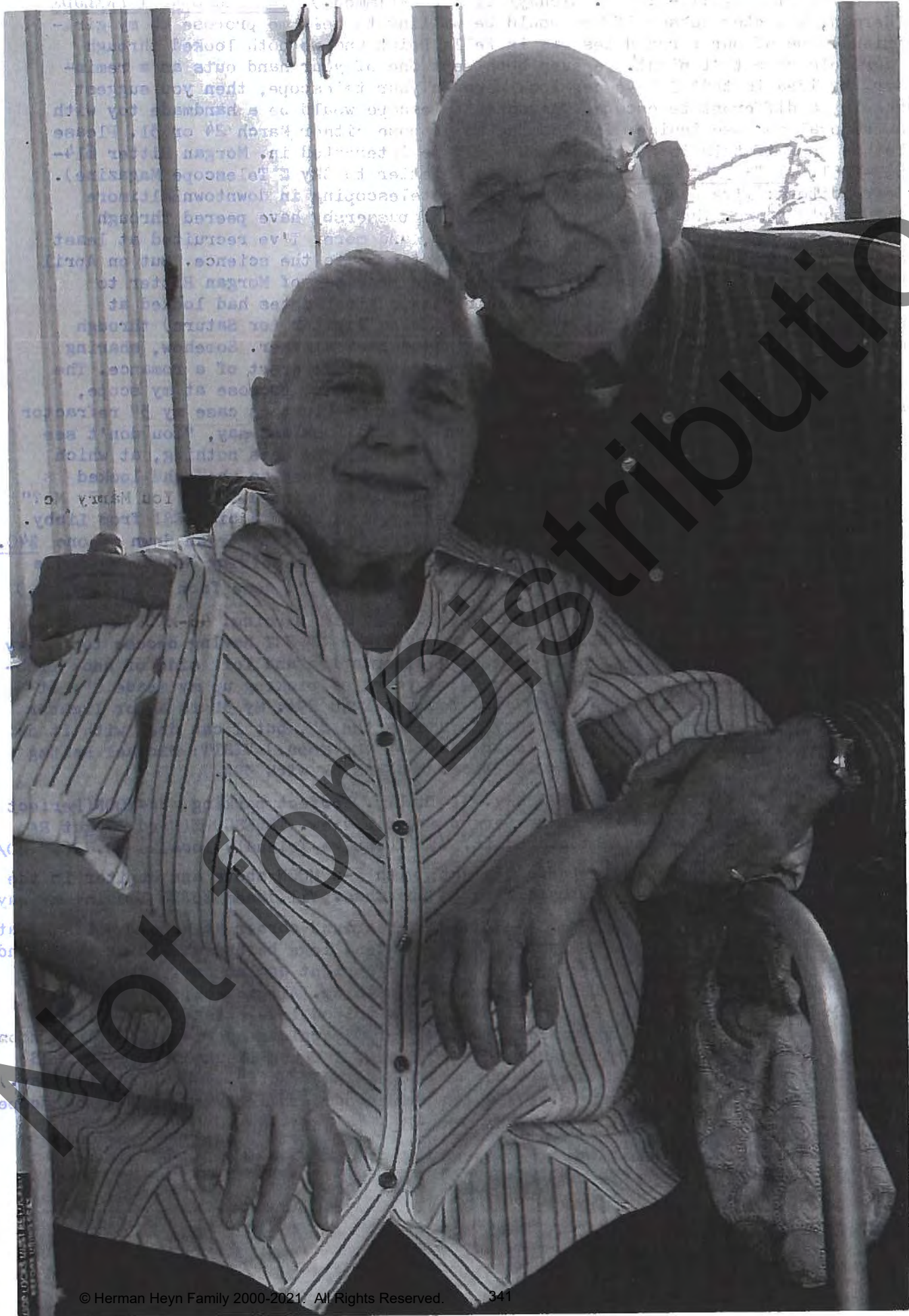
Miles = 516

2018

Not for Distribution

- 2838) 04/06/18(Fri)FPT(8:15-9:15PM. Cloudy/Mild. PARK(Immed.). THE PROPOSAL I PRELUDE
 (An Email)
 "Herman, I wanted to see if you would be willing to help me propose to my girl-friend. One of our first dates was in Fells Point and we both looked through your telescope that night. We even both kept one of your hand outs as a reminder. My idea is that I have her look through your telescope, then you suggest she try a different telescope. The other telescope would be a handmade toy with a proposal message inside. I'm looking to propose either March 24 or 31. Please let me know if this is something you would be interested in. Morgan Ritter 614-537-1191." II THE PROPOSAL (written up as a letter to Sky & Telescope Magazine).
 8 Dear Editors: I've been doing street corner telescoping in downtown Baltimore for thirty years. Thousands upon thousands of passersby have peered through my 8" Meade SCT at the Moon, Jupiter, Saturn, and more. I've recruited at least a dozen to the hobby and, I'm hoping, at least some to the science. But on April 6th I had a first. I presided over the marriage proposal of Morgan Ritter to Elizabeth ("Libby") Nichols, who on one of their first dates had looked at Jupiter through my scope. Like everybody who sees Jupiter (or Saturn) through my scope, each left with a yellow "I Saw....Jupiter" sticker. Somehow, sharing their view of the planet and receiving stickers was the start of a romance. The event was significant enough to Morgan that he wanted to propose at my scope, and he had a plan. Libby would look through my scope (in this case my 3" refractor with its lens cap on) and see nothing. Then I would look and say, "You don't see it? It's very bright." She'd look again and complain she sees nothing, at which point Morgan would hand her a little telescope he fashioned so when she looked through it she would see a lit up screen on which was printed "WILL YOU MARRY ME?" Long story short, Morgan's plan worked perfectly, including a 'big YES! from Libby. Photos were taken by family cued to attend, including one of Morgan ~~down~~ on one \$40.00 knee placing an engagement ring on Libby's finger and she holding Morgan's unique telescope. (Was accompanied by Zippy Larsen, with whom I'd come from a book event.)
- 2839) 04/20/18(Fri)CHARLES VILLAGE(8:53-9:58PM). Good sky. Ok parking. Mild. TELESCOPE (Used my old 3" University Optics refractor, my Meade 8" SCT having become too heavy for me to pick-up. This year have developed upper spine and left side of neck problems which could well have been caused by my years of picking up my Meade 8". It weighs 42# in it case. Scope on its fork mount weighs 29#. My 3" is a lot lighter than my 8" and once set up not as easy to use as the 8", but I can deal with it ok and lookers seemed satisfied with their looks at the Moon.) VISIT: Michael Reitzg and family. \$8.06 (\$7.39/hr.) 5-MOON (Nice. Lookers ok with 39X.)
- 2840) 04/22/18(SUN)CV(8:05-9:08PM). Great sky. Sl Chilly. Perfect parking. 7d MOON(Perfect 1st Qt. 65X with RKE 15mm. Lookers very pleased w/view. TELESCOPE(Need to get RA motion working better. Tonight nudged it. VISIT(Sua, a friendly local.) \$9.02(\$8.20/05/20/18(SUN). Missed out on a perfect night, with 5-d MOON above and Jupiter in the SE. Just couldn't make (force!) myself to go (to Chas. Vil.) Seem to be loosing my way.
- 2841) 05/23/18(WED)CHAS.VIL.(9-10:20PM). PARK(Good, but around corner at home.) Mild. Great sky. TELESCOPE(3" refractor. Learned that must extend legs before attaching mount and scope. Also, could use a finderscope...preferable a right angled one. However, only have a straight thru, which will be better than nothing. Aligned ok, scope tracks manually. Tonight, wasted 1/2-hr. setting up due to tripod legs extension problem.) 8-d MOON(Good with 15mm RKE eyepiece. Beginning of Copernican sunrise. JUPITER(@ 65X. 3-moons, but "stripes" vis. only with perfect focus. I found it unsatisfactory and avoided scoping it...just pointing it out an dispensing "Facts".) SCENE(Fairly busy.) \$20.00 (\$15.04/hr.) First contrib. \$5, which was encouraging! HH(Trouble aiming scope due to motion pain in left side of neck. Otherwise in good form.

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- 2842) 05/24/18 (THU) CHAS. VIL. (8:15-9L45PM) PARK (Good. Arnd. corner home.) Warm. Grt. sky. Semi-busy scene. Easier getting setup than last night. Aligned finderscope, which helped a lot. 9-d MOON (65X did fine. Lookers awed.) JUPITER (65X. 3+1 moons. Belts with effort. Small disc, but lookers impressed.) HH (Intermittent neck pain when maneuvering scope making stint a lot harder. Forgot it, but could have used stool.) VISITS (Vicki, daughter of Tony & Libby, old friends from the Fmrs. Mkt. and holiday cd. purchasers of old. John O'Hara, interesting, supportive. Works as beer vendor at Oriole and other ball parks. Recommended a chiropractor in Hampden for my neck.) \$26.50/\$13.35/hr. People coming & going, so could have stayed longer. Lots of no-pays, so will add 2nd CONTRIBUTIONS WELCOMED sign to hat. VISIT (Diggerido Ian.)
- 2843) 05/25/18 (FRI) C.V. (8:26-10:20PM). PARK (Good. Last space arnd. corner home.) Warm. Grt. sky. Semi busy scene. HH (Thanks to heavy traffic, my sore neck, a flimsy telescope, and going back and forth between two objects, this was a very intense, tiring night. Adding insult to injury, once I got to bed I was too wired to get a good night's sleep.) 10-d MOON (Lookers impressed. One looker noticed Tycho on his own.) JUPITER (3+1. Maybe 50% of lookers saw belts. Good show.) TELESCOPE (Used only 15mm RKE = 65X. Finderscope not perfect but helpful. Good alignment.) "THE STREET ASTRONOMER" BOOK by Robin Smith and HH (Gave one to a father w/12-yr. old son with proviso they'd send me a review.) PHOTOGRAPHS (Good one of Moon taken by Ian, a curbside lemonade vendor.) \$55.12 (\$28.96/hr.) A 2nd CONTRIBUTION\$ WELCOMED card on hat could have helped. DETAILS (Forgot to take MOON FACTS and stool. Need a check-off list!) VISIT (Pat Halle)
- 05/27/18 STREET ASTRONOMER BK TO Chloe Ringer for her grandchildren.
- 2844) 06/15/18 (FRI) C.V. (9-10:30PM). Grt. sky. Warm but not hot. PARK (1st spot on 32nd St.) SCENE (Slow but steady.) JUPITER (0+3. Stripes for most lookers. Lots of "it's beautiful" reactions.) HH (For months have been feeling pain on left side of spinal column and lower left skull. Being out with telescope sort of distracted me from it.) VISITS (Katy & Brent. Stayed most of evening. Helped pack up. Invited me to crab feast tomorrow evening in Sykesville. May go. A JHU grad std. who's invented a scanner for use on microscopes. Other interesting people.) \$26.00 (\$17.33/hr.) HH (Also, it was a good self esteem boost!)
- 2845) 06/28/18 (THU) C.V. (9-10:10PM). PARK (OK both). Grt. sky. Very warm. 3" SCOPE, w/15mm. = 56X? JUPITER IN LIBRA (3+1 moons + stripes,, which almost everybody could see. Lookers impressed. Nobody asked to make it bigger. Very slow scene. \$5.05 (\$4.32/hr.)
- 2846) 06/29/18 (FRI) C.V. (9:10-10:10PM). PARK (OK both). Grt. sky. V.warm. Slightly busy scene. Rush of lookers at start, then moderate traffic. JUPITER (0+3 moons. Stripes. Tried 12mm = 70X. No great for me but lookers OK with it. Gave out lots of stickers.), HH (Back of neck pain driving to corner, which I got distracted from when in action. Physically & mentally, telescoping is the best part of the day for me.) \$26.00 (= \$26.00/hr.) SCOPE (Now that am going out regularly, will have to pay more attn: to scope maintenance. Right now flying on a wing and a prayer!)
- 2847) 07/01/18 (SUN) C.V. (8:42-10:20PM. PARK (Both ok). Grt. sky. V.warm. Slightly busy scene. Rush of lookers at start, then steady traffic. JUPITER (Acq'd 8:47PM... 10m after ss. 2+ stripes @ 70X. All lookers impressed.) SATURN (Spotted 9:50PM by Brent Bederka 1° above roof across street. Acquired w/effort. Kind of dullish view. Will be better when higher. Not knowing I'd do it, had no stickers.) VISIT (Brent & Katie. Abu the Flute Player and his friend, Charlie.) \$34.00 (\$20.86/hr.) VISIT (2 12-yr. old black boys on bikes. Joking at first but then became interested. Had them cross st. to where they could see Venus. Gave them stickers/facts. One contributed \$1. Man 1 yr. younger than me with his "astrologist" wife, who was a bit conversant about planeta' locations.)
- 2848) 07/07/18 (SAT) CV (8:50-10:15PM). PARK (Good. Hm around corner.) Grt. sky. Mild. Slow scene but steady traffic. JUPITER (2+2+stripes for most. Everybody liked.) SATURN (Small, but appreciated.) ROBBERY! (While in conversation w/a number of people, someone cleaned out my hat, which included a just contributed \$10 from Nakul and a Romanian bill. I est. \$20-25 was lost. Incredibly, a Black couple who'd just looked and witnessed what happened, gave me \$25.00!! BOOK (Sold 1 for \$5.00!) MY SETUP (Given flimsiness of scope + dealing w/eyepieces and stickers, is VERY hard keeping it working!) \$41.26 (\$29.06/hr.)

Continuing #2848...HH(Combining the difficulty of using scope with the public with a huge amount of stuning, bending over, reaching, etc., I'm getting an intense physical therapy workout. Whether it's a helpful one, I don't know. I do know it does not bring on the intense pain I feel walking or sitting in car.) VISITS(Nakol, who contributed \$10 which was stolen. Accordionist who used to play w/Barrage Band.) PHOTOGRAPH(First attempt with this scope. Seemed to work. By Wilhelm, the Romanian, of Jupit⁴r + 4 moons.) GENERAL (A pretty busy night with many friendly, enthusiastic lookers.)

2 2849) 07/08/18(SUN)C.V.(8:49-10PM). PARK(Gd. Hm. around corner.) Grt. sky. Comfortable temp. Slow scene. TELESCOPE(Used dec. control cable on Jupiter but couldn't on Saturn due to bent fitting. Need to somehow get it fixed, so can use on Saturn.) JUPITER(2+1. Stripes. 56X. Everybody liked.) SATURN(56X. Small, but no complaints.) HH(Neck hurting.) VISIT (Katie & Brent.) HAT(Kept only \$2 in it.) \$9.00 (\$7.63/hr.) Katie & Brent helped me to pack up.

2 2850) 07/09/18(MON)C.V.(8:50-9:50PM). PARK(Both good.) Grt. sky. Warm. Busy for a while. Shut down when saw nobody on sidewalk in both directions. JUPITER(2+2. Stripes. Very nice @ 55X. Trouble finding because is now on the west side of overhead wire while I was look- on the east side.) SATURN(Skipped it, as Jupiter was putting on a good show.) VISIT(CV friends Sue and husband, who bought a book. Helped me find Jupiter.) HH(Minimal neck pain while telescoping, but it kicked in big time back home.) \$14.00 (\$14/hr.) Sold one book. PARTIAL SOLAR ECLIPSE(Today, July 9th, is the anniversary of my seeing my first solar eclipse. It was at Camp Kennebec around 1945. I photographed a projected image using my small draw tube telescope.

2 2851) 07/10/18(TUE)C.V.(8:44-9:55PM). PARK(Ok. Around corner.) Sl. hazy sky. sticky hot! JUPITER(While others could see it, I couldn't, causing a 10-min. delay in my getting started on it. Maybe I should arrive a little later. 3+1 moons. Stripes. To a person, it was appreciated.) VISITS(Kevin from Carma's. Stayed for a while. Helped me find Jupiter. Barbara & Marty Gudenius, before I found Jupiter. Meagan from JHU library. Said is giving up on her PhD. paper. Jimmy. Friendly local who's helped me unload several times. Gave him \$3 so he could catch a bus to his parole hearing. Returned later with a bike he asked if I wanted to buy. Said he was going back to jail because he didn't have \$400 to pay for a urine test. Chas. Village seems to have more problem people coming by then Fells Pt.) HH(Neck not a problem. Maybe because was wearing my French sneakers? \$18.00 (\$15.13/hr.)

2 2852) 07/13/18(FRI)C.V.(8:50-10:05PM). PARK(Good. Corner.) Gd. sky. Warm/humid. JUPITER(1+3 moons. Trouble getting focus where most lookers could see "stripes". Again, trouble finding it with scope.) TELESCOPE(New screw I bought to keep Dec. cable working failed. Dissapointing! Will work on it. Unfortunately, threw away old screw which worked somewhat.) VISITS(Newly elected state senator Mary Washington and family.) JIMMY(For several wks. has been helping me unload. Two days ago hussed me for \$3 bus fare to go to parole hearing. Later returned with a bike which he offered to sell to me for \$35. To- night he offered to sell me a food stamps card. Says he spent 28 yrs. in jail for mur- dering the man who killed his sister. Has a rea. hustlers' personality. I need to stay on guard with him!) BOOK(Gave one away to a really bright 5-yr. old girl, Leila, who knew her planets.) \$19.86 (\$15.89/hr.)

2 2853) 07/14/18(SAT)C.V.(8:55-10PM). PARK(Both OK.) Warm, humid, breezy, low 80'sF. JUPITER (1+3...not hard to like. Stripes for most lookers.) TELESCOPE(Reversed positions of control knobs....short one on dec and long on RA, and they worked. Really helpful.) HH(Minimal pain. Maybe because wearing French sneakers?) VISIT(Maggie. Young woman who knew my name and said she looked thru scope yrs. ago.) Slow scene. \$13(\$11.21/) Two women bought me ice cream.

This page = \$ 73.86

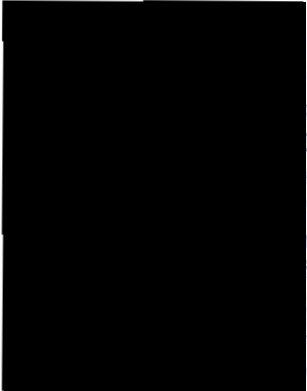
This year = \$364.87

- 2854) 07/18/18(Wed)C.V.(8:45-10:15PM). Warm & humid. PARK(Ok.Hm. around corner) Slow scene. 5-day MOON(Many craters. Lookers surprised.) JUPITER(Ganymede by itself on the left, 3 on the right in a tight triangle. Stripes. Lookers liked.) HH(Conscious of left neck pain. Yesterday received a steroid epidural shot. I hope tonight's telescope activity doesn't diminish its effects.) \$14.35 (\$9.57/hr.)
- 2855) 07/19/18(THU)C.V.(8:40-10:05PM). PARK(Ok both.) Warm & humid. Slightly hazy sky. HH(HELP!....a really tough night! Lots of bending down to pick-up handouts. Two sky objects, meaning I was constantly re-aiming scope. The heat. Very aware of left side of neck pain. Forgot to take aspirin before leaving house. I fear I am ruining any + effect of Tuesday's steroid epidural.) ist. QT MOON(Lots of craters. All lookers impressed.) JUPITER(4 moons in ^{unusually} tight array in left. Nice!) VISIT(Man who got my I SAW URANUS sticker 10yrs ago in FPT. and has it on his bathroom mirror! Young Indian man excited by Jupiter, saying in his Hindu religion, Jupiter is his strongest planet. Had no cash but returned with a bag of assorted food items.) \$41.31 (\$29.09/hr.) VISIT(4 workers from a nearby water line repair project came over to look at Jupiter and received stickers.) * Except for the yogurt, gave the food to a pair of "travelers" who were passing by with two dogs and were wearing huge knap sacks.
- 2856) 07/26/18(THU)C.V.(8:43-10:30PM). First chance after a full week of clouds & rain. PARK(Fair. Corner). Warm & humid. Sl. hazy sky. Slow scene. JUPITER(All four moons in tight array on left.) FULL MOON(Really nice with 25mm eyepiece = 36.4X.) HH(Neck problem continues. Am simply disregarding it on "the street". Hopefully is not making matters worse.) SHOES(Wore my Dr. Scholl's. Had night cramps in both legs.) VISITS. (Vicky, a regular who arrives on a bike. Kattie.) \$19.54 (\$10.98/hr.) MOON PHOTO(A very beautiful one was taken by a young man named Tyler.)
- 2857) 07/28/18(SAT)C.V.(8:45-10:20PM). Comfortable. PARK(Ok both.) Ok sky. Slow scene. JUPITER(1+3. Nice. As usual, all lookers liked.) SATURN(Acq'd 9:40PM. Even w/12mm = 75.4X image so small was hard to focus. Will soon run directly into lights.) MOON (Briefly at end of stint.) MISTAKE!(At 10PM, as was shutting down, a couple appeared who excitingly wanted to look thru scope, so I put it back together. Showed them all three objects. Man even photo'd Moon....sort of. After making this big effort, all they contributed was \$1 + a little chg., and I was totally worn out. Something like this has happened before, and I just have to resist getting suckered! \$6.21(\$3.93/hr.) HH)With Jupiter exiting scene and Saturn heading for lights, Mars will soon be my main object. Remains to be seen how much of an attraction it will be, as well as how interesting it will look in the scope. Maybe it will be time for a break. Also working the scope can be rough on my neck, which is another reason to take a break.) Just realized, Mars will be lower and more difficult than Saturn to scope!) SHOES(Wore Reeboks and had 3 painful cramps in lower left leg.
- 08/04/18(SAT). Perfect weather and sky night (both Jupiter and Saturn available), but not wanting to aggravate my neck problem with all the bending and turning required to operate scope, I decided to stay home. Even had a call from a looker (Paul Byrd), a real rarity, asking if I were going out. After several months of various doctor visits and trying a variety of over-the-counter pain pills, neck problem has not improved. Monday AM have another appt. with Dr. Abed, Advanced Pain Clinic, Timonium. Am afraid that if I can't get on top of my neck problem, my 30.75 years of street telescoping may be over. How do I feel about it? Honestly, at this point in time what I'll miss the most is the money.*After that the fun and gratification of meeting, entertaining, and educating such a wide variety of people. I'll also miss it's being ME....my persona....my self-image. I'll still have my reputation with the public but, I guess, I'll have to find a new ME....or maybe I'll be the old ME emeritus. To continue....I'll also miss being on stage, the center of attention and expertise. It was very important to my improved self-esteem....as was my relationship with Phyllis Weber, which began May 3, 2004. She immediately took to my telescope routine and was out with me, by actual count, 180 times, the last being 07/02/17.

TOTAL THIS PAGE \$ 81.41
 TOTAL THIS YEAR \$446.28



MARS! IT'S THE BRIGHT, ORANGISH-RED OBJECT YOU'VE BEEN NOTICING IN THE LATE EVENING SKY. It is racing toward its once every 15-years closest approach to Earth (July 31st), when it will be a mere 35.8 million mi. away (3.2 light mins.). That day it rises at sunset and will be visible all night. Currently, Mars is the sky's 4th brightest object--after Sun, Moon & Venus....bright in west after sunset. Normally, Jupiter is 4th, but Mars will eclipse it thru July. (Jupiter is hi in the SW after sunset, while Saturn is low in the south.) Only with real good telescopes, such as the ones at JHU and the Md. Sci. Center can much be seen on Mars. They are open free to the public Friday nights (weather permitting.) They might show you Mars' south polar ice cap (mostly CO2). Finally, while looking at M, J, S and V, always remember Herman's First Law of Astrophysics: **STARS TWINKLE, WHILE PLANETS SHINE WITH A STEADY LIGHT.**



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2858) 10/20/18(SAT)FELLS PT.(7:26-9:40PM). Thought I'd retired, but set up one more time at the behest of Baltimore Sun reporter Scott Dance, who plans to do an article on my last stint. Dance was accompanied by the Sun's crack photographer, Carl Ferron. I was accompanied by my 16-year old neighbor, Miles Barnes who, due to my neck problem, performed all the heavy lifting. (Was unaware of neck prob. while performing, but it returned during shut down.) Paid Miles \$25.00 (+\$3 for a snack) for his help. Miles enjoyed the experience, even to taking Moon photos thru the scope. *9* PASSERSBY(Lots said they were glad to see me back and asked me to keep coming back. Who knows, but with Miles' help, when Jupiter & Saturn return next summer, I could start up again!) Old-MOON(50X. Pointed out Tycho and related it to movie 2001. Several times showed terminator craters @ 135X.) MARS (80X. Quite a few times, explaining that it was not much larger than our moon, so at 66-million miles....6 light mins.....no detail visible. Gave out Mars stickers and Facts. TELESCOPE(Worked fine after 6-mos. hiatus. Well aligned.) VISITS(Ed, Admiral's Cup musician who was very happy to see me back. Lisa, who lives nearby and volunteered to help me any time I want. Teaches at W.Md. College. \$49.00 (\$21.97/hr.) Long period w/no contributions. Within a min. of shutting down, a huge, maybe 40-50MPH wind storm adding difficulty to job. PARK(Water Taxi slot!)

TOTAL THIS PAGE = \$ 49.00

TOTAL THIS YEAR = \$495.28

year = 55 miles

SC EXPENSES -- 2018

| | |
|--|-----------------|
| 04/21/18 SP 8-sides SC handouts @ \$0.07/ea. (JHU) | \$ 0.56 |
| 04/28/18 SP 4-sides = 40ea. SC business cards (JHU) | \$ 0.28 |
| 06/02/18 SP 11-sides SC handouts (JHU) | \$ 0.77 |
| 06/27/18 SP 4-sides SC business cards (JHU) | \$ 0.28 |
| 06/30/18 SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 07/06/18 STA whiteout (FedEx) | \$ 1.32 |
| 07/06/18 STA clear plastiv pages for archives book (FedEx) (25ea.) | \$7.41 |
| 07/11/18 EQUIP 2-screws for telescope RA control (ACE Hdwe) | \$0.82 |
| 07/12/17 SP 5-sides SC handouts (JHU) | \$ 0.35 |
| 07/14/18 SP 14-sides SC handouts (JHU) | \$ 0.98 |
| 07/19/18 SP 10-SC handouts (JHU) | \$ 0.70 |
| 07/27/18 SP 18-SC handouts (JHU) | \$ 1.26 |
| 07/28/18 SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 07/29/18 SP 10-sides SC handouts (JHU) | \$ 0.70 |
| 10/19/18 SP 4-sides SC handouts (JHU) | \$ 0.28 |
| 10/20/18 ASSIST Miles Barnes for heavy lifting assistance. \$25 + \$3 (snack) (SP) | \$ 28.00 |
| 10/29/18 SP 3-sides business cds. (JHU) | \$0.21 |
| 12/05/18 STA White-out (FedEx) | \$2.64 |
| 12/19/18 SP 20-sides Science Friday transcript (JHU) | \$ 1.40 |
| | TOTAL = \$48.94 |

SP = \$30.16
 STA = \$11.37
 EQUIP = \$ 7.41
 TOTAL = \$48.94

| | |
|--|------------------------------|
| 06/18 CONTRIBS Observers Handbk contributed to Eisenhower Library, JHU | \$34.93 |
| | TOTAL = \$83.87 |
| 2018 = 55-MILES @ \$00.545/MILE = \$29.98 | +MILAGE = +\$29.98 |
| | GRAND TOTAL EXPS. = \$113.85 |

2018 INCOME = \$495.28
 2018 EXPENSES = \$113.85
 2018 NET INCOME = \$381.43