Observation Date: Nov 13, 2023

Location: Lake City, CO

Observers: Myself

Moon Phase: Moonrise 6:30am

Seeing: 8

Transparency: 10 - Till Fog Came

Notes: Last night for the setup behind the rental here in Lake City Dark

Sky. Will be heading back to Oho in 3 days. Beautiful night at start till 9:30pm when I stopped observing due to heavy fogging. After completing several AL Observing Programs, I decided to look at objects very low in the southern sky where there is no hint of any light polution and I am 2 degress farther south than in Ohio. I targeted DSO's in the constellations of Cap and PsA. A total of 11 DSO's were logged and the temperature dropped to low 30's. Plan on next year to make another attempt for low southern objects at Windly Point with a better horizion and 10,800ft elevation. I am already thinking of doing AL Dark Nebula Program. In a Dark Sky (Brotle 1), I found that dark nebula are fairly easy to detect. The Meade 12.5" F/6 telescope definitely

expanded by observing skills and techniques. Did alot of eyepiece start hopping. Looking forward to more amazing

observing here in Colorado Dark Skies 2024.

Observation Date: Nov 11, 2023

Location: Lake City, CO

Observers: Myself

Moon Phase: Moonrise 6am

Seeing: 10

Transparency: 10 - Excellent

Notes: Hiked Dolly Verden earlier in the day. Beautiful blue skies.

Finished both the AL Asterisms and AL Carbon Stars by

morning. I took two, 2 hour breaks, waiting for objects to rise in the east. Logged the last 12 AL Carbon Stars the the final 5 AL Asterisms. Stopped observing at 5am. Temperature low teens, cold and crispy! What an amazing run I had with dark, clear skies over the last 2 months. Moving the scope down into town from Windy Point allowed me to leave my scope setup, covered during the day and observe at any time during the night. Lake

City Dark Skies are just amazing.

Observation Date: Nov 09, 2023

Location: Lake City, CO

Observers: Parker

Moon Phase: Moonrise 4am

Seeing: 8

Transparency: 10

Notes: Continued observing and logged 11 AL Carbon Stars before

Parker arrived at 11:30pm. Viewed many Messiers and spent several hours giving Parker an introduction into Amateur Astronomy. Stopped observing around 1am. Temperature into

the teens. We had to warm up inside the rental at one point. Heavy Frosting on the telescope, but it didn't hinder the last view

of M42 which was spectacular.

Observation Date: Nov 07, 2023

Location: Lake City, CO

Observers: Stephanie, Parker

Moon Phase: Moonrise 2am

Seeing: 8

Transparency: 10 - Passing Clouds

Notes: Setup behind rental in Lake City. Showed Saturn and Jupiter to

Stephanie and Parker. Windy with strong gusts. Patchy clouds from time to time passed through. Observed and logged 9 AL Carbon Stars all from the west side of the mount. Stopped observing at 11:40pm. Temperature low 30's. Telescope performed OK, some drifting in the west. First time observing with the new additional DEC tube weights (used cannon ball

fishting weights temporary).

Observation Date: Oct 20, 2023

Location: Lake City, CO

Observers: Myself

Moon Phase: Moonset 10pm

Seeing: 10

Transparency: 10 - Excellent

Notes: 4th night in a row setup behind rental. Lake City Dark Skies.

After a day of hiking, I sleep from 8:30pm till 12 midnight. By 1am I was observing AL Asterisms. The skies again, were just amazing. The Meade 12.5" again performed extremely well, I think I have finally have my observing setup complete. Logged 23 AL Telescopic and 2 Naked Eye Asterisms. Only 1 Telescopic and 4 Binocular asterisms to go. Stopped observing at 6:30am just before twilight began. Temperature low 20's but never got cold or took a break. Another incredible night observing here in

Lake City.

Observation Date: Oct 19, 2023

Location: Lake City, CO

Observers: Becky

Moon Phase: Moonset 8:30pm

Seeing: 9

Transparency: 10 - Excellent

Notes: 3rd of 4 nights in a row setup behind rental. Lake City Dark

Skies. Rebalanced tube DEC and RA by adding 28oz to bottom of tube. Becky came out to see Saturn, Jupiter, Double Cluster and a few Carbon Stars. Telescope performance was the best it has been here in Lake City. Encoders, drives and everything else was just great. Logged 31 AL Carbon Stars. Many of which were gems in the 9mm eyepiece. After 1am, wind started to pick

up. Temperature low 30's, Excellent night in Lake City.

Observation Date: Oct 18, 2023

Location: Lake City, CO

Observers: Shad stopped over for a few hours

Moon Phase: Moon 4 Days Old

Seeing: 10

Transparency: 10 - Excellent

Notes: This is the second (of 4) nights in a row setup here behind the

rental. Lake City Dark Skies. Before continuing the AL Bright Nebula, Asterisms and Carbon Stars, I gave Shad a Universe Sampler. Jupiter, Saturn, M13, M15, M26, M31, M32, M110, M33 and the Double Cluster. Logged 24 DSO's, 1 Binocular Asterism and 3 Carbon Stars. Finished the Astronomical League Bright Nebula Program. Stopped observing at 3:45am. Temperature upper 20's. Another excellent night here in Lake City Dark Skies.

Observation Date: Oct 17, 2023

Location: Lake City, CO

Observers: Myself

Moon Phase: Moonset 7pm

Seeing: 10

Transparency: 10 - Excellent

**Notes:** This will be the first of 4 nights in a row. Set up behind rental

again and left it setup till Nov 16th when we left CO for OH. Lake City Dark Skies. Absolutely an awesome evening. Logged 29 objects, 27 of these AL Asterism's. Best of the night was Chi 1,2,3 in Fornax. They were located low in the valley heading out of town towards Lake San Cristbol between two mountains. The sky ths low was no different that the sky overhead. Spent most of the observing in the west side of the telescope (mount). I had to "catch up" with objects past the meridian. This worked out great with most of the objects being in the NW.Observed M1 and M42 before calling it a night. M42 was the best I have ever seen in the 12.5". Just amazing!!. Stopped observing at 3:45am. Temperature low 20's. Best night with the Meade 12.5" f/6 to

date and I had the scope since 1982!

Observation Date: Oct 06, 2023

Location: Lake City, CO

Observers: Myself

Moon Phase: Moonrise 1am

Seeing: 10

Transparency: 10 - Excellent

Notes: Left the telescope setup since previous outling (10/4/23). The

skies were excellent again. Lake City Dark Skies. Continued working on AL Asterism Program. Logged in 2 Telescopic and 7 Binocular Asterism's. Only 5 Binocular, 2 Naked Eys and 51 Telescopic asterism's to go. Temperature low 30's. Stopped

observing at 12:18am.

Observation Date: Oct 04, 2023

Location: Lake City, CO

Observers: Myself

Moon Phase: Moonrise 11:11pm

Seeing: 9

Transparency: 10 - Excellent

Notes: Setup behind rental at 718 Lake Street, Lake City, CO. Elevation

8,700ft. Came down to observe in town from Windy Point

because it is much colder there. Here, I can go inside, eat, warm

up and continue observing in comfort. Worked on AL

Asterism's. It is amazing how dark the skies are here in town.

Lake City is a designated International Dark Site (now called

Lake City Dark Skies). The asterisms were easily observed.

Stopped logging objects at 11:00pm. Observed 14 AL Asterisms

(6 Binocular, 8 Naked Eye). Temperature upper 20's.

Observation Date: Sep 16, 2023

Location: Windy Point, CO

Observers: Wes &Leeann, Donna. 5 other quests that happened to stop by.

Moon Phase: Moon 1 Day Old

Seeing: 9

Transparency: 10

Notes: Showed the guests many Messier objects and Saturn. People

leaving Lake City on their way to Texas, also stopped at Windy Point to see the stars. Logged in 2 AL Carbon Stars. The sky here a Windy Point is just amazing. Around midnight, I was too tired to continue. Covered up scope and headed back to Lake

City. Temperature in the upper 30's.

Observation Date: Sep 07, 2023

Location: Windy Point, CO

Observers: Bruce Heath

Moon Phase: Moonrise 1:30am

Seeing: 10

Transparency: 10 - Excellent

Notes: 2nd Night in a row. Joined by Bruce Heath who heard from Phil

that I had my big scope up at Windy Point. I meet Bruce at Bob's house. He is a long time observer. Need to work on the remote monitor on the ladder. Things need to be tighten up.Spent the first few hours looking at Messiers, Veil Nebula, etc. with Bruce. He was very impressed with my setup. I then continued working on AL Bright Nebula objects. Logged 11 DSO's. Bruce and I talked astronomy the enitre night. Stopped observing at 1:04am. Temperature dropped to the low 40's. Scope performed very well.

Just another amazing night at Windy Point.

Observation Date: Sep 06, 2023

Location: Windy Point, CO

Observers: Many from the Wednesday Night Astronomy Program by Phil.

Moon Phase: Moonrise 12:40am

Seeing: 10

Transparency: 10 - Excellent

Notes: About 20 guests with Phill's Wednesday night astronomy

program hung around and viewed many Messiers through my telescope. The Meade 12.5" operated great. The new lazer pointer on the scope was an excellent addition. Made pointing the 12.5" very easy especially in very dark skies. The skies here at Windy Point are just absolutely amazing. Observations of AL Bright Nebula objects were found with ease. Most of these objects were just amazing. Logged 13 DSO's. Temperature low

40's. No dew, even though setup was out in open. Stopped observing at 12:40am. Just another great evening here at Windy

Point.

Observation Date: Jun 12, 2023

Location: Windy Point, CO

Observers: Myself

Moon Phase: Moonrise 3:30am

Seeing: 9 - Great

Transparency: 9 - Excellent at times

**Notes:** A few thin clouds came by of and on throughout the evening.

Arrived at 10:30pm and spent about an hour getting the drive clutch adjusted. Being left out in the heat and direct sunlight during the day must have softened the grease in the clutch. The clutch was slipping and needed tightened. Continued working

on AL Asterisms and observing other DSO's. The IDA is changing it's name.... It is now DarkSky Colorado. The 12.5" performed very well after the clutch was adjusted. Need to get the laser mounted on the scope for easier pointing of guide stars. Finished observing at 3:30am, packed up equipment and

loaded trailer around 6:00am. Sunrise at Windy Point is

spectacular. Headed back to Lake City at 6:30am. Was a very rewarding day, hiked White Cross Mountain earlier in the day and then observed all night at Windy Point..... Doesn't get any better

than this.

Observation Date: Jun 10, 2023

Location: Windy Point, CO

Observers: Myself - joined by another observer later

Moon Phase: Moonrise ~ 3:00am

Seeing: 9

Transparency: 9 - Very Good

Notes: Arrived 10pm after 2 hour nap. Some thin clouds around early

then very clear and calm winds. At 10,800ft and a completely dark sky, observing takes on a whole new experience. The background FOV through the eyepiece is totally black. Very faint \*'s are seen to the limit of the optics. If a cloud or two came

across the sky, it would appear as a black hole in the sky because there is no ground light reflecting off the bottom of the clouds. Something I have never experienced before. Optical encoders keep acting up. After disconnecting the timing belt and spinning the encoders seams to temporally fix the issue. The latter with monitor and the wireless keyboard setup worked

very well. Sitting at the table with the list of objects made entering the next object a breeze. Just go to the telescope and move to the next object. Need to darken both monitor and

computer with a second red filter.

Another observer showed up around 11pm with his Celestion C8 from Pavonia. He was staying at Williams Camp Ground and was a regular at Windy Point. This was his favorite place to observe. We both enjoyed views of several DSO's and Messiers. I am completely blown-away with the views through the 12.5" and these dark dark skies. Logged 9 AL Carbon Stars and 1 DSO - NGC 6543 in Draco.

Temp dropped into mid 30's. Used hand warmers for the first time. Stopped observing around 3:30am and back to Lake City around 4am. Excellent evening at Windy Point (again).

Observation Date: Jun 08, 2023

Location: Windy Point, CO

Observers: Around 20 guests from the Lake City Star Fest. Bryan Cushion

and Mark Laurise with their scopes.

Moon Phase: Moonrise ~ 2:00am

Seeing: 7-8

Transparency: 10 - great

Notes: Setup 12.5" early around 2pm. Came back around 7:30pm. Bryan

Cushion from Black Caynon Astronomical Society setup scope for Electronically Assisted Astronomy, Mark Laurise his 8" Celestron. Guests from the Lake City Star Fest arrives a little before dark. The sky was mostly cloudy at the start of veiwing, then clear patches moved in with clearing around midnight. Showed many awesome views of DSO's including many

Messiers and the supernovae in M101. The 12.5" performed very well and provided me the best views I have ever seen through this scope. The skies here are black! Stopped observing around 2am and was heading back to Lake City at 2:30am. Excellent

night at Windy Point. No DSO's were logged.

Observation Date: Apr 18, 2023

Location: Hidden Hollow - RAS
Observers: Mike R. and myself

Moon Phase: New

Seeing: 7 - hazy

Transparency: 8 - got better early AM.

Notes: Arrived around 8:30pm. Mike was already setup and filming.

Spent most of my observations around zenith. There the sky was very good. Started observing NGC/IC objects in UMa for the first couple of hours waiting for Asterisms and Carbon Stars to approach meridian. The operation of the 36" scope was the best it has been in a while. I guess the lubrication work performed earlier in the week paid off. Note to self, lubericate the scope more often. The new red light setup on the lift worked very well, except for a little red glare on the computer screen. Mike left around 4am. Twilight started at 5:03am and I stopped observing around 5:30am. Logged 28 DSO's in addition to 13 AL Asterisms and 6 AL Carbon Stars. The temperature dropped into the upper 20's. Closed up observatory at 5:45am and was on my way home

around 6:15am. It was a very good night at WRO.

Observation Date: Apr 12, 2023

Location: Hidden Hollow - RAS

Observers: Several RAS members (5 total) observed most of the evening.

Kim stayed till 4:30am.

Moon Phase: Moonrise 3:38am

Seeing: 8 - good

Transparency: 9 - very good

Notes: Very clear and transparent night. Humidity at a low for this time

of year - 25-30%. Grass fire around 6pm just west of HH had some of us on edge. Fire was out by observing time. Arrived at WRO around 3:00pm. Washed 36" mirror, cleaned up the instide of 36" dome, got rid of some junk laying around. Also did some other small maintenance tasks as well. Continued working on ALGGOC objects, Carbon Stars and Asterisms. Logged in 30 DSO's, 1 Carbon Star and 3 Asterisms. Temp leveled out at a very comfortable 58 degrees. Stopped observing at 3:45am and was on my way home at 4:15am. Excellent evening at WRO.

Observation Date: Apr 10, 2023

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 1:35am

Seeing: 8

Transparency: 8 at start. 9 later

Notes: Arrived later around 10:00pm to let a band of clouds move from

North to South across Ohio. At 10:15pm, the sky has started to clear out very nicely. Transparency became very nice shortly after. Continued working on AL's The Local Galaxy Group and Galactic Neighborhood Observing Club (ALLGGOC). Logged in 29 DSO's of which most were ALLGGOC objects. Stopped

observing at 1:30am and was on my way home at 2:00am.

Temperature dropped to the upper 30's.

Observation Date: Apr 09, 2023

Location: Hidden Hollow - RAS
Observers: Mike R and myself

Moon Phase: Moonrise 12:35am

Seeing: 7

Transparency: 8 - Improved a little around 11:30pm

Notes: Arrived around 5pm and Mike was setup doing Solar photo's.

Tried out the new red lights for recording observations and they work great. Continued working on AL The Local Galaxy Group

and Galactic Neighborhood Observing Club (ALLGGOC).

Recorded 24 objects, most of which were ALLGGOC DSO's. For the most part, most of these non-NGC objects with very diffuse and very low surface brightness. Even with the 36", they are mostly very faint and 'poor' objects. Some are quite large in size

(14.6' FOV at 336x). Mike left around 12:35am. I started

observing at 9:00pm and stopped at 12:45am. The temp dropped

into the low 30's. I was on the road home around 1am.

Observation Date: Mar 19, 2023

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New

Seeing: 7 - Average to Good

Transparency: 8 - Very Good

Notes: Arrived around 6:30pm. Found the Red outside lights on the

Education Building on. There is a bank of Dome outlets that don't work. Maybe a breaker is not working. Someone ran the lift into something - the red reading/writing light was broken off the holder and the AC/DC power cable was snapped. Started the Astronomical League's Asterism and Carbon Start Observing Clubs. Logged 17 Carbon Stars and 7 Asterisms. Did not observe any DSO's. A very crisp, clear and cold evening. Temperature dropped to 23 degrees. Stopped observing at 3:40am. Locked up all buildings and was on my way home at

4:40am.

Observation Date: Sep 22, 2022

Location: Windy Point, CO

Observers: Myself.

Moon Phase: Waning Crescent 12%

Seeing: 10+ Excellent

Transparency: 10+ Excellent

Notes: After having many guests and travelers passing by on previous

observing sessions where I did not get any DSO's logged, I have the night to myself after the few Lake City quests got their fill of Saturn, Jupiter, M16, M17, M22, M57, and others. The crowd cleared out around 10pm and I got down to the business at hand. Logged 18 DSO's and finished the ALOC program! Knocked off a few ALBN objects. Temp dropped into the low 40's. I stopped observing at 3:00am and covered my scope and computer

equipment, etc. leaving it on-site in hopes to return within the next or so. As it turned out, this was not the case and I returned

in a few days to pack up the telescope for snow and nasty

weather is expected.

Observation Date: Aug 30, 2022

Location: Windy Point, CO

Observers: Myself

Moon Phase: Moonset 9:20pm

Seeing: 10+ Excellent

Transparency: 10+ Excellent

Notes: Windy Point Lake City Colorado (el 10,800ft) an IDA latest

designated international dark sky site (near Slumgullion pass el 11,500ft). First time I have ever observed in IDA skies. This is the most remote location in the lower 48 located in the heart of the San Juan Mountains - the most beautiful mountain range in

Colorado.

I brought my Meade 12.5" f/6 Research Grade telescope (1980) here to it's new home in Lake City. The new modifications and additions to the scope are just awesome. I added wireless keyboard, remote monitor, upgraded computer, observing ladder/stand, and many other conveniences to go along with the

new setup.

After polar alignment, I spent sometime viewing several messier objects. I am totally blown away at the darkness of the skies. Zero light pollution. The sky background through the eyepiece was BLACK!.

I continued observing the ALOC program objects. At 2:30am I stopped observing having logged in 5 DSO's with drawings. After a day of earlier hiking, I was just too tired to continue. Packed up and headed back 10 miles to the rental in Lake City.

These are the best skies I have ever observed in.

Observation Date: Jun 24, 2022

Location: Hidden Hollow - RAS

Observers: Mike R. Jason

Moon Phase: Moonrise 3:30am

Seeing: 8

Transparency: 9

Notes: 2nd Night in a row! Arrived at 9:30pm. Finished Serpens ngc/ic

objects. Worked on Sagittarius ngc/ic objects and finished with about 10 objects to go. Around 2am started observing ALOC objects. Finished with only 11 objects to observe and 9 objects to draw. Observed comet C217K2 which was much brighter and better that it was 3 days ago. Mike stayed all night and Jason left

around 2am. Stopped observing at 4:12am and locked up observatory at 4:45am. I took a short nap in the Education Building since I was going to go pick up my cargo trailer at

mon's. Logged in 43 dso's.

Observation Date: Jun 23, 2022

Location: Hidden Hollow - RAS
Observers: Tony, Terry, Mike R.

Moon Phase: Moonrise 3am

Seeing: 8

Transparency: 9

Notes: Arrived at 8:45pm. Temp dropped to low 50's at 3:20am. Spent

time with Tony showing Messier's and explaining observing basics. Worked on NGC/IC in Hercules and then ALBN objects. Logged 15 ALBN objects (33 DSO's total). Stopped observing at

3:20am. Closed up observatory at 3:40am.

Observation Date: Jun 21, 2022

Location: Hidden Hollow - RAS

Observers: Dave Walker, Rita (first visit) Mike R

Moon Phase: 3rd Qtr

Seeing: 8

Transparency: 8

Notes: First Visit for Dave and Rita. Showed them M13, M10, M12, M17,

M16, M57, N6702, N6210 and Comet C217K2. They left around 2:30am. Closed up observatory at 3:00am. Did not log in any

DSO's.

Observation Date: May 30, 2022

Location: Hidden Hollow - RAS

Observers: Mike R.setup on pad for Meteor Shower observing.

Moon Phase: Moonset 9:26pm

Seeing: 7

Transparency: 8

Notes: The Meteor shower was a bust. Arrived at 9pm. Started

observing objects in Hercules until early morning then started observing ALOC objects. Logged 17 ALOC objects leaving only 22 ALOC objects to go. Stopped observing at 4:41am. Closes up observatory at 5:05am. Logged 52 DSO's. Temperature mid

60's.

Observation Date: May 13, 2021

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: 2 days old

Seeing: Good - 8

Transparency: Excellent - 9

Notes: Arrived at 10pm, the clubhouse and light was left open and on,

at 10:30 I was looking throught the eyepiece. The sky was excellent. 17.5 mag galaxies were observed at zenith (with out AV) in Canes Venatici where I was logging CVn ngc/ic objects. I need to spend more time observing in CVn. Many of the IC objects there are as good, if not better, than many NGC objects. Being at zenith for most of the objects doesn't hurt neither. Moved on to Bootes for some Compact Galaxy Trio's. Then

around 2:00am it happened. The last Herschel 2500 was logged. NGC 7024 was not due to cross the merdian until 7am. However, I had about a 30 minute window to observe it in the NE sky if I positioned the telescope tube under the mount. And with the counter weights almost pointing at zenith, I was able to observe NGC 7024 well up in the NE. Afterwards, I got busy with Open

Clusters and Bright Nebula's. At 4:30am when I stopped observing, 57 DSO's were logged. The highlight, besides the last Herschel, was M20. It was the best I have seen it to date. The temperature dropped to the upper 30's. At 5:00am observatory was closed up and I was on my way home. Another back to back

excellent night at WRO.

Observation Date: May 12, 2021

Location: Hidden Hollow - RAS
Observers: Mike R. and Myself

Moon Phase: Moon 1 day old

Seeing: Average - 7

Transparency: Excellent - 9

Notes: Mike setup on the pad for astrophotography. Left around

2:00am. Arrived around 8pm. Mike was already setup. Went to work on Herschels, Open Clusters OP and Bright Nebula OP. Temperature dropped upper 30's. Stopped observing at 4:50am. Closed up observatory at 5:15am and headed home at 5:30am.

Highlight was M8. Best to-date observation. Skies were awesome. Logged 58 DSO's. Only one more Herschel to go

(NGC 7024 - OpenCL). Excellent evening at WRO.

Observation Date: May 05, 2021

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 4:30am

Seeing: Average - 6

Transparency: Good - 8 (excellent after 2am)

Notes: Arrived at the observatory at 7:00pm. A group of Mlay's family

from Texas and North Carolina were in town for a visti to WRO. RAS members were on hand for Astronomy presentations in the Education Building. Afterwards, they were treated to NGC4565 through the 36" WRO telescope. At 11pm, after they left, I got busy with the Herschel 2500 list. I started the evening with 71 Herschels to go, at the end of the observing session I have only

15 left (mostly in Bootes). The real work of getting all the

Herschels out of Virgo and Coma Berenices is completed. One more clear evening over the next 2-3 months is all I need to finish the 2500 list. Besides some awesome face on spirals in Vergo, the hightlight of the night was M10 and M12 under aswsome sky conditions. The deep, patchy granular background glow of both

globular's nuclei was spectacular. This was the best

observation of these objects to date. The temperature dropped to around 34 degrees. Stopped observing at 3:30am after logging 81 DSO's. At 4:30am WRO was closed up and I was on my way to Bellville for Turkey hunting. A most excellent night at

the observatory.

Observation Date: Apr 02, 2021

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Rise 2:05am

Seeing: 7 - average

*Transparency:* 7-8 At times, very good

Notes: Arrived 9:30pm. Had to stop at my brothers on the way down for

gas money to get home. Temperature dropped to low 20's. Very cold, perhaps the coldest till this coming winter. Worked on Cancer NGC/IC's and Herschel 2500 objects. Getting very close to completing both observing projects. Stopped observing at 2:15am. Logged 63 DSO's. Observatory closed up at 2:50am.

**Excellent night at the observatory.** 

Observation Date: Mar 09, 2021

Location: Hidden Hollow - RAS
Observers: Mike R. and myself

Moon Phase: 26 Days Old (16%)

Seeing: 6-7 Above average

Transparency: 9 - Excellent

Notes: Sixth night observing in the past 7 nights and this night was the

best of them all. Arrived at 9pm. Mike was setup in the attic doing astrophotos. He managed to hang out till around 3:30am. Started off observing Cancer NGC/IC objects. Only about 30 objects to go to complete all the NGC/IC in Cancer. Around 11pm turned my attention to Herschel's. Observed Herschel's till

5:00am in the morning. Logged in 125 DSO's, about 90

Herschel's. Temperature mid to upper 30's. This was the best night observing todate in 2021. Closed up observatory at 5:30am

and was on my way home.

Observation Date: Mar 07, 2021

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: 24 days old (34%)

Seeing: 4 - prior to 10pm, 8 after 1:30am

Transparency: 6 - prior to 10pm, 9 after 1:30am

Notes: Fifth night observing in a row, and this night will be the best so

far this year. Arrived at 5pm to wash the 36" mirror and clean the RA/DEC worm gear drives. This evening was a tail of two nights. Prior to 10pm, very thin light clouds would move in and out. Until 10pm when the sky completely clouded up. Watching the radar, a large clearing was coming around 1am. At 1:30am the sky was very clear and transparent (almost excellent). The temperature dropped into the mid teens. Very cold and frosty. Between 10pm and 1:30am, I spent some time taking naps in the clubhouse. During the first half of the evening, I observed NGC and IC in Cancer. After 1:30am, I got busy tracking down Herschel's. At 4:40am I stopped observing. Moonrise was at 4:36am. When all said and done, 104 DSO's were logged. Observatory closed up at 5:10am and headed home. Excellent

black head covering at the eyepiece was again extremely

evening at WRO and the scope performed extremely well. The

beneficial.

Observation Date: Mar 06, 2021

Location: Hidden Hollow - RAS

Observers: RAS Club Meeting

Moon Phase: 23 Days Old (45%)

Seeing: 7-8 Above Average

Transparency: 7-8 Above Average

Notes: Forth of 5 nights in a row! Patchy clouds around sunset.

Cleared very well till around 10pm then the sky just socked in. Forecast was for clear and transparent all night! Temperature in the mid 20'. Managed to log 3 DSO's. Closed up observatory at

12 midnight and headed home.

Observation Date: Mar 05, 2021

Location: Hidden Hollow - RAS
Observers: Mike R and myself

Moon Phase: 22 Days Old (56%)

Seeing: 7 - Above Average

Transparency: 7 - Above Average (got better after midnight)

Notes: Third of 5 nights in a row! Mike was setup for astrophotography

using the heated attic as his command post. Very clever setup. Observed AL Bright Nebula Observing Program objects and Herschel 2500. Used a Ultra High Contract filter for testing on various objects. It helped for bright objects by knocking down background sky glow, but for faint galaxies, it would lower the limiting magnitude .5 to 1. It seamed to work best on lower power eyepieces with larger apparent field of views. Stopped observing at 2:10am. Moonrise was 2:15am. Logged 56 DSO's. Telescope and use of the black observing cover worked very

well. Temperature dropped to the mid to upper 20's.

Observatory was closed up at 3am and I was on my way home.

Mar 04, 2021 Observation Date:

> Location: **Hidden Hollow - RAS**

Observers: Myself

Moon Phase: 20 days old (68%)

> Seeing: 6 - average

Transparency: 7 - above average (cold front came through)

> Notes: Second of 5 nights in a row! Clouds breaking up and cleared up

around 8pm. Winds from north. Temp upper teens - cold and frosty. Worked on AL Bright Nebula objects. Logged 22 DSO's. Stopped observing at 11:30pm. Highlight: NGC 2261 - Hubbles

Variable Nebula. Best to-date observation! Just awesome.

Closed up observatory 12:15 and headed home.

Observation Date: Mar 03, 2021

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: 19 days old (78%)

Seeing: 7

Transparency: 7-8

**Notes:** This turned out to be the first of 5 observing nights in a row.

Finially caught a week of good weather in March!! Worked on AL Open Clusters observing program Temperature dropped to low 30's. Stopped observing at 11pm when it started to cloud up. Logged 22 DSO's. Closed up observatory and on my way home

at 11:45pm. Excellent night at WRO.

Observation Date: Nov 13, 2020

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: 3 Days before New

Seeing: Average - 7

Transparency: Excellent - 10

Notes: Arrived to the observatory at 7:45pm. Worked on and fixed the

handset controller. A wire was cut and needed soldered. It works great now! Mickey called with bad news about cousin Steve. Then Becky called about a UFO landing in the back woods. It was actually a fire ball seen by many in 3-5 states including Maryland. Had I not been on the phone, I would have had a front row seat!! By now, it is about 10pm and time to start serious observing. Worked on AL Open Clusters and AL Bright Nebula observing programs. Picked up a few Herschel 2500's. I am now 4 months out till the next Herschel 2500 transits at midnight. Logged 41 objects including many drawings of ALOC

objects. Stopped observing at 4:45am and closed up the observatoy at 5:25am. Temperature dropped to 24 deg. Very cold and heavy frost outside of the dome. Excellent night at

WRO!

Observation Date: Nov 11, 2020

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 3:45am

Seeing: Average - 6

Transparency: Good - 7 at times Great - 9

Notes: Arrived 7:30am. Slight haze in south quickly dissipated aroud

8pm. Continued Herschel 2500. Started AL Open Cluster and AL Bright Nebula observing programs. Observed 8 ALOC and 1 ALBN along with 61 Herschel 2500 objects. Only 230 Herschel 2500 objects to go! Scope performed well but started to have handset issues at 2:30am which was the same time the sky completely clouded out in minutes. Closed up observatory at

3:00am. Very cold and frosty. Temperature low 30's.

Observation Date: Sep 19, 2020

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2020. Many guests.

Moon Phase: 1 day old

Seeing: Great to Excellent (8-10)

Transparency: Excellent 10

Notes: Hidden Hollow 2020. Second great night in a row. We had a

good turn out despite the Covid-19 thing. Crowd not a big as in the past, but a lot of guest attended. Lots of tents and RV's. Cold front came through earlier in the afternoon. Sky dark blue during the day. Hightlights shown to guests included M57, M27, NGC 7006, NGC 7009, M15, Stephans Quintet, NGC 7331 and the Vail Nebula. Seeing about an 8 up till midnight, then excellent after that. No problem with galaxies down in Fornax. Started working on the Herschel 2500 objects around midnight when most of the attendees went there way. Observed and logged 70 Herschel's. Stopped observing around 3:45am and started to close up the observatory. Around 4:15am was on my way home. Termperature dropped to about 38 degrees. It was cold and frosty. The weather at this years HH2020 was excellent and so

was my night at WRO.

Observation Date: Mar 25, 2020

Location: Hidden Hollow - RAS

Observers: Myself. Mike R. was setup outside on the pad and camped out in

the attic with heater.

Moon Phase: 1 day Old

Seeing: Average - Good 7-8

Transparency: Very Good 8. Thin Clouds around 2:15am

Notes: Observed the Moon at 8:454pm. It was less than one day old.

Also, observed comet c/2019Y4. It was in UMa and was very bright (about 5-6th mag). In the 31mm, VB,VL,Oval,Suddendly VBM,Lg Diff coma around a VS Brt core. Over 20min of time, movement was detected agmonst the background stars. Arrived at the observatory around 7:30. Mike was setting up his scope. Perform minor maintenance on the 36". The sky was very clear and transparency great. After the moon and c/2019Y4 I started in on the Herschel 2500 Observing List. The majority of these

Herschel's are just outstanding objects. The highlight of the

evening was the galaxies

N4098,N4095,N4091,N4089,N4093,N4092. All 6 of these were in the same FOV using the 17MM Type 4 Televue. This is the best FOV of galaxies I have seen to date. I had 11 galaxies in the same 17mm FOV before, but they were much fainter (PGC's, MAC's,etc). Stopped observing at 2:10am when thin clouds started rolling in. Waited another hour for the skies to clear, but didn't. Closed up observatory at 3:30am and headed home. Temperature low 40's, mild and a slight breeze. Logged 74 Herschels. Excellent night at WRO and the second for this March's new moon. A rare occurance indeed.

Observation Date: Mar 21, 2020

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New

Seeing: Good - 8 Front came through around 11pm

Transparency: Good then Excellent 2-6am

Notes: Arrived around 8:30pm. Forecast called for clearing around 9pm.

Sky stayed socked in till 11pm when it began to break up. My midnight, sky was very good and by 2am it was excellent. Heavy dewing, frost and temperature dropped to 20 degrees. In the morning, Possum Run Road recorded 18 degrees. My Monister Energy drink froze in the lift. Had to warm up toes around 3am. Worked on the Herschel 2500. Observed some amazing DSO's as most of my observations were close to zenith. Logged 94 DSO's. Excellent night at WRO and probable one of the best I have had in years. Stopped observing at 6:20am. Closed up

observatory at 6:40am.

Observation Date: Feb 22, 2020

Location: Hidden Hollow - RAS

Observers: Mike R, Bruce and John were already setup on the observing

pad. 3 guests arrived thinking it was public night. Will return for

public night.

Moon Phase: New Moon

Seeing: Average - 6 At times good - 8

Transparency: Good - 8 At times very good - 9

Notes: Arrived 7pm. Members were already setup on the pad. Uninvited

guests showed up, but will return for public night and join club. Finished my 6" redo observing list. Continued Herschel 2500 observations. Temp dropped low 20's. Between midnight and 2am, thin clouds rolled in, otherwise it was clear and cold. Stopped observing around 5:15am. On road home at 6am.

Logged 134 objects. Excellent night at observatory - second in a

row.

Observation Date: Feb 21, 2020

Location: Hidden Hollow - RAS

Observers: Kim, Ron and John N.(left around 10pm).

Moon Phase: 1 Day before New

Seeing: 8-9 Great. Around 1am Excellent

Transparency: 9 - Excellent

Notes: Arrived 4:30pm to setup 36" for a full night of observing.

Completed a few of the remaining AL Globular Cluster Observing

Program objects including a Challenge sketch of Pal 1 GC.
Performed the Herschel Hustle Observing challange logging all
74 objects. Kim managed to perform a quick sketch of each as

well.....impressive. After little over 3 hours of non-stop

observing, the last 2 objects were 2 hours in RA away before they reached the merdian. William Herschel must have taken a

nap before continuing his quest. Logged 94 DSO's.

Temperature dropped ~ 25 degrees. Slight breeze, very clear and

cold. Excellent night at WRO, first this decade. Closed up

observatory at 6am, on my way home 6:30am.

Observation Date: Sep 26, 2019

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2019 Convention.

Moon Phase: 2 days before new

Seeing: 9

Transparency: 10 - Excellent

Notes: Many RAS members setup on grounds. Worked on AL Globular

Clusters observing program including many of the G globulars in M31. Only 5 more ALGCOP objects to go. Temperature in the upper 40's. A front came through earlier int the evening. Logged 26 objects. Highlight was the Veal Nebula NGC 6960 Supernova Remnant. All of the remnant patches shown in Megastar were observed. All who observed the Veal were totally amazed. I rate the Veal SNR one of the top 5 objects to observe with the 36" and

OIII filter. Closed up observatory at 2:20am.

Observation Date: Aug 03, 2019

Location: Hidden Hollow - RAS

Observers: Many RAS club members. Public Night ~ 120 guests.

Moon Phase: 2 Days Old

Seeing: 10

Transparency: 10

Notes: Public Night. Keep busy sending guests to the eyepiece of the

36" till midnight. Observed 2 AL Globular Cluster objects low in SGR. The remaining ALGC objects will not be observable until 5am. Will have to wait 2-3 months until I complete this observing

program. Closed up observatory at 3am. Tim stayed and

crashed in the education building.

Observation Date: Jul 01, 2019

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New Moon

Seeing: 9

Transparency: 8

Notes: Arrived ~ 10:30pm. Some light clouds off and on. Southern

horizon excellent. Observed GC 5 degrees altitude in CrA. Temp

dropped into low 70's, Worked on AL Globular Cluster

Observing Program. Logged 47 DSO's. Stopped at 3:30am. Will need one more good night to complete the AL GCOP. Closed up observatory and on my way home at 4:00am. Excellent night at

WRO.

Observation Date: Jun 28, 2019

Location: Hidden Hollow - RAS

Observers: Les and John N. John left ~1:00am. Les crashed in Education

Building.

Moon Phase: 2 days before new

Seeing: 7-8

Transparency: 8 (9 at times)

Notes: Waitied till 11:00pm to start observing till nearby storms and

clouds moved out of the area. Temp low 70's after upper 80's during the day. Stopped observing at 3:30am when thin clouds started rolling in. Worked on AL Globular Cluster Program. Closed up observatory at 3:50am, on way home at 4:00am.

Logged 42 DSO's. Good night at WRO.

Observation Date: Jun 25, 2019

Location: Hidden Hollow - RAS

Observers: Mike R, Bob V

Moon Phase: Around 3am

Seeing: 7

Transparency: 7 Some thin clouds came through

Notes: Worked on AL Globular Cluster Observational List. Logged 18

DSO's. Finished AL Messier Binocular List observing 31

Messiers. Temp dropped to upper 60's. Closed up observatory

at 3:30am.

Observation Date: Feb 09, 2019

Location: Hinckley OH (Home)

Observers: Myself

Moon Phase: 5 Day Old

Seeing: Good - 7

Transparency: Good - 7 Some thin light clouds

Notes: Cold. Temp 18 degrees. High pressure in control but moving

out. Light thin clouds and a very faint haze around the moon. Worked on the Binocular Messier Program. Observed first 10 Messiers on the Messier Marathon Search order. 30 Messiers to go which are the last 30 in the search order. Used my Leupold

10X42 BX-2 Acadia binoculars. At 8:30pm finished up and

headed into the house to warm up.

Observation Date: Nov 03, 2018

Location: Hidden Hollow - RAS

Observers: RAS Meeting and Guest Night. Large member turnout.

Moon Phase: 4 days before New

Seeing: Very good at sunset. Thin clouds at times. 7 around midnight.

Transparency: Average - 7

Notes: In addition to public night, a large150-200 students and parents

from Lexington HS Science class showed up.Temperature mid 50's dropped to low 40's at midnight. Given the large crowd, only M15 and Mars were shown through big blue. Many club telescopes presented dozens of DSO's to the public. Finished the AL Double Star Observing Club after the public have left. Stopped at 12:10am and had the observatory closed up at

12:25am. Good night at RAS.

Observation Date: Jun 16, 2018

Location: Hidden Hollow - RAS

Observers: Several RAS members and a large group from the Spanish

Immersion School (parents with their kids).

Moon Phase: 2 day old Moon

Seeing: Average - 7

Transparency: Average - 7

Notes: Storms in the area to the South West. Light cloud cover a start

of darkness. Gradually cleared as the evening rolled along. Showed the Spanish Immersion School group (around 50-60 guests) Jupiter in the 36". Light clouds did not matter.... All visitors were gone around 12:30am. Around midnight, sky was completely clear. Seeing and Transparency was an 8 around 2-3am. Worked on AL Double Star program. Logged 23 AL Double Stars. Mike R. stayed till 3am taking photos on the observing pad. Stopped observing at 4:55am. Closed up observatory and was on my way home around 5:30am. Temperature mid 60's,

high humidity. Great night observing at RAS.

Observation Date: Mar 17, 2018

Location: Hidden Hollow - RAS
Observers: Ruth, Randy and Friend

Moon Phase: New Moon

Seeing: 8 early then 10 by morning. Excellent.

Transparency: 8 - Good. Front just moved through. Improved throughout the

Notes: night.

First time logging in observations in more than 2 years!! Messier Marathon weekend and this is my second night in a row. Last night clouds came and prevented any serious observations. A small group showed up as well. Today was cloudy all day then it cleared up nicely around 7:30pm. Arrived at observatory around 4pm. Checked on the electrical work, aligned the telrad and finder scope. 36' needs polar-alinement. Randy and company left around 11:30pm. Showed them Messiers, Eskimo and other gems. Got to work observing AL Double Starts, AL Messier Binoculars and DSO objects. Logged 35 double stars, 19 DSO's and 11 Messiers. Temperature dropped to low 20's, frost everywhere. Stopped observing at 6:35am, closed up

observatory at 7:05am. Excellent night of observing at WRO.

Observation Date: Feb 16, 2016

Location: Hidden Hollow - RAS

Observers: Several members of RAS setup scopes after the clubs meeting at

Bob Evans. Showing newer members views through the 36"

Moon Phase: New Moon - 1 day old

Seeing: Above average - 7

Transparency: Good -8 Very light thin haze.

Notes: Members of RAS came down after meeting at Bob Evans.

Temperature about 29 degrees. Sky looked good but seamed to be a very light and thin haze. Seeing and transparancy got better as the night went on. Arrived at 5:30. Showed members Messier object and the Horsehead Nebula. Worked on AL Double Star

program. Recored and logged 23 double stars. Stopped

observing at midnight. Closed up observatory at 12:15am. First

observing session in a while and first for 2016.

Observation Date: Apr 11, 2015

Location: Hidden Hollow - RAS
Observers: Mike R. and Bob K.

Moon Phase: Moonrise 2:30am

Seeing: 8 Good

Transparency: 7 at start, got better after midnight (8)

Notes: Temperature dropped to 35 degrees with little dewing. Started

the AL Globular Cluster list (mostly redo observations) to include

the visual Type Classification (I-XII). Also continued the AL Binocular Messier list using my Leupold 10X42 BX-2 Acadia binoculars and my old AstroCards. Logged 12 more Messiers but did not logg the 13 or so Messier Obects in COM and VIR. The area was just filled with faint fuzzies. Having a great time with the Messiers. Even observed Messiers in Virgo with the 36". Awesome. Stopped observing at 2:00am. Closed up observatory at 2:15am. Observed and logged 29 observations

with the 36". Excellent evening under the stars.

Observation Date: Mar 21, 2015

Location: Hidden Hollow - RAS

Observers: RAS Messier Marathon Night. About 15 members and guests.

Moon Phase: 1 day past New

Seeing: 6

Transparency: 6 Front coming through.

Notes: Started the AL Binocular Observing List. Had a great time with

my old AstroCards sitting in a chair and going throught the Messier Sequence. Used my Leupold 10X42 BX-2 Acadia binoculars. Transparency was not that bad between clouds that came in from time to time. Operated the 36" to show off some Messiers to those in attendance. At 1:00am, got completely

fogged out. Closed up the observatory at 1:20am and was on my

way home at 1:30am. Was able to record 30 Messier

observations.

Observation Date: Aug 23, 2014

Location: Hidden Hollow - RAS
Observers: Hidden Hollow 2014

Moon Phase: 1 Day Before New

Seeing: 6-7 Aveage

Transparency: 6-7 Average

Notes: Hidden Hollow 2014. Second night in a row at the observatory.

Previous evening saw clouds coming and going. High humidity, sky remained bright. Sky much better this evening. No clouds but high humidity. At 4:09am the sky must have reached it's dew point and within 5 minuted completely fogged out. Transparency over head was not bad. Logged 1 DSO in AGC 2593. Observed M57, M27, M15, NGC7331 and the usual galaxy clusters in PEG, AND, etc. Observed the comet C/2014 E2 Jacques in Cassiopeia which was impressive. Large and bright about 7th mag. The nucleus of the comet very bright with a large halo. First comet I

observed where I could easily watch it move against the background stars. Enterained abot 6 HH attendies well into closing time around 4am. At 4:30am was on my way home.

Observation Date: May 31, 2014

Location: Hidden Hollow - RAS

Observers: Brian, Mark, Mike

Moon Phase: 1 Day Old

Seeing: 8

Transparency: 9 - Excellent

Notes: Second night in a row at the observatory. Made adjustments to

RA backlash. Scope not as jerky when reversing RA now. Completed ALFGOC - flat galaxies. Also completed AGC 2247 and AGC 2256 both located in UMi. 81 degrees DEC observing the meridian hour is the only way to go at these high declination

degrees. Logged 85 DSO's including my 12,000th object.

Temperature dropped to mid 60's. Stopped observing at 4:31am. Closed up observatory and on my way to my parents house at 5:00am where I stayed for the second night in a row. Got home

around 1pm. One of the best evenings this year at WRO.

Observation Date: May 30, 2014

Location: Hidden Hollow - RAS

Observers: Mike, John, Brian, Dan

Moon Phase: New Moon

Seeing: 8

Transparency: 9

Notes: Arrived earlier and washed the 36" mirror. Transparency and

seeing got better as the night rolled on. Observed a comet with John's telescope. Worked onALFGOC. Took some time to view M51 and others with those in attendance. Whirlpool galaxy was just awesome. Logged 34 DSO's. Temperature dropped to mid 60's. Stopped observing at 2:30am. Closed up observatory and on my way to my parents at 3:00am. After some house work, I

made it home around 4pm. Excellent evening at WRO.

Observation Date: Apr 26, 2014

Location: Hidden Hollow - RAS

Observers: Mike, Scott and grandson

Moon Phase: 2 days before New

Seeing: 7

Transparency: 7-8 Clouds on and off

Notes: Patchy thin clouds on and off throughout evening. Worked

mainly on ALFGOC - flat galaxies. Stopped observing at

12:15am when sky conditions reached my limit for astronomical recording. Observed other Messier and NGC objects as well. Recorded 3 DSO's. Temp in the 40's. On road home at 12:40am.

Observation Date: Apr 19, 2014

Location: Hidden Hollow - RAS

Observers: Lee, Mark, John K, Mike, Robert

Moon Phase: Moonrise 1:00am

Seeing: Average

Transparency: Great - 9

Notes: Temperature dropped to mid 30's. Arrived early to work on

setting the backlash on the RA drive. Mark had his new 20" setup, awesome telescope. Observed and finished AGC 1314 in UMa. Continued Flat Galaxies. Observed M51, NGC4565, M104

and Mars. M51 was just the best. Mars was also very

impressive. Logged in 36 objects. Stopped observing at 1:30am

when Moon was on the horizon. By 2:00am was on my way

home. Excellent night. Too bad the moon had to rise.

Observation Date: Jan 29, 2014

Location: Hidden Hollow - RAS

Observers: Bob Kocar

Moon Phase: 1 Day before new

Seeing: Average - 7

Transparency: Above average - 7 Got better early AM

Notes: Second Night in a row! Spent the day running down 4 6vDC

batteries for the lift. Batteries Plus had them for \$98/each. Picked up the batteries at 3pm and headed down to the observatory. Bob Kocar showed up and we installed the

batteries in the lift. The lift is once again operational. Continued working on AL's Flat Galaxies and AL's Galaxy Trio's. Started the AL's Double Star program. Picked up miscellaneous DSO's

where ever the scope was pointed because it was a slow

process moving the dome and scope from one section of the sky to another. The cold weather had its effect on the dome and lift. It wasn't until early in the morning that the lift got warmed up but still did not respond as it normally did. Observed the 10.5th magnitude SN in M82. At 2:30am, Bob had enough and headed home. At 4:30am I stopped observing and at 5:00am left for

home. Logged 38 dso's and 4 Double star drawings. The temperature was -5 degrees below zero. A very cold start for the

2014 year.

Observation Date: Jan 28, 2014

> Location: **Hidden Hollow - RAS**

Observers: Myself

Moon Phase: 1-2 days before new

> Seeing: Average - 7

Transparency: Excellent - 9

> Notes: Extreme cold conditions. First opportunity for a couple of clear

> > nights (close to new moon) in months with only one concern sub-zero temperatures. The first observing session of the 2014 year will go down as the evening that could have been. Arrived at the observatory around 7:30-800pm. The temp was -10

degrees. I had to shovel the steps, a path to the attic,

observatory door and storage garage. I'm glad I brought the Jeep, because there was about 10" to 12" of snow everywhere. The club house door lock was dead and I had to break the frozen attic lock loose to get the key to open the door. The shovel saved the day. Once the lights and heater were on, I focused my attention to the telescope. The dome had to be slowly moved back and forth before it could be rotated freely. The slit had to be manually opened a bit before the motor could then take over. After all this, the lift-a-loft batteries were DOA. Even with it

plugged in, the list was dead. So much for observing.

When closing up, I noticed a hissing noise coming from the restroom. The power must have gone off earlier and the pipes frozen. Water was shooting to the ceiling where it ate through the drywall and installation. One big mess. Turned off the water and drained the toilet. The heater was on and working. After 3 hours at the observatory, I was on my home at 11:00pm. The outside temperature was -16 below zero and the skies were

perfect!

Observation Date: Sep 28, 2013

Location: Hidden Hollow - RAS

Observers: Several RAS members. Mark, Mike, Terry, Tim, Robert, Brian,

some Guests

Moon Phase: Moonrise 2am

Seeing: 8-9

Transparency: 8 earlier, 9 from 12-2am, some thin clouds off and on

Notes: Cleaned up attic, garage and observatory earlier. RAS members

had a cook out. RAS clean up day for HH2013. Observed Uranus - bright greenish ball. Observed MAC 0039+0331 very close to Uranus. Uranus was between NGC202 and NGC203. Finished AGC 76. Worked on some flat galaxies and continued PSC NGC/IC objects. Stopped observing at 2:13am when moon started to become noticable. Mike still hanging around. Temp dropped to low 50's. Humidity 78%, light dewing. Logged in 47

DSO's. Closed up observatory at 2:20am.

Observation Date: Sep 27, 2013

Location: Hidden Hollow - RAS

Observers: About 100 Richland County Leadership Group visitors. Several

RAS members with about 10 scopes setup.

Moon Phase: Moonrise 1:40am

Seeing: 8 - Good

Transparency: 9 - Excellent High pressure in place

Notes: Finished getting telescope and observatory cleaned up earlier in

the day for HH2013. Touched up big blue, counter weights finished. Balanced scope and repaired RA worm drive. Worked on PSC NGC/IC objects and started AGC 76. Logged in 37

DSO's. Closed up observatory at 2:00am. Heavy dewing.

Temperature dropped to upper 40's. Mike only RAS member still outside. Excellent night considering a late start due to the large

group there for 36" viewing.

Observation Date: Aug 03, 2013

Location: Hidden Hollow - RAS

Observers: Public Night. Largest of the year. Many members. Bob, Mike,

Steve, Eric still here at 4:30am

Moon Phase: Moonrise 4:30am

Seeing: 8 - Very Good

Transparency: 9 - Excellent from 1:00am till 4:30am

Notes: Largest public night for summer of 2013. Few clouds came and

went early in the night. From 1:00am on the sky was just excellent. Worked on Flat Galaxies. Logged 13 DSO's. Temperature dropped to mid 50's. Showed public many

messiers. Highlight was the 12th mag supernova in M74. Very easy to locate when compared to RealSky in Megastar. Closed

observatory at 4:30am. Excellent evening at WRO.

Observation Date: Mar 08, 2013

Location: Hidden Hollow - RAS

Observers: Messier Marathon 2013. 7 members had scopes setup. Several

guests also arrived.

Moon Phase: New Moon

Seeing: 6

Transparency: 6 - Thin Clouds. Clouded out at 12:30am

Notes: Messier Marathon 2013. Started out with NGC/IC in Hydra.

Logged in 18 dso's in Hydra. Observed 19 Messiers with 36". Temperature fell into the mid 20's. Thin clouds off and on until

12:30 when it completely clouded out.

Observation Date: Feb 09, 2013

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New

Seeing: Average - 7

Transparency: Average - 7

Notes: Transparency was good at times then poor at 2:30am.

Temperature 16 degrees. Thin cloud streaks around early. SW horizion remained cloudy on and off till 2:30am. About 12 Boyscouts camped in tents Friday and Saturday nights - COLD. Showed guests M43, Horsehead, Eskimo Nebula. Worked on Flat Galaxies and 6" redo list. Stopped at 2:30am when sky conditions did not meet my minumium transparancy standard. 28 DSO's logged. Closed observatory up at 2:45am. 2013 off to

a so-so start.

Observation Date: Dec 12, 2012

Location: Hidden Hollow - RAS

Observers: John Neumann, Mark V, Myself

Moon Phase: Moon 1 day old

Seeing: Good

Transparency: Average to Good.

Notes: Twelve, Twelve. A hard date to forget. John & I spent

the evening observing through the 36", Mark on his 24" dob. Continued working on the AL Flat Galaxy Observing List.

Highlight of the evening was the HorseHead Nebula through the HBeta filter and Thors Helmet (NGC 2359) through the Olll filter. Both were just amazing through the 31mm Nagler. John and Mark left around 1:15am. Temperature dropped to the low 20's. At 2:20am I stopped observing and was on my way home around 2:30am. In total, 53 DSO's were logged. Not a bad night at the

obseratory.

Observation Date: Nov 17, 2012

Location: Hidden Hollow - RAS

Observers: New Member Observing Night. Mark, Eric, Bob, Robert, Brian,

Mike and many others.

Moon Phase: Moonset 9:00pm

Seeing: Average - 7

Transparency: Good prior to Midnight. Excellent after Midnight - 9

Notes: Transparency was average for the early part of the night. After

midnight, transparency was excellent. Many telescopes and members (mostly new members) were present along with guests and stray 'public night' visitors. I entertained many on the 36" till around 11:30 when the crowds began to clear out. I turned my attention to DSO's as the transparency began to greatly improve. Finished the AL Additional Galaxy Groups, completed all but 2 ARP's galaxies and finished AGC 407. Started AL Flat Galaxies Observing List and continued AL Galaxy Trio's. I have officially completed the requirements for AL Galaxy Groups and Clusters award. Observed AGC 539 in Orion for a second time. Compare the 36" observations to the 31" for AGC 539. AGC 539 has some very nice FOV's. Stopped observing at 4:50am. Closed up

observatory at 5:10am and headed home. Temperature was in the mid 20's with light dew and frost. Logged in 107 DSO's.

Excellent night at WRO.

Observation Date: Oct 12, 2012

Location: Hidden Hollow - RAS

Observers: John N, John K, Tim, Guests

Moon Phase: Moonrise 5:00am

Seeing: Good - 7-8

Transparency: Excellent - 10

Notes: High Pressure moved in earlier in the day. Calm at evening then

a light breeze after midnight. Southern horizon was excellent. Observed down to 8 degress above horizion. Telescope was horizonal on top of dome wall. Completed AGC119, AGC 147, AGC 539, Hicksons 27,28,29 and added one more Caldwell Object. Highlight was NGC1851 in Col. At 8.8 Deg above horizon, it looked like M15 and it was resolved. Finished the night with the Horse Head Nebula. Best ever to date. Stopped observing at 4:35am and closed up observatory at 5:00am. Light frost on car and temperature was around 29 degrees. 145 DSO's logged. Excellent night of observing, best so far this year and

most likely one of the top 20.

Observation Date: Sep 19, 2012

Location: Hidden Hollow - RAS
Observers: Mike Romine, Mark

Moon Phase: Moonset 9pm

Seeing: 8 - Front Moving Through

Transparency: 8 at start, 10 by morning

Notes: Thin clouds were passing on and off till about 2am. Lght breeze

and no dew. Temp dipped to low 40's, upper 30's. Coldest so far this year. Played around with Lumicon's Deep Sky Filter. It helps on brighter objects by providing darker sky and greater contrast and detail. It does not help finding faint objects. Transparency keep getting better throughout the evening

becoming excellent after 2am. North American Nebula awesome. Could slew and follow complete outline. Same for California Nebula. Highlight was the Crescent Nebula (NGC 6888). Ton's of detail and nicely placed in the 31mm FOV. Finished AL Planetary Club and AGC 151. Worked on Hicksons and AL Galaxy Trio's.

At 5:22am stopped observing. On road home 5:35am. Excellent

evening. Best to date this year. Logged 98 DSO's.

Observation Date: Sep 15, 2012

Location: Hidden Hollow - RAS

Observers: Denise and Phil, RAS Member, Public Night

Moon Phase: New Moon

Seeing: 7 - Front Moving In

Transparency: 8 - Thin Clouds moving through all night

Notes: Sky was very transparent between thin bands of clouds.

Observed the California Nebula with HBeta filter in a 6" f/4.8 David Levy Comet Hunter telescope. Awesome. First sighting of this object. Waited for sky to completely clear but never did. Closed up at 3:30am and headed for home. Saw many Messiers and the 'Blinking" Planetary Nebula for our guests. Logged in 1

**DSO - California Nebula.** 

Observation Date: Sep 14, 2012

Location: Hidden Hollow - RAS

Observers: Mike Romnie, John Neumann, Couple of RAS Club

Members, Becky, Doug Out Group

Moon Phase: 1 Day before New

Seeing: 7 - Average

Transparency: 8 - Thin clouds to south all night.

Notes: Went to KC's for dinner before taking

Tom, Marian, Dick, Derrick, Karen, and Becky to the observatory. Temperature dipped into the low 40's. Very heavy dewing - most I have ever seen here at the observatory. Cold front just moved

through after rain earlier in the day. Completed AGC 347.

Around 4:40am, thin clouds came in from the North. Closed up observatory and headed home around 5:00am. Logged in 98

DSO's. Was a very good night.

Observation Date: Sep 12, 2012

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 4:30am

Seeing: 9

Transparency: 9 - Clouds came in from South 4:20am

Notes: Completed AGC 14 and some Hicksons. Tried scope on west

side of mount - not good. Issues with table and chairs not to mention electrical hookup. Not familiar with that side of observatory in the dark. Temp dropped to mid 50's. Some

dewing. Completed Aqr NGC/IC DSO's. Thin clouds on horizon

burned off shortely after sunset. NGC 6946 in Cep was awesome. Stopped around 4:30am and on road around 5:00am.

Excellent evening. Logged in 75 DSO's. Second night in a row!

Observation Date: Sep 11, 2012

Location: Hidden Hollow - RAS

Observers: Mike Romie and 5 other mew members and guests.

Moon Phase: Moonrise 3:00am

Seeing: 8

Transparency: 8 - very thin clouds stayed to the south

Notes: Temp fell to about 49 degrees. Light dewing. Mike and new

members observing with scopes. Showed everyone Messier objects in Sgr. M17 Swan Nebula awesome with Olll filter. First time seeing the 'Swan' in such fine detail M16 Eagle Nebula was just as impressive. With Olll the 'Eagle' was amazing. It looked like a black Maple Leaf. Was able to log in 66 DSO's. Finished AGC 2593, AGC 4038. AGC 4038 was only 17 degrees above horizon. Stopped observing around 3:00am. On road by 3:30am. First night doing serious observing with the 36" and first time in almost 2 years getting back into DSO's observing. Excellent

night.

Observation Date: Aug 17, 2012

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2012. 100 guests plus club members.

Moon Phase: New Moon

Seeing: Good - 8

Transparency: Excellent - 9 Thin clouds around 4am

Notes: Hidden Hollow 2012. First time using Bigger Blue (36") since

John Neumann last used the 31" on 9/1/2011. The last object observed was PGC66538. On 9/13/2011, the 31" mirror was broken when the secondary mirror fell onto the primary mirror.

Now, I'm glad to note that the WRO Telescope is back in business. Spent most of week prior to HH getting the new scope ready. Mirror installed, scope painted, etc. Dozens of scopes setup and lots of HH goers along with local guests. Some hight thin clouds rolled in around 4am. Observed M57, M27 and many other 'usual' Messiers and Galaxy clusters. Closed up observatory at 5am and slept in tent setup at

observatory. Logged in 2 DSO which were the missing Hickson 99 members that I could not detect using the 31inch. 17.2 and 17.7 mag galaxies. Temperature in the mid 50's. The new 36"

WRO scope performed extremely well.

Observation Date: Oct 09, 2010

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2010. 50-100 campers setup around area. Many

large apature telescopes setup. Many RAS members.

Moon Phase: New Moon

Seeing: Great - 9

Transparency: Good - 8

Notes: Hidden Hollow 2010. Great weekend for observing. Viewed

many Messiers, NGC's, etc. for HH observers. Completed AL Planetary Club observing list and worked on AGC 262. Logged in 30 DSO's. Stopped observing at 5am. Left 5:20am. Temp 50

deg at 5am. Excellent night.

Observation Date: Oct 07, 2010

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2010 - about 10 early arrivals

Moon Phase: New Moon

Seeing: Good - 7

Transparency: Great - 9

Notes: First night of HH2010. High pressure just moved through.

Several RAS members and a handfull of convention early arrivals

setup. Excellent weather is expected for the next few days.

Closed up observatory around 2am. Left at 2:30am. Too tired to

carry on. Logged in 40 DSO's. Worked on AGC's.

Observation Date: Sep 10, 2010

Location: Hidden Hollow - RAS

Observers: RAS Members, Mom, Cindy and the girls, Bob.

Moon Phase: Moonset 8:30pm

Seeing: 7 - Average to Good

Transparency: 8-9 Excellent around 2am

Notes: Breezy, keep dew at bay, Temp around 50 degrees. Observed

the 11,000th object - mac 2338+2655 in AGC 2634. Finished AGC 2634, AGC 2589, AGC 2593. Logged in 29 Objects. Observed many NGC and Messier objects for our guests. Stopped at 2:30am. On my way home at 2:45am. Not a bad evening.

Observation Date: May 14, 2010

Location: Hidden Hollow - RAS

Observers:

Moon Phase: New

Seeing: Average - 7

Transparency: Great - 9 Some thin clouds at start. Very clear until 2am

Notes: This was the first RAS members only HH convention and cook

out (Saturday). About a dozen RAS members staying at HH for

the weekend. After a week of clouds and rain, Friday and

Saturday nights looked good for observing. Friday night turned out to be the only night that was clear. Saturday it clouded up and there was light rain! A storm system remained well south of

Mansfield all nght until about 2am when the clouds from the south covered the skies above WRO. Up until then, it was a very clear and pleasant night. The temperature was in the low 50's. Continued Leo NGC/IC observation list then moved on to Bootes.

Highlight was NGC 4565. Totally awesome. Everyone was having an excellent time. The remote dome control again

worked excellent. Around 2:30am I had the observatory closed up and was on my way home. In total, 69 DSO's were logged.

Observation Date: May 09, 2010

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 3:45am

Seeing: Good - 6

Transparency: Great - 9 Thin clouds at start.

Notes: First night using the remote dome control. What a difference!

Moving the dome from the lift worked perfectly. No more getting out of the lift to rotate the dome. Excellent job Bob!. Cold front moved in earlier in the day. There were thin clouds early in the evening that gave way to very clear and transparent skies. The temperature dropped to 31 degrees and there was a thin frost layer by 3am on the car. Completed AGC 2063 (37 galaxies). 16.5 mag galaxies were fairly easy to locate. Continued NGC/IC in LEO. Stopped observing at 2:45am. Closed up observatory and was on my way home at 3:10am. A very good night at the

observatory. 115 DSO's were logged.

Observation Date: Mar 17, 2010

> Location: **Hidden Hollow - RAS**

Observers: John Neumann (left around 12am), Bob (Messier Marathon), Mark

(left 1am), RAS Member (left 1am).

Moon Phase: Moonset 8:30pm

> Seeing: Excellent - 9

Transparency: **Excellent - 10 High Pressure for second day** 

> Notes: Second night in a row. Happy Birthday Brett!!! St. Patricks Day.

> > Arrived at the observatory early to collimate the 16" Lightbridge. The focuser needs to be adjusted to get correct collimation. Finished AGC 2151. Observed missed galaxies in ARP 60. Worked on Cancer NGC/IC and continued LEO NGC/IC objects. Both consellations had some awesome galaxies. Made a huge dent in AGC 1060 in Hydra (51 DSO's logged). The southern horizon was excellent (16 - 16.5 mag no problem). Observed MEL 25 (Havides) using John's 12" dob and 32mm SWA

> > eyepiece. Only one or two more Caldwells to go. Completed AGC 2052 (26 DSO's). The sky was so transparent I didn't need adverted vision to identify faint galaxies in AGC's. This was perhaps one of the top 10 nights at WRO. No dewing, no breeze

and no frost. Temperature dropped to about 30. Stopped observing at 4:45am. Closed up observatory at 5am. Bob was still Messier Marathoning. 184 DSO's were logged, 366 total in

the last 2 nights. An Excellent evening at the observatory.

Observation Date: Mar 16, 2010

Location: Hidden Hollow - RAS

Observers: Steve (left around 2am), John (left around 12am), Mark (all night)

Moon Phase: New Moon

Seeing: Great - 9

Transparency: Great - 9 After 2am Excellect - 10

Notes: Mark V. did a Messier Marathon bagging 108 Messiers. Earlier in

the evening, I gave Steve a lession in Polar Alignment using the drift method. It has been a long time to have this many RAS members here at the observatory observing during a NON weekend. For the first half of the night, a thin light band of clouds hung around on the SW horizon. After 2am they were gone and the sky got very transparent. There was very little breeze and no dewing at all. A very steady night. Arrived earlier to return the 16" Lightbridge Mirror. Returned home with the upper section seeing that it needs the focuser and secondary aligned before actual collimation can be done. Completed AGC 671 and AGC 1139. Continued work on AGC 2151 missed galaxies. Observed many Astronomical Leagues Additional

Galaxy Groups. Most of these groups were very impressive groups. At 6:23am stopped observing and closed up

observatory at 6:30am. The temperature was about 30 degrees. Mark was still working on the last few Messiers. An excellent

evening logging in 182 DSO's.

Observation Date: Mar 08, 2010

Location: Hidden Hollow - RAS

Observers: John Neumann. Mike and new RAS member Jim. Mike and Jim.

left around 10pm.

Moon Phase: Moonrise 4am

Seeing: Good - 9

Transparency: Excellent - 10 Better than 3/6/2010

Notes: Excellent night. Very transparent. Best so far this year. John

did a Messier Marathon bagging 103 Messiers! Temperature dropped to 27 degrees. There was a light frost and heavy fog during my drive home. Completed AGC 576 by finding those not able to find from 2 nights ago. Also completed AGC 634. There were many hightlights during the evening. Most were Face on

Messier Galaxies. Sprial arms and sprial structure were amazing. Continued Leo NGC/IC observing list and AL

Additional Galaxy Groups. 142 Objects were logged. Stopped observing at 4:02am. Closed up observatory and headed home

around 4:45am. John stayed and continued his Messier

Marathon.

Observation Date: Mar 06, 2010

Location: Hidden Hollow - RAS

Observers: John, Mark, Ron & Kim, Steve, Mike, Bob, Scott and Mike (guest).

Moon Phase: Moon Rise 1:30am

Seeing: Good - 8

Transparency: Excellent - 10

Notes: First observing session for 2010 and what an excellent forecast.

Hight pressure and very transparent skies. Arrived at the

observatory around 2:30 to shovel a path to the club house and the pad. February was a record snow fall for the Mansfield area and there was about 12-14 inches of wet snow on the pad. Help arrived around 5pm and before long, all the snow was removed. Started and AGC 576. Planetary nebula JNER1 (PK164+31.1 in LYN was awsome. Only 8 more planetaries to observe to complete the AL Planetary Observing List. After ABELL 576, worked on Addtiional Galaxy Clusters and 6" redo observation list. Temperature dropped into the low 20's. Moderate dewing. Stopped observing around 1am. Closed up and on my way home

around 1:30am. Excellent start of the 2010 observing season. 72

DSO's logged.

Observation Date: Nov 11, 2009

Location: Hidden Hollow - RAS

Observers: John Neumann, John Knapp, Mark Vandareer

Moon Phase: Moonrise 1:30am

Seeing: Poor - 4

Transparency: Great - 8 High Pressure in control

Notes: First night observing after second ankle surgery. A very cold

and frosty night. Arrived at sunset and the dobs were already setup. For some reason, the transparency wasn't as good as it

should be. Maybe the humidity and poor seeing keep the

transparency from being excellent. I had troubles with 16.5 mag galaxies. Worked on PSC and CET observation list. Completed AGC 407 in PER. John K. was the first to leave around 10:30pm.

At midnight, the 3 remaining of us called it a night. The

temperature was low 30's if not upper 20's. Frost was heavy. Got home around 1:30am. Overall, not a bad nigfht. 66 objects

logged.

Observation Date: Sep 19, 2009

Location: Hidden Hollow - RAS

Observers: RAS Members and Hidden Hollow 2009 Attendees

Moon Phase: New Moon

Seeing: Overall Good - 7 At times a 9

Transparency: Great - 8 Thin clouds on horizon, excellent at times

Notes: Fourth night in a row! Hidden Hollow 2009 continues. Woke up

around 11am (sleep in the lodge). Worked on finishing John

Neumann's PC setup of his Astronomical Observations
Database. Took a nap from 5pm to 6pm and again at 2am to
3am. Spent the first half of the night showing the public
M27,M15 and other NGC objects including Stephens Quintet.

Continued AGC 194 in CET, now only a few more to go.

Continued ARPS and Hickson Galaxy Groups. At 4am, clouds rolled in but cleared off nicely at 5am. With a small group still up, turned the 31" to M42, Horsehead Nebula, Eskimo nebula, M1 and Mars. Closed up observatory at 6:30am. Temperature in the

low 40's with heavy dewing. In total, 34 DSO's were logged

bringing the 4 day total to 402 DSO's. Around 7am headed to the

lodge to sleep. Woke up around 11am and headed home.

**Excellent night of observing and a very excellent Hidden Hollow** 

2009.

Observation Date: Sep 18, 2009

Location: Hidden Hollow - RAS

Observers: RAS Members and Hidden Hollow 2009 Attendees

Moon Phase: New Moon

Seeing: Good - 9

Transparency: Great - 9 Excellent 4-5am

Notes: Three in a row! Hidden Hollow 2009 in full swing. Many

telescopes, campers and tents setup on the grounds outside the dome. Arrived earlier to replace the 31" focuser. Spent about 3 plus hours getting the new focuser collimated. I need to return in the future to do a complete collimation of the 31" scope. After the majority of the HH2009 attendees got their fill of the usual Messiers and bright NGC's etc., I settled down continuing ARP, Hickson Galaxy Groups. Started AGC 194 and completed AGC 3744. PSC and CET constellations continue to impress with their vast display of very nice galaxy groups and clusters. At 5am the 31" turned towards Orion's M42 and the Horsehead. For those who were still up, the views were just awesome. At 6:30am, I began closing up the observatory. The temperature was in the upper 40's and heavy dewing outside. At 6:50am I headed to the lodge where I will be sleeping for the next 4 hours. In total, 77 DSO's were logged. As it turned out, this was 3 of 4 nights in a row where a total of 402 DSO's were logged. An excellent night at WRO.

Observation Date: Sep 17, 2009

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2009 Opening Night. About 20 HH2009 attendees

camped out on the grounds and many RAS members.

Moon Phase: New Moon

Seeing: Good 7-8

Transparency: Great - 9 (excellent around 4-6am)

Notes: Second night in a row. First night of HH2009. Many early bird

attentees already set up on the grounds. High pressure still in control. Continued CET and AQR constellations and ARP, Hickson Galaxy Groups. Continued AGC 3744 in CAP.

Completed AGC 397 in ARI. At 5:50am stopped observations, closed up the observatory and at 6:15am was in the car on my way home. The temperature was 48 degrees with heavy dewing. In total, 140 DSO's were logged. This was the second of four nights in a row. At the end of the 4th night, 402 DSO's were logged. Tonight a major mile stone was reached. For on this

night, the 10,000th observation was logged. That object was

NGC 190 An excellent evening at WRO.

Observation Date: Sep 16, 2009

Location: Hidden Hollow - RAS

Observers: John Knapp (20" Obsession), Roger Reed (new member),

Brother Bob.

Moon Phase: Moonrise 5:00am

Seeing: Average - 5 High Pressure just pushed through.

Transparency: Great - 9

Notes: What a start for Hidden Hollow 2009! A high pressure just

moved through and the forecast calles for clear skies through the weekend. The temperature dropped to about 49 degrees and

by sunrise, there was heavy dewing. The 31" performed extremely well as I continued CEP, AQR, CET constellations. Started AGC 3744 and also made a huge dent in ARP and Hickson Galaxy Groups. Most of the objects observed in CET and ERI were outstanding. At 5am I stopped observing and began to close up the observatory. At 5:20am I was on my way home. In total, 151 DSO's were logged. Temperature was 49 degrees and the skies extremely clear and transparent. It was an excellent night of observing. As it turned out, this was one of

four nights in a row which totaled 402 DSO's logged.

Observation Date: Sep 13, 2009

Location: Hidden Hollow - RAS
Observers: Mark V. and John N.

Moon Phase: Moonrise 2am

Seeing: Average - Good 7

Transparency: Average - 6 (At times 7)

Notes: Tonight was John's first visit with his new 12" Dob. What a nice

scope. Rather than installing encoders, the scope was outfitted with a digital ALT reader and AZ degree circle around the base. Using Megastar, John was able to locate objects with ease by the

Using Megastar, John was able to locate objects with ease by the objects alt and az coordinates then moving the scope to the objects position. This process is no different than using manual RA and DEC setting circles. While John had his scope setup, Mark has his. The sky really never got very transparent. I did manage to continue objects in Cap and Aqr. Capricornus NGC/IC observation list is almost complete. 32 DSO's were logged and at Midnight, the three of us packed up and headed home. At 12:20am the observatory was closed and locked. The temperature was in the low 6t0's with heavy dewing. This

evening marked the low end for recorded observations. Any

worse, no observations would be logged.

Observation Date: Aug 23, 2009

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonset 9:20pm

Seeing: Average - 7

Transparency: Average to Good - 8

Notes: First solo observing attempt since AF (After Fall). Made an

adjustment on the RA worm drive and the scope performed perfectly all night. Transparency at zenith was excellent! Worked on AL Planetaries and CAP observation list. Around 2am clouds moved in. Closed up and was on my way home around 2:40am. Temperature had fallen into the upper 50's. Light rain began falling as I made my way home. In all, 34 DSO's were logged. Only 7 more AL planetaries to go! Not a bad night.

Observation Date: Aug 15, 2009

> **Hidden Hollow - RAS** Location:

Observers: About a dozen of RAS members and their guests. Mark and I

stayed until moonrise which was about 2am.

Moon Phase: Moonrise 2:00am

> Seeing: Good - 8 At times 9

Transparency: Average to good - 7 At times a 9 at zenith

> Notes: This was my first time back observing at WRO since A.F. (After

> > Fall). My goal was to see if I could perform all the necessary startup, shutdown and mighty lift operations alone on crutches and without putting weight on my right foot. I soon had all the

operations figured out and was able to observe without

assistance. The day was hot and humid. The temperature was about 90 degrees with clear skies on tap for tonight. I was first to arrive and was opening up the observatory when Mike, then Mark showed up. Mark setup his Dob and Mike on of the RAS scopes. The transparency varied in the early evening with some very thin clouds coming and going. After the majority of the guests left, I began some serious observing working on the AL's Planetary Nebula observing list. Transparancy was very good at Zenith where I was observing. at. At moonrise, I had logged in 10 DSO's. At 2am, I stopped observing and began closing up the

observatory. At 2:20am I was on my way home. The temperature was in the low 70's. Only 15 more AL Planetary

Nebula to go. Overall, not a bad night.

Observation Date: May 19, 2009

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 3:45am

Seeing: Great - 9

Transparency: Excellent - 10

Notes: Third night in a row!!! Temp in low 40's, low humidity and no

dewing. High pressure still in control. Came close to

completing AGC 2151. Continued AGC 1656 and just before moonrise worked on AL planetary nebula observing list.

Stopped observing at 4am and by 4:15am was on my way home. This was the best ever 3 nights in a row to date. In total, 98

DSO's were logged this evening and 280 DSO's over the 3 nights.

Another excellent evening.

Observation Date: May 18, 2009

Location: Hidden Hollow - RAS

Observers: John Neumann - left 1am

Mark Vandeere - left 2am

Moon Phase: Moonrise 3:25am

Seeing: Great - 9

Transparency: Excellent - 10

Notes: Second night in a row. High pressure in control. Very low

humidity and no Dew. Continued AGC 1656. Finished AGC 2162

and started AGC 2151. Early in the AM before moonrise, continued AL planetary nebula observing list. The plantaries were just awsome. Played around with Messiers and NGC's. NGC 4565 was the best to date. 16.0 to 16.5 magnitude galaxies jumped out of the eyepiece. Temperature dropped into the low 30's. 80 DSO's were logged. At 4:10am, observatory was closed up and I was on my way home. A very excellent night. As it

turned out, tomorrow night (3rd night in a row) would be another

excellent night.

Observation Date: May 17, 2009

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 3:00AM

Seeing: Good - 8

Transparency: Excellent - 10

Notes: Record low temperatures in Cleveland and Mansfield area - 30 -

32 degrees. Low humidity, no dewing. Completed AGC 2147 (61 DSO's). Continued AGC 1656 and AL Planetary Club. Logged in 102 DSO's. 3:30am observatory closed and on my way home. Excellent evening. This turned out to be the first of 3 excellent

observing nights in a row!!!

Observation Date: May 14, 2009

Location: Hidden Hollow - RAS

Observers: Mark Vanderaar and myself

Moon Phase: Moonrise 1:35am

Seeing: Good - 7

Transparency: Excellent - 9

Notes: Rode Beluga to the observatory. Temperature was in the low

70's perfect for a bike ride. A high pressure system is moving through the area and forecast is for very clear and transparent skies. There were some very thin clouds at sunset but they soon moved out of the area. Arriived early to fix the squeeking noise when opening the slit using the mighty lift and WD-40. With good transparency, worked on AGC 1656 and AGC 2147. AGC 1656 held a lot of surprises. Many NGC's and IC with field of views stuffed full of galaxies. I will definitely continue working this Abell Cluster trying to observe the 600 plus galaxies located there. Just before moonrise, observed a few messiers - M13 and M57. Played with the image intensifier on M57. At 2am closed

up and was ready for the ride home around 2:45am. The

temperature outside was in the mid 50's. 73 DSO's were logged.

Observation Date: Apr 17, 2009

Location: Hidden Hollow - RAS

Observers: Eric, Mark, Mike and his grandson, Kacy with girlfriend, Bob

showed up later as well.

Moon Phase: Moonrise 3:30am

Seeing: Great - 9

Transparency: Excellent - 10

Notes: Arrived early and used the laser to collimate the 31" mirror.

Spent most of the time showing NGC and Messier objects to RAS members and guests. Transparency tonight was much better than last night. When I wasn't showing off Messier objects, I was working on Abell Galaxy Cluster 2065. Logged in 33 objects and after moonrise, closed up shop and on my way home at 4:00am.

Temperature was in the upper 30's.

Observation Date: Apr 16, 2009

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: Moonrise 2:30am

Seeing: Good - 8

Transparency: Good 7-8

Notes: Observed comet 2008 T2 Cardinal using the Meade 16"

Lightbridge (VB,PL,LARGE BNUC,VERY BRT NUC WITH HALO,SOMEWHAT ELONG HALO,HISB MIDDLE). Spent the observing time on the 31" observing Abell Galaxy Clusters AGC 1228 and AGC 2065. At moonrise, closed up observatory and on my way home at 3:00am. Temperature then was lin the low 30's.

75 DSO's were logged. Not a bad night.

Observation Date: Mar 20, 2009

Location: Hidden Hollow - RAS

Observers: Tim & Son, John Neumann, Myself. My Brother and a friend

stopped down on the ATV for a while.

Moon Phase: Moonrise 5:20am

Seeing: Good - 8

Transparency: Good - 8.5

Notes: Tonight John performed a Messier Marathon. Had it not been for

the moon and complete cloud cover at 5:30am, he would have observed more. Still, he managed 93 Messier's. I spent some time helping Tim get acquainted to the club's telescopes and giving him some observing pointers. I showed my Brother some Messier's and Saturn. After midnight, I started on Abell and Arp/Hickson galaxy clusters. The temperature dropped to the low 20's and there was heavy frost everywhere. There was a lot of moisture in the atmosphere keeping the transparency from being excellent. At moonrise (5:20am) the sky quickly clouded

over completely. 37 DSO's were logged. At 6am, the

observatory was closed up and on my way home. It wasn't a bad

night of observing.

Observation Date: Mar 17, 2009

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 3:20am

Seeing: Average - 7

Transparency: Good to Excellent - 8-9

Notes: Second night in a row. Arrived on Beluga early to replace

outside light bulbs and to extend the mirror cover posts on the mirror cell. Light haze at start of evening then turned very clear soon after twilight. This was the evening to do Abell Galaxy Clusters. At times during the evening, 17 to 17.5 magnitude galaxies were undetectable. Highlights of the evening was the completion of Abell Galaxy Clusters 569, 779, 999 and 1213. At 3:20am the moon was starting its climb above the horizon. At 3:40am observatory was closed up and I was on Beluga on my way home. Temperature was low 50's and 109 DSO's were

logged.

Observation Date: Mar 16, 2009

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 2:10am

Seeing: Great - 8

Transparency: Excellent - 9

Notes: Arrived early to replace burned out light bulbs in the dome. High

pressure moving through at sunset. Just after sunset, the sky was very clear. Tonight is first light with the newly re-coated 31" mirror and it went to work on Abell Galaxy Cluster 1185. A total

of 60 galaxies down to 17.5 magnitude were observed. I

continued ARP and Hickson Galaxy Clusters observed. The highlight of the evening was the Ring Tail Galaxy. Both lobs with seperation and detail in NGC 4038 was detected. At 2:15am the moon was just above the horizon and at 2:40am the observatory was closed up and I was on my way home. The temperature at that time was in the upper 30's. In total, 97 DSO's were logged including the 9000th object. It was an excellent evening at the

telescope.

Observation Date: Jan 24, 2009

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: 1-2 days before new

Seeing: Average - 6

Transparency: Good at times, Average at times

Notes: Well, the first observing session for the 2009 season was one of

the most interesting. To start of, I got stuck in the snow outside the club house. Had it not been for John showing up later, I don't know if I would have gotten out. Then, John went to unlock the restroom and there we discovered that the water pipe had burst. Water was everywhere including on ourselves. Just to

burst. Water was everywhere including on ourselves. Just to make things even more interesting, the slit on the dome was frozen. I was able to pry the lower section away from the upper section, but the lower section remained frozen to the base of the dome. No observing at low altitudes. After about 2 hours of getting ready to observe, we finally started to observe when clouds rolled in. The sky went to pot around 10pm. Only 4 DSO's were logged. At 10:30pm we called it quits and closed up

the dome. The temperature was 0 degrees. The only good thing to come out of the evening is that we caught the water break. This is probably one of the worst observing sessions to date.

Observation Date: Dec 28, 2008

Location: Hidden Hollow - RAS

Observers: John Knapp and John Neumann

Moon Phase: Moon 2 days old

Seeing: Average 7

Transparency: Good at start. Excellent later in the night - 9

Notes: First observing session in a long time. First time at observatory

since moving into new house. Arrived around sunset. John Knapp had his 14" Dob setup. Clouds moved in and it didn't clear up until 11:00pm. By then, John K. had left. Around

midnight, John N. left but not until he was able to observe a few outstanding objects. Around 5:30am, sky started to fall apart with light clouds returning. Temperature dropped to 25 degrees. Heavy frost and dewing. Horsehead was awesome again using the H-Beta filter. Another highlight was NGC2359 with 2" OIII filter and the 32mm Nagler. What a view! Logged in 61 Objects working the AL Planetary Observing Club list with ARP and Hickson Clusters thrown in. Many of the planetaries were just awesome. Stopped observing at 6:00am. Closed up observatory

and was on my way home at 6:20am. Excellent evening of

observing.

Observation Date: Sep 02, 2008

Location: Hidden Hollow - RAS

Observers: John Boggs & Son

Moon Phase: 1 Day old

Seeing: Average - 7

Transparency: Good - 8

Notes: As the night went on, the skies got better and better. Rode

Beluga and arrived before sunset. My targets for the evening is the AL Planetary Observing List. With one 17mm T4 threaded with an 2" OIII filter and the other with no filter, I went to work observing strictly planetary nebula's. I usually just observe very

faint galaxies with the 31", so observing the finest of the

planetaries all evening was very rewarding. In most cases, the 2" OIII filter improved the visual detail of the object and made it easier to locate. At 3:45am I stopped observing and closed up

the observatory. At 4:10am I was on my way home. The

temperature dropped to 65 degrees and there was little dew. The

valley below was heavy with fog. 35 DSO's were logged including 2 more Caldwell Objects. Excellent night at WRO.

Observation Date: Jul 05, 2008

Location: Hidden Hollow - RAS

Observers: RAS Public Night. Many RAS members and guests. Over 10

telescopes were setup.

Moon Phase: Moon 1 day old

Seeing: Good - 8

Transparency: Great - 9

Notes: A very busy evening at RAS. Rode Beluga to the observatory

arriving around 6pm. Attended the club meeting where I was voted in as the temporay Observatory Director. Temperature dropped to about the mid 60's throughout the evening. I spent most of the evening showing Messier objects to guests and RAS members. Early in the morning (around 3:30am) I started my observing lists only to have the lift-a-loft break down. It wouldn't lower or reverse. At 4:00am I closed up the observatory and

headed home. Only 5 DSO's were logged.

Observation Date: Jun 01, 2008

Location: Hidden Hollow - RAS

Observers: John Neumann and John (20" Obsession owner)

Moon Phase: Moonrise 4:30AM

Seeing: Excellent - 9

Transparency: Excellent - 10

Notes: Best transparent night of the year. Rode Beluga down to

observatory arriving before sunset. 20" obsession and 16"

Lightbridge were set up. The temperature dipped to the low 50's with very little or no dewing. With little sleep the night before, I stayed till 2:00am then closed up the observatory and headed home. It was hard to leave with excellent skies. Logged in 76

DSO's mostly in Serpens. Excellent evening.

Observation Date: May 28, 2008

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: Moonrise 2:15am

Seeing: Good - 8

Transparency: Excellent - 10

Notes: This was probably the best transparent evening to date. Only a

few thin high clouds noticed on the horizon around 2am. Arrived early with John to work on getting the RAS 16" Lightbridge completely configured and setup ready to go. I also washed the 31" mirror. First light with the new 16" was Saturn and M3. While John configured and played with the Argo Navis settings, I

went to work on the 31" observing DSO's in Serpens. Around 1am I knocked off 3 more Caldwell Objects in Scorpius. The

highlight of the evening was NGC 6302 "Bug Nebula" in Scorpius. While only getting 9 degrees above the horizon, the observations with and without the OIII filter were amazing even though the 31" was almost in the horizontal position. With high pressure in place, the temperature dipped to the mid to upper

30's and no dew was detected. Very cold for this time of year. At 2:15am, I closed up the observatory and headed home. Overall,

71 DSO's were logged. Excellent evening.

Observation Date: Apr 26, 2008

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: Will Rise 2:15am

Seeing: Good - 8

Transparency: Great - 9 Then clouded out around 11:45pm

Notes: Arrived to the observatory around 10pm. Rode the Bike and

parked Beluga in the dome. At 11:30pm the skies clouded and by 11:45pm I was on my way home. Short evening of observing but still logged in 19 DSO Hickson Galaxies in Leo. Temperature

was in the 40's.

Observation Date: Apr 09, 2008

Location: Hidden Hollow - RAS

Observers: John Neumann - left around Midnight

Moon Phase: Moonset 11:45pm

Seeing: Good

Transparency: Great - 9 At times Excellent

Notes: Few high thin clouds around at sunset. Thereafter, a very clear

and transparent night. Temperature dropped into the 30's. Half of the observations where logged with a waxing cresent moon lingering in the west. Moon was completely set by Midnight. 3 of 4 nights in a row to start off the 2008 observing season logging a total of 297 objects in the first 3 sessions (109 DSO's logged tonight). Pounded ARP and Hickson galaxy clusters and continued Serpens NGC/IC observing list. Observed all

members of AGC1452. Rode Beluga down arriving just a little before sunset. Tonights clear skies were a complete total surprise fooling even the weather forecasters. At 4:00am I closed up the observatory and spent the next hour in the club house warming up before the frigid ride back home. At 5:00am, left the observatory and headed home. Arrived home around 6am just before I started to get really cold. Excellent night of

observing.

Observation Date: Apr 07, 2008

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moon 1-2 days old

Seeing: Good - 8

Transparency: Good - 9 Some high thin clouds off and on.

Notes: Back to back nights to start off a slow 2008 Observing season.

Temperature dropped to the low 50's. A very pleasant night of observing. High thin clouds were around early evening, but completely gone and very transparent around 1am. At 3am, a front moved in along with clouds. At 3:30AM, the observatory was closed up and I was on my way home. A total of 106 DSO's were logged in. Completed was the Webb Anonymous Galaxies observation list. Continued ARP's and Hicksons in Ursa Major.

An excellent night of observing.

Observation Date: Apr 06, 2008

Location: Hidden Hollow - RAS

Observers: John Neumann - Left around midnight

Moon Phase: New

Seeing: Average - Good

Transparency: 8. At times excellent. Some thin clouds off and on

Notes: High pressure in control but high thin clouds remained. Arrived

at 10pm just as the sky was clearing up. Transparency got better and better reaching excellent around 2am. Temperature dropped to the mid 40's. Stopped observing at 5am when clouds moved in. Was on the road home at 5:30am. Finished the RNGC/IC observing list for Corvus. Continued the Webb, Hickson and ARP observating lists. Logged in 82 DSO's. Not a bad start to

the 2008 Observing season. Finally!!

Observation Date: Oct 13, 2007

Location: Hidden Hollow - RAS
Observers: Hidden Hollow 2007

**RAS Members, Brent Archinal** 

Moon Phase: New Moon

Seeing: Average - 5

Transparency: Good - 7 Got better towards morning.

Notes: Hidden Hollow 2007. More guests than the previous evening and

the temperature was not as cold. Temperature fell to the upper 30's but dew was heavy. I had setup my 12.5" and once the computer problems were ironed out, it performed very well as usual. Between running the 31" and the 12.5" I did manage to get some serious observing done by logging in 21 DSO's. Most of these objects were in Cetus. One of the highlights of the evening was ABELL Galaxy Cluster 426. 10-15 galaxies were seen in one eyepiece FOV. The Saturn nebula was just awsome. At 6am I packed the 12.5" away, closed up the observatory and headed home. This was another excellent year for Hidden

Hollow.

Observation Date: Oct 12, 2007

Location: Hidden Hollow - RAS
Observers: Hidden Hollow 2007

**RAS Members, Brent Archinal** 

Moon Phase: New Moon

Seeing: Average - 6

Transparency: Excellent - 9 Got Better as the Night went on.

Notes: Hidden Hollow 2007. Over 100 plus attented HH07 and

telescopes were plentyfull all over the HH grounds. It was also the coldest night of the year. The temperature dropped to the low 30's and it was the first frosty night of the year. I operated

the 31" telescope showing the guests the usual favorites,

NGC7331,M15, M42, etc. All my eyepieces and Lumicon filters got a lot of action. Early in the AM when the crowds died down, I managed to get some observing of my own in. Worked on Cetus Observation List, Hickson and Abell Cluster 426. 37 objects were logged. Around 5am the transparency was excellent and views of M42 and the Horsehead Nebula were excellent. Around 6am I closed up the observatory and headed home. An excellent

night for the HH2007 attendees.

Observation Date: Sep 12, 2007

Location: Hidden Hollow - RAS

Observers: Ken & Barb (both left around Midnight)

Moon Phase: New Moon

Seeing: Good - 8

Transparency: Excellent - 9 Cold front moved through

Notes: Back to back nights and this night blew last night away. A cold

front has moved through clearing out everything. By 5am in the morning the temperature had dropped to 46 degrees and the dew was heavy. With clear dark skies, galaxies and galaxy clusters were on the memu. The last (missing) object in Pegasus was observed offically bring closure to the NGC/IC Observating list for Pegasus. Over 700 objects have been observed in Pegasus to date. Also completed were Abell Clusters AGC2572 (16 objects) and AGC2666 (37 objects). Observed many Hickson Galaxy Groups in Andromeda and Aries and continued ARP and Web Society Anonymous Galaxies. Continued the NGC/IC

objects in Sagittarius and was able to observe objects 6 degrees above the horizon. Observed Einstein's Cross (PGC69457) with high power but could only detect 4 faint lobs around PGC69457. This object needs to be observed high on the mederian under excellent seeing conditions. All my eyepieces and filters got a good workout this evening. When all is said and done, 104 objects were logged. Stopped observing at 5am and by 5:20am I

was on the road home. Excellent evening.

Observation Date: Sep 11, 2007

Location: Hidden Hollow - RAS

Observers: John Neumann, Ken & Barb.

Moon Phase: New Moon

Seeing: Poor-Average

Transparency: Excellent - 9 When Clouds not present

Notes: Cold front moving over Mansfield. Patchy clouds here and there,

then clear, then cloudy. Observations when clear were excellent. The sky was very dark. Temperature dipped into the 50's. Little or no dew. At 12:30am, clouds were still around so I closed up the observatory and heading home. Only 11 DSO's were logged.

Observation Date: Sep 05, 2007

Location: Hidden Hollow - RAS

Observers: John Neumann, Ken & Barb

Moon Phase: Moonrise 2:30am

Seeing: Good - 7

Transparency: Good - 7

Notes: Beluga's first observing trip to WRO. Stopped observing around

2:40am when the moon was about 10 degrees above the horizon. The sky was clear and dark but the dew never fell out of the sky. The sky had a slight brightness to it all evening limiting the 31" to about 16.5 magnitude. John setup his 8" while Ken & Barb setup their new Meade LS200 10". Once they obtained good star alignment, the goto on the Meade worked very well putting objects in the eyepiece. I finished up the last 2 IC objects in Scutum that I had missed the last time out. The NGC/IC observing list for Scutum is finished. Also completed was one of the most demanding NGC/IC observing lists - Pegasus. What remains is the confirmation/verification of the Non-Existant objects. In addition to Scutum and Pegasus, I continued work on the NGC/IC Observation list in Sagittarius. The observatory was closed up around 3am and the temperature at that time was 65 degrees. A total of 68 DSO's were logged. Not a bad evening.

Observation Date: Aug 13, 2007

Location: Hidden Hollow - RAS

Observers: John Neumann, Ken & his wife.

Moon Phase: New

Seeing: Average 6

Transparency: Average - 6

Notes: I finally ended a 3 month observing dry spell and took what I

could get even though it was not a perfect evening. All forecasts called for an excellent dark sky but the sky got brighter and a few light clouds could be detected on the horizon. The temperature bottomed out around 60 degrees. Given the sky conditions, faint galaxies were out of the question. Instead, I went after open clusters in Scutum. Around 1am, the conditions did not improve so I closed up the observatory and headed home. 10 DSO's were logged and the observing list of Scutum has only 2 more objects

to go. Overall, it was an average night.

Observation Date: May 18, 2007

Location: Hidden Hollow - RAS

Observers: John Neumann - left around Midnight

Moon Phase: 2 days old

Seeing: Good - 8

Transparency: Excellent - 10

Notes: A very transparent night. Temperature dropped to 40 degrees

and the skies remained extremely dark and transparent.
Completed the ARP/Webb Anonymous/Hickson Clusters for Virgo and Hercules. Hickson 62 is a very impressive Galaxy Cluster. At 3:15am I began to shutdown and close up the observatory. At 3:40am I was on the road home. A total of 95 objects were logged. This was one of the best nights so far this

year.

Observation Date: Mar 20, 2007

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: Moon 1 day old

Seeing: Average - 6

Transparency: Excellent at start. Got worse later.

Notes: 3 of 4 nights observing in March! Very transparent and clear

skies all day with a forecast of clouds and rain moving in around 2-3am. Arrived early to the observatory and watch a beautiful sunset with a 1-2 day old moon with Venus close by. The earth shine on the back of the moon was about as bright as I have seen in a long time. The hopes of having an excellent night of transparent dark skies ended at 11pm for the second time in a row. At 11pm, the skies fell apart as thin clouds covered the sky. I closed up the observatory and was on the road by 11:20pm. The temperature was 26 degrees. I did managed to log in 41 DSO's under excellent sky conditions and finished the remaining

2 objects in Monoceros.

Observation Date: Mar 18, 2007

Location: Hidden Hollow - RAS

Observers: Myself only

Moon Phase: New

Seeing: Average - 6

Transparency: Excellent - 9

Notes: Arrived early to finish DSO's in Monoceros before it gets too far

west and sets. The sky was very transparent and dark. Forecast

is calling for cloudy skies around midnight. At 11:00pm the

clouds did arrive and at 11:15pm I was packed up and on my way home. The temperature was 25 degrees when I left. In total, 26 DSO's were observed and logged. The highlight was NGC 2237

with the 32mm 2" Nagler and OIII filter. What a show piece. Finished the NGC/IC objects for Monoceros but after verification

there may be a few left to observe. It was a very good evening.

Observation Date: Mar 17, 2007

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: New

Seeing: Average - 6 or 7

Transparency: Excellent - 10 after 2am.

Notes: Messier Marathon 2007! As usual, clouds most of the day kept

observers at home. Forecast called for clearing after dark as a cold front is working its way through Ohio. Day started off cloudy, then partly cloudy. When I arrived at the observatory, John was already setup attempting a Messier Marathon. A few clouds kept getting in his way and soon he was off observing Herschel objects. As the night wore on, the clouds became fewer and fewer until 2am when it was totally clear and very dark

fewer and fewer until 2am when it was totally clear and very dark. Observing through the clearings did not pose a problem, for it was still very transparent. John and I both stayed till 7:30am. The evening had very little dewing but the temperature hit 17 degrees and it was cold. I took a 30 minute nap around 4am. Observed and logged 110 objects (ironically) but no Messier objects on this 2007 Messier Marathon. Logged the 8,000th object during this observing session. Overall, it was an excellent

evening for observing.

Observation Date: Mar 10, 2007

Location: Hidden Hollow - RAS

Observers: RAS Members, Missy & Kids, Guests, John & Becky

Moon Phase: Moonrise 1:35am

Seeing: Good - 8

Transparency: Excellent - 9 Cold front recently moved through

Notes: First observing session of 2007! January and February offered

no opportunies around new Moon to observe. Very clear and Transparent. Temperature bottomed out around 29 degrees. Very little dewing with a constant light breeze throughout the evening. Many people from Globe were at the observatory for a program given by Tammy and AFY members. From sunset till about 11pm, I operated the 31" providing views of NGC objects and Saturn. After the guests left, I went to work in LEO going

after ARP, Hickson and Webb Anonymous galaxies. At moonrise, 37 DSO's were logged. Around 1:45am the observatory was closed up and I was on the road home.

Observation Date: Dec 19, 2006

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: New

Seeing: Good - Great 9

Transparency: Excellent - 10

Notes: Oh Holy Night! The last observing night of the year was one of

the best. Skies were very dark and transparent. Heavy frost covered the area as the temperature dropped to 24 degrees. TSO jamming on the CD player kept our spirits up all night. During the evening, I completed the Canis Major and Triangulum NGC/IC observing projects. The HorseHead nebula was just awesome in the 31mm Nagler T5 with the Lumicon Olll filter. However, the most spectacular highlight of the evening (and for the year) was NGC 2359 and IC 468. Both these objects are associated together and both are bright nebula. With the 31mm Nagler and Olll filter, these objects are beyond what words can

describe. I have not seen any object to date that is more enhanced by the OIII filter than these two. These objects are in Canis Major and will become a regular show piece whenever the Orion Nebula is targeted for viewing. Around 1:30am, John and I both closed up shop and headed home. In total, 73 DSO's were

logged. See you all next year.

Observation Date: Nov 24, 2006

Location: Hidden Hollow - RAS

Observers: Becky, John Neumann, Ken, Missy & kids

Moon Phase: Moonset 8:15pm

Seeing: Excellent - 9

Transparency: Excellent - 10 Still High Pressure around

**Notes:** Today is Friday, the day after Thanksgiving and the dome is

repaired and the 31" back in operation. Still, I set up the Meade 12.5" to finish the southern observation lists. Unlike the last 2 observing sessions, the temperature only dropped down to upper 30's. There was no dew anywhere. When I arrived at the observatory John was on the 31". I setup the Meade 12.5" without any issues and had it ready to go in about 20 minutes. Polar alignment was good. Around 8:30pm Ken, Missy and 4 children visited the observatory. Between the 31" and the 12.5", they got to see a pretty good show. The highlight was Saturn around 1am when it was still low in the East. Many Messier's and well known NGC's were observed through both the 31" and 12.5". The 6" Discover Dob was setup and the guests had a good time using it. They were even able to find many objects themselves. It showed what a small dob can do over a small department store refractor. Around 1:30am the visitors where tired and on their way home. John left around 2am. Using the Meade 12.5" my goal was to finish up the NGC/IC in Puppis and the Herschel II (400). By 6am, I had logged 72 DSO's completing the observations list for Puppis and Herschel II 400. By 6:30am I was packed up and on my way home. The last few evenings could be the best we get for 2007 and I am sure glad I got to

spend them with the 12.5".

Observation Date: Nov 22, 2006

Location: Hidden Hollow - RAS

Observers: Becky and John (Owner of 20" Obsession)

Moon Phase: Moon Set 6pm

Seeing: Great - 9

Transparency: Excellent - 10

Notes: Tonight is Thanksgiving Eve and is almost an exact duplicate of

the previous night. Very clear and transparent. Heavy frost my 5am. Temperature fell into the mid 20's. The Southern horizon again was very clear. The Meade 12.5" was left setup from the previous evening and ready to go. This time, there were no technical issues. My goal for the evening is to work on the observation lists (NGC/IC) for Lepus, Puppis and Herschel II (400). By the end of the observing session 69 DSO's were logged and the observation list for Lepus was complete. In addition, a mini-Messier marathon was performed (not logged). Around 5am I ended the observing session breaking down the 12.5" and storing it in the dome. The 31" dome is still broken. I sure was an excellent evening observing with the 12.5". At 6am I

was on the way home.

Observation Date: Nov 21, 2006

Location: Hidden Hollow - RAS

Observers: John Neumann - Left around Midnight

Moon Phase: One Day Old

Seeing: Good - 8

Transparency: Excellent - 10 High Pressure Moved in.

Notes: The Dome is in repair and the 31" Scope not usable. This night

(and the next 2 observing sessions to follow) belonged to the Meade 12.5". It has been over a year (HH 2005) since the Meade 12.5" was setup. I ran into several issues setting up the scope. First, I left my Scope Link Interface for the encoders at home. This was overcome by using the encoder interface from the Greer Scope. Then, the laptop computer I normally use keep crashing. I ended up using my work laptop. Finally, the battery in my illuminated reticle was dead. I borrowed John's to do the polar alignment. Arrived at the observatory at 8pm and I was finally polar aligned and ready to go at 11:30pm. The sky was extremely dark and transparent, even all the way to the southern

horizon. My goal was work on the observing lists for the constellations low in the south where the 31" doesn't normally go. Lepus, Canis Major and Puppis were my primary targets. Around 4:30am I left for home leaving my scope setup and ready to go. The forecast is calling for extremely clear skies for the next 4-5 days. The temperature bottomed out in the mid 20's. There was frost everywhere. The observation list for Canis Major was almost completed during the evening as 64 DSO's were

logged in. This was one of the better nights to date in 2007.

Observation Date: Oct 25, 2006

Location: Hidden Hollow - RAS

Observers: John Neumann (left around midnight)

Moon Phase: Moonset 8pm

Seeing: Good - 7

Transparency: Excellent - 9 Very clear and cold

Notes: Arrived at the observatory around 7pm. The sky was beginning

to clear off and the temperature was expected to drop into the

20's. The temperature did drop and the sky became very

transparent. Began the evening in Pegasus where we got tied up in AGC 2589. We managed to observe all the objects in AGC 2589. Soon we were stuck in AGC 2593. After observing 11 galaxies there, we continued going East in Pegasus trying to keep the telescope East of the Meridian. Leaving Pegasus, I went into Triangulum where I spent some time observing all the NGC/IC objects in M33. At the start of the evening, I had only 49 NGC/IC objects to go in Triangulum, after tonight, only a few dozen remain. After a few Hickson Compaq Galaxy Groups and

some Webb/ARP galaxies, I settled into Ursa Major. When it was all over, 136 DSO's were logged and I completed the NGC/IC observing list for Aries. At 5am I closed up the observatory and headed home. The temperature then was 27 degrees and the sky

was very clear and transparent.

Observation Date: Oct 20, 2006

Location: Hidden Hollow - RAS

**Observers:** Brent Archinal, John Neumann, others.

Moon Phase: New Moon

Seeing: Average - 6

Transparency: Average - 6 Thin, patchy clouds off and on all night.

Notes: Hidden Hollow 2006. With rain and clouds for the last several

days, the forecast for this years HH is calling for partical

clearing. Just after sunset, the skies did start to clear. However, with so much moisture around, falling temperatures and dewing was a problem. Still, between the clouds and high overhead, observations of DSO's were not that bad. Many Messier objects were shown to HH guests throughout the evening. In between the random flux of guests, I was able to continue my own observation lists. During the evening, I was able to log in 27 objects. Just before observing the horsehead nebula, the sky took a dump and completely clouded out. The time was 4:30am and the temperature dropped to about 32 degrees. I closed up the observatory and was on the road about 5am. Not a bad

HH2006 considering the weather of late.

Observation Date: Jul 24, 2006

Location: Hidden Hollow - RAS

Observers: John Neumann left around midnight.

Moon Phase: New

Seeing: Good - 8

Transparency: Good - 8

Notes: First time Halley made it to WRO where it was parked in the

observatory while I observed. I didn't have adequate sleep to make it an all-nighter and took a nap around 12:30am for 2 hours before riding Halley back home. The temperature dropped to the

low 60's with little fog atop the hill. In the little time I had, I logged in 18 objects of Webb Anonymous and ARP Peculiar observation lists. Closed up the observatory around 3:30am.

Observation Date: Apr 26, 2006

Location: Hidden Hollow - RAS

Observers: John Neumann and Myself. John left around Midnight

Moon Phase: Moonset about 7:30pm

Seeing: Good - 8

Transparency: Excellent - 9 Very clear and dark all evening

*Notes:* A very good evening. Temperature bottomed out in the low 30's.

The highlight of the evening was comet Schwassmann-

Wachmann 3. In the 31mm Nagler T5 the comet was spectacular. It looked like a classic comet that one usually visions. During the evening, I worked primary on the Herschel 400 (II) and ARP Peculiar Galaxies observing lists. In total, 126 objects were logged. Closed up the observatory around 5:15am and was on the road at 5:30am. This was definitely one of the better nights

here at Warren Rupp Observatory.

Observation Date: Mar 29, 2006

> Location: **Hidden Hollow - RAS**

Observers: John Neumann - left around midnight.

Moon Phase: New - 1 day old

> Seeing: Good - 8

Transparency: Great - 9 The Sky got better as the night went on

> Notes: The forecast for this coming weekend is for rain and like many

> > times in the past, the Messier Marathon will be clouded out. The last observing session, John did a Messier Marathon with his 8" dob. This evening he went after Herschel's. I came determined to do a marathon of my own, but it was not going to be a Messier Marathon. I combined the Herschel 400 (II), ARP Peculiar and

Webb Anonymous observing lists into one sorted by

constellation. I was determined to observe non-stop for 9 hours (8pm till 5am) without taking 'normal' breaks. With observing list in hand, I embarked on a 9 hour non-stop marathon. My main goal was to once and for all break my all time single night observing record of 140 logged objects on March 27, 1981. I have come close in recent years observing 130, 134 and 135 objects but could not break the 140 mark. At 5am when I

stopped observing and began to close up the observatory I have set a new single night observing record. The old record of 140 objects got smashed with the new record of 202 logged objects! The statistics for the evening are amazing. One object was

logged on average every 2.67 minutes. 201 galaxies were observed, 1 planetary nebula. 36 galaxies observed in Abell Galaxy Cluster 2151 in Hercules. 31 MAC's, 74 NGC's, 14 IC's and 83 PGC's (UGC's, MCG's, CGCG's) objects observed and logged. The average magnitude of the objects observed was 14.98. Most of the objects were part of multi-galaxy groups and the most impressive of the evening was Hickson 57. Made up of mostly NGC's this compact galaxy group is awesome in the 31". The Abell Galaxy Cluster 2151 was another impressive galaxy field. Up to 10 galaxies were easily identified in a single FOV. At

5:30am I was on the road. The temperature bottomed out around 30 degrees. The sky remained transparent the entire night. This evening is definitely one for the record book, I doubt I will ever

top the 202 objects set during this observing session.

Observation Date: Mar 26, 2006

Location: Hidden Hollow - RAS

Observers: John Neumann

Moon Phase: 1 Day before New

Seeing: Good - 9

Transparency: Excellent - 10 Got better and better throughout the night

Notes: This was another excellent night of observing, perhaps on of the

top 10. The sky was very dark and transparent. I arrived around 8pm and John was already doing the Messier Marathon with his 8" Dob. I had some unfinished business to take care of on the 31" and by morning, I have completed my tasks. Completed are the observing lists for Circumpolar (801 NGC and IC objects) and Draco (411 objects). I also continued work on the Webb Society Anonymous and the ARP Peculiar galaxies. In total, 131 objects

were logged, just 9 shy of my personal record of 140 on

3/27/1981. Went over the 7,000th logged observation. The ARP Peculiar galaxies are surprisingly very interesting objects to observe due to the various types and shapes of these galaxies. A lot of detail is detected observing these galaxies. At 5:10am, it was time to close up the observatory and head to work. The temperature had dropped to about 24 degrees. At 5:30am John

and I were on the road.

Observation Date: Mar 04, 2006

Location: Hidden Hollow - RAS

Observers: RAS Meeting Night and first public night for 2006. Several RAS

Members were there including: Becky, John N., John B., Joe, Keith, Dave, Tammy and new members from the Columbus area.

Moon Phase: Moonset 12:15am

Seeing: Excellent - 10

Transparency: Excellent - 10 One of the best skies at RAS

Notes: Oh What a Night! With so much activity going on at the

observatory, it is going to be hard to summarize this evening. First and foremost, the 31" telescope blew away our guests. As it turned out, some of the students were themselves amateur astronomers making the view through the telescope even more enjoyable. Never have they seen objects so spectacular. Well before moonset, the views through the 31" were just awesome. The skies were just that good. The Eskimo Nebula with the 12mm Nagler was perhaps the best I had ever seen. Other highlights were M51, M104, ngc4565, ngc2903, M81, M65, M66, M84, M86, Saturn and Jupiter. In the pre-dawn hours using Heidi's 8" dob, we observed comet Pojmansk and Venus. The tail on comet Pojmansk stretched across the 40mm FOV! As the temperature dropped into the upper teens, many found warmth and comfort in the club house. In the early morning hours when the crowd thinned out a little, I continued Draco and the Circumpolar observation lists. Only 6 more objects to go in Draco and about a dozen for Circumpolar. In total, 45 objects were logged. I finished observing around 6am and at 6:30am I

was on the road. What an excellent start to the 2006 Public

Nights.

Observation Date: Feb 23, 2006

Location: Hidden Hollow - RAS

Observers: John Neuman - Left around 2:30am

Moon Phase: Moonrise 5:30am

Seeing: Good -8

Transparency: Excellent - 10

Notes: Tonight's observing was unexpected. Observing 3 of the last 4

nights in February! A cold front came through earlier and it didn't clear off till about 9:30pm. I arrived at the observatory around 10:15pm. John was already here and was observing with the 31". The sky was just about the best I have seen here at WRO in a long time. Very dark and transparent all the way to the horizon. The only complaint was that is was a little breezy. Around 3:30am, a patch of clouds rolled in from the Northwest. Rather than observing through patches in the clouds, I decided to close up shop and at 4:15am I was on the road home. The temperature at that time was 24 degrees. I continued working on the Webb Society Anonymous Galaxies, Circumpolar objects and Draco. I have only 22 more objects to go in Draco and only 33 Circumpolar objects left. The highlight of the evening was Hickson 56A-D. This is an excellent galaxy cluster to observe with the 31". Draco was the other big surprise. Just about every NGC/IC object observed received a 'Good' rating. Most of the objects had High Surface Brightness and stood all alone in their FOV. My only complaint is that I wish I could freeze the night sky in this position for about a year. There are over thousands and thousands of excellent DSO's to observe from the North Pole to the southern horizon at this RA hour. In total, 56 DSO's were

logged under excellent observing conditions.

Observation Date: Feb 21, 2006

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise about 3am

Seeing: Good - 9

Transparency: Good - 9

Notes: Two nights in a row! WOW! And just like the night before,

everything was just perfect till about 11:15pm when all of a sudden, the sky clouded up in minutes. By 11:55pm I had the dome closed up and on the road home. The temperature had dropped to about 24 degrees as I headed out. The night however

was not a bust. For 3 hours the sky was very dark and

transparent, especially to the south. I spent my time working on Webb Society's Anonymous Galaxies and then finished the

NGC/IC observing list for Orion. The Nagler 31mm T5 and Lumicon's H-Beta and Olll filter surely earned their keep for the remaining 20 or so objects in Orion were Emission, Reflection, Bright and Dark nebulas. The highlight of the evening was NGC 2174. Without the Olll filter the object was just a small patch of nebulosity. Using the Olll filter and the entire FOV filled with delicate detail of nebulosity, patches with dark areas that consumed about 2 FOV in the 31mm Nagler. The Horse Head Nebula again was absolutely amazing along with IC 434 (the bright nebula behind the HH). In total, 33 DSO's were logged on

what surely would have been an excellent night of observing.

Observation Date: Feb 20, 2006

Location: Hidden Hollow - RAS

Observers: John Neuman - Left around 10pm

Moon Phase: Moonrise about 2am

Seeing: Good - 8

Transparency: Good - 9

Notes: Tonight was first light for the newely recoated 31" mirror and the

first observing session for the 2006 year. Images through the 31" telescope were amazing. The sky was very transparent and clear all the way down to the Southwest horizon. Around 10:10pm the sky became completely overcast within about 2 minutes. Within minutes, I was closing up shop for the evening. At 11:18pm, the dome was closed up and I was on my way home.

The temperature was about 21 degrees. During the 2 or so hours of prime observing, I was able to log in 21 objects. The observation list for the constellation Lynx was completed. I worked on Webb Society's Anonymous Galaxies then took advantage of the excellent southern sky to go after Dark and Reflection nebula's in Orion. The highlight of the evening was once again the Horsehead Nebula. Using the 2" 31mm Nagler and the 2" H-Beta Lumicon filter, the Horsehead was easily detected. As John put it, "this \$800 view of the Horsehead Nebula is the best ever...". Had the clouds stayed away, this

evening would have been one of the best.

Observation Date: Dec 07, 2005

Location: Hidden Hollow - RAS

**Observers:** John Neuman - Left around Midnight

Moon Phase: Moonset 11:30pm

Seeing: Average - Good

Transparency: Excellent - 9

Notes: I arrived around 11pm to a very cold observatory. John was

already here observing. The sky was very clear and dark as an Artic cold front moved into the region. Orion was just about on the meridian when John decided pack it up. While I was getting my observing lists in order for the evening, I remembered my latest purchase - a 2" Lumicon H-Beta filter and the Horsehead Nebula was right there, high on the meridian. I asked John if he wanted to see the Horsehead before he took off, yes, he sure did. I broke out the 2" 31mm Nagler Type 5 and attached the 2" H-Beta filter. Using Megastar, I slewed the 31" to the correct coordinates and there in the 31mm Nagler was the best viewing of the Horse Head nebula I have ever seen. Absolutely amazing. Even the direction where the Horses head was looking was easily detected. The magnification and the FOV of the 31mm Nagler is the perfect combination for viewing the Horsehead Nebula. Continued observation lists for Lynx and Circumpolar objects. Observed 17 DSO's in ABELL 569. Only a few objects remain in Lynx. Closed up the observatory at 6:30am. The temperture was 2 degrees. In total, 72 DSO's were logged and it

was indeed an excellent evening.

Observation Date: Oct 30, 2005

Location: Hidden Hollow - RAS
Observers: John Neuman & Myself

Moon Phase: Moon rise 4:30am

Seeing: Poor - 5

Transparency: Average to Good - 7

Notes: A cold front is heading this way. Last 24 hours have been

excellent. Very thin clouds kept coming and going for most of

the early evening. Around 10pm skies cleared to good transparency. Around 12 Midnight, cold front moved in and skies clouded. Closed up observatory around 12:15am. The temperature dropped to about 38 degrees with little dewing.

Continued observing in Pegasus, all but finished Aries and started Webb's Society Anonymous Galaxies. Before getting clouded out, logged in 61 DSO's. Got the chance to observe Mars at it's closest approach for the next 16 years. Poor seeing conditions prevented good observing of Mars, but was still able to detect surface markings on the red planet. Observations of Mars back in August 27, 2003 yielded better observations. John

left about 1/2 hour before me. In all, it wasn't that bad of an

evening.

Observation Date: Oct 04, 2005

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: 1 Day past New

Seeing: Good - 8

Transparency: Good earlier, Excellent later. Thin clouds earlier.

Notes: Temperature bottomed out in the mid 50's. A very thin band of

slow moving clouds took their time leaving the area. After midnight, the sky was totally clear and transparent. Sure was nice to relax and do some serious observing on the heals of HH05 and some serious observing indeed was done. Observed all (but one) of the Megastar listed objects in the ABELL galaxy cluster 2572 in Pegasus. Continued the observation lists in Orion, Pegasus, Aries and Aquaruis. In Orion, only about 20 NGC/IC Nebula's remain. In Pegasus, 94 NGC/IC objects remain. In Aries, only 25 remain. 63 objects remain in Aquarius. In total, 135 DSO's were logged which is 5 short of my personal record (140 in 3/27/1981) and one more than last's February's 134. Besides the observing of the objects in ABELL 2572, another highlight was Jonckheere 320 (J 320), a planetary nebula in Orion. This is a very nice planetary that should be easily visible in smaller telescopes. Closed up the observatory around

4:30am. In summary, this was an excellent night to close off the Summer 2005 season and a very successful HH05 just 4 days

ago.

Observation Date: Oct 01, 2005

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2005. Second Night of HH2005. Brent Archinal

again was one of the many including a big surprise visit from

Becky.

Moon Phase: New

Seeing: Good - 9 Got better later in the evening.

Transparency: Excellent - 9.0 Not as good as the previous night, but still

Notes: excellent.

A little warmer tonight. By 6:00AM temperature has bottomed out in the 50's with light dewing. After the normal viewing of some Messiers, NGC7331, Stephan's Quintet, the masses thined out earlier than last night. Probably because they were all tired from the night before. With everyone operating their own telescopes, I got busy in Aqr, Peg and Ori. The highlight of the evening for those still awake, was the viewing of Mars. Much detail was observed on the Red Planet. In addition, Becky got her first crack at operating the Meade 12.5". It wasn't long till she was knocking off NGC's and giving lessons on how to operate the scope using Megastar. With more time on the 31", I was able to log in 53 DSO's. Earlier in the day, work was done on the RA drive system. With braces on the side of the pillow blocks, the RA worm and gear no longer bind. The scope slews and tracks in RA free from binding and motor stalls. Closed up

Hidden Hollow 05 was a resounding success. The weather could

the observatory around 6:00am and headed home to crash.

not have been better.

Observation Date: Sep 30, 2005

Location: Hidden Hollow - RAS

Observers: Hidden Hollow 2005. First Night of HH2005. Among the masses

was Brent Archinal.

Moon Phase: 1 day before New

Seeing: Very Good - 9 Cold front went through yesterday

Transparency: Excellent - 10 Crisp and Clear all night

Notes: This was the first night of HH05 and the weather for tonight and

tomorrow is expected to be very clear. Temperature dropped to 40 degrees with light dewing. The 12.5" was setup outside the dome and left there all weekend. Tried to run both 31" and the 12.5" but was swamped by the large crowd and spent almost the entire evening on the 31". Still managed to give some views of Messiers through the 12.5". Highlight of the evening was

Messiers through the 12.5". Highlight of the evening was NGC7331 and Stephan's Quintet. The 6th galaxy by Stephan's Quintet was also observed. Early in the AM when the crowd thinned out, got busy working on observation lists. Completed the NGC/IC Camelopardus list (103 DSO's total). Continued Peg and Ori observation lists. Logged in 38 DSO's in total by 5:45am then I closed up the observatory around 6:15am. Headed to my parents house to crash and then back to HH05 around noon. It

was an excellent evening.

Observation Date: Sep 27, 2005

Location: Hidden Hollow - RAS

Observers: Joe, John Neuman (left around midnight)

Moon Phase: Moonrise 2:35am

Seeing: Good - 9

Transparency: Excellent - 10 Cold front came through yesterday clearing out

Notes: Hurricane Rita

Came to observatory earlier in the day to continue working on

the 31" and cleaning out the Observatory. Finished the new light

shroud for the 31". Tonight was 'first light' for the newly

recoated mirror and yes it did make a big difference. Used the secondary monitor on the back of the lift for the first time. For observers in the back of the lift, the secondary monitor sure is a

useful tool. The highlight of the evening was NGC7009 (the Saturn Nebula). I have never seen it so good. It was just awesome! Finished all but one (California Nebula) NGC/IC objects in Perseus. Continued Hickson Compact Galaxy

Clusters, Aqr and Peg observation lists. Another item of note: until we get fans on the control box, the control box needs to be opened when the drive controls are in use. There is too much heat generated with the new drive system. The temperature

dropped to 50 degrees and the sky remained very transparent all

night. It was one of the best transparent nights this year. Logged in 77 DSO's. Closed up observatory around 3:10am.

This was an excellent evening of observing.

Observation Date: Sep 04, 2005

Location: Hidden Hollow - RAS

Observers: John Neuman, Becky. John left around 2am.

Moon Phase: Day past new moon

Seeing: Very good - 9

Transparency: Excellent - 10 Beautiful Skies

Notes: Early in the evening, I re-installed the RS232 Bluetooth serial

adapters between the ScopeLink interface and the laptop on the lift-a-loft. We had John's 8" and Greer's 10" scope setup outside the dome. Becky observed with astrocards and found many DSO's including NGC7009 (the Saturn Nebula). Installed the telrad on the Greer scope making it easy to locate guide stars and point the scope accurately. While Becky observed with the 10", I got busy busting Hickson Compact Galaxy Groups. Took advantage of the very clear southern horizon and kept the scope in southern declination most of the night. Continued Aqr and Per early in the AM. Closed up observatory at 4:45am, caught a few hours of sleep then off to the Cleveland National Air Show.

Temperature dropped to 52 degrees. When all said and done,

logged in 67 DSO's. An excellent night of observing.

Observation Date: Sep 03, 2005

Location: Hidden Hollow - RAS

Observers: RAS Meeting and Public Night approx 15-20 guests.

Moon Phase: New Moon

Seeing: Thin clouds off and on

Transparency: Good - 7, thin clouds off and on

Notes: Guest from public night left around 12 midnight. Observed

Messier M27, M15 through holes in clouds. Forecast calling for clear skies. From midnight till 4:30am, took nap's on the lift-aloft waiting for skies to clear off. Never did. Managed to log one

DSO. Temperature dropped to 54 degrees. Closed up

observatory at 4:45am. Off to the Cleveland National Air Show.

Observation Date: Sep 02, 2005

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New Moon

Seeing: Good - 7

Transparency: Excellent - 10 Cold front just moved through

Notes: Showed up earlier in the day to work on the 31". Setup the new

laptop for the 31", the old one bit the dust. Didn't have

documentation for the wireless RS232 so I went 'wired' between the laptop and the 31" encoders. Will get the wireless Bluetooth serial communications re-configured next time down. The temperature dropped to 58 degrees. Observed mainly in Aqr then continued Peg and Per later in the morning. The observing project for Perseus (NGC & IC) could be completed after I verify

unidentified and unkown objects. In all, 73 DSO's were logged in. Closed up observatory at 4:30am, slept 4-5 hours then

headed to the Cleveland National Air Show. An excellent night of

observing.

Observation Date: Jul 29, 2005

Location: Hidden Hollow - RAS

Observers: Joe, Tammy, John, Becky

Moon Phase: MoonRise 1AM

Seeing: Great - 9

Transparency: Excellent - 10

Notes: Very clear and transparent. Observed till moonrise then closed

up shop. Logged in 9 DSO's but observed many Messier objects using the Greer 10" scope. The Greer scope was operated by Becky as she continued to get better and better observing with the 10". The star finder chart was used for the first time with great success. The Greer Scope needs the Telrad mounted to make it easier to point the scope. The 31" as usual performed

very well.

Observation Date: Jul 09, 2005

Location: Hidden Hollow - RAS

Observers: Tammy, Joe, John and Becky

Moon Phase: Moonset 11:20pm

Seeing: Good - 7

Transparency: Good - 8 Got better as the night went on

**Notes:** Setup the Greer 10" for use giving observing lessions to Becky.

Before long, many Messier objects in and along the Milky Way were discovered by Becky. John, Tammy and Joe left around midnight. While on the 31", I was able to log in 12 DSO's before I hit the wall. Yes, I got too tired to observe and saved what little energy I had to make the trip back to Cleveland. I was able to accomplished another observing list goal during the observing

session. Finished all the NGC/IC in Corona Borealis the

Northern Crown. In total, 152 objects in this constellation were

observed. Closed up the observatory around 2:30am.

Observation Date: Apr 04, 2005

Location: Hidden Hollow - RAS

Observers: John Neuman (left around midnight), Jerry Beck (left around

2am)

Moon Phase: Moonrise about 5am

Seeing: Great - 8

Transparency: Great - 8 Some few thin clouds came and went

Notes: Temperature bottomed out about 40 degrees. Continued the

northern circumpolar observing project. Finished Corona Borealis (the northern crown) however, I still need to verify against Digital Sky Survey and investigate unknown objects in Megastar. Highlights of the evening was Jupiter, M3, ngc4565 and M104. Jupiter was just about the best I have ever seen throught the 31". The red spot was the best I have ever seen to date. M3 was a sight to behold. The Nagler 31mm just provided unbelievable impressions. Jerry was totally blown away and commented that "these are the best views through any telescope I have ever seen..". Jerry has observed with many telescopes and even with professional observatory telescopes. NGC 4565 was edge to edge FOV in the 31" Nagler T5. It was just the best I have ever seen. M104 was just as spectular but ngc 4565 still blew it away. In all, it was a spectular evening logging in 108

DSO's. Closed up the observatory around 5am.

Observation Date: Apr 03, 2005

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 4:30am

Seeing: Average - 6

Transparency: Good - 7

Notes: Finally a break in the cloudly weather. Although not the best of

skies, the conditions are fairly good for DSO's. Continued the Northern circumpolar observing list. The 31" and the Nagler 17mm Type 4 just continue to perform outstanding. Observed all the DSO's in ABELL 1783 in CrB. Need to check on possible Super Nova in NGC 5322. Something is just off the nucleus. Logged in 109 DSO's and by 4:30am had the dome closed up and on the road back home. Topped the 6,000th logged observation

tonight. Temperature bottomed out around 35 degrees.

Observation Date: Feb 05, 2005

Location: Hidden Hollow - RAS

Observers: Myself, guests and members of RAS.

Moon Phase: Moonrise 6:20am

Seeing: Excellent at start

Transparency: Excellent at start. Around 5am sky brightened with light haze/fog

Notes: Tomorrow is the Super Bowl and this week surely has been a

Super Observing week. Just when you think you will not see clear skies till April, the Ohio weather has unexpectedly provided us with super opportunities to enjoy moonless skies. The score in this game was 306 DSO's logged this week. Temperature dropped into the 20's. As the night went on, thin clouds lingered on the horizon and around early morning they began passing overhead. Finally around 5am the entire sky was covered with a thin haze. Observing stopped at that time and I closed up the observatory. Took a short power nap and hit the road around 6am. Started the evening with the telescope on the west side of the mount (again) to easily observe in Perseus. With guests and RAS members present, I turned the 31" the typical showcase Messier objects, M42, M43, M78, M1, M3, M65, M66, M86, M84, M81, M82, M51. However, the best of show for the evening was ngc4565. Just absolutely stunning, the best viewing I have ever seen. With the 31mm Nagler, it was almost edge to edge in the FOV! Continued the Perseus observing list, Circumpolar objects and finished Camelopardalis and Ursa Minor NGC and IC objects. The Circumpolar observing list has taken a serious hit over the last week and the end is now in sight. The Lumicon OIII filter again proved its worth on ABELL 4 and other planetary nebula's. When all was said and done, a total of 66 DSO's were logged.

Observation Date: Feb 04, 2005

Location: Hidden Hollow - RAS

Observers: Myself. Bonnie and Mark showed up around 11:30am. Stayed till

early morning hours.

Moon Phase: Moonrise 5:30am

Seeing: Better than Average - 7

Transparency: Excellent - 10

Notes: This was the best night observing I had in a very long time.

Temperature fell into the teens and the sky stayed very clear and dark the entire night. I was well on my way to a new record in logging DSO's (140 back on March 27, 1981) but gave it up to show some of those 'specatular' objects to my guests. Saturn, Jupiter, M81/M82, M3, M97 took the place of PGC's and MAC's but hey, it was worth it. About the only time I get to see the **Messiers and Planets anymore is during Messier Marathon** guests visiting the observatory. With the new Nagler 31mm now in my inventory, each viewing of the Messiers is an entirely new experience. The combination of apature, actual field of view, and magnification of the 31mm Nagler and the 31" telescope is providing the 'Best Ever' views of Messier objects. I am thinking of an all out 31" Messier Marathon this spring. This evening was a first in that I began the observing session with the telescope on the West side of the mount. This made it possible to to observer in Perseus which was just past the meridian. The telescope perform well on the west side, just needed to adjust the RA worm gear and reverse the direction of the DEC encoders. Continued the Perseus observing project, Circumpolar and Camelopardalis project lists. All but one remains in Camelopardalis. Packed up at 5:40am and was on the road at 6am. Finished with 134 objects logged just 6 short of my personal record but keep in mind that I usually don't log Messier objects used for show and tell. In all, a most excellent night of observing.

Observation Date: Feb 01, 2005

Location: Hidden Hollow - RAS

Observers: John Neuman - left around 11pm.

Moon Phase: Moonrise 1:30am

Seeing: Good - 8

Transparency: Excellent - 9

Notes: A very clear and cold (hit 10 degrees) evening that has been long

overdue. Continued Camelopardalis and Northern Objects

observing projects. RA and DEC timing pulley's were loose and both had to be tightened. RA drive system acted up most of the evening. Had to tinker with it several times. Other than that, the 31" was dead-on even at high declination coordinates. Just as moonrise started, the sky deteriated and high thin clouds came in from the north. Stopped observing at 1:35am and was on the road at 2am. Logged in 85 DSO's. Another excellent evening at

WRO.

Observation Date: Jan 30, 2005

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 11:35m

Seeing: Average

Transparency: Good - 8

Notes: At 9pm, the temperature dropped to 18 degrees and must have

hit the dew point. The sky went to full fog in about 20 seconds. Waited till 10pm to see if it was going to clear off. It didn't. Closed up at 10:30pm and headed home. While it was clear, I managed to log 21 DSO's. Continued the Northern Objects list.

The telescope performed very well (as usual).

Observation Date: Dec 15, 2004

> Location: **Hidden Hollow - RAS**

Observers: John Neuman

Moon Phase: Set around 9 pm

> Seeing: Good - 7

Transparency: **Excellent to start, thin clouds around 1am** 

> Notes: Temperature dropped to 18 degrees. Windy and cold outside the

> > dome, warm inside. Set up the 12.5" Meade in the dome while John set his 8" up outside. The 31" is down for some minor machine work on the RA worm drive assembly. The night got off

to a slow start. It was the first time to use my new setup

configuration. There is too many wires hanging around getting in the way. Think I will go back to my original configuration. I still need to simplify some wiring in my observing box. When I finally got busy with Deep Sky Observing, I was able to finish off Taurus and Auriga. This was the first time with my new eyepiece suitecase - a Christmas present opened a little early. When all was said and done, I managed to log 11 DSO's. Around 1:15am, the dome was closed up and I was heading back north. This will be the last observing session for 2004 - the year the 31" came to

life.

Observation Date: Dec 04, 2004

> Location: **Hidden Hollow - RAS**

Observers: John Neuman

Moon Phase: Moonrise 12:40am

> Seeing: Average

Transparency: Good - High thin clouds early then cleared out nicely

> Notes: Temp dropped to about 30. Finished putting on the final touches

> > to the telescope balancing. Telescope drives and wireless serial worked great. John set up his 8" Dob. Observed some NGC's and comet Macholz through the 8". John passed the 600th

> > logged observation. Highlighs for the evening was M42/M43 with the 31mm Nagler Type 5 and Lumicon OIII filter. It was the most

awsome view of the Orion Nebula I have ever seen. Just

unbelievable. M1 with the 31mm Nagler also provided the best view of the Crab I have ever seen. The 31mm Nagler is becoming the 'Messier' eyepiece of choice. Another 'best view ever' was NGC 2392, the Eskimo Nebula viewed with the 17mm Nagler Type 4 and Olll filter. The detail in this nebula was outstanding.

When all said and done, 72 objects were logged. Closed up shop

around 1am.

Observation Date: Dec 03, 2004

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moonrise 11:20pm

Seeing: Poor to Average

Transparency: Average - High thin clouds come and go. Eventually clouded out

Notes: at 10pm

First time back on the 31" in about 2 months. The weather lately has been just horrible. The forecast for the December New Moon sessions is not looking very good either. This was the first night using the RS232 Bluetooth wireless serial connection between the laptop and the ScopeLink encoder interfaces. The wireless setup worked great. No more cables from the scope to the lift. Tried the STI knife edge focuser with the 1.5" extension tube. Was able to get prime focus with about .5 inches to spare. Continued the Pegasus pounding until it has traveled too far West of the meridian to comfortablely observe. In all 24 objects were logged and the observatory was closed up around

10:30pm. The temperature dropped to 24 degrees.

Observation Date: Oct 06, 2004

Location: Hidden Hollow - RAS

Observers: John Neuman

Moon Phase: Rise 2:30am

Seeing: Excellent - 10

Transparency: Excellent - 10 High pressure in control for days now

Notes: Temp dipped to low 40's. Just a perfect night for observing even

though I was tired and didn't get much sleep the night before. The dark and very transparent skies provided the adrenalin I needed to stay awake. Observed some NGC's, Uranus and Neptune in John's 8" telescope. I am just impressed to see what John has done with his homemade 8". His mastery of Megastar

John has done with his homemade 8". His mastery of Megastar is now paying big dividends as he customizes the software to his observing techniques. Locating and identifying faint DSO's right to the edge of the 8" visual limit, is nolonger a chore. Hat's off to John. Continued to pound Pegasus. What began on June 17, 1980 with the first logging of NGC7331 in Pegasus, I now have

over 400 objects observed in the Winged Horse. There remains only about 120 more NGC's and IC's to observe until I complete what I started out to accomplish almost 25 years ago. Two more observing session should wrap it up. The highlight of the evening was Stephan's Quintet. The view of this tight cluster of

galaxies was very impressive. This evening, 81 DSO's were logged and when the moon rose about 2:30, I closed up the observatory and headed to my parents house for a quick few hours of sleep before heading back to Columbus for work at

OSU.

Observation Date: Sep 19, 2004

Location: Hidden Hollow - RAS

Observers: Jerry Beck, John Neuman, Jerry's 2 firends

Moon Phase: Set 10:00pm

Seeing: Excellent - 10

Transparency: Excellent -10

Notes: The best night of this summer to date. Just a remarkable several

days and nights of excellent weather for observing. September has made up for the aweful weather this summer. Temperature dropped to 42 degrees. Not a cloud or a hint of clouds all night. Finished Cassiopeia and Lyra NGC and IC objects. Highlight of the evening was M27 and M15. Both were just amazing. Around 1:30am the electricity and power for all of Hidden Hollow went out. After about an hour of closing the slit on the dome, and before almost getting it completely closed, the electricy came back on. Where is the hand crank for the Dome? The damage was done after that exercise, for I was whipped and lost the observing drive. I have had very little sleep the last couple of days. Packed up and eaded out about 2:30 am leaving the facilities for Jerry and his friend. When all said and done, still

managed to log 20 DSO's.

Observation Date: Sep 18, 2004

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Moon Set 9:30pm

Seeing: Excellent - 10

Transparency: Excellent - 10

Notes: High pressure moved in behind Hurrican Ivan. Sky exceptionally

dark and blue. This is the best night of the summer to date.

Jerry was going to show, but called and couldn't make it. The

next few days look very good for DSO observing. The

temperature dropped to 42 degrees and not a cloud or a hint of a cloud all night. There are many highlights worth mentioning this evening. Finished Lacerta, Cepheus, Andromeda and Cygnus NGC and IC objects. Observed the last listed PGC (73197) and the first listed (PGC 1). Observed the globular Palomar 1. The planetary and reflection nebula's in Cygnus and Cassiopeia are awsome. NGC7538 and IC1747 was excellent. The Lumicon Olll filter got a good workout but it doesnot help much on Emission Nebula's (EN). Logged 75 DSO's and closed up the observatory

at 4:45am.

Observation Date: Sep 11, 2004

Location: Hidden Hollow - RAS

Observers: Jerry Beck came around midnight.

Moon Phase: Rise 4:40am

Seeing: Excellent at times - 8

Transparency: Good to Excellent - 9 Few high thin passing clouds.

Notes: Another excellent evening at WRO. Temperature dropped to the

mid 50's with fog and dewing in low lying areas. The sky was very dark and transparent. The 31" performed as expected - just excellent. Logged in 74 DSO's. Finished the NGC's in Lacerta. Continued work in Andromedia and Cygnus. Used the Lumicon OIII filter on many bright nebula's in Cygnus. Observed some different types of object designations - Kohoutek, Dolidze and Roslund. Highlight of the evening was watching Jerry just about fall out of the mite-lift getting blown away by the performance of

the 31" and the ease of finding DSO's. Closed up the

observatory at 3:30am and headed off to BGSU.

Observation Date: Sep 10, 2004

Location: Hidden Hollow - RAS

Observers: John Neuman stopped down late for a few hours

Moon Phase: Rise 4am

Seeing: Great to Excellent - 9

Transparency: Excellent - 10 High Pressure in control, Dark blue skies.

Notes: First time back to the Observatory in about 2 months. Work has

keep me really busy all summer. From what I have heard and seen, I really didn't miss much anyway. The Ohio weather has been awfull this summer. This night is perhaps the best night of the summer so far. It also the weekend of the BFSP which I

couldn't make, but I pulled out all stops and made it here regardless if it meant little sleep. I finished up observations lists

regardless if it meant little sleep. I finished up observations lists of several constellations that I have been working on for years and in some cases, decades. Vulpecula, Equuleus, Sagitta, Delphinus constellation lists were completed. In the case of Equuleus, all the PGC's observed, some 80 plus galaxies in the smallest constellation. Continued work in Andromeda and

Cygnus. Only a dozen more to go in Andromeda! The temperature dropped to the mid 50's and the sky was just beautiful all night. Logged in 98 objects and closed up the observatory at 4am. This was perhaps the best evening so far

this summer.

Observation Date: Jun 20, 2004

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Couple days past New

Seeing: Average - 6

Transparency: Great - 7 later Excellent - 8

Notes: Oh YEA! Another historical first at WRO. As far as I know,

tonight was the first DSO astrophotograph (15 minute exposure) taken throught the 31". Not talking about doing a snap shot of the moon or planets either! High thin clouds with dark patches of very clear sky gave way to excellent dark skies after midnight. The evening was going to be an astrophotography shoot out, but

The evening was going to be an astrophotography shoot out, but the battery in the illuminated reticle died! I know have 6 batteries in my eyepiece box. The lumicon off-axis guider worked great. Purchasing a CCD/SLR focuser to take the guess work out of focusing through the camera. In addition, hypered Kodak TP2415 film is in the works. Get ready for breath taking DSO photo's from the WRO 31". All was not lost though, for I am not a Sun and/or Moon observer. I'm going after very advanced stuff - Abell Galaxy Cluster 2162. 34 additional galaxies were located by using the old fashioned star hopping technique in this Galaxy Cluster. That's now 53 galaxies located in AGC2162. Started a Lyra constellation mop, yes, all IC and NGC objects and whatever MAC's happen to be in the way. One more evening and I will have this constellation checked off my observing list along with Cepheus where I have only 5 more objects to go. Want a

Cepheus! Temperature dipped to the low 50's. Logged 78 DSO's. Overall, an excellent evening. Closed up shop at 4:30am.

challenging observing list, try all the NGC and IC objects in

Observation Date: Jun 19, 2004

Location: Hidden Hollow - RAS

Observers: John Neuman, John Knapp & Friend, Jerry Beck - came early AM

Moon Phase: 2 days old

Seeing: Average - 6

Transparency: Excellent - 8 Light clouds early then Excellent after Midnight

Notes: Finally a break in the weather. High pressure moving in and the

temperature dropped to low 40's. The 31" performed extremely well. Jerry Beck showed up after midnight. Was completely impressed with the 31". Highlight of the evening was M27 with

the OIII filter. Just unbelievable and right at zenith. Also

checked out M57 and M13. But enough with the boring Messier objects! Went to work on faint DSO's. Completed Ophiuchus and Aquila NGC and IC objects. Speaking of Messier objects, congradulations to John Neuman, he completed all the Messier objects. While sweeping through Crona Borealis, I got side tracked on Abell Galaxy Cluster 2162. Searched out 19 of the 70 or so galaxies there. I plan on coming back to this cluster the next observing session. Closed up the observatory at 4am. This

was a very good night having logged in 48 DSO's.

Observation Date: May 16, 2004

Location: Hidden Hollow - RAS

Observers: John Neuman

Moon Phase: Rise 5am

Seeing: Good - 8

Transparency: Good-Excellent - 9 Very heavy Dewing

Notes: Finally got a break in the weather. Nice high pressure moved in.

John setup the Greer 10", we put it to the test. The coating on the secondary as failed. The coatings are only months old!!! Need to return to Spectrum. The DEC motor needs more work and the RA gear's don't mesh at times. Other than that, Megastar and the Greer scope worked very well. On the other hand, the 31" performed extremely well. It marked the first (of many to come) time I observed in complete comfort. Not leaving the chair

on the lift, I would just lean over the rail and look into the eyepiece. Move the lift a little, lean over and look again. This scope is truely amazing! Astrophotography is just around the corner. The night was extremely heavy in dewing. The most I have ever seen. I had to use the hair drier several times to clear the eyepiece and twice to clear the secondary! The primary mirror on the Greer scope even needed the hair drier. The temperature dropped to the upper 40's. In total, 47 DSO's were logged. I ended the observing session at 5:00am and closed up

the observatory at 5:30am.

Observation Date: Apr 14, 2004

Location: Hidden Hollow - RAS

Observers: Monty, John Neuman (John left around 1am)

Moon Phase: Rise at 5:00am

Seeing: Good - 8

Transparency: Excellent - 10 High pressure overhead.

Notes: This was indeed an excellent evening, from dust to dawn. It also

was a historical first for the Brits came through with flying colors. More on this later. Given a new lease on observing, I decided to put the efforts of Monty and myself to the extreme

test. Having spent the last full moon polar-aligning and

calibrating the optical encoders, it was time to go North with the

AWR controlled beast. Yes, it was time to continue the circumpolar NGC and IC objects, the toughest test for any

equatoral telescope. Following my own advice in my

Circumpolar Observing article, I keep the telescope 1 hour in RA either side of the meridian. Actually, slightly east of the meridian is best. The blue beast is tamed. Over 100 circumpolar objects were logged. In all, 118 DSO's were bagged before the night was over. This truely was a night to remember and a historical first at that. Meanwhile, John Neuman was making history at RAS as

well. To my knowlege, his is the first dobsonian telescope at RAS to have optical encoders working with Argo Navis,

Megastar5 and a Palm computer. And if you ask him what he thinks of his 'techno' gadgets, he will tell you that it has made his observing experiences the best that they could ever be. John has been involved in amateur astronomy for about 6 months.

Other highlights for the night was the finding of Quasar 3C 309.1, and the view of M82. M82 was just remarkable. I have never seen it this good. The temperature bottomed out at 31 degrees

and I don't expect another night as cold as this till next fall/winter. The observatory was closed up at 5:15 am.

Observation Date: Mar 22, 2004

Location: Hidden Hollow - RAS

Observers: Monty, Dave, Goose. Ed and his son dropped in out of the blue

(non-member).

Moon Phase: 2 Days Old

Seeing: Good - 8

Transparency: Excellent - 10

Notes: Temperature dipped to 16 degrees by morning. Continued

Messier Marathon where I left off 3 days ago. Setup the 12.5" on the observing pad and like the previous sessions, the 12.5" and Megastar rocked. The 12mm Nagler T4 again was the eyepiece of choice. In addition to the remaining 39 Messier objects (all but M30), I observed and logged 52 Herschel II objects. The Messier Marathon for 2004 was completed in 2 evenings. The Herschell II list is getting very short. The Greer 10" scope joined the Meade 12.5" on the observing pad. It marked the first time in over 20 years both scopes were once again observing side by side. I gave a Polar Alignment lab for Monty, Dave and Goose. I think they got it, but I will be giving them a final exam soon. The Greer scope was polar aligned and connected to Megastar on the club's laptop. Before you knew it, it was knocking off Messiers like it knew what it was doing. A little slippage in the DEC motor needs attention, but otherwise the Greer scope performed extremely well. It will once again be a familiar sight at RAS star parties. Dave and Goose left around 2am while Monty stayed till dawn when there was no more Messiers to be had. The horizon to the south and south east was very transparent. I was able to observe Messiers through the trees to the southeast. It was an excellent night and well worth the struggle to stay awake the

following day.

Observation Date: Mar 19, 2004

Location: Hidden Hollow - RAS

Observers: Monty, Terry, Dave, John and others from RAS. Bonnie and Mark

stopped down just after sunset.

Moon Phase: New

Seeing: Good - 8

Transparency: Excellent - 9

Notes: This was the Club's first meeting at the clubhouse this year and

also the Messier Marathon night. The sky at sunset was extremely transparent and observing close to the western horizion no problem. Only John and myself setup telescopes to observe Messier objects. By 2am, I was the only one left. By 3am, high clouds came in and ended the Messier Marathon. The 12.5" was setup for the first time this year. It was first light for the new coatings and for my newest eyepiece addition - 12mm Nagler Type 4. What an awsome eyepiece. It could easily

replace my Nagler 9mm T6 as the eyepiece of choice for DSO's on the 12.5". These are tough decisions. Also this evening, the Greer Telescope was returned to the RAS after working on it for 3 months restoring it to mint condition. As usual, the 12.5" performed excellent with Megastar and DSC's. 70 Messier

objects were observed and anther 10 Herschel II objects logged in before the clouds came. All observations were made under excellent sky conditions. In addition to Messier's and

Herschel's, Jupiter and Saturn were also observed. This was an

excellent night of observing.

Observation Date: Feb 25, 2004

Location: Hidden Hollow - RAS

Observers: Monty, John Neuman (Left around Midnight)

Moon Phase: Set Midnight

Seeing: Average

Transparency: Good to Great - 8 (at times excellent)

Notes: I finally got my business taken care of, something I have not

done in a while. At times, the transparency was just awsome. Some high thin clouds came and went. Around 4am they came

back. John had his Dob setup with the optical encoders

installed. We wired him up and gave him an Argo Navis to play with. To my knowledge, this is the first Dob at RAS to have Digital Setting Circles. I'm sure the next time his scope makes it to the observatory, all the bugs and mechnical problems will be worked out. Can't wait to see a Dob under Megastar control.

The trouble light hookup Monty engineered worked perfectly. No more running over extension cords. Highlights of the evening were once again M3 and M51. Both just absolutely amazing. Several NGC's that I have observed for the first were also impressive. Some day I will compile a list of the 'best of the NGC'. I'm sure some IC's will make the list as well. With the moon setting so late, I only was able to log 72 DSO's. All observations were made with no Moon in the sky. Started the Abell Galaxy Cluster AGC 999. This is a small cluster and could easily be finished next night out. Temperature bottomed out at

20 degrees. Closed up observatory around 4am.

Observation Date: Feb 17, 2004

Location: Hidden Hollow - RAS

Observers: Monty

Moon Phase: Rise 5am

Seeing: Good to Excellent - 9

Transparency: Excellent - 10

Notes: Oh what a night..... Best night so far this year. Sky cleared

nicely and the transparency was excellent. Highlights of the evening was planetary nebula in Gemini and bright nebula in Auriga. The new 2" Lumicon O111 filter and the 17mm Nagler T4

proved to be an unbeatable pair. The planetary nebula's Jonckheere 900 and Minkowski 1-7 in Gemini were outstanding. Look out Abell's, here I come. In Auriga, using the filter and eyepiece combination I found sweeping large bright nebula's to be very enjoyable. Area's of nebula patches, clumps, etc. are easily detected. The constellation Gemini is now completely finished. All NGC's and IC's have been observed. Many other constellations are very close to completion as well. The viewing of M94 was another major highlight of the evening. Never have I seen it this amazing. The night ended at 3am with a technical glitch. Other than that, it was an excellent night having tagged another 97 DSO's. Februray is turning out to be an excellent month. Usually we don't get chances like this till April or May (around new moon anyway). The observatory was closed up

around 3:10am.

Observation Date: Feb 15, 2004

Location: Hidden Hollow - RAS

Observers: Monty and Dave (Dave left around 2am)

Moon Phase: Rise 4:30am

Seeing: Average to good - 7

Transparency: Good - 8 (Excellent at times throughout the night)

Notes: A massive artic cold font came pushing through the area

clearing the skies and dropping the temperature to about 2 degrees. This was the best night so far this 2004 observing season. Arrived early to break up ice on the steps and attempted to clear the ice in front of the attic door. No luck there. Monty brought his heater and in about 10 seconds, the club house was warmed up! I'm sure we will be seeing more of this gem for the remainder of the winter nights. The highlight of the evening was

the Horsehead nebula (B33) through a 40mm and H-Beta

Lumicon filter. What an awsome sight! The nebula and shape easily detected. First light with my new Nagler 12mm T4 was also the Horsehead with H-Beta filter. The view wasn't as impressive since the magnification was too high. Next on my dream list is a 2" H-Beta filter. Other great sightings were M65, M66, M3 in the 17mm T4 and the usual M51 which is now burned into my memory. Finished the night with 109 DSO's logged in and closed up the observatory at 5am. This was an excellent

night.

Observation Date: Jan 24, 2004

Location: Hidden Hollow - RAS

Observers: Monty (left approx Midnight), John Neuman (left 2am)

Moon Phase: Set 7:00pm

Seeing: Good - 7

Transparency: Excellent - 9 at start, high thin clouds around 2am on

Notes: Colder then the last observing session. Temp read -2 outsid the

attic door. First time with my new boots. They worked very well never having to warm my toes. Went to close up shop around 3:00am when the clouds finally won over. I spent almost 2 hours trying to get the slit closed. The rope tied to the end to the slit didn't work. Tried the hand crank for the dome, it was NOT the right tool, it didn't fit. After an hour, finally figured out the problem - too much snow on top of the slit making it too heavy to

close. Rotated the dome so the opening of the slit faced West, went outside and used the 8 ft 2x4 to knock off the snow.

Tossed the 2x4 up onto the top of the slit to knock off even more snow. After this exercise, then used the 2x4 to push up the slit

from the outside while the motor tried to close the slit. It worked! Definitely need a tool made (or a good pair of vice grips) to manually close the slit. Before opening the slit, go outside and knock off as much snow as possible. Other than the slit problem, it turned out to be a very good night. Using the hair drier while looking through the eyepiece prevented the eyepiece from foging and improved on the views. When all said and done, logged in 60 DSO's and finished up all the IC's and NGC's in Gemini. Used the Lumicon Olll filter for the first time and was impressed with it's performance. Planetary and bright nebula

were made viewable in cases where they were not otherwise.
Will purchase a 2" Olll for use on 2" Naglers in the future. Finally

closed up the observatory around 5am.

Observation Date: Jan 20, 2004

Location: Hidden Hollow - RAS

Observers: Monty, John Neuman (till midnight)

Moon Phase: New

Seeing: Average to Good - 7

Transparency: Very Good - 9 Some thin high clouds off and on.

Notes: Very Cold. Low 0 degrees. This was the coldest observing night

so far this season. Made the commitment to purchase new boots to combat these cold nights. The 31" and DSC performed extremely well again. Logged in 56 objects mostly in Gemini. This just about does it for the IC and NGC objects in Gemini. Only a few reflection nebula left to observe. The hair drier was needed between each viewing to keep the eyepiece free of fog. Definitely need to look into some sort of heating wire for the Nagler 17mm. Each observing session lasted about 1-1.5 hour with 1/2 hour breaks in the club house needed to get my feet warmed up. The coffee never tasted better. When all said and done, this was a good night. Closed up the observatory around

4:30am.

Observation Date: Dec 26, 2003

Location: Hidden Hollow - RAS

Observers: John Neuman (till 1am), Goose and Dave (till 2am), Monty

Moon Phase: Set 8:30pm

Seeing: Average to good - 8

Transparency: Excellent at start and after 1am

Notes: Excellent night, temp dropped to 19 degrees, very light breeze.

Had troubles with RA encoder wiring for the first hour. Used backup wiring to get everything working. DSC were then very hot and the 31" performed very will. Logged in about 103 objects. Also observed with John Neuman's 8" dob for a while

while he hunted down Messier objects. In the middle of the night, high thin clouds would come and go coming from the Southwest. The views of the Owl (M97) and Whirlpool (M51) through the 31" were just absolutely outstanding. The best I have every seen to date. Also observed Saturn and it was awsome. Goose and Dave were blown away with 31" doing galaxy sweeping while reaching DSO's down to 17th magnitude.

It was an excellent night of observing. Closed up the

observatory around 5:15am.

Observation Date: Dec 20, 2003

> Location: **Hidden Hollow - RAS**

John Neuman (till 8pm), Monty (after 8pm), Dave (after 10pm) Observers:

Moon Phase: Rise 5:30am

> Seeing: Poor - 5

Transparency: Varied from 6-9 Depending on passage of high thin clouds

Notes: This was our first chance to observe in almost 1 month. Very

clear up till 10pm then dodged clouds through out the night. The temperature dropped to 18 degrees. The dome was almost frozen solid which would have ended the night early. John Neuman showed up after reading on the web members would be observing at WRO. He got so excited observing with the 31" he

left early to go home and get his 8" dob out. I'm sure Mr.

Neuman will be a regular at observing sessions this year. During periods of clouds, spent the time getting warm downstairs or working on Monty's 16". Got his tube rotated, tangent arm installed, tube and DEC weights figured out. When the skies cleared, it was a very transparent and dark. The 31" performed nicely. DSC were hot and was able to log in 76 objects. Dave left around midnight while Monty and I stayed till 5am. The cold, a long drive and the newest batch of thin clouds sent us on our way home. This was an overdue night of observing and will surely be the last night of observing this year. When the stats are all compiled for 2003, it will be shown that 2003 turned out to be a very good year looking through a telescope. It will be a challenge to repeat 2003 in 2004. Closed up shop at 5am.

Observation Date: Nov 24, 2003

Location: Hidden Hollow - RAS

Observers: Monty

Moon Phase: New

Seeing: Average

Transparency: Good to Excellent - 8

Notes: First snow/blizzard of the season occured earlier in the day.

High pressure cleared everthing out about 9pm. A few high thin clouds came and went then it cleared off nicely around 1am. Temp dropped to 18 degrees. Spent first part of the evening setting up and playing with Monty's DS-16. A few modifications

and this will be a very nice observing instrument. Tried observing the norhtern objects with the 31" - not possible

without drives on both axis. The scope is just too hard to move

in DEC and RA independently when at high northern DEC

locations. When I finally got down to business, after taking care

of business, logged in 36 DSO's. It was a very good night.

Closed up shop at 5am.

Observation Date: Nov 20, 2003

Location: Hidden Hollow - RAS

Observers: Monty

Moon Phase: Rise 3:10am

Seeing: Average to Poor

Transparency: Average to good. Thin clouds early in the evening.

Notes: Watch what others said was an aurora which was in the southern

and southwestern sky. I thought it was just high thin clouds passing by. They were reddish, pinkish and greenish in color. It was not like any aurora I have ever seen. Still not 100% that is what I was looking at. The seeing and steadyness of the sky deteriated around 2:30 - 3:00am. Bright stars were longer showing defraction spikes but rather roundish balls. Closed up

observatory around 3am. Managed to obtain 77 good observations in various constellations. The sky has really shifted since the last time I observed missing Equuleus which is

now too far west past the meridian. Caught the tail end of

Pegasus and started Andromeda and Taurus. The temp dropped

to 39 - 40 degrees. Overall, it was a good night of observing.

Observation Date: Oct 24, 2003

Location: Hidden Hollow - RAS

Observers: Monty, 6 guests showed up out of the blue around 12.

Moon Phase: New Moon

Seeing: Average - 5

Transparency: Average - 5

Notes: Hi thin clouds were coming an going all night. Clouds got worse

as the night went on. Got clouded out around 1am. Still

managed to observe 14 Galaxies in Equuleus. Did some work on the observatory as Monty replaced the 220 outlets with 220/110 outlets. The 31" performed nicely, Megastar was again awsome. The Nagler 17mm T4 is the eyepiece of choice when using the 31". Put the 12.5" away and brought the optics home to ship out for recoating. I don't think the 12.5" will see the winter skies like it did last winter. The 31" is just too awsome when it comes to observing those faint DSO's. I guess a CCD camera is now the next project to undertake since the new drives for the 31" have already been ordered. Around 2am, packed my stuff and closed

up shop.

Observation Date: Sep 25, 2003

Location: Hidden Hollow - RAS

Observers: Monty, Tammy, Steve and Mr. Knapp. Steve brought his

Obsession 20" f/5. Awesome.

Moon Phase: New Moon

Seeing: Good - 8

Transparency: Excellent - 10

Notes: Just when you think it couldn't get any better, it did. Temp

dipped to 42 degrees. While it was cold and dewy outside, it was comfortable in the dome. Another night using the 31" while the 12.5" sat in the corner. What am I going to do with this scope? The temporary light shroud was put on the 31" and when it was all said and done, over 134 DSO's were observed and logged in. Almost 400 objects now observed with the 31" in the last 2 months. Started a galaxy blitz in Equuleus leaving only 37 objects remaining to observe of the 100 galaxies located there.

PGC 66313 was the main focus there where a possible SuperNovae may have been discovered. I should know the results in a few days. After Equuleus, continued the galaxy sweep in Pegasus. Well over 400 DSO's observed in Pegasus and counting. After Pegasus came Aries where I finished observing all the NGC's in the Ram. The DSC were very hot after another round of adjusting the DEC encoder settings. The 31" performed exceptionally well after I continued adjusting the clutch and the RA worm gear mounting brackets. The Nagler 17mm T4 never left the focuser and will be the eyepiece of choice on the 31". Closed up shop at 4:15am after completing my observing objectives. Still could of had another 2 hours to observe but was perty exhausted handling the scope all night. There was only one other night where I have observed (and logged) more than 134 objects and that was about 15 years ago.

This was definitely the best night on the 31" to date.

Observation Date: Sep 23, 2003

Location: Hidden Hollow - RAS

Observers: Myself and Monty

Moon Phase: Rise 4am

Seeing: Good-Excellent - 8

Transparency: Excellent - 10

Notes: Temp dipped to 43 degrees. This was the coldest night since

last winter/spring season. Arrived early and continued work on the 31". Got the light shroud clipped up and chalk lines marked for sewing. The sky cleared with a deep dark blue high pressure overhead. I knew it was going to be an excellent night and it was. The best observing session to date with the 31" and one of the best skies of the year. Logged in 102 DSO's. Was also first light for the Nagler 17mm Type 4 -- AWSOME. The Ring Nebula was the lucky object and what a sight it was. This is the eyepiece of choice for the 31" (perhaps a 20mm would be perfect) when doing galaxy study. 15th to 16th mag galaxies (for the most part) all had detail easily detected along with easy descriptions of the object's core. Was finding non-PGC's or objects not in Megastar but on Digital Sky Survey photo's. What a rush those are thinking you found a faint comet. Continued working on DEC encoder settings but still need to spend time zeroing in on the setting. While the 31" sang and danced to the light of a trillions trillion suns, my 12.5" sat in the corner weeping. Could it's days be numbered? Thanks Norm! This telescope really is something special and it's possibilities are just now coming into light. Closed up shop around 4am. In just under 2 months of serious observing with the 31", I have logged in 275 DSO's. This evening was the best to date.

Observation Date: Sep 20, 2003

Location: Hidden Hollow - RAS

Observers: Monty, Robert and Windy (came late), Mom, John Boggs and Joe

showed up for a bit.

Moon Phase: Rise 2am

Seeing: Good - 8

Transparency: Excellent - 10

Notes: Temp droped to 48 degrees. Sky very dark and transparent all

night. First light for the new JMI focuser. Came down early afternoon to work on the scope. Squared the focuser to the tube and alligned it through the tube. Collimated 31" with laser and optically. Washed the mirror and worked on the light shroud. This was the best evening ever observing with the 31". Logged on 73 DSO's all in Pegasus. Saw the planetary in M15 for the first time. Observed Mars and noticed the polar cap almost gone. Noticed new features on the surface I haven't seen before.

This turned out to be an excellent evening.

Observation Date: Sep 17, 2003

Location: Hidden Hollow - RAS

Observers: Monty, Tammy, Mom & Dad and their guests

Moon Phase: Rise 11:30pm

Seeing: Average - 6

Transparency: Excellent -9

Notes: For accurate RA drive settings and with a monitor attached to the

drive computer, use the '+' and '-' keys to set the drive rate setting to 38. Came done earlier in the day and worked on the scope with Monty. The ServoCAT drives failed again this my last attempt. Temporary put a light shroud on the 31". The views were excellent. It definitely helped. I set up my 12.5" outside where Tammy, Mom and Dad and their guests were entertained by Tammy while Monty and myself hunted down galaxies on the 31". Argo Navis worked, then didn't work, worked then didn't. It is out as far as using it connected to Megastar. Logged in 30 DSO's mostly in Pegasus The day started out bad, but the night

ended on a good note. Excellent evening.

Observation Date: Aug 30, 2003

Location: Hidden Hollow - RAS

Observers: John, Joe, Mr. Day and some invited guests.

Moon Phase: Set 10pm

Seeing: Average - 5

Transparency: Average to Good - 7. Thin Clouds kept passing through.

Notes: Southern part of the sky remaind mostly cloudy with thin clouds

and a clearing every now and then. The East and North sky stayed clear. Every now and then a thin patch of clouds would

come through. About 2:30am the entire sky clouded up.
Observing wasn't too bad in the clear patches. Meet Mr. Day
from New York. This guy came down on a bus and taxi to

observe. Stayed at Travel Lodge on I71. Besides M27, M15, M71

and Mars, logged in 20 DSO's using exclusively the 31"

telescope. Megastar would not work with Argo Navis. Could not get the connection to work. Star hopped using Megastar instead with great success. Overall, it turned out to be a good night.

Observation Date: Aug 27, 2003

> Location: **Hidden Hollow - RAS**

Observers: Mars night for RAS and invited guests. Cindy, Kacy and Myia,

Mom, Bob, Paul, Gale and Terrie, Kurt & Trica, Tammy, John and

Joe, Monty (came 1am) and many, many more.

Moon Phase: **New Moon** 

> Seeing: Average to Good - 7

Transparency: Excellent - 9

> Notes: Oberved Neptune, Uranus and Mars. Observed many Messiers -

> > M16, M22, M27. About 2am when Mars was on the meridian, observed Mars with 2.5X barrow and 9mm (12.5"). The view was the best ever seen of Mars. This is the night of Mar's closest approach to Earth in over 60,000 years. So many observed through the 12.5" that I had no time for logging in DSO's. I was too tired to continue much after 2am when the last of the visitors left. Packed up shortly after. Monty brought his new Meade

DS16 down. A great night of viewing for the guests.

Observation Date: Aug 20, 2003

Location: Hidden Hollow - RAS

Observers: Tammy

Moon Phase: Rise about 1am

Seeing: Excellent

Transparency: Excellent

Notes: Observed exclusively with the 31". Megastar and Argo Navis

worked very well. Closed up shop after the Moon rose. Logged in 27 objects, mostly PGC's along the border of Andromeda and

Pegasus. A very excellent night.

Observation Date: Jul 29, 2003

Location: Hidden Hollow - RAS

Observers: Monty late. Cindy and Kasey stopped down. The campers had a

'Starry Nights' observing program and about 50 guests stormed the observatory. Besides my 12.5", Curt, Robert, John Boggs, Joh

Moon Phase: New

Seeing: Good - 7

Transparency: Excellent - 10

Notes: Very dark and transparent night. Very little dew and low

humidity. Had the 12.5" setup on the concert platform outside the dome with Megastar fired up. Observed many Messier objects, M11, M22, M16, M8, M27, M57 and Mars. Mars was the best I have ever seen. The polar cap and dark markings easily seen. About 3am when Mars was just past the meridian, the seeing was better and the view just spectacular. The campers got a great treat hanging out with the Meade 12.5". This was the first session with the Starligh Instruments Feather Touch

Focuser. WOW. What a nice focuser. Observing with this focuser was just awsome. Gave Joe the introduction on how to use the Argo Navis unit to find objects. Observed a couple of Messiers using Argo Navis. After the campers and helpers left, went to work observing with the 31", Argo Navis and Megastar. This time for keeps. Logged in 23 DSO, mostly PGC's. Megastar and the 31" performed excellent. Topped out at 17.5 magnitude. Moved the scope by hand, the ServoCAT motors not installed yet. But when they are, the 31" will be a down right observing machine. Observing from the mightly lift-a-loft presents many challenges. The high chair really helps, but there needs to be holders for clip boards, goose neck red light and flip down seats attached to the sides of the the lift-a-loft to make the observing experience really comfortable. Monty and I stayed till day light

hitting the road around 6:30am. Excellent evening of observing.

Observation Date: Jul 03, 2003

Location: Hidden Hollow - RAS

Observers: Monty

Moon Phase: Set at Midnight

Seeing: Average - 6

Transparency: Average -6

Notes: Although it was clear, the sky was very bright. Transparency

degraded through the night until we decided to bag observing DSO's and work on the 31" telescope. Monty cut out the RA mounting plate where the new RA timing pulleys will go. Did manage to observe and log 15 objects, but IC and PGC were out of the question. Closed up shop around 4:30am. In all, it was an average night. It was better to get the work done in the 31" than

to try an observe 15th magnitude galaxies.

Observation Date: Jun 27, 2003

> Location: **Hidden Hollow - RAS**

Observers: Monty, Jerry. Jerry left around 1am.

Moon Phase: Rise 5am

> Seeing: Excellent - 9

Transparency: Excellent - 9 Fast moving front moved through earlier.

> Notes: Finally got a break last night when a fast moving front came

> > through and prevented a sixth night in a row. The record has

finally been broken and after 5 in a row, it was expected.

Besides, I needed the sleep. Got to get twice my business done earlier which further added to this record setting week. Tonight concludes a record week of observing having logged in 327 DSO in 6 of 7 nights of observing. Of the 327, 60 DSO's were logged in this session. Temp dropped to a cool 60 degrees and the sky

was very dark and transparent. No shorts or short sleeves

tonight. The scope remained setup in the dome ready to go. The DSC were hot as usual. Did some observing with OIII filters

Monty had with mixed results. I am done for now with the

Northern Gems. I have to wait 6 months to get the remaining RA hours in prime observing loation to finished the 50 to 90 degree sweep. Finished the to-do NGC list in Ophiuchus and started the NGC list in Pegasus. M27 was observed a OIII filter and was the best view of it I have ever seen to date. It is Friday night with a very clear and transparent (moonless) sky and I am shocked many others from the RAS club are not here to observe. But then, maybe I'm not so shocked. This was most definitly an excellent night of observing and a week to always remember.

Observation Date: Jun 25, 2003

Location: Hidden Hollow - RAS

Observers: Monty and my Mom stopped by for a little bit

Moon Phase: Rise 4am

Seeing: Good to Excellent - 9

Transparency: Good to Excellent - 8 Kind of humid and warm

Notes: Looking forward in the future, this was the fifth of 5 consecutive

nights (6 of 7 in total) observing under the best of conditions. This is a record week of observing having logged in 327 DSO in one week of observing. A high pressure dome moved in from Canada and is sitting over Ohio. Transparency for the 5 nights was excellent with this night being the worst of the 5. For the next 6 of 7 nights. I observed from sunset to either moonrise or

sunrise.

Scope stayed in the dome ready to go. Record setting evening having now gone 5 consective nights in a row under excellent conditions. Lack of sleep starting to take it's tool. Weather was warm and humid with a slight breeze to keep us cool. The sky

still is dark and transparent, but not like the previous 4. Observed 65 DSO's including 7 PGC's and a hand full of IC's. Continued the Northern sweep of 50 degrees and higher until I ran out of objects in the RA hours that are observable. Finished the NGC to-go list in Aguila. Also, ran out of observing sheets, had to revert back to the old style sheets. Closed shop at the

start of twilight. An excellent record setting evening.

Observation Date: Jun 24, 2003

Location: Hidden Hollow - RAS

Observers: Monty, Joe, John Boggs and approx 50 boys and girls from the

camp. Joe and John left around midnight after the campers were

gone.

Moon Phase: Rise about 3:30am

Seeing: Excellent - 9

Transparency: Excellent - 10 Sky very dark and transparent

Notes: Looking forward in the future, this was the fourth of 5

consecutive nights (6 of 7 in total) observing under the best of conditions. This is a record week of observing having logged in

327 DSO in one week of observing. A high pressure dome moved in from Canada and is sitting over Ohio. Transparency

for the 5 nights was excellent. For the next 6 of 7 nights, I

observed from sunset to either moonrise or sunrise.

Continued the northen sweep of 50 degrees and higher. Scope setup in dome. Weather perfect and comfortable. Observing in shorts first time this year. Kept taking a nap just before coming

down and it seems to be working. Not getting tired (yet).

Logged in 64 DSO including 11 IC's and 14 PGC's. The sky

continues to remain extremely dark and transparent. Have never

had an observing run like this before. Observed till start of

twilight.

Observation Date: Jun 23, 2003

Location: Hidden Hollow - RAS

Observers: Monty, Cindy and my Mom showed up then left around 12:30.

Moon Phase: Rise around 3:30am

Seeing: Good to Excellent - 8

Transparency: Excellent - 10 Sky very dark and transparent.

Notes: Looking forward in the future, this was the third of 5 consecutive

nights (6 of 7 in total) observing under the best of conditions. This is a record week of observing having logged in 327 DSO in one week of observing. A high pressure dome moved in from Canada and is sitting over Ohio. Transparency for the 5 nights was excellent. For the next 6 of 7 nights, I observed from sunset

to either moonrise or sunrise.

I arrived at the observatory around 11:30pm. Continued the Northern sweep of DSO 50 degrees and higher. Running out of objects in the current RA hour blocks. Spending early morning hours observing other DSO's in other parts of the sky. Logged in 32 DSO including a couple of IC and a hand full of PGC's. The DSC were hot as usual and the scope has been setup in the observatory dome untouched for this remarkable run of clear, transparent nights. Closed up just before start of twilight.

Observation Date: Jun 22, 2003

Location: Hidden Hollow - RAS

Observers: Monty, Cindy came down and left after about an hour

Moon Phase: Rise around 3am

Seeing: Good to Excellent - 8

Transparency: Excellent - 10 Sky very transparent

Notes: Looking forward in the future, this was the second of 5

consecutive nights (6 of 7 in total) observing under the best of conditions. This is a record week of observing having logged in

327 DSO in one week of observing. A high pressure dome moved in from Canada and is sitting over Ohio. Transparency

for the 5 nights was excellent. For the next 6 of 7 nights, I

observed from sunset to either moonrise or sunrise.

Continued the Northern quest of DSO 50 degrees and higher. I have many of the RA hours completed from 50 degrees to 90 degrees North. Logged in 51 DSO including 7 IC objects and 6

PGC. Excellent night of observing. Temperature very

comfortable.

Observation Date: Jun 21, 2003

Location: Hidden Hollow - RAS

Observers: Monty

Moon Phase: Rise around 3am

Seeing: Good-Excellent 8

Transparency: Excellent - 10 High Pressure in from the North

Notes: Looking forward in the future, this was the first of 5 consecutive

nights (6 of 7 in total) observing under the best of conditions. This is a record week of observing having logged in 327 DSO in one week of observing. A high pressure dome moved in from Canada and is sitting over Ohio. Transparency for the next 5 nights was excellent. For the next 6 of 7 nights, I observed from

sunset to either moonrise or sunrise.

I continued the northern object quest logging 55 DSO in total. 14 were of the PGC variety and 8 of the IC type. Magnitudes down to 16.0 were not out of the question. Temperature dropped into the 50's and the sky was extremely transparent. Objects jumped

out of the eyepiece.

Observation Date: Jun 01, 2003

Location: Hidden Hollow - RAS

Observers: Tammy and Monty

Moon Phase: New Moon

Seeing: Average

Transparency: Average - 6 Sky remained 'bright' all evening.

Notes: Setup in the 31" dome. Temp dipped to 37 degrees. No clouds,

high pressure but the sky stayed bright all night. The month of May was a total wash out. June is not looking much better. Faint galaxies really didn't jump out of the eyepiece. Polar alignment was perfect and Megastar again was dead on.

Observed till 4:30am when morning twiilight started. Managed to log in 51 objects but would say that the descriptions of these objects were not under optimal conditions. I was required to use

averted vision more than ever to identify and confirm

observations. Continued the 'Northern Objects'. Overall, the

evening was average to just barely good.

Observation Date: Apr 26, 2003

Location: Hidden Hollow - RAS

Observers: Mike Grilley, Mike Allen, Keith Moore, Monty, Jerry, Dave, Terry

and other club members.

Moon Phase: Rise at 5am

Seeing: Excellent - 9

Transparency: Excellent - 10

Notes: Before coming down, didn't get all of my business taken care of,

but still had an excellent evening observing. Tonight was the first night having the optical encoders and laptop working in the 31". The results were OK, and some work needs to be done getting the correct encoder tics for the DEC calculated. Also, it was apparent that there needs a training program for the club with MegaStar and how best to use the software to find objects. Jerry showed up around 2am. We observed PGC objects with great success. Most of these faint DSO's were at zenth and most were easily detected. Because the 31" was in use, I setup outside the dome. The temperature dropped to 30 degrees, very

light winds. Logged in 56 objects and also observed some Messier objects. M57 was spectular. Viewed IC1296 for the first time which is very close to M57. Closed up shop around 5am.

Monty and Dave were still observing when I left. What an

excellent evening.....

Observation Date: Apr 23, 2003

Location: Hidden Hollow - RAS

Observers: Mike Allen, Tammy, Monty

Moon Phase: Rise around 3:30am

Seeing: Excellent - 9

Transparency: Excellent - 10

Notes: This was one of the best nights of this year. High pressure, temp

dropped to 30 degrees. Set up in the dome again. Mike Allen had his 15" Obsession set up as well. Awsome scope. Finished

some business before heading down to the observatory.

Observed 73 objects while I continued the Northern 50 degree sweep. Mike, Monty and myself stayed till almost dawn. Left at 4:45AM. The wind stayed calm and the transparency was just awsome. NGC 5907 was the highlight of the evening. Just an unbelievable edge on galaxy. Encoders and MegaStar did it

again.... dead on all night.

Observation Date: Mar 26, 2003

Location: Hidden Hollow - RAS
Observers: Monty, Dave, Tammy

Moon Phase: Rise around 5am

Seeing: Average to Good

Transparency: Very good - Clouds came and went then clouded up

Notes: Again set up in the dome. Music going and the Northern objects

were targeted again. Temperature dropped to about 30 degrees. During the cloudy periods, we all watched the Obsession 20inch video down in the club house. Secondary still not in the 31inch

telecope. Monty has his Meade setup and had Megastar

controlling the scope including 'goto'. It was really nice. Closed up the dome and headed out about 2:30am. Did manage to get

observations of 9 objects logged in.

Observation Date: Mar 06, 2003

Location: Hidden Hollow - RAS

Observers: Tammy and Monty

Moon Phase: Set 10pm

Seeing: great - 8 - Front just came through earlier

Transparency: excellent 9

Notes: Finally, Februray a total wash out. Set up in the 31" dome again.

Continued observing the northern DSO by RA with great

success. Observed 73 objects, most of them after Monty and Tammy left. Left the observatory at 5am. Temperature dipped to about 7 degrees. Dome made the observing comfortable once

again. Excellent evening.

Observation Date: Jan 30, 2003

Location: Hidden Hollow - RAS

Observers: Myself and Tammy. My Mom stopped by later.

Moon Phase: One Day before New

Seeing: Good - 7

Transparency: Good to Excellent. Got clouded out about 11:30pm

Notes: Finally a clear evening to observe. My scope was left setup in

the Dome. I came down the previous evening to observe but the sky never cleared while it was clear about 50 miles to the west. All I had to do was to plug in the extention cord. Started my 'Northern' DSO's. RA hours 1-6 are finished. Polar alignment of the scope is excellent. Was able to find northern objects with ease and accuracy. Observing on the meridian is the best technique for northern objects. About 11pm the sky suddenly clouded over. The entire sky went from clear to completely clouded in about 2 minutes. I never seen anything like it before. The temperature must have dropped to the dew point. The temp was about 12 degrees. Observed a lot of nice IC objects that if not for their extreme northern declinations, they would definitely be everyone's seasonal favorites. Overall, an excellent night

while it lasted.

Observation Date: Jan 08, 2003

Location: Hidden Hollow - RAS

Observers: Tammy, Monty, my Mom and Dad stopped by.

Moon Phase: Set 11:20pm

Seeing: good to OK. Very windy, Warm Front leaving Area, Cold Front

Transparency: coming through.

Notes: Excellent, extremely clear

First observing session of 2003. Set up scope in the 31" dome again. Windy evening, temp dropped to about 30. Warm for January. Continued the Herschel II list. Observed some very interesting edge-on galaxies. The evening got better and better as the night went on. Left my scope setup in the dome ready to go next new moon in February. Logged in 28 more objects and also observed Jupiter, and some Messier objects. M51 was the best I have ever observed to date. The 9mm Nagler view of M51

was just awsome. Left observatory around 3:10am.

Observation Date: Dec 06, 2002

Location: Hidden Hollow - RAS

Observers: Goose, Monty, Dave, Tammy and friend, a person from the gas

station (possum run road and sr 13)

Moon Phase: Set around 7:30

Seeing: good - 7

Transparency: good to excellent - 8

Notes: This was a very cold night. Temp droped into the teens. It was

breezy most of the evening. I set up the 12.5" in the 31" dome. For cold weather obseving, inside the dome is the way to go. After countless times freezing outside in the winter, I can't believe I never thought of setting up inside the dome. Three SCT's with goto's were outside behind the dome. The observers frequently came inside the dome to warm up! Heavy dewing and

frosting outside and no mosture or dew inside! The only problem was the ink in the pen kept freezing. Solved this

problem by keeping the pen inside my jacket. I stayed warm and observed till dawn. Logged in 49 DSO's mostly in Perseus and Gemini. Yes, galaxies galore in Gemini. With the comfort inside the dome, observing table and music, this was one of the best

nights I ever had during the winter observing season.

Observation Date: Oct 05, 2002

Location: Hidden Hollow - RAS

Observers: HIDDEN HOLLOW 2002. Primary Observers throughout the

evening were Brent Archinal, S. Astra and Bill Burton.

Moon Phase: New

Seeing: Great

Transparency: Excellent - Hurricane Lilly came through previous day

Notes: RAS Convention. What an evening. Dozen's of scopes scattered

all over the place. Campers too. Got to see Brent and Bill again after 17 years!!! DSS's were hot, logged in 80 DSO's. Also observed many Messier objects, Uranus, Saturn, Jupiter. Temp

dropped to about 40 degrees. Light frost in the pre-dawn hours. Stayed till sun rise. Plastered DSO's in Andromeda. Tried observing with Bio-Viewers (Bill's). Results were outstanding but don't know if investment would be worth it. Not good on faint DSO's. Hurricane Lilly blew through yesterday and

threathened observing the entire weekend. Excellent evening.

Observation Date: Sep 12, 2002

Location: Hidden Hollow - RAS

Observers: Tammy, Jerry and Monty

Moon Phase: Set 11pm

Seeing: excellent - light clouds come and go around 5am

Transparency: excellent - little dewing

Notes: Sure glad I went observing tonight. Left home around 9pm... got

set up just as the moon was setting. Logged in 51 objects. Didn't have any luck observing around the north pole. I don't think my polar alignment was as good this time. Observed some messiers using the 31 inch, then got down to business in Peg, And and Per. The cluster of galaxies in Perseus was awsome. Observed 25 galaxies in 1.5 FOV using the 9mm nagler. This cluster is a must for the 31 inch. Temp dropped down to 47 degrees. Very comfortable night at the telescope. Left at

morning twilight. Excellent evening.

Observation Date: Sep 06, 2002

Location: Hidden Hollow - RAS

Observers: Tammy, Gary Deatsman and daughter Becky, Terry

Moon Phase: New

Seeing: Average at Start then Excellent after Midnight

Transparency: Excellent

Notes: Oh what a night. Logged in 64 objects. Continued the Herschel

400 II list. Observed the closest NGC to Polaris (NGC 3172). Observed may other DSO close the the pole with great success. MegaStar comes through again. Terry and I stayed till dawn.... first time doing that in over 17 years. Observed a few Messiers and finishted off the night with M42 (totally outstanding), Jupiter

and Saturn. Temp dropped to mid 50's with little dewing.

**Excellent evening.** 

Observation Date: Sep 04, 2002

Location: Hidden Hollow - RAS

Observers: Curt, Jerry, Tammy & Friend, Mike and his son,

Moon Phase: Rise 5am

Seeing: Excellent

Transparency: Excellent

Notes: What a night!! Started off with the batteries on the door lock

dead. Had to call Mike to come and let us in. Then things just got better and better. Perfect night. Very little dew. Temp dropped to about 55. Logged on over 75 objects (mostly in PSC) and continued the Herschel 400 II list. Had some of the best views of SNR in CYG using the Konig 32mm 2" eyepiece. Some were awsome. IC and PGC galaxies in PSC were not a problem. Having the RealSky installed on laptop's internal disk drive worked excellent. RealSky images (inverted) in dense galaxy fields sure made it easy to locate and identify DSO's. Very

productive evening. I was the last one to leave and that was

about 4am.

Observation Date: Sep 01, 2002

Location: Hidden Hollow - RAS

Observers: Jerry, Terry, Robert & Friend, Jim Baker, Monty and few guests

Moon Phase: Rise 1:30am

Seeing: Good

Transparency: Good - Great

Notes: Another awsome evening at the observatory. Observed many

Messier objects, showed off computer interface and MegaStar again. Logged 10 objects in Pegasus including Stephan's

Quintet. Used the Nagler 9mm on the 31 inch and looked at M57

and the Saturn Nebula .... the views were the best ever -

Unbelieveable.

Observation Date: Aug 10, 2002

Location: Hidden Hollow - RAS

Observers: RAS Club and Public Night. Monty, Bob, Tammy stayed till

dawn.

Moon Phase: 1 day old

Seeing: Excellent

Transparency: Good

Notes: Awsome night. About 100 guests. Many telescopes set up. First

light for my Nagler 9mm Type 6. Eyepiece is worth every cent. Now I want the set. Observed many Messier objects the got down to business and logged in 34 deep sky objects, most of the Herschel 400 variety. Cindy and my Mom stopped down. Perfect observing night. Shorts and tee shirt, no bugs, no dew. This was the 5th straight night of clear skies. High pressure in

control. Location of command center to the East of scope works great. Easy to see from eyepiece while observing. MegaStar5 is

absolutely the best. Optical encoders were dead on, scope

nicely polar aligned. Excellent evening.

Observation Date: Aug 03, 2002

Location: Hidden Hollow - RAS

Observers: RAS Members Mike, Larry, Bob, Curt & Trica, others....

Moon Phase: Rise 2am

Seeing: Excellent

Transparency: Good-Excellent

Notes: A group of about 25 people came down. Many scopes were set

up: 12.5", 10", 8", and a Dobsonian 10". I used a goto telescope

for the first time - awsome. Looked at a couple of Messier objects then got down to business in Delphinus and Aquarius. Logged in 17 more new discoveries. Excellent evening... warm and mild. Low humidity. MegaStar 5 is carrying it's own weight. This software is totally amazing. Setup the computer to the East

side of the mount. It's much easier to use and see in this

location. Perfect night.

Observation Date: Jul 31, 2002

Location: Hidden Hollow - RAS

Observers: Myself, Mike G., Ted & friend.

Moon Phase: Rise at 1am

Seeing: Excellent

Transparency: Good-Excellent

Notes: Back to back excellent nights. Delphinus continuted, 19 objects

observed including my first PGC galaxies. Showed off my computer setup to Mike. Observed many Messier's then got down to business. Began using inverted field and the rotation tool in MegaStar 5. Was able to duplicate the eyepiece FOV and walk right to faint galaxies. Perfect night for observating, low

humidity and warm.

Observation Date: Jul 30, 2002

Location: Hidden Hollow - RAS

Observers: Myself, John Boggs, Tammy & friend, Gary and other RAS

members.

Moon Phase: 3rd Qtr

Seeing: Excellent

Transparency: Good-Excellent

Notes: Campers from the HH camp were invited to some views. About

40 in total got to visit the telescopes. 31", 10" and my 12.5" were

setup for the campers. Excellent night. Perfect observing temperature and low humidity. First night using MegaStar 5. The single star alignment worked excellent. The new/enhanced features of Megastar 5 are awsome. Need to figure out a way to get the computer closer to the eyepiece and to use a chair

somehow. Observed may Messiers and 5 objects in Delphinus including my first UGC galaxy. Last one to close up shop.

Observation Date: Jul 06, 2002

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Rise about 4am

Seeing: Good

Transparency: Good to Great

Notes: Excellent night. Several guests showed up thinking it was Guest

Night. Some as far as North Royalton. Sleep observed may Messier objects before crashing in attic. Got scared by a raccoon and fell aginst my car denting the door. Dew fell out about 1:30am. Guests left leaving me by myself. Packed up about 4am. Red filter paper works great. Observed many messier objects and 4 new objects. Computer and encoders

worked execellent.

Observation Date: Jun 08, 2002

Location: Hidden Hollow - RAS

Observers: A dozen or so RAS Members. Club meeting and Public Night.

Moon Phase: New

Seeing: Good - thin clouds early part of evening

Transparency: Good

Notes: Sky turned excellent around 1am. High pressure in control. Very

calm. This was a public night and about 100 plus guests showed up. Emil Diener and family stopped by. Observed many Messier and NGC objects. Demo the encoders and TheSky. Scope right on. Many were impressed with how easy it was to go from object to object. Left scope in observatory for first time. Didnot get to

do any serious observing but it was an excellent night.

Observation Date: May 10, 2002

Location: Hidden Hollow - RAS

Observers: Bob Scodova, Cindy, Mike and Kasey, Curt & Trish Goff

Moon Phase: 2 Days before New

Seeing: Good - Excellent

Transparency: Excellent - High clouds came in around 2am

Notes: First time at RAS with new SUV and trailer/boxes. New setup

works great. Need to perform minor work on boxes (black cloth, metal feet, etc.) Used TheSky software with encoders with great success. Objects were in the eyepieces. Looked a a bunch of Messiers with others. Started serious observing when they left

only to get clouded out around 2am. Observing with

computerized software and encoders is awsome! Managed to get 2 new objects descriptions in Hercules. Need to check on

collimation - secondary was loose from the trailer trip.

Observation Date: Mar 15, 2002

Location: Hidden Hollow - RAS

Observers: Bob Scodova, Cindy & Casey, Mom & Dad, Curt & Tricia Goff,

other RAS Members

Moon Phase: New

Seeing: Poor

Transparency: Poor - Got clouded out

Notes: Messier Marathon 2002!.. First time 12.5" back at RAS in over 17

years!! Telescope has been completely overhauled and

computerized. Jupiter drew first light. No Messier objects were seen, sky deteriated. Shutdown by 10pm. Played with MegaStar and encoders. Could not get software to track scope movement correctly. Problem turned out to be bug in MegaStar software.

Tried TheSky software over the next 2 months with great

success observing in Macedonia on Wren Drive. What a sight to

see the 12.5" back at RAS!!!!!

Observation Date: Sep 06, 1985

Location: DSO - Garver Road

Observers: Brent Archinal, Mitch Luman

Moon Phase: Last QTR

Seeing: Very Good

Transparency: Very Good

Notes: Another Asteroid Hunt. Observed 8 asteroids and Comet Halley.

Observed G-Z Comet which occultated a 6th mag star in Auriga. See article in M111 9/85. Brent and Mitch stopped by at 4am to hunt down and locate comet Halley. Althought the moon was close by and the sky bright, Comet Halley was located at 5am. Estimated at 12th mag. Finder charts in Tonight's Asteroids are excellent and accurate. Need to work on additional tarp for light control. Clutch needs greased and tightened. Overall a super

night. Observed the following asteroids:

Miriam, Ariadne, Eurynome, Parthenope, Germania, Thyra, Nausikaa and Hertha. NOTE: this night is the last recorded observation here at DSO and (as it turned out) the last

observation here at boo and (as it turned out)

observation session this century.

Observation Date: Mar 15, 1985

Location: DSO - Garver Road

Observers: Myself and neighbor boys (showed them M81, M82)

Moon Phase: Rise after 3am

Seeing: Excellent

Transparency: Excellent

Notes: Best night skywise and performance. Closed up observatory at

2:30am. Temp 20-25 deg. Not much dewing. Excellent night - 10

!!

Observation Date: Mar 02, 1985

Location: DSO - Garver Road

Observers: Myself

Moon Phase: 3 Days before Full

Seeing: Fair

*Transparency:* Fair

Notes: First time off on an Asteroid Hunt. My first asteroid was Rachele

674. Charts shown in tonight's astroid are very wide field. Use 2" 32mm and faintest stars on Hans Vehrenberg's are visible in 32mm. The moon shine washed out the fainter stars and made detection of field stars and asteroids possible. Also did some astrophoto's of the moon and moonshine. Photographed moon

with Ektachrome 200. CLosed obseratory up at 1:30am.

Observed other astroids: Euphrosyne and Amherstia.

Observation Date: Dec 25, 1984

Location: DSO - Garver Road

Observers: Myself

Moon Phase: 4 Days old

Seeing: Excellent - 8

Transparency: Excellent - 10

Notes: Completed a Tarus Burnham's sweep. Temp 10 deg. No dew.

Conditions deteriated after 2am. Front moved in. M81 and M82 spactular. Used a 2" 48mm Brandon eyepiece. Observed some

variable stars in Burnham's.

Observation Date: Sep 21, 1984

Location: DSO - Garver Road

Observers: Tony Holenbrink, Mark Mattox

Moon Phase: 3 days before New

Seeing: Excellent - 9

Transparency: Great - 9

Notes: View all Burham's Pegasus objects. Best night to date.

Observed in Pegasus and some objects in Sagittarius. Located

and confirmed NGC 1 in Pegasus.

Observation Date: Sep 20, 1984

Location: DSO - Garver Road

Observers: Myself

Moon Phase:

Seeing: Excellent - 9

Transparency: Very Good - 9

Notes: Sagittarius observations. Best night ever at DSO. Dew started

falling around 11pm. Go after objects in 18-19 Hours sometime

in the future.

Observation Date: Sep 19, 1984

Location: DSO - Graver Road

Observers: Myself

Moon Phase: Rise 3:00am

Seeing: Good - 8

Transparency: Average -5

Notes: The sky appeared very dark but somehow faint objects didn't

show well. Dew started falling out when I shutdown about 11pm.

This was the second night after a cold front came through.

Observation Date: Aug 31, 1984

Location: DSO - Garver Road

Observers: Myself

Moon Phase: 4-5 days old

Seeing: Average

Transparency: Average

Notes: Observed some objects in other constellations too - Andromeda,

**Aquarius** 

Observation Date: Jul 21, 1984

Location: DSO - Garver Road

Observers: Myself

Moon Phase: 3rd Qtr

Seeing: Average - Poor

Transparency: Good - Fair

Notes: High Pressure but heavy fogging. First night to observe using

tarp. Very effective, no stray lights except for south. The scope has never performed so well. Re-balanced and adjusted clutch. Crossed over mount no initial drifting. Viewed Jupiter, Saturn

and Mars. Saturn looks good with yellow filter.

Observation Date: Mar 03, 1984

Location: DSO - Garver Road

Observers: Myself

Moon Phase: New

Seeing: Excellent

Transparency: Excellent - 8

Notes: Cold - 0-5 deg. Heavy frosting. Observed 10pm till 2am.

Finished Leo. Observed a few other Messier objects, M3, M104 very impressive. Observing table worked very well. Has light

block around building. Good Night.

Observation Date: Mar 02, 1984

Location: Hidden Hollow - RAS

Observers: Larry Greer, Several RAS members

Moon Phase: New

Seeing: Average

Transparency: Great

Notes: Messier Marathon 1984 Part1. Very cold, no heat downstairs yet.

I left at 2:30am. This was the first half of Messier Marathon.

Being 2 weeks early, the first objects were very easy to get. I had to shovel snow off the steps and the pad to setup Larry's 10 inch.

The 12.5" is at DSO on Garver Road. I will finish Part II of

Messier Marathon end of March or Early April weather permitting.

Observed 52 objects this night.

Observation Date: Feb 25, 1984

Location: DSO - Garver Road

Observers: Keith Moore

Moon Phase: Will rise 3-4am

Seeing: Very Good - 8

Transparency: Excellent - 9 Some smoke problems with wood burners

Notes: Good night at DSO. Temp very cold 0-10 deg. Everything frosty.

Started a second run in Leo. Finished Monocerus completely.

Viewed Saturn and Mars. Finished up at 3:00am.

Observation Date: Feb 21, 1984

Location: DSO - Garver Road

Observers: Myself

Moon Phase: Will Rise 3:00am

Seeing: Very Good - 8

Transparency: Great - 9

Notes: Best night at backyard observatory. Need to put in observing

table and chair. Also need to finish light shield. This was a very good night. 13th mag objects were easy to see. Temp about 30

degrees. Fogging was a minor problem.

Observation Date: Dec 30, 1983

Location: DSO - Garver Road

Observers: Myself

Moon Phase: 1 WK before New

Seeing: Average - Good

**Transparency:** Good at times, otherwise poor

Notes: Very Cold -2 deg. Sky seemed bright, light haze. Snow Trail's

lights covered Lepus. Light shield worked well. Mouse made a mess in the clock drive box. A couple of wired chewed in two. He was killed that day. First offical observing session here at

Deep Sky Observatory.

Observation Date: Jul 09, 1983

Location: Hidden Hollow - RAS

Observers: Larry Greer, Chris Coteff, Brent Archinal, John Kerns, Tom

**Burns, Keith Moore** 

Moon Phase: New

Seeing: Poor

Transparency: Average - 5

Notes: Started Draco RNGC galaxies. Fair success. Cepheus mop

complete with Verenburg Atlas. First time I observed NGC 188. Used Chris's 8" and my 12.5". Good night overall. Heavy dewing at morning. Sky cleared at sunset and remained bright all night. Last Night 12.5" spent at RAS. Scope is moving to Garver Road where I built a backyard observatory. Observing here at RAS will

no longer be the same.

Observation Date: Jul 08, 1983

Location: Hidden Hollow - RAS

Observers: John Kerns, Larry Greer, Chris Coteff, Brent Archinal, Dick

**Suiter, RAS Members** 

Moon Phase: 2 Days before New

Seeing: Good

Transparency: Good - 7

Notes: Clouds came and went. Sky contrast remained great. Circles

hot.

Observation Date: Jul 06, 1983

Location: Hidden Hollow - RAS

Observers: Doug Wereb, Dick Suiter, John Kerns, Larry Greer, Tom Burns,

**Brent Archinal** 

Moon Phase: Rise at 4am

Seeing: Good - 8

Transparency: Excellent

Notes: Pegasus RNGC run continued. Finished the last Herschel 400.

Photographed some Messier objects. Very clear night, cold and

frosty. High Pressure. First good observations for 1983.

Observation Date: Jun 11, 1983

Location: Hidden Hollow - RAS

Observers: Chris Coteff, Larry Greer, Keith Moore

Moon Phase: New

Seeing:

Transparency:

Notes: Completed the Herschel 400 List.

Observation Date: Feb 12, 1983

Location: Hidden Hollow - RAS

Observers: John Kerns, Dick Suiter, Tom Burns, Chris Coteff, John Boggs

Moon Phase: New

Seeing: Average - Fair

Transparency: Average - heavy frosting

Notes: Herschel 400 Continued. Observed 68 objects this night.

Extremely frosty. First time for Moon Boots and insulated

overalls. They worked great, feet never got cold. Photographed 3 objects earlier in the evening then Chris and I did Herschels.

CAS's 16" was set up, got some spectactular views.

Observation Date: Oct 23, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, Keith Moore

Moon Phase: Set 11:50pm

Seeing: Good - 8

Transparency: Great - 8

Notes: Setting circles very good. Finished RNGC in Aries (56 total).

Missed only 6. Triangulum looks like another area that RNGC's will be successful. Got very cold. Hand warmers worked great.

Observation Date: Oct 22, 1982

Location: Hidden Hollow - RAS

Observers: Tom & Suzy Burns, Larry Greer, Keith Moore, John Kerns, G.

Wood, L. Sharver

Moon Phase: Set 11pm

Seeing: Poor to Average - 4

Transparency: Average - 6

Notes: Circles good. RNGC galaxies visible with no problem. Stopped

at NGC820. Went to Connies and John's wedding Saturday.

After Aries, observed some Herschel 400 objects.

Observation Date: Oct 16, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, John Kerns, Dick Suiter, Chris Coteff, Tom & Suzie

Burns, Bill Burton & friend, Brent Archinal, Terry Mcquisten

Moon Phase: New

Seeing: Fair to Good

Transparency: Excellent - High Pressure just moved in today

Notes: Continued Herschel 400 list. Observed 41 objects. Record

apature set at site - 17.5". Scopes in use: (2) 17.5", 12.5", (2) 4.25", 10", 6". First time for Bill Burton, Cloudy all day but cleared off at 10pm. Beautiful night. Very cold about 30 deg. Everything frosted over. Also observed some Messier objects.

Observation Date: Sep 18, 1982

Location: Hidden Hollow - RAS

Observers: Keith Moore, Larry Greer, John Kerns, Dick Suiter, Chris Coteff,

Lacy Shaver.

Moon Phase: 1 day old

Seeing: Excellent - 8

Transparency: Super - 10 plus

Notes: Pegasus continued. Setting circles hot. Knocked off every

RNGC in order. Little dew. Some clouds came in 1am then cleared. Some light clouds came in around 5am. Excellent FOV contrast, many 15th magitude galaxies jumped out. Dick Suiter

very impressed and interested in finding these 15th mag

galaxies.

Observation Date: Aug 25, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer

Moon Phase: Set 12:00 Midnight

Seeing: Excellent - 10

Transparency: Excellent - 9 Heavy Dewing

Notes: Eyepieces and Diagonal dewed up. Left scopes setup till 9am so

Sun could dry them off. Planted English Ivy and other plants at

Observatory. Completed second run on Triangulum.

Observation Date: Aug 21, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, Tom & Suzie Burns, Kieth Moore, Tony Holenbrink &

Friend

Moon Phase: Set 2 hrs after Sun

Seeing: Average - Good

Transparency: Good - 8 Some light clouds moved in

Notes: Started a RNGC search in Per, didn't have much success.

Continued Herschel 400 list. Light clouds keep moving in in

patches. Observed 12 objects.

Observation Date: Aug 17, 1982

Location: Hidden Hollow - RAS

Observers: Mark McKee

Moon Phase: 1 Day before New

Seeing: Good - 7

Transparency: Excellent the later it got.

Notes: Thunderstorms seen in southen horizon. Sky got really dark

after 1am. Eye sighted polar alignment, circles hot. Observed every RNGC object in Perseus in order with no misses. Only a

couple of pages to go.

Observation Date: Aug 14, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, John Kerns, Keith Moore, Dick Suiter

Moon Phase: Rise at 3:00am

Seeing: Average - Good - 7

Transparency: Good. Sky was bright

Notes: Check 6946 periodically for SN. Drew 6946 with star field on

computer card. Observed asteroid 9 Metis (see field 8/14/82 on back of photography log sheet). Photographed 3 more objects

tonight.

Observation Date: Aug 13, 1982

Location: Hidden Hollow - RAS

Observers: Mark Mattox, Chris Coteff, Larry Greer, Keith Moore, Doug

Wereb, John Kerns, Dick Suiter, Wilkie, Tom & Suzie Burns

Moon Phase: Rise 2:05am

Seeing: Excellent - 10

Transparency: Excellent - 10 High Pressure still dominant

Notes: Some light clouds at sunset, cleared off quickly. Continued

Herschel 400 list. Completed the summer and fall groups. Polar alignment was extremely good. Went from Sco to UMi and object

was in FOV. Temp about 50 deg. Total of 281 Herschel 400

objects now logged in.

Observation Date: Aug 11, 1982

Location: Hidden Hollow - RAS

Observers: Celia Scodova (watched TV)

Moon Phase: Rise 12:20am

Seeing: Excellent - 9

Transparency: Excellent - High Pressure just moved in

Notes: Worked on the Herschel 400 list. Observed 13 objects. Total of

249 Herschel 400 objects logged.

Observation Date: Mar 27, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, Keith Moore, Tom Burns, Emil Diener, Brian, Terry

and Friend

Moon Phase: Set 2 HRS after sun

Seeing: Great

Transparency: Excellent - Cold and frosty

Notes: Temp about 10 deg. Heavy frosting. Messier Marathon Night.

108 Messiers were observed. Continued Hercules and Virgo RNGC galaxies. Photographed 3 objects with 12.5". Started Sextans. I didn't participate during the entire Marathon. Got

some good descriptions of Messier objects.

Observation Date: Feb 27, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, Tom & Suzy Burns, Keith Moore, Dave, John Kerns,

Wilkie

Moon Phase: Set 10:00pm

Seeing: Excellent - 10

Transparency: Excellent - 10

Notes: Started Coma Bernices. RNGC run worked well. Observed all

planets except Pluto. Polar Alignment was excellent.

Telescopes setup were: (2) 12.5, (3) 10 and (2) 8 inch telescopes.

Also observed some Messier in Sag, Sco, M27 and M13.

Observation Date: Feb 26, 1982

Location: Hidden Hollow - RAS

Observers: Larry Greer, Doug Wereb, John Kerns, Keith Moore, RAS

Members and 60 plus guests

Moon Phase: Set 9:00pm

Seeing: Poor - haze all night

Transparency: Poor

Notes: This was the Planet Marathon Night. I gave a slide show (twice

due to large crowd) with Doug and Terry. Observed Jupiter, Saturn, Mars, Uranus, Neptune, Venus and Earth. Mars was excellent, dark patches easily detected. WMAN radio brodcast brough the largest crowd to RAS. There wasn't enough chairs to the slide show. Telescope's in use were: 12.5", (4) 10", 6" and

8". Fair night overall.

Observation Date: Feb 25, 1982

Location: Hidden Hollow - RAS

Observers: Tom Burns

Moon Phase: Set 8:50pm

Seeing: Excellent - 10

Transparency: Excellent - 10

Notes: Finished Canes Venatici and started Hercules. Heavy dewing,

cold and frosty. Temp about 8 deg. Used 7mm for Saturn,

Jupiter and Mars. Best night I ever had observing these planets. Division in Saturn's rings, dark shadow bands on cloud tops. Mars showed unbelievable surface markings. Jupiter - moon shadow on cloud tops. First time I located and observed Horse

Head Nubula. Tom comfirmed the find.

Observation Date: Jan 28, 1982

Location: Hidden Hollow - RAS

Observers: Doug Wereb, Tom Burns

Moon Phase: Set 9:00pm

Seeing: Excellent - Better after 2am

Transparency: Excellent - 10

Notes: First day with my new car. Continued mopping Canes Venatici

with great success. Temp 12 degrees, 1 degree at 6am. Also observed M13, noticed a star in 6207, could not confirm it. M4,

M5,M10,M57, Saturn, Jupiter, Mars, M27 observed through

Wereb's 4" reflector telescope. Dew heavy at sunrise. Excellent

night!!!

Observation Date: Jan 26, 1982

Location: Hidden Hollow - RAS

**Observers:** Tom Burns

Moon Phase: 3 days after new

Seeing: Good

**Transparency:** Excellent

Notes: Started Canes Venatici. Photographed M42 with 8" f/5 for first

time. Noticed someone broke into Dome upstairs and destroyed

8" telescope. Temp was 0 deg.

Observation Date: Dec 21, 1981

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase:

Seeing:

Transparency:

Notes: Not sure of the year these observations were made, or the

location. Only sure of the Month and Date.

Observation Date: Oct 30, 1981

Location: Hidden Hollow - RAS

Observers: John Kerns, Larry Greer, Keith Moore (all three had their 10"

setup)

Moon Phase: 1 Day before New

Seeing: Average to Poor. Some clouds hung around

**Transparency:** Great most of the Night, Excellent 2 hours before sunrise

Notes: Good sucess in Gemini. Finished Eridanus. Black cloth

technique works great. Continued side-by-side observations with Larry's 10" in Eridanus. RNGC 1719 galaxy in Orion easy target. Need to finish RNGC run in Gemini and Orion in the future. Took nap 9-11pm and 3-4am because I went duck

hunting that previous morning.

Observation Date: Oct 24, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer, Keith Moore, Tom Burns, John Kerns, Mark Mattox

Moon Phase: 2 Days before new

Seeing: Good to Average

Transparency: Good at start. Excellent towards daylight

Notes: Cancer mop complete. Continued Cepheus, Cancer, Lepus and

Eridanus. Dew fell late morning then sky became very

transparent. Started Hydra and continued Aries. Observed 1 galaxy in Cepheus. Tom brought his 12.5" Dob for the first time.

Observed concurrent with Larry for first time.

Observation Date: Oct 03, 1981

Location: Hidden Hollow - RAS

Observers: Brent Archinal, Mark Mattox, Larry Greer, Keith Moore, Tom &

Suzy Burns, John Kerns, Tony Holenbrink

Moon Phase: Set 11:00pm

Seeing: Average to Poor in Early Morning

*Transparency:* Fair to Good. Heavy Dewing, Sky fogged out early morning

Notes: Diagonal and eyepieces kept dewing up. Keith and Larry had

their 10" set up. Both are impressive telescopes. Helix looks good in Larry's scope. Sky fogged out at 3:30am. Extremely wet and dewy. Everything soaked. Temp 38 deg. Finished 2 objects missed in Cetus when sky was dark. Looked at many object

through Keith's and Larry's telescopes.

Observation Date: Sep 27, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer, Keith Moore (left 12am), Tom & Suzy Burns, Doug

Wereb (slept)

Moon Phase: New

Seeing: Good - very windy, calm at 4am then dew fell out

Transparency: Excellent - one of the best

Notes: Observed a star in same 32mm FOV as southern horizon.

Unbelievable how clear the southern horizon is. Observed Piscies Austrinus, finished Sculptor, Cetus and Pisces.

Observed M42,43,44,81,82,108,97,Viel

Neb,41,79,27,15,31,32,110,34 and double cluster. No dew till 4:30. Transparency unbelievable. Temp hit low 40's. Southern observing the best I have ever seen. First time to observe in

Pisces Austrinus.

Observation Date: Sep 24, 1981

Location: Hidden Hollow - RAS
Observers: Bruce Beck, Tom Burns

Moon Phase: 2 days before new

Seeing: Excellent at Start, Poor to AVG after 2am

Transparency: Average, Sky remained bright

Notes: Dew fell out early AM. Observed Aries, Pisces, finished Sculptor,

and started Cetus. Taught Tom Burns how to use setting circles. Looked at some Messier objects. Used black cloth method, got

about a magnitude gain. It works very well.

Observation Date: Sep 23, 1981

Location: Hidden Hollow - RAS

Observers: Doug Wereb, Tom Burns, Celia and Bruce Beck (left earlier)

Moon Phase: Moon Rise 2:15am

Seeing: Excellent to Best

Transparency: Very Good

Notes: Few light clouds came and went. Celia and Bruce Beck stopped

by and observed some Messier Objects. First night using black mask to cover eyepiece. It works great. Saw for first time the end of arms in M31 and 2 dust lanes. 2 FOV's in 32mm. Color

again in M42. Saw NGC 55 and NGC 300 for first time.

Observation Date: Sep 20, 1981

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase:

Seeing: Excellent

Transparency: Very Good - few clouds at start

Notes: Observed 27 objects encluding Benards Galaxy

Observation Date: Jul 31, 1981

Location: Hidden Hollow - RAS

Observers: Doug Wereb, Brent Archinal, Mark Mattox, Larry Greer, Keith

Moore, Clarence Hamilton, Emil Diener, Tom & Suzy Burns,

Cindy Scodova and 20-30 RAS members

Moon Phase: New

Seeing: Great at start. Poor after 3am

Transparency: Good at start

Notes: 3rd streight night at RAS. Saw several bright meteors. Clouds

rolled in around 2:30am. Looked at several Messier objects.

Gave talk at RAS meeting on observing.

Observation Date: Jul 30, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer

Moon Phase: New

Seeing: Good - Excellent

Transparency: Excellent

Notes: Mopped Sagittga and Vulpecula.

Observation Date: Jul 29, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer, Clarence Hamilton, Mark Wagner, Doug Wereb,

Norm Oberly and Wife, Jim and friend, Emil Diener.

Moon Phase: Rise 4:30am

Seeing: Excellent

Transparency: Excellent

Notes: Looked at a lot of Messiers. Norm's first night here. Very

impressed with 12.5" and RAS site. Pegasus run using RNGC.

Observation Date: Jul 24, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer, Keith Moore, Brian, Dan

Moon Phase: Rise at 2:00am

Seeing: Fair - Poor

Transparency: Fair - Good

Notes: Sky deterated around Midnight. High pressure moved out of

area, breeze began to pick up. Continued Cygnus.

Observation Date: Jul 22, 1981

Location: Hidden Hollow - RAS

Observers: Mark Mattox, Larry Greer

Moon Phase: Rise at 1:00am

Seeing: Fair to Good

**Transparency:** Excellent

Notes: Draco Mop. First night to observe northern region. Not that hard

to do.

Observation Date: Jul 10, 1981

Location: Hidden Hollow - RAS

Observers: Tom Burns, Larry Greer, Keith Moore

Moon Phase: Set about 2am

Seeing: Excellent

Transparency: Excellent

Notes: Best Night of Summer. Aquarius, Capricornus, Aquila Run.

Helix Nebula seen in Larry's 6" f/10, Beautiful.

Observation Date: Jul 07, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer, Randy and Mark (Randy's friend)

Moon Phase: Will set 1:00am

Seeing: Fair - Good

Transparency: Fair - Good

Notes: Finished Pegasus run... Missed 1 galaxy. Hazy and Humid night.

Stayed hazy.

Observation Date: Jun 06, 1981

Location: Hidden Hollow - RAS

Observers: Larry Greer, Randy, Keith Moore, Cindy Scodova

Moon Phase: Set midnight

Seeing: Excellent

Transparency: Very good - Excellent

Notes: Happy Birthday Bruce!! Started Cepheus, Cygnus. Looked at a

bunch of Messier objects.

Observation Date: Jun 04, 1981

Location: Hidden Hollow - RAS

Observers: Randy

Moon Phase: Set 10:00pm

Seeing: Excellent at Zenith

Transparency: Excellent

Notes: Continued Virgo mop. Finished Ophiuchus and Lyra. Ring

Nebula was beautiful. May have saw central star, 2 other stars in

the ring together by rim of gas.

Observation Date: May 31, 1981

Location: Hidden Hollow - RAS

Observers: Randy, Keith Moore, Emil Diener (both left around midnight),

Larry Greer arrived 12:30am

Moon Phase: New

Seeing: Good - Very Good

Transparency: Very Excellent

Notes: Light clouds and haze moved in around 1am. Performed a

Serpens sweep.

Observation Date: May 06, 1981

Location: Hidden Hollow - RAS

Observers: Myself again for the 4th streight time

Moon Phase: Set 12:30am

Seeing: Average - Breezy

Transparency: Very Good - High Pressure and Cold

Notes: Moon set when I was done observing the last object. Had

Schmidt 5.5" (Celestron f/1.65) set up on telescope to start

shooting astro-photo's after moon set. Bootes run.

Observation Date: May 03, 1981

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New

Seeing: Average to Great in AM

Transparency: Average to Great in AM

Notes: This is the third clear night in a row around new moon. Last

night was the best I have ever seen the Milky Way. It was

amazing. Photographed some Messiers.

Observation Date: May 02, 1981

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: New

Seeing: Good to almost excellent - Breezy

Transparency: Very Excellent - one of the best

Notes: Was the night of the Lexington HS Prom. Flood lights on parking

lot went off at 11:30pm. Photographed some Messier objects with Larry's camera (M51, M92, M14). MEL 2-1 is an 8" Planetary

I actually found and identified. Libra mopped up.

Observation Date: May 01, 1981

Location: Hidden Hollow - RAS

Observers: Larry Green

Moon Phase: New

Seeing: Good - Excellent

Transparency: Excellent

Notes: Photographed M13, M5 and M57 with 12.5". Observed Neptune

and Uranus. Both easy finds.

Observation Date: Apr 25, 1981

Location: Hidden Hollow - RAS

Observers: Brent Archinal, John Kerns, Mark Mattox, Larry Greer

Moon Phase: Will Rise 1am

Seeing: Excellent - high pressure

Transparency: Excellent

Notes: Virgo Cluster. Had all the scopes setup on the pad for first time.

Photographed Coma Star cloud, MEL 111, M13 and North Americal Nebula with Celeston 5.5" schmidt f/1.65 camera.

Observation Date: Mar 27, 1981

Location: Hidden Hollow - RAS

Observers: Cindy Scodova, Brant Archinal, Mark Mattox, Doug Wereb, John

**Kerns, Sever RAS Members** 

Moon Phase: Very Old Moon

Seeing: Very Good

Transparency: Excellent - High Pressure over Ohio

Notes: MESSIER MARATHON Night. Observed over 141 objects. Temp

dropped to 31 deg. John has his 10" scope setup. Got 108 of 110

Messier objects. Missed M74 (first) and M30 (last).

Observation Date: Jan 30, 1981

Location: Hidden Hollow - RAS

Observers: Mark Mattox

Moon Phase: Rise at 4:00am

Seeing: Excellent - 9 Best ever at this site

Transparency: Very Good

Notes: Photographed some objects using Schmidt 5.5" f/1.65. Mopped

up Leo completely. Saturn - 3 moons, dark inner ring. Jupiter - 6 to 7 band breaks and first time for center bands to show cloud

like forus. Tempature 10 deg, cold and frosty.

Observation Date: Dec 03, 1980

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Rise about 4am

Seeing: Good - Low clouds come and gone

**Transparency:** Excellent to Great

Notes: Temp cold, about 10 deg. Observed 102 objects. Awsome night.

Observation Date: Oct 31, 1980

Location: Hidden Hollow - RAS

Observers: Doug Wereb, Mark Mattox, John Kerns, Brent Archinal

Moon Phase: 3rd Qtr

Seeing: Good - very windy

Transparency: Excellent

Notes: Observed comets Stephan and Enke. Also some IC planetaries.

Moon and Regulus in close conjunction. Jupiter, Saturn, Venus

also close to Moon. Awsome. Temp about 32 degrees.

Observation Date: Oct 29, 1980

Location: Deleware Rifle Range

Observers: Mark Mattox

Moon Phase:

Seeing: Excellent - fog over resivore

Transparency: Good - best seen from Deleware to date

Notes: Observed with Mark's 8" Celestron. Observed 19 objects. Temp

around freezing.

Observation Date: Sep 18, 1980

Location: Hidden Hollow - RAS

Observers: Myself

Moon Phase: Set 1:30am

Seeing: Excellent

Transparency: Excellent

Notes: Observed 62 objects (logged).

Observation Date: Sep 10, 1980

Location: Malabar Farm

Observers: Steve (Levi) and Myself

Moon Phase: New

Seeing: Excellent - Very steady

Transparency: Very Excellent

Notes: Mount Geese (Malabar farm) on top of the hill. This site is

**EXCELLENT!!!**. Dark site, beautiful views and great horizons.

Observed and logged 101 objects.

Observation Date: Sep 09, 1980

Location: Hollywood Lane

Observers: Myself

Moon Phase:

Seeing: Fair - breazy

Transparency: Excellent - cold front just moved in

Notes: Humidity low, no dew. Best Night to date at this location.

Observation Date: Sep 07, 1980

Location: Hollywood Lane

Observers: Myself

Moon Phase:

Seeing: OK - Good

Transparency: Great - best ever at home so far

Notes: Got clouded out about 4:10am.

Observation Date: Sep 03, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: Clouds cleared at sunset

Transparency: Great - High Pressure

Notes: Observed 17 objects.

Observation Date: Aug 22, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase: Set 3:15am

Seeing: OK

Transparency: Excellent - Best yet at Perkins

Notes: Observed 27 objects, Venus.

Observation Date: Aug 19, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: Poor - Clouds come and go

**Transparency:** Poor - Extremely hazy

Notes: Got fogged out when baromeeter fell. Managed 16 objects.

Observation Date: Jul 24, 1980

Location: Perkins Observatory

Observers: Myself

Moon Phase: 2 Days past Full

Seeing: OK

Transparency: Great - Best a Perkins so far

Notes: Observed 33 objects this night, mostly double stars. Only a few

DSO were logged. This was a July to remember. Many nights

observing this month.

Observation Date: Jul 17, 1980

Location: Perkins Observatory

Observers: Myself

Moon Phase: Set at Midnight

Seeing: Excellent

Transparency: Great - best it has been for a while

Notes: Observed 36 objects this night. This continues to be July to

remember.

Observation Date: Jul 15, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: Extremely Hot and Humid

Transparency: Poor to Good. Thunderstorms in the East

Notes: Temp about 88 deg. Observed 27 objects.

Observation Date: Jul 14, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: Sky Bright - Storm moved in around 2am

Transparency: OK at start, got worse as storms moved in

Notes: Observed 20 objects before storms came in.

Observation Date: Jul 12, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: Storms just moved throught

Transparency: Great - foggy

Notes: Got fogged out about 3am. Observed 14 objects this night.

Observation Date: Jul 11, 1980

**Location:** Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: OK

Transparency: Getting Better as night goes on

Notes: Observed 44 Objects this night including H & Chi Open Cluster

and M45

Observation Date: Jul 05, 1980

Location: Perkins Observatory

Observers: Myself

Moon Phase:

Seeing: Good - Great

Transparency: Good High front moving in

Notes: Observed 16 objects this night.

Observation Date: Jun 20, 1980

Location: Perkins Observatory

Observers: Myself

Moon Phase: First Quarter

Seeing: OK

Transparency: Good - Excellent

Notes: Observed 27 objects this night. First time 12.5" visited Perkins

Obsevatory. Planets showed well.

Observation Date: Jun 18, 1980

Location: Hollywood Lane

Observers: Myself

Moon Phase: 6 days old

Seeing: Good

Transparency: OK 30-40% Humidity

Notes: Observed 46 objects this evening.

Observation Date: Jun 17, 1980

Location: Hollywood Lane

Observers: Myself

Moon Phase: About 5 days old

Seeing: Poor - Fair A lot of lights

Transparency: Poor - Fair Milky Way barely visible

Notes: Observed 24 objects on this night. First night with my new

Meade 12.5" research series reflector.

Observation Date: Jun 10, 1980

Location: Perkins Observatory

Observers: Many from OSU Astronomy Club, Doug Wereb

Moon Phase:

Seeing: Good - Sky looks bright

Transparency: Good - Excellent

Notes: Set up in front of Perkins Main Entrance. Turned out to be last

offical observation recording with my 6". Meade 12.5" will be

arriving soon. Observed 59 objects this evening.

Observation Date: May 07, 1980

Location: Perkins Observatory

Observers: Doug Wereb

Moon Phase:

Seeing: Excellent - Columbus nebula only 5 degrees above horizion

**Transparency:** Excellent

Notes: Set up outside of Schmidt Dome. Observing with Doug's 5"

refractor. Also observed Mars, Jupiter and Saturn. Observed 20 objects while using the 24" Schmidt for photography of DSO's.

Observation Date: Apr 18, 1980

Location: Perkins Observatory

Observers: Myself

Moon Phase: 4 Days Old

Seeing: Poor - Light clouds around

Transparency: Not Good

Notes: Managed to observe 11 objects. Set up on golf course outside

Schmidt dome. Photographed some DSO with the 24" schmidt

telescope. Also observed Venus and the Moon.

Observation Date: Apr 16, 1980

Location: Perkins Observatory

Observers: Myself

Moon Phase: Set 8:20pm

Seeing: Light Haze at start

Transparency: Excellent

Notes: First visit with my 6" at Perkins. Set up outside the Schmidt

while I photographed DSO with the 24" schmidt camera. Also

observed Venus, Jupiter, Mars and Saturn.