# **Okie-Tex Star Party 2017**

Arrived at the OTSP on Sunday, Sept 17, 2017 about 4 pm. Took the motorhome towing Roger Lau's trailer he loaned me. It was so rusted that it looked like it had been underwater at some point. But it got my scope there and back and I was able to wheel barrow it out of the trailer, which was nice.

It was cloudy when I arrived but near sunset, it was clearing from the south. The forecast was for clear skies that night, so I got my scope out of the trailer and set it up.

Walking past a gentleman later on, I overheard him say that Boise City was in a Severe Thunderstorm Watch. Boy, was he right.

Lots of lightening was seen over the west mesa after dark and it was coming this way. I covered my scope and then it rained very hard. The lightening was so intense and often, the field looked like it was lit up with flood lights.

I watched my scope out the back widow of the motorhome. It veined in the wind and came thru just fine.

Bringing up my 9News weather app, we were on the southern edge of an intense system. The bottom edge of a dark pink had just gone over us and now we were in a calm saddle with another pink area approaching. This second dark pink area had pea sized hail in it. Once this passed, the storm drifted off to the east.

I would have not wanted to see the center of these two dark pink areas go directly over us. This was the worst, most intense thunderstorm I've ever been in during a star party and it was bad enough.

### Monday, September 18, 2017

Clear. Light wind from SW about sunset. Seeing and transparency very good.

Berk 99	9:24 PM	24mm – 10-12 stars form an arrow head that points at 1 o'clock. 10 approx. same mag and 2 bit brighter and brightest at apex of arrow head. Fills FOV.
Stock 17	9:55 PM	17mm – A small, roundish OC with 15 stars of 2 mags. To right and near a brighter field star.
Red Film blew off Surface 2. No more OCs tonight. Brisk wind from south. Seeing and transparency good.		
NGC 7549 NGC 7553	10:17 PM	13mm – A small oval dim glow. Maybe extra something on glow. Below and near is a small dim oval glow of N7553. Maybe a hint of a hare brighter core.
NGC 7550	10:32 PM	13mm – To right and near and above a dim field star is this small, round, extremely faint smudge of light.
NGC 7558	10:51 PM	13mm – Above N7550 is this <u>extremely faint</u> , very small ghostly glow that is very near an extremely faint field star.
H95	11:02 PM	13mm – An extremely faint, very small ghostly glow. Barely there.
Started watching Algol go thru a minimum. Realized it's tomorrow night.		
NGC 1054 NGC 1059	1:14 AM	13mm - A very small, <u>extremely faint</u> , thin oval that is seen once in a while. Goes from $10 - 1$ o'clock. Uniformly lit. In same FOV and near as N1054 is N1059, a very faint doublet that could be the

1:34 am. Not finding galaxies anymore. Argo Navis works great. 12V power supply works. Green light seen after dark that was not seen when I plugged it in during daylight. Get ServoCat working tomorrow night as well as watch Algol go through a minimum that is max at 5:48 am.

unknown object. Seems to be in the right spot.

## Tuesday, September 19, 2017

Was very hazy all night. Could see Algol and comparison stars easily. Watched it basically from midnight till morning twilight. Minimum was at 5:48 am. Very cool to watch it dim quickly.

I was all by myself on the observing field most of the early morning. I was taking readings every 15 min so time passed quickly.

About 2 am, the wind shifted from the North and then it got cold. I hunkered down behind a Juniper bush which helped block the wind.

I used my mounted 20x80 binoculars until Perseus was directly overhead, when I switched to my 8x50 binoculars.

### Wednesday September 20, 2017

Clear at sunset. Light breeze from S. Contrails are short. Win supposed to be gone by 10 PM.

NGC 6506	9:15 PM	17mm – 12-15 bright blue white stars. 6 brighter, 5 bit dimmer and 3-4 much dimmer. Loose. Boxy. Fills center of FOV nicely.
Ru 137	9:19 PM	17mm – To upper right and near N6506 is this fat oval look of 20 very faint stars with 6-8 stars of same mag in middle. Small in FOV.
NGC 6546	9:34 PM	32mm – 50+ blue white stars of same, dim mag. Over 2 FOVs forms a round group on lower left FOV, then 2 lines to upper right FOV with more stars scattered in this FOV in a long, fat oval.
NGC 6469	9:41 PM	$32mm - 20-25$ dim stars of same mag outline a larger, flat isosceles triangle. Base $\frac{1}{2}$ FOV long. 10-15 dimmer stars fills inside of triangle.
NGC 6959	9:48 PM	32mm – Long, thin boxy shape. <sup>3</sup> / <sub>4</sub> FOV long. 20-30 dim stars of 3-4 mags pack this area of OC.
NGC 6625	9:54 PM	32mm – 15 stars form this long, thin curved feather with point on lower right end. ½ FOV long. End curved and opens up. Dim stars of 2 similar mags. Stands out. Has much brighter field star below it and to right of center.
NGC 6631	10:02 PM	32mm – 16 dim stars of same mag forms a 'n' shape. Fills center of FOV nicely. Then above are 3 lines of stars of same mag. Left one has 3 stars, middle one has 5 stars and right one has 7 stars.
NGC 6683	10:17 PM	17mm – 8 brighter blue white stars form an open ended circlet in a star rich area. But these 8 stars are much brighter than most stars in area.
NGC 6704	10:26 PM	17mm – 40+ very dim stars of 3-4 mags. Makes a large, curved bow shock. Fills center of FOV. Then inside bow to upper part is a small knot of 7-8 stars that forms a thin, long arrow head.

Tr 34	10:33 PM	17mm – A small, thin, very faint stars form a 'u' on right hand side and a dimmer knot on left hand side.
Stock 18	10:42 PM	32mm – Fills center FOV. 18-20 stars of 2 brighter mags forms a nice equilateral triangle. Bright starts that are easy to see they all belong together and stands out in dim star rich field.
Seeing and tran	nsparency good t	to very good for stars are steady. Light breeze now and then from SE.
Berk 104	10:51 PM	17mm – To left of a bright field star is this small, compact group of 10- 12 very faint to extremely faint stars, Right side near star has 'n' shape and $2^{\text{nd}}$ group farthest from star is a vertical line.
Stock 12	11:01 PM	32mm – 40+ blue white stars, roughly circular, overwhelms 32mm FOV. Sky Safari has little arc of 4 stars that this contains. Most are bright blue white stars with 2 dimmer mags mixed in.
Stock 11	11:12 PM	32mm – 10-12 dim blue white stars outline a large, roughly circular shape about the size of the FOV.
Berk 102	11:17 PM	17mm - 2 dim triangles at each end of a line of 3 stars. 8 all the same mag. Has 3 much fainter stars in line but might be background stars.
Berk 103	11:24 PM	17mm – 15 very faint stars of 3 mags fan out to left of a brighter field star. Approx. 1/3 FOV long and narrow. All seem of a similar magnitude so probably belong together.
Nice to see Algol back to mag 2.1. When I saw it last at 7 AM it was mag 3.0 and brightening.		
Stock 19	11:37 PM	32mm – A small, thin line of 8 dim blue white stars. Compact.
Stock 24	11:43 PM	32mm – A wide line of 10-12 very dim starts. ½ FOV long. All stars approx. same mag.
NGC 1146	11:57 PM	13mm – A tiny circlet of 5 stars, 3 dim and 2 very faint.
NGC 1197	12:01 AM	13mm – A non-existent object. Put cross hairs in cross asterism of stars. All I see are <u>extremely faint</u> stars in area.

Seeing and Transparency OK. Stars fat in Perseus. They twinkle low in the east.

NGC 1159	1:01 AM	13mm – A small, dim, round glow under a bright field star. No other stars in area has a halo around it. Sky Safari shows a field star near glow. Field star below center, but on glow and glow lopsided above.
NGC 1174	1:16 AM	13mm – A small, <u>very faint</u> oval glow. Hint of a stellar core seen once in a while in center of glow.
NGC 1164	1:20 AM	13mm – A small, thin, tilted oval. Dim, uniformly lit. A field star is below and touching halo glow in center.
NGC 1183 NGC 1178 NGC 1173 NGC 1176	1:28 AM	<ul> <li>13mm – A little knot of 4 very faint stars.</li> <li>A bright double star. Very close.</li> <li>A dim, close double star.</li> <li>A dim, close double star. All 4 in same FOV and close to each other.</li> </ul>
NGC 1198	1:37 AM	13mm – A very small, thin edge on. Very faint. Has central bulge and tiny, <u>extremely faint</u> stellar core. Tiny tapered arms off each end. 10-4 o'clock.
NGC 1123	1:40 AM	13mm – A small, very faint tilted oval. Uniformly lit. Has 2 extremely faint field stars on halo glow. Hare brighter field star on upper part and <u>extremely faint</u> field star on lower part. No central core seen.
NGC 1106	1:44 AM	13mm – A dim glow to upper left of a bright field star. Field star on lower part of halo glow and with AV, see more halo is to upper left of field star.

Seeing and transparency good. Stars pinpoints again.

NGC 1053 NGC 1040	2:16 AM	13mm – An extremely faint, thin oval, uniformly lit glow. Has 3 extremely faint field stars along lower part of glow and near but not on glow.
NGC 1086	2:20 AM	13mm – A small, thin, 2:1 oval, uniformly lit glow.

AN batteries died. It wanted to reinitialize. Found 4 AA batteries in my AM/FM radio. Glad I brought that for I didn't have any more AA batteries with me.

NGC 1130	2:45 AM	13mm – A small, round, very faint glow. Has extremely faint stellar core
		in center and 2 extremely faint field stars on glow on lower left side of
		core.

Seeing and transparency OK. Contrast is good in eyepiece. A nice dark sky.

NGC 1077 A/B	Right h	M 13mm – A <u>very faint</u> long thin, 3:1 cigar. Has 2 cores on glow. and side core is much brighter than left hand side core, which is ely faint. Both cores noticeable.
NGC 1213	2:54 AM	13mm – A very small, dim oval with tiny, hare brighter core. An <u>extremely faint</u> field star just below lower end of glow.
NGC 1233	3:01 AM	13mm – A medium sized, dim, roundish glow under a brighter field star. Lopsided to top of star more.

AN lost alignment again. Need to get the 12V Power to it.

Had a great night. Had fun using my telescope.

## Thursday September 21, 2017

I won a nice door prize. A gift bag from the Astronomical Society of the Pacific. The ASP's <u>Skywatcher</u> book, a red lighted writing pen and several other astronomy related items for beginners were in the bag along with a nice ASP bag.

Predicted to be windy tonight, which it was. Packed up my telescope about noon.

Spent most of the evening with Brad Young. He has an Obsession, ultra lite 22" telescope. Nice views. I liked catching up with him and talking AL Observing Programs.

# Summary

This was the first time I went observing that I didn't have aggressive observing goals. Instead, I wanted to get my equipment in shape and test a new observing process. I enjoyed the relaxed observing atmosphere.

#### Goal 1

This was the first time I had my 12.5" out since last year's Okie-Tex. Last year, my Argo Navis (AN) didn't seem to find objects. So I wanted to get it working. I knew I had lots of help there at the star party so I would get it working.

I built a new support for my AN and attached the mounting bracket to it. Worked very well.

I leveled my scope, tested the directions based on Gary Kopff's instructions and all was just as it should be. Monday night, my AN found objects as it should have. Wonderful!!!

Then I wanted to get the AN working with the ServoCat. During the day, I tested my 12V AC/DC converter by plugging it into the electrical grid but didn't see the green light indicating it was working. So I packed up the power and saw that Orion Telescopes sells the identical unit if I ever need to replace it. I tried one more time after dark and the power converter was working. I just couldn't see the green light in the daylight, even cupping my hands around it to make it darker.

I needed to take the cover off my ServoCat to change jumpers on the inside from the Sky Commander configuration to the AN configuration. It was windy from Wednesday on and I didn't want to expose the electronics to the dust of Camp Billy Joe, so I did this all when I got home. The AN needed the Serial 1 port configured also, which I did at home.

#### Goal 2

I wanted to see if I could use my Surface 2 and jpg star charts on my observing table. I had jpg charts of open clusters I wanted to see. I loaded these jpg charts onto a thumb drive and used it with my Surface 2.

Monday night, I used the sticky dots to hold the red filter to the front of my Surface 2. It was a bit windy and the dots are old and didn't hold it. I used the tiny spring clamps on Wednesday night to hold the red film and that worked great.

Using the Surface with jpg charts worked great. I used the Sky Safari app to show the stars of the open clusters and this helped to nail the open cluster star fields. I downloaded the Twilight app to make the whole phone screen red, but it was still too bright. I need to get a red filter for the phone also so I can dim it down more.

This is a good combination. The only thing I need to figure out is to find a way to cross out the objects observed on the jpg charts.