



# OBSERVER

## AUGUST 2025

*Bringing Stars to the eyes of Tulsa*  
since 1937

Editor – John Land



M 16 “The Eagle Nebula” in the constellation of Serpens  
By Tim Gilliland

NGC 6611 (M16 ) is one of the favorite observation points in the summer Milky Way. This giant interstellar cloud of glowing gases and dust is a region of rapid new stars formation. In the center we see the [“Pillars of Creation”](#) dust cloud. One of the most iconic images from the Hubble Space Telescope. It lies at a distance of 7,000 Light years

Tim Gilliland integrated this detailed image from 33 Thirty-minute exposures over three different nights and using H-alpha, O III and S11 filters 330 minutes with each filter From his “Hard Hat Observatory” northwest of Sand Springs, OK.

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## Stargazing Nights and Observatory Nights

Our GUESTS & Members nights are open to anyone. We do ask guests to try to RSVP.  
Large groups need to make separate arrangements.

Members Only Nights are Open to members and their family  
Details, Times and Direction Maps are posted on our Website

<https://www.astrotulsa.com/events>



### Guest and member Observatory nights

Come enjoy an evening of star gazing at our observatory located in darker rural skies.

See details and directions on our [Website Events Page](#) Guests are requested to RSVP

**Friday Aug 15 - 7:45 PM** Guest & Members Observatory Night  
**Friday Sept 12 - 7:00 PM** Guest & Members Observatory Night.  
**Saturday Oct 11 - 6:20 PM** Guest & Members Observatory Night



### Astronomy Club Members Nights

Our members are invited to come work on their observing goals, do some Astro imaging and share ideas.

**Friday Aug 22 - 7:30 PM** Members Observatory Night  
**Friday Sept 19 - 7:00 PM** Members Observatory Night  
**Friday Oct 17 - 6:15 PM** Members Observatory Night

If a Friday event must be cancelled due to weather,  
we will try on Saturday at the same time

- Always check the website for event updates

See full Event details and directions at <https://www.astrotulsa.com/events>



## Public Telescope Viewing Nights

August 1 -- 8:00 to 10:30 PM

Case Community Center

[1050 W Wekiwa Rd, Sand Springs](#)

August 30 -- 7:30 to 10:00 PM

Hunter Park ([5804 E 91st ST](#))

91st Street between Yale and Sheridan

See Event Details at

<https://www.astrotulsa.com/events>

Our member Scott Bratt has created this fun video of all the activity at one of our Spring Public Telescope nights. <https://youtu.be/jzFVv6mNgfo>



## In Town Astronomy Club meetings at Jenks High School planetarium

Meetings are Open to Guests and Members

**Friday Sept 5 -- 7:00 PM** Jenks High School Planetarium

Located at [105 East B St, Jenks, OK](#)

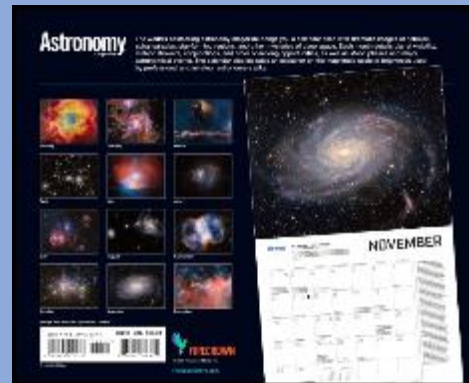
We will be resuming our in-person Astronomy Club Meetings this fall at the planetarium - Hope to see many of you there !

**OKIE-TEX STAR PARTY 42 is coming !!** <http://www.okie-tex.com>

**Friday Sept 19 to Saturday Sept 27** **Registration Deadline Aug 30**

Meals must also be prepaid by Aug 30 !! Nearest café is 34 miles away !!

See more about the wonderous dark sky at Okie-Tex later in the newsletter.



## 2026 Astronomy Calendars \$ 12 each

We will be making a bulk order for the 2026 calendars soon.

Each month has tips on sky events and historical highlights.

Retail cost is \$ 16.99 plus tax Calendars will be available at our fall meetings

Contact [astrotulsa.tres@gmail.com](mailto:astrotulsa.tres@gmail.com) to make an advanced request





Salutations all,

As the summer heat continues to climb, I hope you're all finding ways to cool off and enjoy the season.

This summer has been packed with incredible activities—solar observing at Hunter Park, members-only nights under the stars, and some truly unforgettable guest nights. Our most recent one, on July 18th, may have been the busiest I've seen in months! That doesn't happen without the dedication of our members and volunteers, so thank you for carving time out of your schedules to share the sky with our guests. This club doesn't operate without you.

Interested in volunteering to at a future guest night? Send us a message through the Tulsa Astronomy Club website contact page, and either myself or another board member will gladly answer your questions or help you get involved.

Looking ahead, we've got a busy fall lined up: the return of our in-person meetings at the Jenks High School Planetarium, Case Community Center observing nights, more Hunter Park events, and other exciting opportunities to connect with the community. We'll share full schedules and details soon, so keep an eye out.

On a more personal note, I want to reflect on a special visitor passing through our skies recently: Comet 3I/ATLAS. This interstellar traveler, only the third known object from outside our solar system, is on a one-way journey past our Sun, moving at over 60,000 miles per hour. It won't be staying long—its trajectory will carry it back into interstellar space, never to return.

Now, you might be wondering, "Why get sentimental about a dirty snowball, Jonathan? Aren't there countless comets zipping through space every second?" And you'd be right—interstellar comets are mostly ice and dust, cosmic leftovers. But for me, these visitors hold a special place. It was the first interstellar comet, 'Oumuamua, discovered in 2017, that first sparked my deep interest in astronomy and astrobiology. That strange, tumbling object pulled me down the path that's led me to where I am today — standing with all of you, looking up, and wondering what other wonders are out there, just waiting to be found.

Clear skies,

*Astronomy Club of Tulsa*

*"Bringing Stars to the Eyes of Tulsa since 1937"*

*Jonathan Fussell - President*

# ASTROCON 2025

BRYCE CANYON NATIONAL PARK UTAH | JUNE 25-28

## Report by Debra Chapman



Steve and Debra Chapman were able to attend the 2025 Astronomical League Conference in Utah. They made a family outing of it along with their daughter Susan, husband Jason and grandkids. Those of us who have been in the club many years fondly remember Susan as a kid being an enthusiastic star lover when she came with her dad Steve.

The Astronomy League Convention held at Ruby's Inn, Bryce Canyon, UT, was extra special for us this year because our daughter's family was able to join us. None of us had been to Bryce Canyon area or Utah. We signed up early for ASTROCON and our stay at Ruby's Inn.

Steve had a serious health issue popped up during the winter and kept us quite busy into spring. However, by June sufficient improvement gave us the green light to start us packing and getting ready to make our trip for 2025 ALCON. We left for Utah on the 21st and arrived on the 24th. Our planned four day drive up was ideal - stress free, comfortable, and enjoyable.

Even though fires plagued the area close to Bryce Canyon, smoke did not obscure all areas from stargazing! Our daughter, Susan, and son-in-law, Jason, chose to have us ride with them out to Rainbow Point - which is located at the end of the Southern Scenic route. When we arrived, we noticed most were doing Astrophotography. It was windy; but the star-filled sky was fabulous! We were glad Steve had reserved us a spot. Susan remembered and was correctly naming so many of the constellations she had learned as a child! She and her dad, Steve, were having fun passing that knowledge on to our grandkids. We enjoyed the clear sky under our cozy blankets and comfy chairs. As usual for us, Steve & I brought our reclining lawn chairs. Glad Jason could get them in his luggage carrier. Steve did have his SeeStar S50 telescope and took a few pictures.

The next night, the stars were also quite visible; but we enjoyed them at a different location - Farview Point (aka Far Point). Other than our family, only one other person was there. Since the other visitor to the site was not doing astrophotography, our daughter used her green laser pointer a few times. We used our binoculars for a little while. Then, Steve set up his SeeStar S50 telescopes. I always like watching for shooting stars - I did get to see two. Saw lots of satellites. Our family had a good time. We felt blessed to be together and so happy to be enjoying Steve's hobby with him under Utah skies.

At sign-in when we picked up our welcome packet and materials, we noticed our daughter collecting a sketch pad and items for a sketching workshop. To our delight, we learned our 13-year-old granddaughter had expressed interest in that. She likes to be artistic, from dancing to drawing. She is good at both. She attempted sketching while stargazing. Her PaPa setup the SeeStar for her. The wind convinced her to put away the red light and her materials and do her drawing later from memory.

Our 5-yr old grandson likes to copy his sister; but, has a shorter attention span when it comes to drawing. He will sit still for a story, or a game. So, when we walked through the shops at Ruby's

Inn, I got him a deck of cards with constellations printed on them. I bought myself the same cards. I had an idea for a memory game we could play.

We strolled through the Exhibitors' booths more than once, and we made several purchases from the vendors. With all the books, star charts, hats, etc., that Susan and I were buying, the two Astronomy League tote bags I purchased came in most handy.

We thought about the Astro photographers in our own club, because this 2025 ALCON convention had many excellent speakers who talked about different aspects of Astrophotography. To see the presenters and the titles of their topics, one can visit this website: [astrocon2025.org/presenters](http://astrocon2025.org/presenters).

We missed getting to see a speaker: Terry Mann, the Vice President of The Astronomical League. She spoke the afternoon of the 25th on ***"Imaging and Recording the Aurora."*** We were able, though, to locate some of her YouTube presentations; plus, several articles in publications.

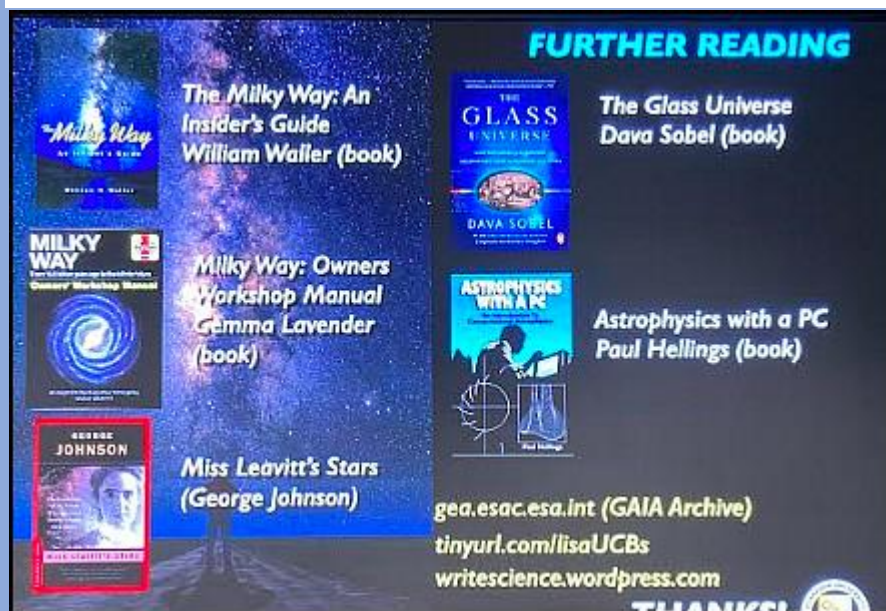


The keynote speaker at the banquet, Saturday night, was **Dr Shane Larson**. Dr. Larson is a research professor of physics at Northwestern University, where he is the Associate Director of CIERA (Center for Interdisciplinary Exploration and Research in Astrophysics). He works in the field of gravitational wave astrophysics, specializing in studies of compact stars, binaries, and the galaxy with both the ground-based LIGO project, and future space-based observatory LISA. His presentation was:

***"A Storm of Stars: Knowing The Milky Way From Star Counts To Gravitational Waves."***

My notes from his talk, read as soundbites which highlight progress from Galileo's short astronomical treatise in 1610 to *"the future space-based observatory LISA."* His energy held our attention. I like listening to speakers who are passionate and knowledgeable in their fields of expertise.

Along with our souvenirs, programs, and pictures, we got to bring home a door prize. Steve won a James Webb desk clock at the Friday afternoon Star-B-Que! It's a perfect size to set on the bookshelf.



**Debra & Steve Chapman**  
Astronomy Club of Tulsa





**OKIE-TEX STAR PARTY 42 is coming !!** <http://www.okie-tex.com>  
**Friday Sept 19 to Saturday Sept 27** **Registration Deadline Aug 30**  
 Meals must also be prepaid by Aug 30 !! Nearest café is 34 miles away !!

Each fall amateur astronomers from all over the country gather in the western Oklahoma Panhandle to enjoy a weeklong “Star Feast” under some of the darkest Bortle 1 sky on the planet. It’s a memory you will cherish for a lifetime and yearn to go again. Search the November issues of our [Newsletter archives](#) for several yearly issues showing our members enjoying Okie-Tex.

Our observing chairman, Brad Young, shares some of his descriptions of the Bortle 1 Okie-Tex night sky in his book [“Take What the Night Sky Gives You”](#) Paraphrased in **BOLD** are a few selections from his book. The portions with \*\* are some of the editor’s personal experiences at Okie-Tex.

**Zodiacal Light, gegenschein and zodiacal band clearly visible.** The Okie-Tex observing fields are nestled on a broad plain in the Black Mesa area of Oklahoma. To the west side of the mesa is the tiny town of Kenton, OK population less than 50. *\*\* My first time at Okie-Tex I was a bit perturbed by triangular column of light extending well above the mesa to the west after evening twilight. How could such a tiny town have so much light? Then it was kindly pointed out to me that this was the [Zodiacal Light](#) produced by billions of tiny particles orbiting along the ecliptic plane in the visible Zodiac constellations.*

[Gegenschein](#) **\*\***This phenomenon is a bit more challenging. It is produced by tiny particles orbiting directly opposite the sun shining back at us like tiny full moons. You’ll need to wait later in the evening around midnight and scan the sky with averted vision for a faint oval of enhanced light lying along the ecliptic plane. It’s about 25-30 or so degrees across. In September look for

it in the region of Pisces below the Great Square of Pegasus. Once identified, its easily located by the unaided eye.

**The Scorpius and Sagittarius region cast diffuse shadows on the ground.** \*\* That region of the Milky Way is astounding ! Rising up like a flaming band of starlight and arching into the Summer Triangle. The dark galactic dust clouds are easily visible to the unaided eye. Several of the larger star clusters are also visible. As the autumn and early winter constellations rise higher you can easily see the Milky Way flowing to the NE into Cepheus and Cassiopeia regions. If Venus or Jupiter are up, place a white sheet of paper below your hand and look for its shadow.

**The M 33 galaxy is an obvious naked eye object.** \*\* M 31 in Andromeda is easily seen and below you can find M 33.

**Limiting Magnitude of 7.5 or better with effort.** \*\* To experienced observers like Brad I'm sure this is true. My measure is if I can see all the corner stars of the Little Dipper ( which hangs low to the northern horizon in September ) and some fainter stars of 5.5 and 6.3 near the top right corner of the bowl near Eta Ursa Minor. Or count the stars inside the Great Square of Pegasus and then look up the magnitude of the fainter ones. Before you go study your constellation patterns carefully. There are so many more stars you'll have to concentrate a bit to identify the simple patterns we see near town. Faint obscure ones like Camelopardalis are easy to trace out.

\*\* Well, I've rambled on too long. It's a place you just have to experience to believe. My advice is to leave your scope covered the first night and just bask in the wonders of starlight. When I taught about light pollution, I used to tell my students we suffer from "*Generational Amnesia*" The idea that the feeble starlight we see around the towns is the way the sky really is. My grandfather who worked cattle in the panhandle at the end of the 19<sup>th</sup> century saw a vast canopy of star filled sky every moonless night. For millennia people marked the seasons of planting and harvest, navigated the oceans, and explored vast stretches of the land by the patterns of stars in the sky.

Comments by *John Land*





Click on these images  
to links on the Internet



\*\*\* The **CLEAR OUTSIDE** icon above is a link to an extensive site showing cloud cover %,

Seeing, Transparency, Moon Phase, Temp in ° C and many other useful tools

**GOT A NEW TELESCOPE?** Here are some sites to help you get started with you telescope.

Getting Started with Your New Telescope

<https://skyandtelescope.org/astronomy-news/getting-started-with-your-new-telescope-2/>

Astronomy for Beginners | Night Sky Facts, FAQs & Resources

<https://skyandtelescope.org/astronomy-information/>

What to Know Before Buying a Telescope

<https://skyandtelescope.org/astronomy-news/what-to-know-before-buying-a-telescope/>

See [Website Observation Station](#) for a collection of [Interactive Sky Watching Tools](#)

Moon phases - Sun rise & Set - [Make your own custom interactive sky chart](#) and more

Great website for printable Finder Charts of Solar System objects <https://in-the-sky.org/>

**JUNE - Moon Phases - -**

**Full** Sat Aug 9 - - **3rd Q** Fri Aug 15 - - **New** Sat Aug 23 - - **1st Q** Mon Aug 31

**Lunar conjunctions -**

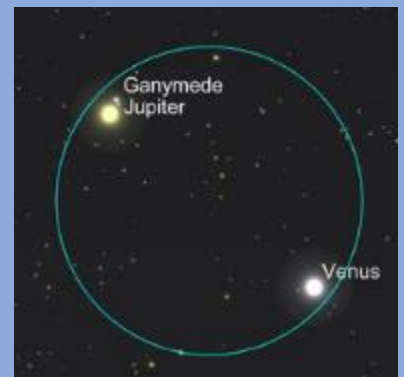
The moon rises near **Saturn & Neptune** about 11:00 PM on Monday Aug 11

It the mornings look for the moon near **Jupiter** on Tues Aug 19 and **Venus** Weds Aug 20 and **Mercury Thurs** Aug 21 Then in the evening on **Mars** Tues Aug 26

On the morning of August 12 look to the ENE for when our two brightest planets Jupiter and Venus will both be withing One Degree of each other. The rise about 4:00 AM and should be still visible in the morning twilight as late as 6:00 AM



Saturn is rising in the east about midnight in early August an 9:00 PM by the end of August. We are viewing Saturn along the plane of its thin rings. Its large moon Titan has a series of shadow transits on the disc of the planet.



#### Upcoming Titan Shadow Transits (UT)

Date	Start	Mid-transit	End
Aug 3	6:25	8:52	11:04
Aug 19	5:52	8:01	10:00
Sep 4	5:25	7:09	8:50
Sep 20	5:09	6:20	7:34
Oct 6	—	5:32*	—

\*Full shadow on disk only at mid-transit

See Brad Young's Observing Article for more Saturn challenges

**View Shadow Transits of Saturn's moon Titan**

on Aug 3 and Aug 19. See **page 16** in our [May Newsletter](#) for more details

#### Tulsa Times

	Start	Mid	End
Aug 3	1:25	3:52	6:04 < twilight
Aug 19	0:52	3:01	5:00
Sep 4	0:25	2:09	3:50
Sep 20	0:09	1:20	2:34

## Observing Chairman Brad Young



# Saturn Needs No Rings to Fascinate

The loss of Saturn's rings every 15 years as we pass through the plane between Saturn and the Sun is something of a letdown. Saturn's crown and glory after all is the most magnificent ring system in the solar system. However, as they say there's a silver lining to every cloud and the lack of rings opens other possibilities for Saturn that aren't always available. For one, the disc of the planet is completely exposed and more can be done to image and visually explore the disc especially the areas that are often covered by the rings in the equatorial zones. But perhaps the coolest thing is that Titan, its largest moon, can throw its shadow on the disc, visible with even a small telescope.

On July 18th I attempted this myself. It wasn't a very good morning at all, it had been cloudy all night and was barely clearing at 5:00 a.m. when I tried it. But at 5:35 I barely perceived a small dark spot just above the rings on the west side (left in my mirror reversed ETX-125). That's where it should have been, but I couldn't get high power to focus with very unsteady skies. I'm not satisfied and will be looking at other events coming up. Luckily, we have a few more this year before things tip too far and the shadow misses the disc. And to add to the experience, Saturn will be getting higher in the sky earlier at night and some of the shadow transit times are almost convenient and summer and early fall. I've adapted a list from Astronomical League below that shows when they are for Tulsa.

### **Titan events in July and August 2025 (all times CDT)**

Shadow transit begins: Jul 2, 2:39 a.m.

Disappearance: Jul 10, 12:59 a.m. – 1:16 a.m.

Reappearance: Jul 10, 6:30 a.m. – 6:49 a.m.

Shadow transit begins: Jul 18, 1:58 a.m.

Disappearance: Jul 26, 12:13 a.m. – 12:30 a.m.

Reappearance: Jul 26, 5:32 a.m. – 5:50 a.m.

Shadow Transit: Aug 3, 1:20 a.m. – 6:10 a.m.

Disappearance: Aug 10, 11:28 p.m. – 11:46 p.m.

Reappearance: Aug 11, 4:33 a.m. – 4:52 a.m.

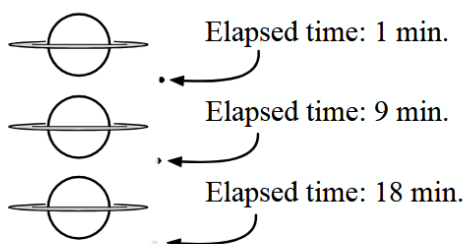
Shadow Transit: Aug 19, 12:46 a.m. – 5:10 a.m.

Disappearance: Aug 26, 10:46 p.m. – 11:04 p.m.

Reappearance: Aug 27, 3:33 a.m. – 3:51 a.m.

• Reappears while Titan is 25% occulted at the south rim of Saturn.

### **Titan's disappearance**



- Make sure that Saturn is sufficiently high above the horizon at your location.
- Begin viewing a few minutes before the listed times.
- Use high magnification.
- It takes about 18 minutes for Titan to slide into or out of Saturn's shadow.
- Titan needs 4-5 hours to pass through Saturn's shadow.

It won't matter where you are, from Earth they'll all be at this moment, changing only with time zone. The crossing of Titan's shadow across Saturn is also accompanied by Titan being eclipsed by Saturn itself as it passes behind the planet. Those times are also listed as well as the durations and how long it takes for it to disappear and reappear each time. I haven't seen that yet and plan to look for that at the next occasion.

If these aren't enough, **Bob King** at Sky and Telescope also says: ***"Rhea's also fair game. Rhea, the planet's second largest satellite, casts a shadow just 0.3" in diameter. Telescopes in the 8 to 10-inch range should be able to tackle it in excellent seeing. Also, because Rhea orbits much closer to Saturn, transits are more frequent. To find out when they'll happen, use a stargazing app like Stellarium or SkySafari and run through a simulation."***

Let me know if you try any of this, and what your experience was or if you have an image or sketch, please send it to me at [hafsnt1@gmail.com](mailto:hafsnt1@gmail.com)

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## Earn an Observing Certificate this Summer ! By John Land

A great way to enjoy and grow your knowledge of the night sky is to choose one of the [Astronomical Observing Certificate programs](#) and with to completion. Programs are available for all levels from novice to veteran observers. There are levels for naked eye, binocular and telescope observer levels. The website has many resources to develop the skills you will need. Also, we have several members who can mentor you on your journey to discover the mysteries of the night sky. Brad's article above illustrates that developing a system for recording and organizing your observations can build a lifetime of memories. In November we have our annual club dinner. **We would like to be able to recognize several of our members who have completed a certificate program.**

**Set your goal now to be one of them?**

See our [July 2025 Newsletter](#) page 16 for more details



### **Celestron Nexstar 9.5-inch Evolution telescope package for sale**

**Asking \$ 1900** Bought New in February 2025 price was \$ 2995

Save \$ 1,100 for a great new telescope

Package includes Nexstar 9.25" OTA, Heavy Duty Tripod, Nexstar Hand Controller, Red Dot Star Pointer, Auto Mount w/Batt & WiFi, 1 1/4" Visual Back, 1 1/4 Star Diagonal, 1 1/4 " 13mm & 40mm Plossl eyepieces, 110v AC Adapter, Manual. Software and Firmware have been uploaded with latest versions.

Contact Ron Dunn [rondunn43@gmail.com](mailto:rondunn43@gmail.com)

[YouTube video review](#) of Celestron 9.5 Evolution scope



## Treasurer Report Cathy Grounds



As of July 24, 2025, we have **176** members **23** new members so far this year! Please welcome our newest members Richard Foster, Austin Newton, Robert McDaniel, Cameron Green, Mickey Smith, Allie Christensen, and Ashley Doyle.

We had an enthusiastic bunch of guests at our July 18 Observatory night.  
Several of them made nice donations to show their appreciation.

**FAQ: How do I know when to pay my dues?** You will receive a notice by email that it is time to renew your membership. Look for it on or around the 1<sup>st</sup> of the month in which your membership expires. If you are not sure you are always welcome to check with the treasurer.

1. PayPal (click "join/renew" on the website) and follow the prompts, there is small fee.  
( You can use any major credit card - you don't need a PayPal account )
2. Mail in a check or money order to Astronomy Club of Tulsa,  
PO Box 470611, Tulsa, OK 74147.
3. Direct your bank's bill pay service to send payment to our PO Box address above.
4. Pay cash at any club event or swipe a credit card (there is roughly a 3% service charge).

As always if you have any questions or concerns or if your email, phone, or postal address has changed please email me at: [AstroTulsa.Tres@gmail.com](mailto:AstroTulsa.Tres@gmail.com)

Membership rates for 2024 - 2025 are as follows:

All include an Astronomical League Membership, and you will receive their magazine *The Reflector* each quarter.

Adults: \$ 50 per year

Sr Adult: \$ 40 per year ( 65 or older )

Students: \$ 40 per year

Additional Family membership: \$ 30 includes voting rights

The regular membership allows all members in the family to participate in club events but only ONE Voting Membership and one Astronomical League membership.

**Magazine Subscriptions-** You can see subscription info on the "Join" tab at [www.astrotulsa.com](http://www.astrotulsa.com).  
You can get a discount rate as an Astronomy Club member. You will need to do so directly using their web links below to make your subscription

To learn about [Sky and Telescope magazine](#) see their home page  
Digital \$ 37.05 Print & Digital \$ 45.75 includes a \$ 10 club discount  
Use this [Sky & Telescope Subscription Link](#)

To learn about [Astronomy magazine](#) see their home page  
Use this [Astronomy Subscription Link](#) Digital \$ 39.95 Print & Digital \$ 49.95 no club discount



**This article is distributed by NASA's Night Sky Network (NSN).**

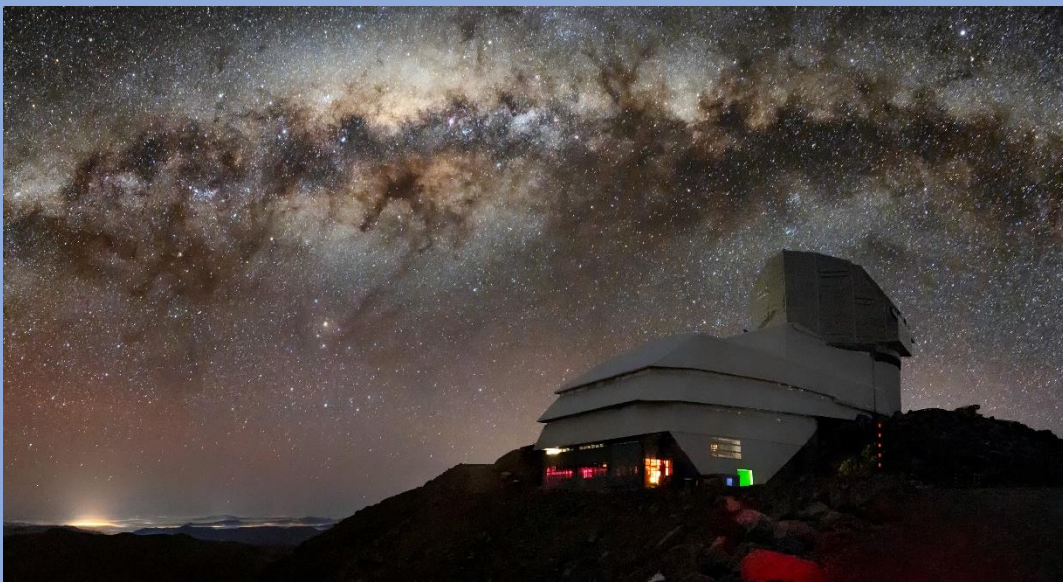
The NSN program supports astronomy clubs across the USA dedicated to astronomy outreach. Visit [nightsky.jpl.nasa.gov](https://nightsky.jpl.nasa.gov) to find local clubs, events, and more!

## August's Night Sky Notes: The Great Rift

By Dave Prosper      Updated by Kat Troche

Summer skies bring glorious views of our own Milky Way galaxy to observers blessed with dark skies. For many city dwellers, their first sight of the Milky Way comes during trips to rural areas - so if you are traveling away from city lights, do yourself a favor and look up!

To observe the Milky Way, you need clear, dark skies and enough time to adapt your eyes to the dark. Photos of the Milky Way are breathtaking, but they usually show far more detail and color than the human eye can see – that's the beauty and quietly deceptive nature of long exposure photography. For Northern Hemisphere observers, the most prominent portion of the Milky Way rises in the southeast as marked by the constellations Scorpius and Sagittarius. Take note that, even in dark skies, the Milky Way isn't easily visible until it rises a bit above the horizon, and the thick, turbulent air obscures the view. The Milky Way is huge, but it is also rather faint, and our eyes need time to truly adjust to the dark and see it in any detail. Avoid bright lights as they will ruin your night vision. It's best to attempt to view the Milky Way when the Moon is at a new or crescent phase; a full Moon will wash out any potential views.



The Vera C. Rubin Observatory, located at Cerro Pachón, Chile, under the Milky Way. The bright halo of gas and stars on the left side of the image highlights the very center of the Milky Way galaxy. The dark path that cuts through this center is known as the Great Rift, because it gives the appearance that the Milky Way has been split in half. Image Credit: [RubinObs/NOIRLab/SLAC/NSF/DOE/AURA/B. Quint](https://www.noirlab.org/observers/rubin/)

Keeping your eyes dark-adapted is especially important if you want to not only see the haze of the Milky Way, but also the dark lane cutting into that haze, stretching from the Summer Triangle to Sagittarius. This dark detail is known as the Great Rift, and is seen more readily in very dark skies, especially dark, dry skies found in high desert regions. What exactly is the Great Rift?

You are looking at massive clouds of galactic dust lying between Earth and the interior of the Milky Way.

Other “dark nebulae” of cosmic clouds pepper the Milky Way, including the famed [Coalsack](#), found in the Southern Hemisphere constellation of Crux. Many cultures celebrate these dark clouds in their traditional stories along with the constellations and the Milky Way. One such story tells of a [Yacana the Llama](#), and her baby, wandering along a river that crossed the sky – the Milky Way. The bright stars Alpha and Beta Centauri serve as the llama's eyes, with the dark sections representing the bodies of mother and baby, with the baby below the mother, nursing.



In the activity, "[Our Place In Our Galaxy](#)", if the Milky Way were shrunk down to the size of North America, our solar system would be about the size of a quarter. At that scale, Polaris - which is about 433 light years distant from us - would be 11 miles away. Image Credit: [Astronomical Society of the Pacific](#)

Where exactly is our solar system within the Milky Way? Is there a way to [get a sense of scale](#)? The "[Our Place in Our Galaxy](#)" activity can help you do just that, with only birdseed, a coin, and your imagination. You can also discover the amazing science NASA is doing to understand our galaxy – and our place in it - in the [Galaxies](#) section of [NASA's Universe](#) page.

*Originally posted by Dave Prosper: June 2021*

*Last Updated by Kat Troche: July 2025*



**You are invited to come join us to learn more about  
Astronomy and view the wonderful sights in the night sky.  
Check the EVENTS section at <https://www.astrotulsa.com/>**



During the school year our club holds a  
**Monthly General Club meetings at  
Jenks Public Schools Planetarium  
205 East B St, Jenks, OK  
Located North of the intersection of  
1st and B St**

**Meetings begin at 7:00 PM**

**When you enter the building lobby,  
take the elevator to the 3<sup>rd</sup> floor.**

**[Click for Google Map Link](#)**



#### **ASTRONOMY CLUB OBSERVATORY**

Located on a hilltop about 25 miles SW of Tulsa  
Features: classroom, restroom, dome with 14-inch telescope  
and an acre to set up your telescopes.

Weather permitting, we host two types of observing nights.

#### **GUEST OBSERVING NIGHT – RSVP requested**

This event is open to our Guests – both individuals and  
families as well as our regular members. Several of our club  
members set up telescopes for public viewing.

\* Groups need to make separate arrangements.

**MEMBERS OBSERVING NIGHT** usually on a Friday near new moon  
Reserved for club members and their families to allow them to pursue observing projects.  
The Observatory is ONLY OPEN for SCHEDULED EVENTS.

**Check the EVENTS section at <https://www.astrotulsa.com/>**

Follow our map directions DO NOT USE GPS

**Two Options for travel to the observatory**

**[MOSTLY PAVED ROADS](#) – Hwy 75 to 201st St S – through Mounds OK**

**Most [DIRECT ROUTE](#) – Hwy 75 to 241st St S – some coarse gravel & dirt roads**

## ASTRONOMY CLUB OFFICERS:

PRESIDENT – JONATHAN FUSSELL  
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SECRETARY – SKIP WHITEHURST  
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TREASURER – CATHY GROUNDS  
[astrotulsa.tres@gmail.com](mailto:astrotulsa.tres@gmail.com)

You may also contact club officers or board members using the CONTACT tab on our website

## BOARD MEMBERS-AT-LARGE:

MIKE BLAYLOCK  
DON BRADFORD  
JERRY CASSITY  
BRYAN KYLE  
JOHN LAND  
JACK REEDER  
JAMES TAGGART  
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– Cathy Grounds

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SIDEWALK ASTRONOMY – TIM GILLILAND

PR AND OUTREACH – **Open Position**  
GROUP DIRECTOR – **Open Position**

NIGHT SKY NETWORK – Jonathan Fussell

# Enjoy at Planetarium Show at Jenks High School

## JENKS PLANETARIUM



Jenks High School Campus  
205 East B Street, Jenks

**TICKETS** are \$7

See our Current Shows  
Schedule and ticket purchase  
links at

[Shows and Ticket Link](#)

Shows take place on Tuesday evenings  
or Saturday mornings

Must purchase tickets online in advance

[Shows and Ticket Link](#)

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