

Antares



The Newsletter of the Kansas Astronomical Observers

Meeting time: **March 16, 2019** **3:00 pm**

Location: **Great Plains Nature Center (GPNC)**

Speaker: **Harold Henderson**
Topic: **History of LAPO part 2**

KAO Website: <http://www.kaowichita.com>
The Night Sky Network: <http://www.nightsky.jpl.nasa.gov>
The Astronomical League: <http://www.astroleague.org>

If you have comments or suggestions for an article in the newsletter, e-mail them to:
kevin.l.kight@gmail.com *Please begin the subject line with "Antares"

Current Club Officials

President:	Jerelyn Ramirez	jerelyn.ramirez@gmail.com
Vice-President:	Tony Haidai	thaidai@cox.net
Treasurer:	Paul Ramirez	ramirezpm2@gmail.com
Newsletter/Media:	Kevin Kight	kevin.l.kight@gmail.com

Next Month's Meeting: April 20 @ 3:00pm, Great Plains Nature Center (GPNC)

Club Updates:

Call for Meeting Speakers:

For those members that wish to create and present during a club meeting, or that have a suggestion for a guest speaker during the fall and winter meetings, contact the Club Vice-President: Tony Haidai (thaidai@cox.net)

Newsletter Items for Publication:

Please submit items for publication prior to the 10th of each month to be included in that month's newsletter.

Club T-shirts available:

Club T-Shirts are always available to all club members year around. (or anyone who wants to support the club) \$10 each, indicate size and quantity to Jerelyn Ramirez or Paul Ramirez by email or at club meetings / outings.

From The Desk of Jerelyn Ramirez:

This is the year of "A Universe of Stories" theme at libraries around the country. This themed program is encouraging libraries to reach out to astronomy clubs to provide an astronomical experience for their patrons. With that being said, our club has been contacted to provide astronomy related activities and presentations for their young patrons. We have many requests for astronomy educational outreach during the day, and a few observing requests at night, or both on different days.

So far we have four libraries scheduled on the calendar with six events, with three more libraries pending scheduling. We are working out the details of when they want to schedule it.

Many of these libraries are rural communities in Kansas. They have reached out to us via email through our media sites, Night Sky Network, and the KAO website. These communities don't have access to local astronomy clubs and we are the closest to them. What an opportunity to bring the experience of astronomy to them.

We have two events scheduled at the Mulvane Library, two at the Saint Marys Library, the Augusta Library, and one at the Coldwater Library.

The three pending are Belle Plaine, Douglass, and Silver Lake Libraries. These will be posted on the calendar when more information is collected.

If any would like to help with any of these events, this would be an excellent opportunity to share your experience to these small town communities and young minds.

You can email me or call for any questions about any of these libraries. I will be sending out RSVP requests soon. Any help would be much appreciated.

Astronomical League Website:

Due to the lack of login interest to the Astronomical League website, this feature has been removed from our use. Login access has been suspended (blocked) and all stored documents and information has been removed. You will no longer be required to login to have access to current and back issues of the Reflector Magazine. It has been made available on the normal website.

June Meeting Special Announcement:

The June Club Meeting has been moved to June 22nd. The meeting will still be held at LAPO at the same time of 7:30 p.m.. The reason for the change; this year the Symphony in the Flint Hills (SFH) is holding their event on June 15, our scheduled club night. Several club members (including the President and Treasurer) participate in this all day event which is scheduled to take place in Chase County.

This was brought up at our January meeting and was put to a vote to move our scheduled time a week later rather than cancel, or have someone else facilitate the meeting.

Normally the SFH hold their annual signature event on the second weekend of June without conflicting with our scheduled meeting. This is their 14th annual signature event and this will be our 13th invitation to this event. It is unknown why the SFH has made this change.

Another reminder will be sent out as the June meeting draws closer. The calendar has been updated to reflect the change. You can log onto [NSN](#) or navigate to our [KAO website](#) for this information. This will also be posted on our facebook page.

February Club Meeting:

See addendum for a short summary about the February club meeting.

Solar and Planetary Items:

Moon Phases:

Last Quarter: February 26

New Moon: March 6

First Quarter: March 14

Full Moon: March 20

Last Quarter: March 27

New Moon: April 5

First Quarter: April 12

Full Moon: April 19

Planets:

Mercury – Hidden in Solar Glare

Venus – Visible in the morning in Capricornus; rises approximately 6:00 am

Mars – Visible after sunset West in Aries; setting approximately 12:00 am

Jupiter – Visible in the morning in Ophiuchus; rises approximately 3:00 am

Saturn – Visible in the morning in Sagittarius; rises approximately 4:50 am

Uranus – Visible in Aries; Setting approximately 9:30pm

Neptune – Hidden in Solar Glare

- Spring Equinox is on March 20th

Comets:

Listed below are comets possibly visible in telescopes from the Wichita area (approximately cutoff at magnitude 15; if available the observed magnitude is used in favor of the JPL prediction). Magnitudes shown are approximate predictions for mid-month. Links are provided for additional information:

<http://cometchasing.skyhound.csom/>

38P/Stephan-Oterma: A fading morning comet in Lynx

Magnitude 12.9

<https://theskylive.com/38p-info>

C/2018 Y1 (Iwamoto): An all night comet in Auriga

Magnitude 8.9

<https://theskylive.com/c2018y1-info>

46P/Wirtanen: A morning comet in Ursa Major, moving into Leo

Magnitude: 10.6

<https://theskylive.com/46p-info>

Event Reports:

If you've participated in a club event, please submit an event report to be included here by the 10th of each month. It doesn't have to be anything formal, just a brief description about the event and how it went. Credit will be given unless you request to be kept anonymous.

Symphony in the Flint Hills at the Volland Store

Jerelyn Ramirez has provided an event report on the Volland Store Event. See addendum for details.

Upcoming Regional Events:

Symphony in the Flint Hills – June 15

Chase County, Host:Irma's Pasture

Time: 10:00 AM - 11:00 PM

This year is the 14th Annual Signature Event at the Symphony in the Flint Hills and will be held in Chase County. The theme this year is Ad Astra. The host ranch is Irma's Pasture in Bazaar, Kansas. The private ranchland in Chase County is owned by Mike Stout, board chair for Symphony in the Flint Hills, and his brother, Joe Stout.

This year's theme will shine the spotlight on the state's motto "Ad Astra," with region-wide activities that tie to Jump!Star, a multi-faceted arts program developed by artist George Ferrandi with support from the National Endowment for the Arts.

This is an all day event. Telescopes are set up for solar viewing while educational outreach presentations are held inside the educational tent before the concert begins. This is a collaboration with the Salina Astronomy Club. At the conclusion of the concert patrons come by for some evening viewing. Jupiter will be in the southeast sky at sunset in Ophiuchus about 8° from the two days from Full Moon to the west. Saturn will be rising on the eastern horizon around 10:30 p.m. about an hour before the end of evening twilight.

Please contact the SFH Team Leader Jerelyn Ramirez for questions, your volunteer assignment, parking passes, and other information regarding this event.

See NSN for details and updates

MSRAL 2019 – June 14-16

Rockhurst University, 1100 Rockhurst Road Kansas City, MO 64110

MSRAL event is being held this year in Kansas City, MO, hosted by The Astronomical Society of Kansas City.

There will be speakers, Vendors, and an Astrophotography Contest.

For more information go to www.msral.org

Fall River Star Party – August 2-3

Fall River State Park, Casner Creek Campgrounds

Come join us at the annual Fall River event. Join us for an evening of dark skies and deep space viewing. Jupiter and Saturn will be featured this night too.

Camping is available for all who want to come out for some dark sky viewing. Come for the dark skies and the fellowship. A dinner is planned before the Saturday event for all who attend.

See NSN for details

Upcoming KAO/Public Events:

Messier Marathon #2 – April 5-6

Butler County State Lake, Latham, KS 67072

This is the backup date for Messier Marathon #1.

Lets stay up all night to try and find all the Messier objects in one night. March is the best time to try this attempt. Now all we need a clear sky. So come on out and try to find as many Messier objects as you can. If finding Messier objects is not your thing you can still join the fun and observe whatever you like.

See NSN for details

Arkansas City Public Library – May 10

Arkansas City Public Library, 120 East 5th Ave, Arkansas City, KS 67005

An adult educational astronomy event. We will be learning about the asteroids in the asteroid belt and what actions we can take if one is heading for Earth.

See NSN for details

Kick-Off Party – May 20

Mulvane Public Library, 408 N. 2nd Ave., Mulvane, KS 67110

The Mulvane Public Library is hosting a Kick-Off Party with informational booths to promote business or events. The Kansas Astronomical Observers has been invited to set up an astronomy educational booth for the event. There will be some hands on activities and visual aids to enhance your astronomy experience.

See NSN for details

Mulvane Family Mulvane Public Library – June 7

Mulvane Public Library, 408 N. 2nd Ave., Mulvane, KS 67110

The Mulvane Public Library is hosting an event for family with the theme on Space...a Universe of Stories. Come and learn about our Solar System.

See NSN for details

In the Moonlight – June 10

Pottawatomie Wabunsee Regional Library, 306 N 5th Street, Saint Marys, KS 66536

Have you seen the Moon up close? Craters, lunar features, and lunar landing sites are awesome up close. Come by the library in Saint Marys. We will set up on the south parking lot. Experience some lunar fun.

See NSN for details

Augusta Library– June 28

Robert Shryock Park, 2923 Ohio Street, Augusta, KS 67010

Please come on out to the Robert Shryock Park in Augusta for some awesome observing. The park is located north on Ohio Street. We will have some before the sun set activities. After the sun sets we will be able to see through the telescope at Jupiter high in the sky, and Saturn rising in the east.

We will attempt to locate an asteroid in the asteroid belt; (1) Ceres.

See NSN for details

Coldwater Library Summer Reading (Universe of Stories theme) – July 10

Coldwater Library, 221 E. Main, Coldwater, KS 67029

This would be an indoor event at the Coldwater Public Library and preferably in the morning. Any educational emphasis on the universe, the night sky, etc. that could help children learn about the world above us. Pictures or any other type of material would be appreciated for them to learn as well. Of course, if you have any recommended books on the subject, those suggestions would be appreciated as well. This year's theme is "Universe of Stories" which is very fitting with it being the 50th anniversary of the Apollo 11 moon landing. So, anything would be very helpful.

See NSN for details

Astro Fest 2019 – August 10

Lake Afton Public Observatory (LAPO), 5000 West 39th South, Goddard, KS 67052

Time: 1:00 PM – 1:00AM

This is a collaboration with LAPO. Solar activities during the day with other activities through out the day. Having telescopes for the visitors to share with them the wonders of the night sky. This night is three days after a first quarter Moon. Yes it is a lot of Moon, but most visitors have never looked through a telescope and the Moon is always a huge hit. There will be a nice terminator to visually see some depth to some craters. This is also the 50 year Anniversary of the Apollo lunar landing missions. All six landing sites should be visible, you can point them out with your telescope.

This is the second annual event to promote the observatory. To make this astronomy party a success we need volunteers. They plan to stay open till 1:00 a.m.

So lets help out LAPO by kicking off this astronomy party.

See NSN for details

Volland Store – August 24

The Volland Store, 24098 Volland Rd, Alma, KS 66401

We have been invited to help host an event at the Volland Store in Alma Kansas. Dark skies are on the agenda where we can observe Jupiter and Saturn. Even Urnaus and Neptune will be up for a showing if conditions are right. What about a few comets, there is the possibility a couple will be close enough to catch a glimpse of these fast moving solar system objects.

See NSN for details

Featured Article:



This article is distributed by NASA Night Sky Network

The Night Sky Network program supports astronomy clubs across the USA dedicated to astronomy outreach. Visit nightsky.jpl.nasa.org to find local clubs, events, and more!

Springtime Planet Party

David Prosper

March brings longer days for Northern Hemisphere observers, especially by the time of the equinox. Early risers are treated to the majority of the bright planets dancing in the morning skies, with the Moon passing between them at the beginning and end of the month.

The **vernal equinox** occurs on **March 20**, marking the official beginning of spring for the Northern Hemisphere. Our Sun shines equally on the Northern and Southern Hemispheres during the moment of equinox, which is why the March and September equinoxes are the only times of the year when the Earth's north and south poles are simultaneously lit by sunlight. Exacting astronomers will note that the length of day and night on the equinox are not *precisely* equal; the date when they are closest to equal depends on your latitude, and may occur a few days earlier or later than the equinox itself. One complicating factor is that the Sun isn't a point light source, but a disc. Its edge is refracted by our atmosphere as it rises and sets, which adds several minutes of light to every day. The Sun doesn't neatly wink on and off at sunrise and sunset like a light bulb, and so there isn't a perfect split of day and night on the equinox - but it's very close!

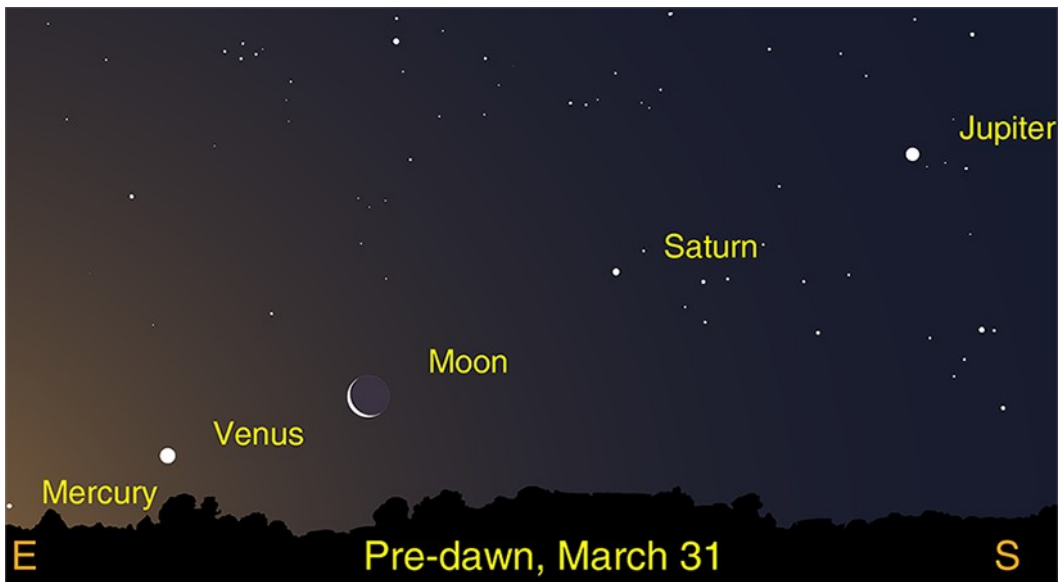
Ruddy **Mars** still shines in the west after sunset. Mars scoots across the early evening skies from Aries towards Taurus and meets the sparkling Pleiades star cluster by month's end.

March opens with the morning planets of **Jupiter**, **Saturn**, and **Venus** spread out over the southeastern horizon before sunrise. A crescent **Moon** comes very close to Saturn on the 1st and occults the ringed planet during the daytime. Lucky observers may be able to spot **Mercury** by the end of the month. March 31 opens with a beautiful set of planets and a crescent Moon strung diagonally across the early morning sky. Start with bright Jupiter, almost due south shortly before dawn. Then slide down and east towards Saturn, prominent but not nearly as bright as Jupiter. Continue east to the Moon, and then towards the beacon that is Venus, its gleam piercing through the early morning light. End with a challenge: can you find elusive Mercury above the eastern horizon? Binoculars may be needed to spot the closest planet to the Sun as it will be low and obscured by dawn's encroaching glow. What a way to close out March!

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Caption: Earth from orbit on the March equinox, as viewed by EUMETSAT. Notice how the terminator – the line between day and night - touches both the north and south poles. Additional information can be found at <http://bit.ly/earthequinox> Image credit: NASA/Robert Simmon



Caption: The morning planets on March 31. Image created with assistance from Stellarium.