

Monthly Tidbits from NCRAL Officers, A.L. Representative and Appointees

Alan Sheidler, PAC, Chairman

Bill Davidson, RAC, Vice Chairman

Roy Gustafson, PAC, Secretary-Treasurer

John Attewell, RAC, Regional Rep. to the A.L.

Carl Wenning, TCAA, Northern Lights Editor

Jeffrey Setzer, NCSF, NCRAL Webmaster

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- ★ With the start of the new year, it's time to review and update the NCRAL website. Among the most important updates is the 2025 Calendar of Events, which can be found here: https://ncral.wordpress.com/events/
- ★ Is your **affiliate contact information** up to date on the NCRAL website? Over time, contact information for <u>affiliates listed on the Region's website</u> becomes outdated. Please visit the NCRAL website and verify the accuracy of your information. If incorrect, please provide the correct information to NCRAL Regional Chair Alan Sheidler at <u>adsheidler@gmail.com</u>.
- ★ As you might have noticed by reading the Autumn issue of **Northern Lights**, the Madison Astronomical Society rejoined the Astronomical League. We are delighted to have them back in the fold! ^② Here is essential contact information for the group:

Madison Astronomical Society P.O. Box 5585 Madison, WI 53705

Home Page: www.madisonastro.org

ALCor: Jack Fitzmier

Email: <u>jfitzmier@gmail.com</u> Telephone: 404-276-9342



- ★ Save the Date! The NCRAL convention planning committee has been working hard to arrange an interesting and enjoyable conference for 2025. Anyone interested in astronomy is welcome to attend. The event will be held at the Minneapolis Marriott Southwest Hotel, 5801 Opus Parkway, Minnetonka, Minnesota 55343. The agenda includes an April 25th tour of Eagle Lake Observatory, Star-B-Q, and evening observing, weather permitting. April 26th will feature talks by eight presenters, the NCRAL business meeting, a banquet meal with award presentations and a keynote address, an astrophotography contest, door prizes, and possibly even some vendor displays. Look for updates in recent and upcoming issues of *Northern Lights* and *Reflector*. In particular, see the winter 2025 edition of *Northern Lights* for details. This issue of the newsletter was released to the membership on December 26th.
- * ALCors are reminded to send the Astronomical League membership rosters four times per year to Mitch Glaze at <u>rosters@astroleague.org</u> so that the <u>database</u> can be updated.

- * It's never too early to **make nominations** for NCRAL's Region award, Newsletter Editor award, and other regional and Astronomical League awards. Please start thinking about who you want to recognize for their significant contributions to the science of astronomy and their clubs. Also, don't forget that two **mini-grants are available** each year for up to \$250 each. Regional Award and Mini-Grants information can be found on NCRAL's Awards Page.
- ★ ALCON 2025 ANNOUNCEMENT: "The 2025 Astronomical League convention will be held June 25 28, 2025, at Bryce Canyon, Utah. The committee has been working hard to plan a convention that will be "ASTRONOMICAL." They hope to have the 2025 website up and running soon. Watch for updates and keep these dates open on your calendars!" ASTROCON 2025 workshops are as follows:
 - Astrophotography/Digital Imaging—Novice: This section provides help for those who are just getting into
 photography for the first time. It covers what equipment may be needed and basic photography techniques
 unique to astronomy.
 - o Astrophotography/Digital Imaging—Advanced: This course is for intermediate and advanced imagers who want to hone their skills and learn about the latest techniques and equipment.
 - Observing: Personal Program/Journal: Set up your observing program, including Astronomical League Observing Programs, to consider. Starting and keeping your journal.
 - Observing: Tips & Ideas/Eyepieces/Filters: Observing tips, including how best to use your eyes, what to wear, and equipment ideas. Understanding eyepiece selection. Using filters for visual and photographic work.
 - Observing: Charts/Books/Observing Lists: Using star charts (digital and paper) and reference books/star atlases. Creation of observing lists for different types of objects.
 - Sketching: This workshop will give attendees hands-on experience with drawing what you see at the
 eyepiece.
- ★ AL on Facebook and YouTube—Did you know that the AL has a presence on YouTube and Facebook? These platforms provide lots of good information. Be sure to check out these resources. They are incredibly comforting during the winter when we can't view them due to constantly overcast skies.
- ★ Observing Program Coordinators Needed: Each January (usually), the League searches for people interested in helping out as Observing Program Coordinators. If you would like to apply, email Aaron Clevenson at aaron@clevenson.org. The openings might change, but the following positions must be filled: Space Weather Observing Program, Caldwell Observing Program, Flat Galaxies, etc.



- As this issue of NCRAL blotter goes to press, Astronomical League President Chuck Allen has just informed Regional leadership that the **Advertising Manager** for the *Reflector* has abruptly quit without an explanation. If you are at all interested in this position, please contact NCRAL Chair Al Sheidler for information about job responsibilities and/or qualifications.
- ★ Hubble 35th Anniversary Downloadable Participation Certificate: The Observing Challenge is in full swing from January 1 through December 31, 2025. Suppose you are doing outreach activities to spread the word about the Hubble Telescope, its fantastic accomplishments, or the Observing Challenge and would like to pass out Participation Certificates to your attendees. In that case, we are pleased to announce that the participant certificate is now available. It may be downloaded from the Astronomical League's Downloadable Certificates web page: https://www.astroleague.org/downloadable-certificates/. Remember to start your observing towards the challenge in January and do your observations each month to go for the gold...

OCCULTATION OF MARS BY THE FULL MOON ON JANUARY 13TH

~ BY CARL J. WENNING, TWIN CITY AMATEUR ASTRONOMERS ~

(NOTE THAT TIMES WILL VARY DEPENDING UPON OBSERVER LOCATION.)

The Moon will occult – or pass in front of Mars – on the evening of Monday, January 13th, as seen across the NCRAL Region. Since this is a wintertime event, the likelihood of a clear sky is minimal. However, we should have a great opportunity here if **Timke's Law** holds ("If the moon is full, the sky will be clear." Alan Timke, former TCAA member).

That evening, the 15-day-old moon will rise around 4:31 p.m. in *Central Illinois*.* (Sunset will be at 4:52 p.m.) At the end of civil twilight (5:22 p.m.), Mars should be easily visible just over 1° to the moon's lower left. Mars will shine brightly at magnitude -1.4, the same magnitude as the Dog Star, Sirius. However, because the moon will be shining brilliantly nearby, at magnitude -12.5, Mars will appear rather dim in comparison. As the moon encroaches on Mars' position, the ruddy planet will appear dimmer and dimmer to the unaided eye.

Using a telescope or binoculars, keep an eye on Mars. The moon will slowly pass in front of the Red Planet, commencing at about 8:05:03 p.m. Over the next 30 seconds, Mars will disappear behind the moon's limb. It should disappear by 8:05:33 p.m. The disappearance will occur at approximately the 7 o'clock position if the moon's face is treated like a clock.

Reemergence will begin around 9:13:41 p.m., 68 minutes after the disappearance. Look for Mars to appear at approximately the 1 o'clock position. The re-emergence will last just over a half-minute. Mars should be entirely visible to Central Illinois viewers by 9:14:13 p.m.

Because the moon's and Mars' motions are well understood, IOTA (the International Occultation Timing Association) will not be interested in collecting the times for contact for this occultation. However, if your club wants to determine the time of first through fourth contacts, it might prove interesting to share with members of your club along with the latitude and longitude of the observations. Timings should be accurate to the second to provide information useful for comparison.

Occultations of stars and planets are not uncommon. Stellar occultations occur every night, but such phenomena are rarely noticed unless the star occulted is bright (e.g., Regulus, Spica, Antares). As the moon orbits Earth once per month (completing one circuit among the background of stars every 27.3 days), it moves eastward among the stars about one lunar diameter (0.55°) each hour.



Look for red Mars to disappear at the 7 o'clock position just after 8:05 pm. Binoculars or a telescope will aid in observations.



Look for Mars to reappear at the 1 o'clock position just after 9:13 p.m. The entire occultation lasts about 68 minutes.

^{*} Times of the occultation will vary depending upon the observer's location. The farther east along the eclipse path an observer is located, the later the events noted here will occur; the farther west, the sooner. Locations north and south also will affect occultation times. Use a simple program such as *SkySafari* or *Stellarium* to determine the times for your area.

CALL FOR ASTRONOMICAL LEAGUE AWARD SUBMISSIONS

Applications or nominations for all League awards must be received no later than March 31, 2025, at 11:59 p.m. CDT. Award rules appear on the "Awards" page at www.astroleague.org. Submissions are incomplete until you receive an email confirming receipt from the League vice president.

LEAGUE YOUTH AWARDS

National Young Astronomer Award. U.S. citizens or U.S. school enrollees under the age of 19 who were engaged in astronomy-related research, academic scholarship, or equipment design may apply. League membership is not required. The top two winners receive expense-paid trips to the League's national convention (U.S. travel only) and Explore Scientific telescope prizes. Email the application, research paper, and a photo of the nominee to NYAA@astroleague.org.

Service Award. League members under the age of 19 who are engaged in service to the League or their clubs, schools, or the astronomy community may apply for the Horkheimer/Smith Youth Service Award. Club or regional officers may nominate. The winner receives a plaque, a cash prize, and an expenses-paid trip to the League's national convention (U.S. travel only). Email the application and a photo of the nominee to HorkheimerService@astroleague.org.

Imaging Award. League members under the age of 19 who engage in astronomical imaging may apply for the Horkheimer/Parker Youth Imaging Award. Club or regional officers may nominate. The winner receives a plaque. The top three finishers receive cash prizes. Emailed the application, image, and a photo of the nominee to horkheimerparker@astroleague.org.

Journalism Award. League members aged 8-14 may seek the Horkheimer/O'Meara Youth Journalism Award by submitting a 250-word science essay. The winner receives a plaque. The top three finishers receive cash prizes. Email the application, essay, and a photo of the nominee to HorkheimerJournalism@astroleague.org.

LEAGUE AWARDS

The following League awards are open to all League members regardless of age. Winners receive award plaques.

Mabel Sterns Award. Club officers may nominate their newsletter editor for the Mabel Sterns Award by emailing a copy of the club's newsletter as a PDF file or a link to an online newsletter to

<u>sternsnewsletter@astroleague.org</u>, along with a nomination cover letter (.pdf) that includes the nominee's name, address, and photo.

Webmaster Award. Club officers may nominate their webmaster for the Webmaster Award by emailing their club website link to WebMasterAward@astroleague.org along with a nomination cover letter (.pdf) that includes the nominee's name, address, and photo.

Williamina Fleming Imaging Awards. These awards, sponsored by Explore Scientific, are open to female League members 19 years of age or older in four categories: deep sky (>500 mm excluding Solar System), Solar System (>500 mm), rich field (201-500 mm), and wide field (200 mm or less). Email the form, a photo of the entrant, and up to three jpeg attachments not exceeding a total of 25 megabytes to flemingaward@astroleague.org

Sketching Award. Members may apply by emailing one sketch as a high-resolution jpeg file (10 megabytes maximum) along with a photo of the applicant to sketch@astroleague.org. Cash prizes are awarded to the top three winners.

CALL FOR OFFICER NOMINATIONS

Nominations for League secretary (2-year term) and executive secretary (3-year term) beginning on September 1, 2025, must be received by nominating committee chair Terry Mann at vicepresident@astroleague.org no later than March 25, 2025, at 11:59 p.m. CDT. The duties of each office appear in the League bylaws (see League website under "About Us"). Nominations should be accompanied by a background statement of 250 words indicating qualifications and/or reasons for seeking the position and a photo of the nominee, both for inclusion in the reflector and on the ballots.

LIBRARY TELESCOPE GIVEAWAY

The League's annual Library Telescope giveaway drawing will take place in July. The League gives away up to 11 Library Telescopes (4.5-inch StarBlast reflectors), one to a club in each of its ten regions and one to a member-at-large. Winners then place the telescopes with local libraries. This is an excellent recruitment tool for new and younger members for winning clubs. Applications may be found on the League website (see the link at the bottom for Library Telescope Program). Applications must be received by May 30, 2025, a month earlier than expected due to the June convention.