The High Desert Observer

January 2022

This Month's Meeting - January 28, 2022

Meeting will be virtual via Zoom®
Friday, January 28th at 7 p.m.

Speaker for the Month - Kevin Schindler

From Planter to Planets:
The Story of Clyde Tombaugh

From humble beginnings as a farmer and self-taught astronomer to the discoverer of Pluto, Clyde Tombaugh is a classic example of a small-town boy making it big. In this program, Lowell Observatory Historian Kevin Schindler will tell the story of Clyde Tombaugh, using both historical as well as recently collected video and images from the old Tombaugh farm in Burdette, Kansas

Kevin Schindler is the historian and Public Information Officer at Lowell Observatory in Flagstaff, Arizona, where he has worked for 27 years. He shares Lowell's long history of research and exploration through writing and public presentations. Schindler contributes a bi-weekly astronomy column, "View from Mars Hill", to the Arizona Daily Sun newspaper and has written seven books, including Pluto and Lowell Observatory. He also spearheads community science events, including the 2018-2019 Flagstaff Lunar Legacy celebration and Lowell Observatory's annual I Heart Pluto Festival. Fun fact: Schindler has both a fossil crab and asteroid named after him.

Astronomical Society of Las Cruces

In This Issue

Coming Events

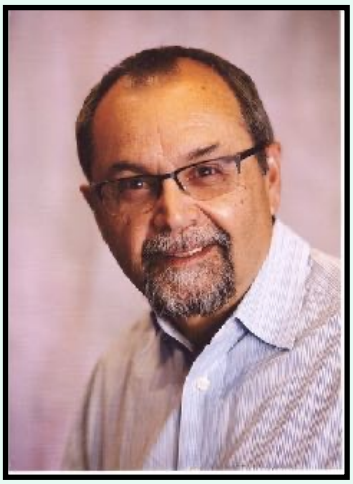
Monthly, on an evening close to the first-quarter moon, ASLC hosts a public "MoonGaze" observing session currently at the Plaza de Las Cruces. We also hold occasional special evening sessions at Tombaugh Observatory on the NMSU campus.

Also monthly, the ASLC welcomes public viewing at the Leasburg Dam State Park Observatory located just 20 miles north of Las Cruces. Our 16-inch Meade LX200 telescope at this site is used to observe under rather dark skies.

Keep updated on the dates, times, and locations through this link with additional information available at our website www.aslc-nm.org as well as our Facebook page.

Masthead Image: M82 & M81 Galaxies in Ursa Major - courtesy of ASLC Member Jeff Johnson

From the Desk of Ed Montes
ASLC President



So, now we start a new year. It's been quite a ride navigating through vagaries of COVID, but with ZOOM on our side, we've made it. Thanks to Tracy for initiating the process in 2020 and to Steve and Trish for getting us up and running. And a big thanks for all the speakers who were willing to meet with us through this medium. We have made a permanent jump, even when we return to having live meetings we will continue to use Zoom to extend our reach.

Live Meetings

With the current Omicron surge, I think it best to hold off with live meetings for now, but exploring the available venues for when it is safe to start them again is useful. Steve Barkes is on the board of the Mesilla Valley Radio Club. He brought up to them the idea of using their building for our meetings. They have agreed, as long as a member of their club is present, an easy requirement to meet since at least 4 of our members are also members of their club. So now we have that venue available for live meetings. Tim Kostelecky spoke with member Kyle Slover who was borrowing one of our loaner scopes. Kyle works at Virgin Galactic and they may be able to offer us space for our meetings at their offices just off Roadrunner Blvd., thus another possibility. It's good to have choices.

Interesting email communication

Last month I got an email from a librarian, LouAnne Taylor, who indicated that one of the young girls, Amelia, in a program she runs, is a very enthusiastic Astronomy buff. She said that they use our "external links" page to find interesting astronomy information. Amelia found a link that she wanted us to add to our page - https://www.elevators.com/space-elevators-astronomy/ . Rich has tried to get permission from the owner of this page to add it, but has had no response. In any case, it's probably not the right content for our site anyway. But I did respond to LouAnne that we heartily encourage Amelia's enthusiasm for astronomy and thanked her for sending the link. I will send her a copy of this message to let her know that we heartily encourage Amelia's enthusiasm.

Outreach event at the Spaceport

Stephen Wood has published a very thorough after-action account of the observing event at the Spaceport on groups.io. We were contacted, at short notice, by a representative of Spin Launch Corporation to see if we could support their launch celebration by having an observing session for their guests. Stephen did a great job of getting folks together and having a great session. Much thanks to Trish Conley, Tom Oler, RaniMo Bush and Rich Richins for supporting the event. We might wind up doing more events Spin Launch.

Update on Naming the Leasburg Observatory

Our main contact at Leasburg State Park, Ken Abalos, contacted me in December to inform me that the local Head Ranger at the Park has given us the go-ahead to put up a plaque over the

observatory door, thus naming it the Walter Haas Observatory. I have asked for him to please put this in an email message so that we have some kind of documentation indicating that we have permission do it. Ken has now sent me that email. Note, this does not indicate that the government of the State of New Mexico has recognized this naming formally. That process is still in motion and apparently, according to Ken, has to go up to the Governor. So, for now, we move forward with the plaque.

Speaker this Month

Our speaker this month, January 2022, is Kevin Schindler. Kevin is the Historian and Principal Information Officer for the Lowell Observatory. He will be speaking about Clyde Tombaugh. I know that several folks in the club actually knew Clyde; I think Kevin will give us a broader biographical view of him than most of us have. I trust that this appreciation and review of Clyde's life and accomplishments will be a great kickoff to the new year

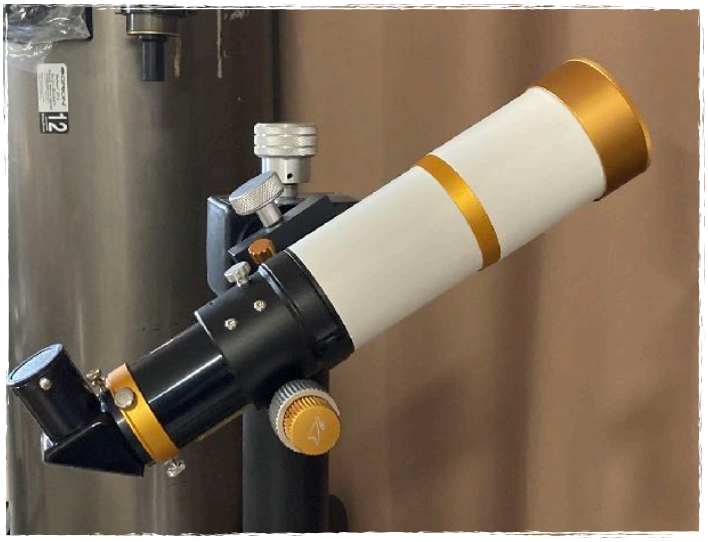
That's it for now. Clear skies!

The Astronomical Society of Las Cruces (ASLC) is dedicated to expanding public awareness and understanding of the wonders of the universe. ASLC holds frequent observing sessions and star parties, providing opportunities to work on Society and public educational projects. Members receive electronic delivery of The High Desert Observer, our monthly newsletter, plus membership in the Astronomical League including their quarterly publication, Reflector, available in either paper or digital format. ASLC members are also entitled to a discount on a subscription to Sky and Telescope magazine. Annual Individual Dues are $36; Family $42; Student (Full Time) $24. Dues are payable in January and partial year prorated for new members. Please contact our Treasurer, Patricia Conley, treasurer@aslc-nm.org for further information.

ASLC Board of Directors		board@aslc-nm.org
President:	Ed Montes	president@aslc-nm.org
Vice President:	Tim Kostelecky	vp@acslc-nm.org
Treasurer:	Patricia Conley	treasurer@aslc-nm.org
Secretary:	John McCullough	secretary@aslc-nm.org
Director:	Michael Nuss	director1@aslc-nm.org
Director:	Rani Bush	director2@aslc-nm.org
Past Pres:	Tracy Stuart	tracystuart@comcast.net

Committee Chairs		
ALCOR:	Patricia Conley	tconley00@hotmail.com
Calendar:	Stephen Wood	clearskies2u@gmail.com
Education:	Rich Richins	education@aslc-nm.org
Loaner Program:	Tim Kostelecky	tim.kostel@cloud.com
Observatories:		
Leasburg Dam:	David Doctor	astrodoc71@gmail.com
Tombaugh:	Steve Shaffer	sshaffer@zianet.com
Outreach:	Stephen Wood	clearskies2u@gmail.com
Website:	Steve Barkes	steve.barkes@gmail.com
HDO Editor:	Tim Kostelecky	tim.kostel@icloud.com

Astronomical Society of Las Cruces



ASLC LOANER SCOPE PROGRAM

ASLC members can try before they buy!

We have several scopes available covering all popular types, and these items are available to members at no charge. The typical loan period is two months (monthly thereafter if available) and equipment can be checked out through Tim Kostelecky, our Loaner Program Coordinator (tim.kostel@icloud.com). The ASLC loaner telescopes range in size from a 61mm refractor to a 10" Dob. Along with the telescopes and eyepieces, the loaner program has other accessories available. Contact us for availability.

Also check on our "Fixer-Upper" scopes that need some TLC. If you're interested, let's see what we can to do get these scopes operational, and for your efforts we'll let you hang on to these for an extended period. Talk to us about the possibilities.

Celestron C8 Classic Orange 8 inch Schmidt-Cassegrain

Available now

It's a Classic & in Great Shape!

Great vintage 1970's Celestron Classic 8" SCT. It's a bit of a beast but manageable and transportable. No computer control, but has AC tracking drive and manual fine-tune RA control. Get it reasonably polar aligned and it's a pleasure to use and gives great views.

Objective Diameter	**8 Inches**
Focal Length	**2030 mm**
f-ratio	**F/10**
Mount	**Celestron Eq Fork - Manual**
Power	**110 V AC**
Eyepieces	**25mm Plossl; 10mm Plossl**
Total Weight	**~ 40 lbs**

Celestron NexStar 8se 8 inch Schmidt-Cassegrain

Available now

Deep Sky GoTo SCT

Very popular Celestron SCT with computer goto system. Runs only on AA batteries or DC port and has no manual pointing capability - all electronic. If you're out of power, you're done. That said, it's a nice scope that does a decent job pulling in deep sky objects.

Objective Diameter	**8 Inches**
Focal Length	**2030 mm**
f-ratio	**F/10**
Mount	**Celestron Alt-Az Fork - Computer GoTo**
Power	**8 AA Batteries & DC Port**
Eyepieces	**25mm Plossl; 10mm Plossl**
Total Weight	**32 lbs**

Celestron C102 4 inch Achrom. Refractor

Available now

Experienced Celestron Refractor on GoTo Eq. Mount

Mature but reliable Celestron classic achro-refractor. Stable Meade Autostar goto mount gives this guy good support and capabilities. May not be pretty and shiny, but won't disappoint.

Objective Diameter	**4 inches**
Focal Length	**1020 mm**
f-ratio	**F/10**
Mount	**Meade Eqitorial - Computer GoTo**
Power	**12 V DC Port w AC adapt**
Eyepieces	**25mm Plossl; 10mm**
Total Weight	**36 lbs**

Orion StarMax 90 90mm Maksutov-Cassegrain

Available 3/15

Small, Simple, and Powerful

Simple table-top Mak, and with its f/13.9 focal ratio, it provides the magnification power to take good looks at the moon, planets and smaller bright deep sky objects. A bit of a challenge to track objects with its high power and manual mounting. Super for grab-and-go portability. Also available with Televue Panoramic alt-az manual mount.

Objective Diameter	**90 mm**
Focal Length	**1250 mm**
f-ratio	**F/13.9**
Mount	**Orion Table Top or Televue Alt-Az - manual**
Power	**None**
Eyepieces	**40mm Kelner, 25mm Plossl; 10mm Plossl**
Total Weight	**6.5 lbs**

Meade ETX-90 go-to 90mm Maksutov-Cassegrain

Available now

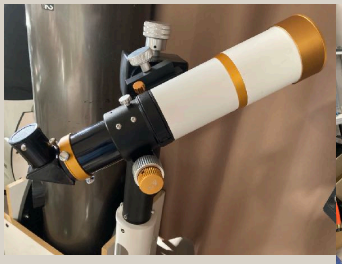
Small and Powerful with Computerized GoTo

Nice scope but at f/13.9 has limited field of view, but with its computerized mount, it finds a wide array of celestial objects and tracks well. Its high f-ratio does well with the moon, planets and small brighter DSOs. The mount is a little noisy, even when tracking…but don't let that dissuade you from trying it out.

Objective Diameter	**90 mm**
Focal Length	**1250 nm**
f-ratio	**F/13.9**
Mount	**Meade Alt-Az/ Equatorial Fork - Computer GoTo**
Power	**8 AA Batteries & DC Port**
Eyepieces	**25mm Plossl; 10mm Plossl**
Total Weight	**19 lbs**

William Optics ZenithStar 61mm Apo-Refractor

Available now



High Quality Small Refractor

This is a small scope but a gem. Wide field of view with superb optics. iOptron computerized mount is a nice fit for finding celestial objects and tracking. Good visually for moon, planets and bright star clusters. Field Flattener available for astro-imaging, but iOptron alt/az mount has limited imaging capability.

Objective Diameter	**61 mm**
Focal Length	**360 nm**
f-ratio	**F/5.9**
Mount	**iOptron Cube Pro Alt-Az Computer GoTo**
Power	**8 AA Batteries & DC Port**
Eyepieces	**25mm Plossl; 10mm Plossl**
Total Weight	**14 lbs**

Orion SkyQuest XT10 Dobsonian Reflector

Available 2/15

Manufacturer's photo, but pretty close to reality.

Classic 10" Dobsonian

Manual pointing and guiding, but its 4.7 focal ratio provides a wide field of view that helps you find and track deep sky objects. Includes a finder scope (not shown), 2" focuser, front cover, and eyepiece rack. The scope has a few miles on it with some minor dings and dents, but those won't interfere with your viewing.

Objective Diameter	**243 mm**
Focal Length	**2500 nm**
f-ratio	**F/4.7**
Mount	**Orion Dob**
Power	**None**
Eyepieces	**25mm & 10mm Plossls**
Weight Opt Tub	**31 lbs**
Weight Base	**23 lbs**

Meade Lightbridge 12 inch Dobsonian

Available now

Fixer-Upper

Big 12" Dob and Includes JMI Wheeley Bar with inflatable tires for transport on rough terrain. Mirror in very poor condition - needs repair and/or re-coat. This is a big scope that needs a bit of room.

Needs Mirror Re-coat

Objective Diameter	**12 inch**
Focal Length	**1524 mm**
f-ratio	**F/5**
Mount	**Meade Lightbridge Dobsonian - Manual**
Power	**None**
Eyepieces	**26mm & 10 mm Super Plossl**
Total Weight	**~ 80 lbs**

Orion XT 12i IntelliScope 12 inch Dobsonian

Currently being repaired - Available this Spring?

Fixer-Upper

Good optics in this fine scope but the original base was badly abused and now unusable. Needs replacement. The optical tube is heavy at the upper limit of handling by one "able-bodied" person. For many of us, it needs two.

Needs Base Rebuild

Objective Diameter	12 inch
Focal Length	1500 mm
f-ratio	F/4.9
Mount	Original: Orion Dobsonian - Computer Push-To - needs replacement
Power	AA batteries for Intelliscope computer
Eyepieces	26mm & 10 mm Super Plossl
Total Weight	~ 100 lbs with base

Criterion 8 inch Schmidt-Cassegrain

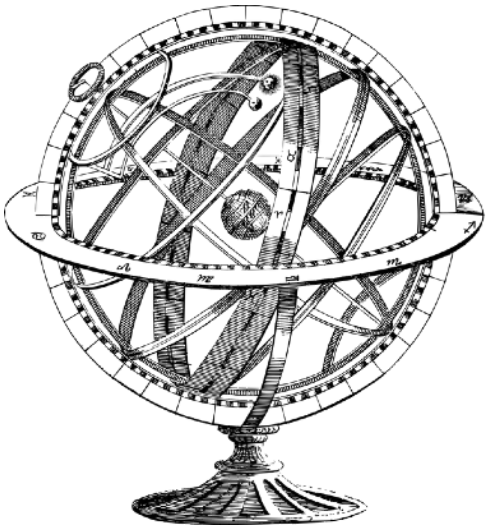
Available now

Fixer-Upper

Old and tired OTA but functional with rigged visual back for 1.25 optics. Has mounting plate and Telrad finder.

Ugly, needs affection, mount & accessories. Adoption?

Objective Diameter	8 inches
Focal Length	2110 mm
f-ratio	F/10.4
Mount	None
Power	N/A
Eyepieces	None
Total Weight	~ 12 lbs



Minutes of November 2021 Meeting

John McCullough - Secretary

Ed Montes, President, Astronomical Society of Las Cruces (ASLC, the Society), called the November 2021 meeting to order at 7:05 pm on 19 November 2021. He welcomed attendees to tonight's meeting via ZOOM. Eighteen (18) attendees were signed in for the start of the meeting.

Ed welcomed the group and announced that the minutes from the October 2021 meeting (thanks to John McCullough, Secretary) were published in the November issue of the Society newsletter, the High Desert Observer (HDO) (thanks to Tim Kostelecky, HDO Editor). Ed asked if there were any required additions, deletions, or corrections to the minutes as submitted. Trish Conley noted some spelling corrections that were required. A motion to accept the October 2021 minutes as corrected was offered by Tracy Stuart, seconded by John Kutney. There being no objections, the motion was passed by acclamation.

Ed introduced tonight's speaker, Ms. Luci Finucan.

Presentation:

Tonight's Tombaugh Series speaker was Luci Finucan of the Green Bank Radio Observatory (GBRO).

The Green Bank Observatory is a national radio astronomy observatory in the rural mountains of Green Bank, West Virginia and is home to the world's largest fullysteerable radio telescope, the Robert C. Byrd Green Bank Telescope (GBT). The GBT is the world's thirdlargest moving structure on land. The GBRO is a partner to the Very Large Array (VLA) in New Mexico; the single dish GBT has higher sensitivity, the multidish VLA has higher resolution. Luci discussed the Observatory's history, the National Radio Quiet Zone (someone will come knocking on your door for radiating in the restricted radio spectrum!), and the telescopes and the science they produce. Questions and discussion followed Ms. Finucan's presentation, including how to survive without microwave popcorn or mac 'n cheese.

Officer/Committee Reports:

Treasurer:

Trish Conley, Treasurer, provided a report on the status of the Society's accounts. The Society received $52 since the October meeting including one new family membership. She noted reduced donations at this year's Renaissance Arts Faire.

The Observatory at Leasburg Dam State Park (LDSP):

Steve Barkes and Jerry Gaber have been working on upgrades to the facility. Two (2) new ACER gaming laptops have been setup and are working to support the Observatory. New firmware still needs to be installed. Steve said he was considering installing "red" mode software and other apps.

Outreach:

Stephen Wood, program coordinator, reported excellent weather for recent events. There were six (6) telescopes on hand for the most recent Moon Gaze. Mike Cook from the Las Cruces Bulletin was also on hand to write an article for the weekly newspaper. There was good member support for the White Sands Missile Range Cub Scout star party.

There will be an event at LDSP on 27 November and a Moon Gaze on 11 December.

Stephen noted some issues with the solarscopes during the Renaissance Arts Faire this month.

Apparel:

Rani Bush has volunteered to be the new coordinator. She reported that a replenishment order was due. She will be checking current costs and needs.

ASLCWest (Demingarea) Activity Report:

Mike Nuss reported the group continues to work

with the City of Rocks State Park staff. He said they see a number of Las Cruces and El Paso people at their events.

Old Business:

A Holiday Party will be held in lieu of the December monthly meeting. The format will be a potluck dinner at Ed Montes' home on 04 December starting at 6:30 pm. Attendees must be fully vaccinated. The invitation will be on the io.groups. Please RSVP with dishes and number of guests. More details will follow.

No additional old business was considered.

New Business:

Ed would like to conduct an inreach event at LDSP specifically for members, especially those who have never been to the Observatory. The format is in development and may include specific presentations or programs, possibly a miniMessier marathon.
John Kutney has red-screen software that he will send to Steve Barkes for review.

No additional new business was offered for consideration.

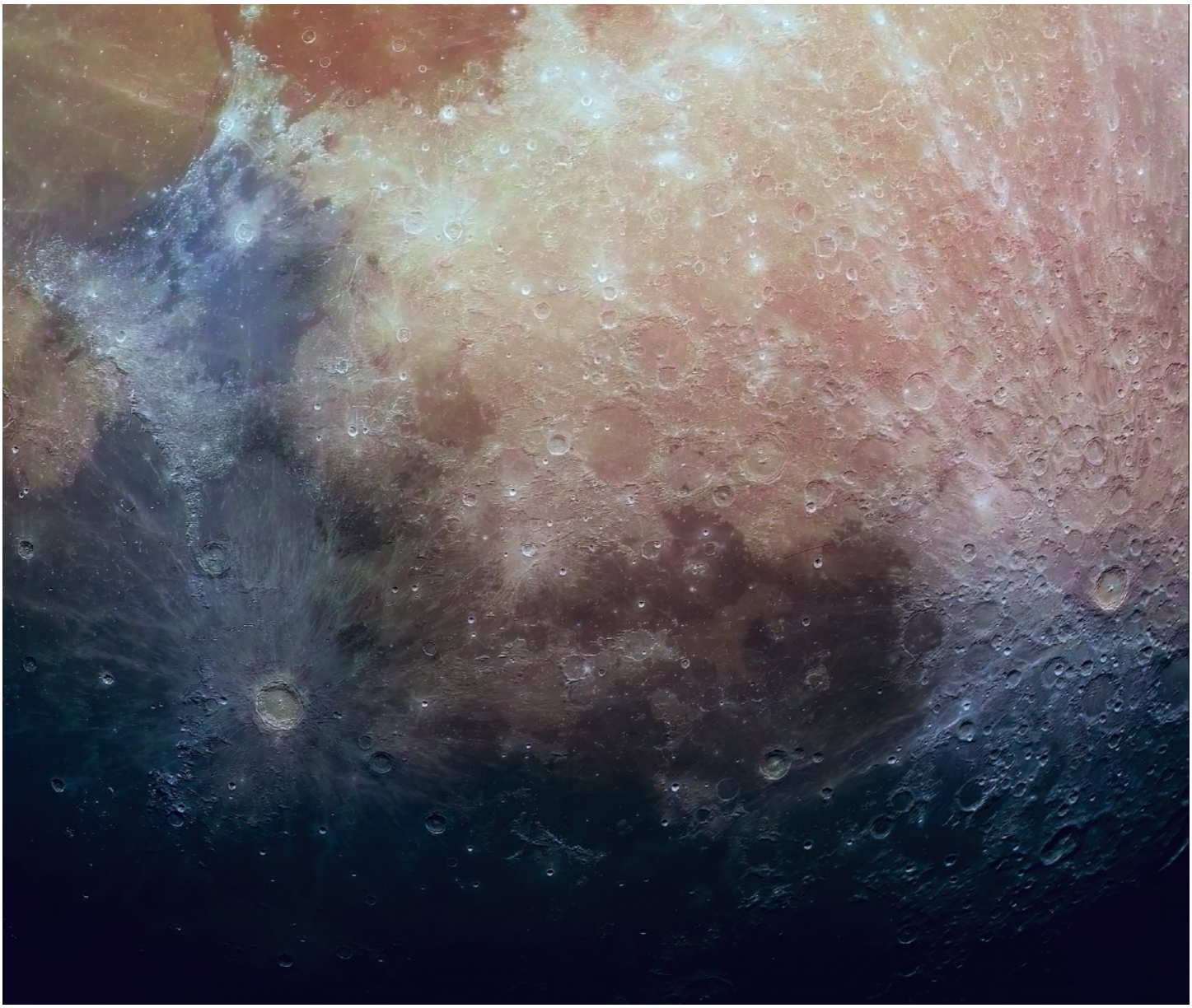
The November 2021 meeting was adjourned at 8:39 pm.

-Respectfully submitted:
John McCullough
Secretary, ASLC

Member Images

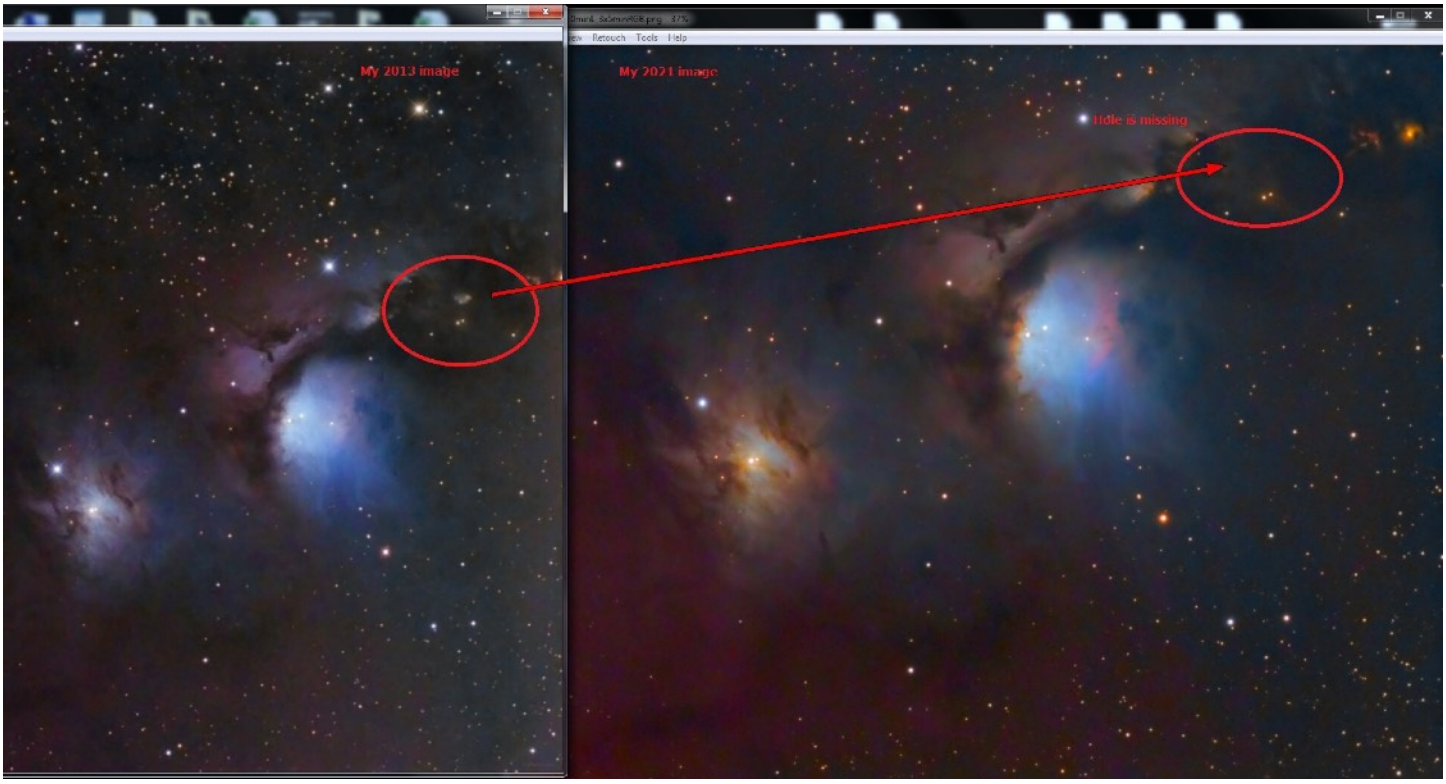
M3 & Comet Leonard - Rich Richens

The Moon - Mike Sherick



A false color image of the Moon, imaged with a 24" RC Telescope. This was a single Ha 0.1 second exposure -- colorized in PhotoShopCC using the Neutral Filters tool.

M78 & Variable McNeils Nebula in Orion - Jeff Johnson



When I finished this (Oct image), I compared to earlier results I had from nearly a decade earlier. I then NOTICED an illuminated area that had disappeared. I contacted NASA APOD astronomers (as I had pulled data from years past there that showed the same thing).

This variable nebula only recently (2004) discovered. One of the NASA astronomers replied to me (as I noted an estimate on frequency of the [likely] variable star that illuminates that area).

Cool stuff -"McNeil's Nebula" is currently "switched off."