New Braunfels Astronomy Club

Texas, USA

August 20th, 2020

252nd Meeting (Zoom 5) (Agenda Below)

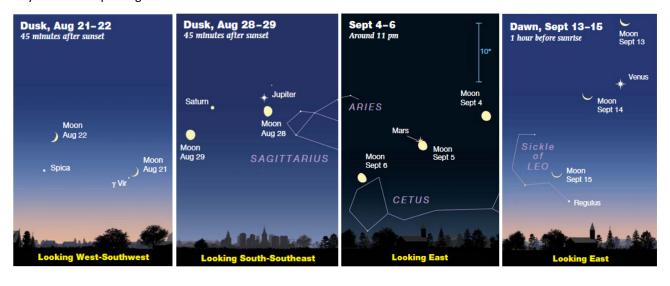
Larry's Celestial Calendar & Newsletter

277th Edition -by Eric Erickson

Venus Brilliant in the Morning
Mercury Low and Dim at Dusk
The Moon and Planets Dance
A New Old Comet – 88P/Howell
Will the Moon and Mars Kiss?
New Feature – Imagining Imaging

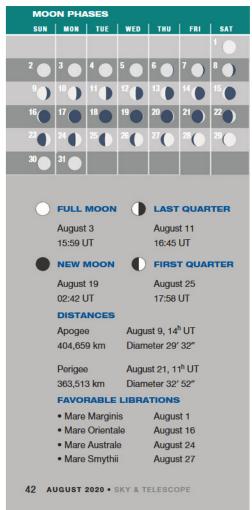
Highlight Calendar for Clear Skies

-From Sky and Telescope Magazine



Solar System Roundup

- **Earth** still spins, and we are still here to marvel at the wonders of our universe
- ➡ The Moon dances with Jupiter, Saturn, Venus, and nearly kisses Mars on September 5th





- ➡ Mars rises around 10pm and its disk getting bigger as it approaches opposition in
 October. Watch the Moon nearly kiss Mars late night on September 5th into morning of
 the 6th.
- Jupiter rises in early evening and looks great
- **♣** Saturn rises an hour after Jupiter and is in conjunction with Jupiter a great conjunction. Saturn and Jupiter are separating throughout September
- Uranus is in Aries and transits the meridian around sunrise
- ♣ Neptune is in Aquarius, transiting the meridian as Venus is rising

Comet(s)

- o NEOWISE (C/2020 F3) gave a respectable showing and created a lot of buzz.
- 88P/Howell will reach perihelion September 26th, and magnitude 9. It's a short period (5.5year) comet, getting photo close to NGC 5897 on September 4th and 5th. More next month I hope.

-From Sky and Telescope



- ♣ ISS viewing for New Braunfels (works for Canyon Lake too).
 - From <u>Heavens Above</u>

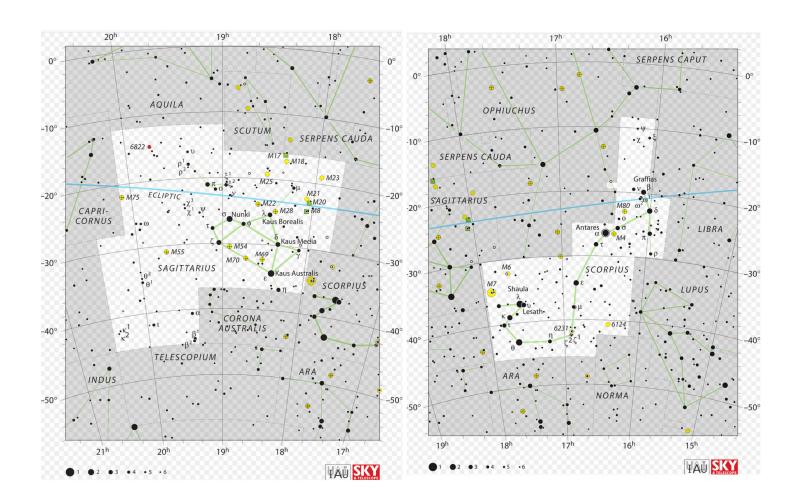
Date		Start Time	Start Loc	Max Alt °	End Loc	Note
	08/22	06:03	SSW	35	NE	Goes through Orion and close to Venus
	09/11	06:20	NW	27	ESE	
	09/13	06:22	NW	76	SE	Goes through Orion and close to Sirius
	09/16	20:36	SW	62	NE	Skims past M13 in Hercules

My Observing Pick: Yes, Still Scorpius & Sagittarius

It's summertime and that means all the thrill and beauty of the southern sky and Milky Way. We have the scary scorpion and the archer, both constellations of the Zodiac. And they're next door to each other. The shape of Scorpius is unmistakable. It's one of the best constellation examples of looking like what it is named. Sagittarius not so much. I have a harder time seeing a half-man, half-centaur. One asterism stands out in Sagittarius, the Teapot. Once Sagittarius rises above the city lights murk, the Teapot can be easily spotted. See below.

NEW: Our home galaxy, The Milky Way appears to pour from the Teapot's spout. Check out M24, a "star cloud" located between the star μ and M18. Why it's not on the chart below baffles me.

Both constellations have a wealth of objects visible in binoculars and telescopes. I suggest starting by scanning around in the constellations and then pick a few areas to focus on.

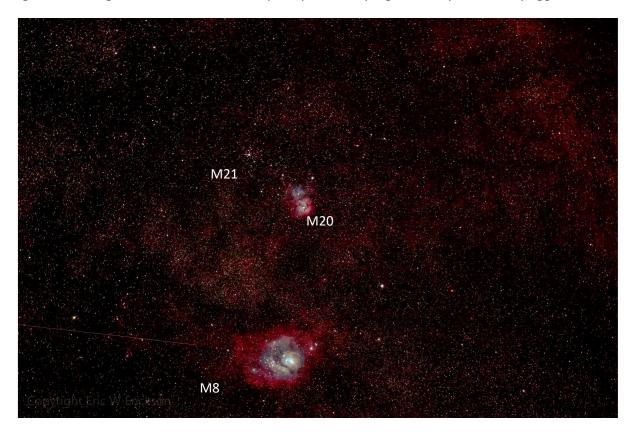


New Column...see below

I want to encourage and feature our club's astrophotography. I'll kick it off with what can be done with a DSLR.

Imagining Imaging by Eric Erickson

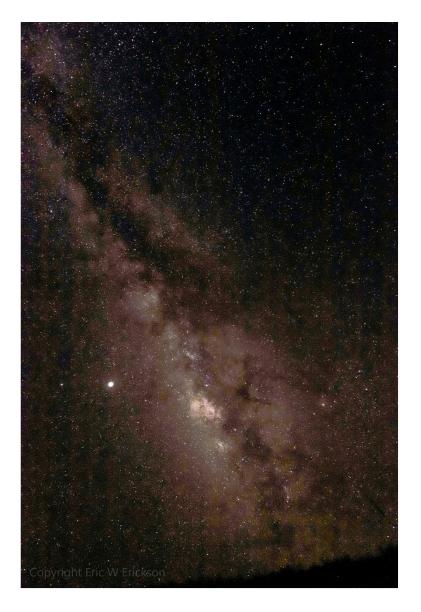
Here is a shot from Fort Davis. M8(the Lagoon), M20(the Trifid), M21 open cluster. Shot with a Canon 6DII, EF 100-400mm f4.5-5.6 LII, 400mm, @ f6.3, for 30 seconds. ISO 1600. iOptron Alt-Az GoTo mount. Post processing in Adobe Lightroom. The Alt-Az did pretty well keeping stars as points vs squiggles.



Comet NEOWISE from my back porch in Canyon Lake: Tripod mounted Canon 6DII, EF 300mm f4 L @f4.5 for 5 seconds. ISO 3200. Post processing in Adobe Lightroom. Notice the stars trailing.



Milky Way from Fort Davis: Tripod mounted Canon 6DII, EF 17-40mm f4 L, 19mm, @f4.5, 20 seconds, ISO 2000. Post processing in Adobe Lightroom. See Jupiter and Saturn? Jupiter is the bright "star", Saturn to its left.



You Don't Miss Your Stars Until...

Nancy and I spent four days in Fort Davis last week, to celebrate my birthday. What a treat!

Yeah, I know Fort Davis is a tiny town in dusty west Texas. No nightlife, and only a few restaurants. Also, unfortunately, Fort Davis Historical Monument and the McDonald Observatory are closed. But Fort Davis State Park is open and a destination on its own. The folks living there tend to be down to Earth, hardscrabble, and friendly. Fortunately, the restaurants are open, very good, and very different.

You know what else was open? The sky!

We stayed a couple of miles outside town in a former bomb shelter, with 24-inch-thick reinforced poured concrete walls. Solid. That was cool and viewing sunset from the state park's skyline drive overlook was awesome. Then night brought our reason for being in Fort Davis. Stars, planets, and OMG, the Milky Way! Rising from Sagittarius in the south-southwest, traversing the sky overhead and dropping to the northeastern horizon, our home galaxy made my jaw drop. I think I giggled too.

We scanned it with binoculars, and I set up to get some images. Where to start? I was paralyzed for a while trying to decide. So, we looked at some highlights in Sagittarius...globular cluster M22, nebulae M8 and M20, open clusters M21, M23, M25. Then Jupiter and Saturn. This with a telephoto zoom lens plus adapter and barlow, used as an 800mm f11 telescope. It worked very well. With the same lens minus the adapter, now at 400mm I shot some sky-scapes, including one of M8(the Lagoon Nebula), M20(the Trifid Nebula), and open cluster M21.

I just kept looking at the Milky Way and how incredibly bright it was. There was visible structure showing our neighborhood arm!

Tearing myself away from our home galaxy, I took in the sky dome and it was full of stars! I know, they're home galaxy stars. Many of these stars I cannot see even from Canyon Lake. I had some difficulty identifying constellations. Nancy could not make out Cassiopeia, even when I pointed it out with a laser. So many stars.

The next day we were talking with the rental owner and he commented that he doesn't notice the sky at night. I mentioned something about the Perseid meteor shower, and he perked up, wanting to know when and where to look. The Perseids was decent for me, but I could not stay awake beyond 1:30 am on the 12th. Saw around 15 with 5 really nice ones. The next day the owner exclaimed he and his wife had a great time seeing meteors.

He also confided that they do not notice the sky at night, well, because it's always like that.

What?!

You don't miss it until it's gone. Let's not let our night sky slip away.

Eric Erickson

Coming up: OUR 253rd ASTRONOMY CLUB MEETING

September 17th 2020, from 7 – 9:00 p.m.

ZOOM meeting

New Braunfels Astronomy Club

Astronomy Friends New Braunfels

Comal County Friends of the Night Sky

Mick Homer-First Contact

astronomynbtx.org or astronomynbtx.org/dir

https://www.facebook.com/groups/354953995432792/

https://www.facebook.com/groups/166098014710276/

mhomer2012@yahoo.com

New Braunfels Astronomy Club Meeting

Date:		
A	kaenda	

- Open meeting and introduce new members
- > Interesting observations, experiences

> Show and tell

- > What's in our sky this month?
 - Newsletter Eric Erickson
 - o Abrams Sky Calendars Paula Pratt
- ➤ What's going on events, outreach
- Main feature(s)
 - o JR Strailey A review of the ASI294MC Pro Camera
 - Steve Ellery New website new opportunities
- > Open for discussion
- > Feedback and close the meeting