

Newsletter of
The Black River Astronomical Society

Guidescope

Lorain County, Ohio

March 2017

Website: blackriverastro.org

Newsletter submissions: [Editor](#)

--Wednesday, March 1, 7 p.m.: Regular meeting, at **SANDY RIDGE RESERVATION JOHNSON WETLANDS MEETING HOUSE, 6195 Otten Road, North Ridgeville** (please note this location change is for the March, April, and May regular meetings!)

Program: Messier Marathons, by John Reising

--Thursday, March 9, 7 p.m.: Board meeting, Blue Sky Restaurant, Amherst

--Friday, March 17, 9-11 p.m.: Public observing, Nielsen Observatory (cloud backup date Saturday, March 18)

--Friday, March 24, 9-11 p.m.: Public observing, Nielsen Observatory (cloud backup date Saturday, March 25)

--Thursday, March 30, 8:00-9:30 p.m., Wellington Night Walk, Wellington Reservation, LCMP

Visit Our Website!

Explore if you will the informative BRAS [website](#) and all its interesting, timely [links](#), and join the interactive members-only [BRAS Forum](#) to better keep in touch.

Board Summary

February 9, 2017

The meeting was called to order at 7:12 p.m. with nine Directors present. The minutes of the January meeting were read and approved as was the Treasurer's Report. Committee reports followed with *Guidescope* Editor Bill Ruth reporting that the newsletter was going well and that submissions from members on any topic of astronomical interest are welcome. Our Website committee member Lee Lumpkin reported that the website was in good shape. He has added a new weather app to the "Weather" tab on the site. This is called Clear Outside and is similar in appearance to the Clear Sky Chart. Members are encouraged to check it out, as it has, among other features, indicators for high, medium and low clouds separately. John Reising reported that no-one had been to the observatory recently due to the poor weather, so he had no Instrumentation report. He has not had time to work on the 16" reflector. ***Update: we had an impromptu observing session on Feb. 18th, and we noticed a crack and bulge in the roof of the observatory on the west side over the winch. This will be reported to the Metro Parks for evaluation and repair. The OTAA and Metro Parks Liaison committee had no report

Programming is as follows:

March	John Reising	Messier Marathon
April	Schauer, Walker	The Total Solar Eclipse of August 21 st
May	Tim Kreja	TBA
June	Dan Walker	Motions of the Cosmos
July	Denny Bodzash	Major Historical Discoveries
Aug.-Nov.	OPEN	

Old Business came next with the President reminding the Directors that our MARCH, APRIL AND MAY MEETINGS WILL BE AT THE METRO PARKS SANDY RIDGE/JOHNSON WETLANDS RESERVATION AT 6195 OTTEN ROAD IN NORTH RIDGEVILLE. Next came a discussion of the "Dark Skies, Bright Kids" program at the Avon Lake Parks and Recreation facility on Route 83 held on Friday Feb. 17th. Dan Walker, Greg Zmina, Jeff Walsh, Micky Hasbrook, Len Jezior and Steve Schauer have planned to attend. If it is clear we will set up telescopes outside. Inside we will

have displays and interactive exhibits on the Sun, the planets, info about the club and we will do the “Your Weight On Other Planets” exhibit using an iPad app.

The next item of Old Business was a reminder that we are helping out at the Keystone Elementary Science Night on Friday March 31st, in LaGrange. There will be 20 minute mini-lessons on science-related topics for kids grades K-5 with Dan Walker, Dave Lengyel, Greg Zmina, Micky Hasbrook and Len Jezior planning to attend.

The final item was a brief discussion on how to best remind members that our General Meetings have been moved to Sandy Ridge in March, April and May. It was decided to use the Guidescope, the Forum, The Blog, the Facebook page, and our TNS system to do so.

Under New Business, the first item was a discussion about renewing our Network Solutions Domain Name. This Domain Name is owned/administrated by John O'Neal, who has moved to North Carolina. We will contact John to have ownership transferred to Lee Lumpkin.

The club has been contacted by the LCMP Welling Reservation naturalist about starting the Night Walks at that facility again. He was hoping to do two per month in the spring, with perhaps one a month during the summer. Of the dates he suggested, we committed to Thursday, March 30th as one we could help with. These walks will start at 8:00 p.m. and will take hikers to the Wellington Reservation observation mound where we will be waiting with telescopes set up. We will then conduct a 45-minute star party after which the participants will hike back to the parking lot. We will coordinate with them about scheduling future hikes and about how to cancel in case of poor weather. The fact that these hikes are to be on a Thursday night will make it difficult for BRAS members who work to attend.

Dates are as follows:

Public Observing	Fri./Sat. Feb. 24/25	7:00-9:00	Nielsen Observatory
General Meeting	Wed. March 1 st	7:00	SANDY RIDGE RESERVATION
Board Meeting	Thurs. March 9 th	7:00	Blue Sky Restaurant
Public Observing	Fri./Sat. March 17/18	9:00-11:00	Nielsen Observatory
Public Observing	Fri./Sat. Mar. 24/25	9:00-11:00	Nielsen Observatory
Wellington Night			
Walk	Thursday March 30	8:00-9:30	Wellington Reservation, LCMP

The meeting was adjourned at 8:49 p.m.

~Steve Schauer



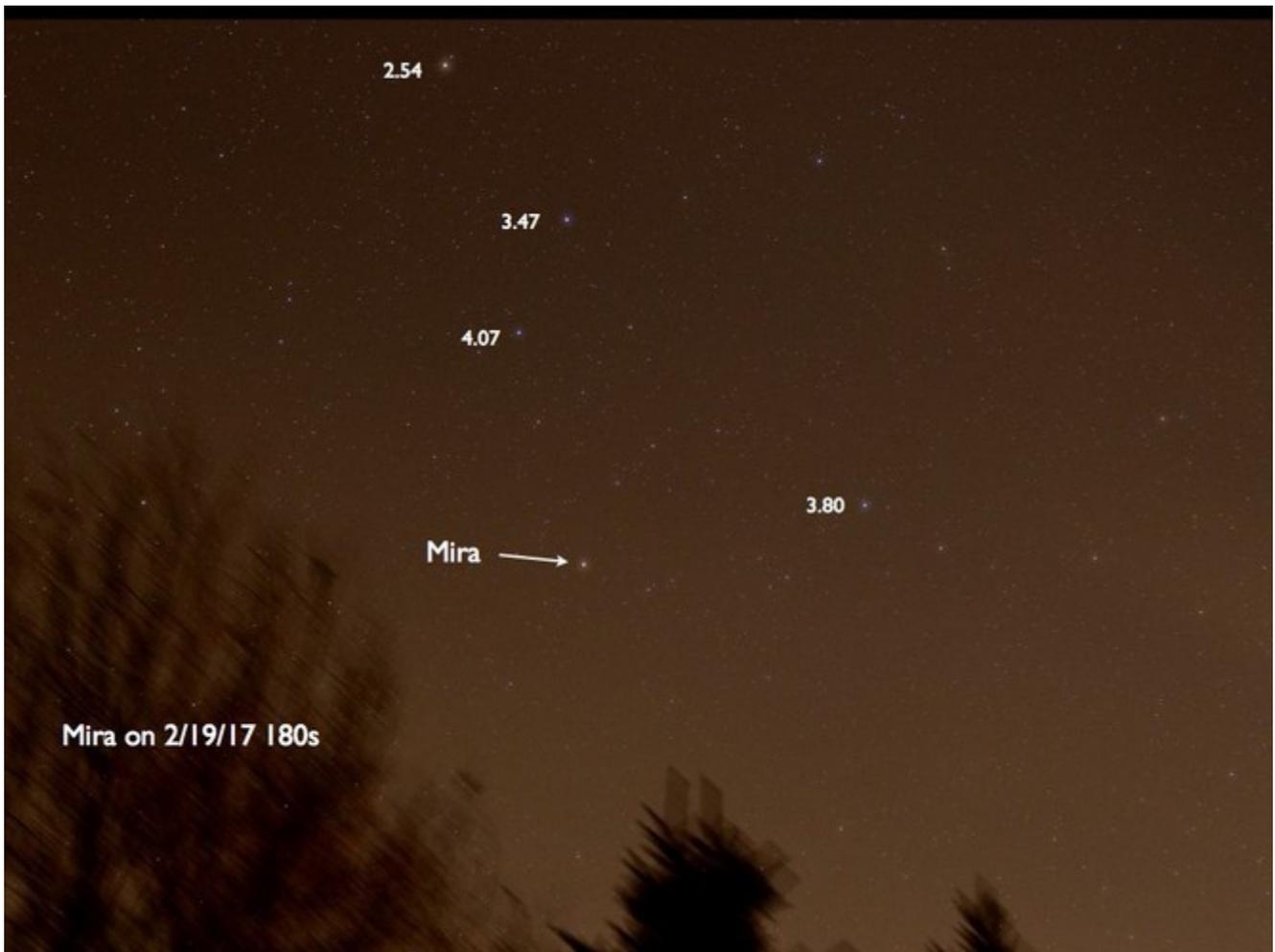
I took this photo 2/13/17 just a bit after 4 p.m. Venus clearly shows a waning crescent phase. I used a hand-held 300mm optically stabilized lens on my Canon SL1. I found Venus first with my unaided eye, then binoculars, then I took the photo. --Dave Lengyel

Deep-Sky Objects for March

Objects for Binoculars							
RA	Dec	Number	Mag(s)	Size/Sep.	PA	Const.	Type of Object
08 ^h 13.1 ^m	-05°48'	M48	m5.8v	54'		Hya	Open Cluster, 80 stars
08 ^h 40.1 ^m	+19°57'	M44	m3.1v	95'		Cnc	Open Cluster 50 stars, "Beehive or Praesepe
08 ^h 50.4 ^m	+11°49'	M67	m6.9v	29'		Cnc	Open clusereter 200 stars
08 ^h 46.7 ^m	-28°46'	48 (Iota-1)	4.2, 6.6	30.5"	307°	Cnc	Double Star
13 ^h 23.9 ^m	+54°56'	79+80 (Zeta)	2.3, 4.0	14.4"	150°	Cnc	Double Star
Objects for Small Telescopes (2-6 inch)							
RA	Dec	Number	Mag(s)	Size/Sep.	PA	Const.	Type of Object
06 ^h 26.8 ^m	+58°25'	5 Lyn	5.3, 9.8	31.4"	139°	Lyn	Triple Star (3 rd star 7.9, 96". 272")
08 ^h 52.7 ^m	+33°25'	NGC 2683	9.8v	8.4'x2.4'		Lyn	Galaxy, type SA(rs)b II-III
09 ^h 55.6 ^m	+69°04'	M81	m6.9v	24.0'x13.0'		UMa	Galaxy, type SA(s)ab I-II
09 ^h 55.8 ^m	+69°41'	M82	m8.4v	12.0'x5.6'		UM	Galaxy, IO
10 ^h 24.8 ^m	-18°38'	NGC 3242	m7.8v	>16"		Hya	Plan. Neb. "Ghost of Jupiter"
Objects for Medium-Size Telescopes (8-14 inch)							
RA	Dec	Number	Mag(s)	Size/Sep.	PA	Const.	Type of Object
08 ^h 26.8 ^m	+26°56'	23 Cnc (Phi-2)	6.3, 6.3	5.1"	218°	Cnc	Double Star
08 ^h 33.4 ^m	-16°09'	NGC 2610	m12.8v	37"		Hya	Planetary Nebula
08 ^h 48.3 ^m	+00°33'	OE194	7.3, 10.8	12.6"	56°	Hya	Double Star
08 ^h 49.2 ^m	+60°13'	NGC 2654	m11.8v	3.8'x0.7'		UMa	Galaxy, type SBab: sp II-III
09 ^h 10.3 ^m	+07°02'	NGC 2775	m10.1v	4.6'x3.7'		Cnc	Galaxy, type SA(r)ab
09 ^h 31.5 ^m	+63°04'	23 UMa	3.7, 8.9	22.7"	270°	UMa	Double Star
09 ^h 32.2 ^m	+21°30'	NGC 2903	m9.0v	12.0'x5.6'		Leo	Galaxy, type SAB(rs)bc I-II
Objects for Larger Telescopes (16-inch & larger) Challenge Objects							
RA	Dec	Number	Mag(s)	Size/Sep.	PA	Const.	Type of Object
07 ^h 38.1 ^m	+38°53'	NGC 2419	m10.3v	4.1'		Lyn	Glob. Cl. "Intergalactic Wanderer"
08 ^h 14.7 ^m	+49°04'	NGC 2541	m11.8v	7.4'x3.3'		Lyn	Galaxy, type SA(s)cd
08 ^h 54.2 ^m	+08°55'	PK219-31.1	m12.0v	>980"		Cnc	Planetary Nebula (use O-III filter)
08 ^h 54.2 ^m	+30°35'	57 Cnc (Iota-2)	6.0, 6.5	1.4"	316°	Cnc	Double Star
09 ^h 19.8 ^m	+33°44'	NGC 2832	m11.9v	3.0'x2.1'		Lyn	Galaxy, type E+2: (In Abell 779 galaxy group)
09 ^h 45.7 ^m	-14°20'	NGC 2992	m12.2v	4.0'x1.2'		Hya	Galaxy, type SO pec sp
09 ^h 45.8 ^m	-14°22'	NGC 2993	m12.6v	3.3'x1.8'		Hya	Galaxy, type IO? Pec

Print and use the [Deep-Sky Interest Group - Observation Form](#) to record your observations.

(thanks to Len Jezior for deep sky object charts)



The variable star Mira in Cetus seems to be near maximum.

This is a three minute exposure taken this evening from my house on 2/19/17 using Canon SL1, 180s, f/4.5, 400 ISO 35mm using iOptron drive in my driveway. Darn light pollution is even a problem down my way. I'd estimate Mira to be around magnitude +2.5, with some nearby stars in Cetus and Pisces marked with their magnitudes. So, how bright is Mira? Thanks to John Reising for reminding me to look at Mira. ~Dave Lengyel



Uranus and Mars, 137s, 300mm, f/5.6, 800 ISO ~Dave Lengyel

M42, 2m, 271mm, 800 ISO 2/27/17 ~Dave Lengyel



Neuroastrophotography

Visual astronomy is not just about fleeting observing experiences. All those time exposures upon the retinas and the visual cortex wind up in the long term memory.

After taking a new pair of very sharp binoculars out to star test for several clear nights, drinking in starlight for long stretches, it was easy to recall the images days later while sitting in a warm house. The stars were still crisp pinpoints in the mind's eye.

How wonderful that light from such enormous distances makes indelible changes in the brain after being captured by retinas and neurons.

Photographic memories of distant suns reside so easily in the brain, and are so easily recalled, in vivid detail.

The only way to share these images is to set up visual observing equipment to duplicate the setup and experience and let other retinas and brains soak in the starlight so that faraway photons can work their way into other neuroplastic worlds and magically establish their presence there too.

~Bill Ruth

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