

# PAS-Times



The newsletter of the Pontchartrain Astronomy Society  
*visit us online [www.astronola.org](http://www.astronola.org)*

December 2020  
*Volume 61, Issue 12*



**Next PAS General Meeting**  
**Friday, December 4th - 7:30pm**  
**Zoom meeting due to COVID-19**

**Deep South Star Gaze**  
**2020**

**PAS Officers for 2020****President:**

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 paspres@astronola.org

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**Secretary:**

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**SPMOS:**

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## President's Message

**By: Bill Johnson**

Hi, and welcome to December. It's the end of the year, but the night sky plans to give us one very nice treat before we roll into 2021. This month we have a very special show taking place in the heavens above. As both Jupiter and Saturn leave the night sky for several months, they leave with what promises to be an early Christmas gift. On Monday, Dec 21st Jupiter and Saturn will pass within 1/10th of a degree. This conjunction promises to be a spectacular view of the two most visible planets in your telescope at the same time. I hope you all make plans to view this. It will be just after sunset and can be viewed from almost anywhere. Backyard, lakefront, SPMOS, take your pick. I suggest you view these two planets several days before Dec 21st and plan where to set up, and what equipment to use. If you plan to photograph this event, take some shots a few days earlier to gauge exposures and settings. This event is the closest Jupiter and Saturn will be since 1623. It won't be matched until 2080. Plan now, and don't miss this viewing treat!

I was able to attend the Deep South Star Gaze last weekend, and had three of the best nights to observe in a very long time. The event was perfect weather, clear, dark skies, and attended by quite a few enthusiasts. If you were there, you know what I mean, and if you were not, we can't possibly tell you what you missed out on. I was able to view many different wonders of the night sky that had eluded me. What a great event and venue. Plan now for the next one in the spring. It's well worth attending.

As December marks the end of the year, it also marks the end of my term as President of the PAS. I have said many times how much I enjoyed serving as President. I have been blessed to have a great supporting team, and thank each of the PAS officers for all they have done, and continue to do for the PAS. While 2020 was especially challenging, with Covid tossing the biggest monkey wrench into our plans and processes, we will persevere and eventually come out ahead. Soon this will end, and we can get back to what we all enjoy doing- Astronomy. In January, Phillip Wollenberg will take over as PAS president. I support Phillip and expect that he will do a wonderful job as the next PAS resident. I hope you will all support him when and where you can do so.

Our next General meeting of the PAS will be on Friday, December 4th at 7:30PM. We will continue to hold meetings via Zoom. Zoom details will be on the PAS Website (Astronola.org) Forum. All are welcome and encouraged to attend our virtual meeting. Things are getting better, thank goodness. We hope to meet live soon, but for now we Zoom. I hope to see everyone there. I think we will be able to get into UNO in January, but that is still not confirmed yet.

I wish all of you a very Happy Holiday season, and hope that you all follow Covid guidelines to stay safe and well.

Thank you for allowing me to serve as your President for the last three years.

Bill Johnson  
 PAS president 2018-2020



## Secretary's Report November 2020 General Meeting **By: Jeff Best**

November 6th, 2020 - Twelve members were in attendance for our 7th virtual meeting

Bill Johnson opened the meeting at 7:30 pm, welcomed everyone

- Discussed current state of PAS & possible face to face meetings. Maybe January 2021? We will have a new PAS President for 2021. All other officers have agreed to continue if unopposed. Nominations remain open if anyone else is interested. Installation during December's meeting.

### Officer's reports

- Mike Danielson: PAS normally holds a Christmas party in December. Not likely this year. Online maybe?

- John Scholl: 2021 Membership dues must be payed by January 1st. Please notify John if making payment online as system has had issues with notifications.

- Ron Marcella: The observatory at SPMOS was recently broken into. Eyepieces & ladder were stolen. Looking at some trail-cams for possible installation. New keys & locks have now been installed. Contact Ron at 504-451-6034 to arrange to get a copy.

- Jeff Best: I have volunteered to pick-up webmaster duties since Chad Powell is resigning position. Plan to mirror what I'm currently doing on FaceBook. Need contact information for Chad. Bill to provide.

### Open discussion on the following topics:

- Member Observations: Bruce Housey shared his Mars composite video from the past month. Go to our PAS forum or FaceBook page to see his video.

- Next generation amateur telescopes: Lively discussion on this topic starting with what appeared in December's issue of Sky & Telescope page-66, Unistellar eVscope. Nearly hands off scope highly automated & no eyepieces. Uses an auto-focus camera & monitor. Other similar scopes were also discussed. Several members shared their experiences with electronic viewing & imaging both advantages & disadvantages.

- Barry Simon joined the meeting late & shared plans for the upcoming Deep South Star Gaze. Will share some highlites at the December meeting.

- Meeting adjourned at approximately 9:00 pm

- Next Meeting – December 4th - Will again be virtual so look for an invitation coming soon

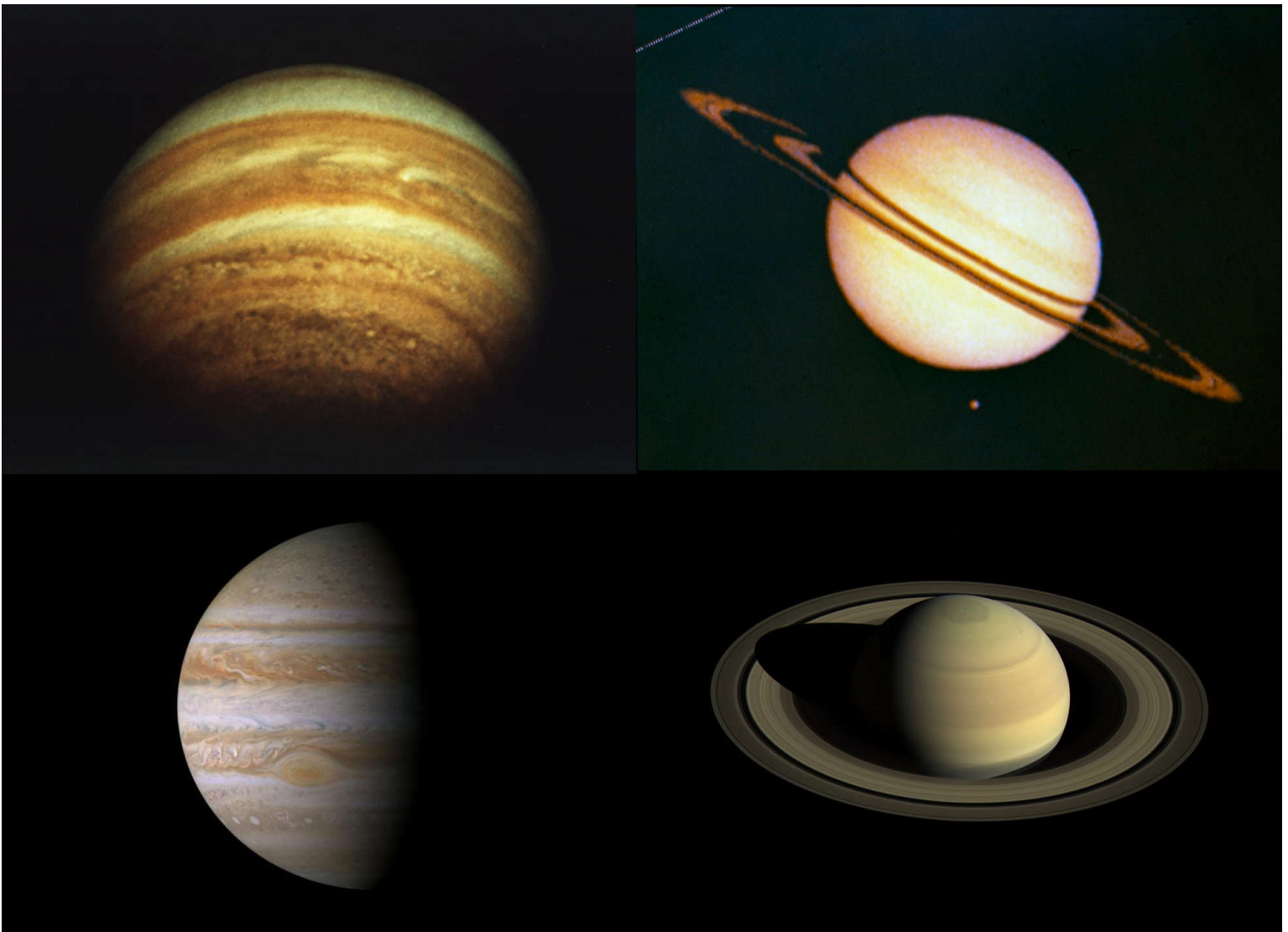
## Visitors to Both Jupiter and Saturn By David Prosper

Have you observed Jupiter and Saturn moving closer to each other over the past few months? On December 21, the two worlds will be at their closest, around 1/5 of a full Moon apart! While the two gas giants may appear close, in reality they are hundreds of millions of miles apart. Despite this vast distance, a select few missions have visited both worlds by using a gravity assist from giant Jupiter to slingshot them towards Saturn, saving time and fuel.



Pioneer 11 was the first mission to visit both worlds! Launched in 1973, the probe flew past Jupiter in late 1974, passing just 26,4000 miles above its stormy clouds. In 1979, it became the first spacecraft to encounter Saturn. Pioneer 11 took the first up-close photos of Saturn and its satellites, and made many exciting discoveries, including the detections of its magnetic field and a faint "F" ring, before departing Saturn and eventually, the solar system.

The Voyager missions quickly followed up, taking a "Grand Tour" of the four largest and most distant planets in our solar system. Both probes were launched within two weeks of each other in 1977. Voyager 1 flew past Jupiter in



The difference in technology between generations of space probes can be stunning! The top two photos of Jupiter and Saturn were taken by Pioneer 11 in 1974 (Jupiter) and 1979 (Saturn); the bottom two were taken by Cassini in 2000 (Jupiter) and 2016 (Saturn). What kinds of photos await us from future generations of deep space explorers?

March 1979, discovering Jupiter's faint ring and two new moons, along with active volcanoes on Io's surface! The probe then flew past Saturn in November 1980, discovering five new moons, a new "G" ring, mysterious ring "spokes," and "shepherd moons" shaping the rings. After a brief encounter with Titan revealed evidence of complex organic chemistry and liquid on the moon's frigid surface, Voyager 1 was flung out of the plane of the solar system. Following close behind, Voyager 2 took detailed photos of Jupiter's moons and cloud tops in July 1979. Flying past Saturn in August 1981, Voyager 2 measured the thickness of Saturn's rings and took detailed photos of many of its moons. This second explorer then captured images of Uranus and Neptune before leaving our solar system.

Cassini-Huygens was the last mission to visit both worlds. Launched in 1997, the mission flew past Jupiter in late 2000 and took incredibly detailed photos of its stormy atmosphere and faint rings. Cassini entered into Saturn's orbit on July 1, 2004. The Huygens probe separated from Cassini, landing on Titan to become the first probe in the outer solar system. Cassini discovered geysers on Enceladus, fine details in Saturn's rings, many more moons and "moonlets," the changing oceans of Titan, and seasonal changes on Saturn itself. After revolutionizing our understanding of the Saturnian system, Cassini's mission ended with a fiery plunge into its atmosphere on September 15, 2017.

What's next for the exploration of the outer worlds of our solar system? While Juno is currently in orbit around Jupiter, there are more missions in development to study the moons of Jupiter and Saturn. Discover more about future NASA missions to the outer worlds of our solar system at [nasa.gov](http://nasa.gov).

*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.gov](http://nightsky.jpl.nasa.gov) to find local clubs, events, and more!*



### Deep South Star Gaze # 38 Recap - PAS Forum post by Barry Simon » Sun Nov 22, 2020

Well the 38th Annual Edition of the Deep South Star Gaze is now history. A memorable star party held in a memorable (not all for the best reasons) year. How did we do? Pretty good I think, read on - In spite of COVID the DSSG was one of a very few star parties which was able to be held. We did limit registration based upon what we felt we could accommodate due to COVID. Realistically I was expecting a registration of no higher than about 30 to 35 and we actually had a paid registration of 55. Not all of the 55 registrants actually attended, it was more like about 46 or 47 but this was enough people to make the field feel more like some of our big DSSG events from the past. The weather cooperated for a change. Thursday and Friday nights were very, very good and we did get some observing in on the other nights too so anyone who came did get a chance to see the stars from a dark location. Most commented on how happy they were to be able to get some observing in. There were over 30 registrations. Pretty good in this COVID year. Here is a partial list of early registered attendants.  
 1 Miele, John - 2 Gaddy, Kenneth - 3 Simon, Barry - 4 Morris, Joseph - 5 Brocksmith, Donald - 6 Walter, Matt - 7 Withrow, Kate - 8 Wright, Steven - 9 Best, Jeff - 10 Roberts, Corey - 11 Hale, David - 12 Kern, David - 13 Kern, Clariza - 14 Smith, Forrest - 15 Philpot, Len - 16 Sarrat, Walter - 17 Martinez, John - 18 Siekmann, Vicki - 19 Shirkey, Bryan - 20 Harrison, Steve - 21 Meis, Nic - 22 Thompson, Greg - 23 Johnson, Bill - 24 Kannard, Lance - 25 Halupowski, David - 26 Aymond, Kirk - 27 Rodenhausen, Eric - 28 Rodenhausen, Mary Ann - 29 Lindsey, Madison - 30 Diaz, David - 31 Keating, Ron - 32 Junius, Ralph



## The 38th Deep South Star Gaze

*Photos by Barry Simon*



## Upcoming Events

**PAS General Meeting** Friday, December 4th. Virtual online due to COVID-19

Visit the PAS website and forum for COVID-19 info, virtual meeting information and outreach updates....

# www.astronola.org

### On the Cover

DSSG #38 Photo by Barry Simon

### On the Back Cover

Constellation Sagittarius  
from Urania's Mirror - A View of the Heaven

The PAS is a proud member of these organizations:

International Dark-Sky Association



**PAS 2021**  
**General Meetings**  
**ZOOM**  
**December 4 2020**  
**Holiday Party**  
**January 29, 2021**  
**February 26**  
**March 26**  
**April 23**  
**May 28**  
**June 25**

**January 2021**  
**PAS-Times Deadline**  
Sunday, January 17th  
Please submit all things astronomical to be included in the next edition of PAS-Times to the editor at the following address:  
**pas2vp@astronola.org**

2021 Membership Renewal Form  
Date \_\_\_\_\_

Name \_\_\_\_\_  
Address \_\_\_\_\_  
City \_\_\_\_\_ St \_\_\_\_\_ ZIP \_\_\_\_\_  
Home Phone\* \_\_\_\_\_  
Work Phone\* \_\_\_\_\_  
Occupation \_\_\_\_\_  
E-mail Address \_\_\_\_\_  
\*Check here  if you DO NOT want your phone numbers published.

Membership Dues:  
(Calendar year per household) \$40.00 \_\_\_\_\_  
(Calendar year per Student) \$20.00 \_\_\_\_\_  
Optional Subscriptions:  
Sky & Telescope \$32.95/yr \$65.95 two years  
    \_\_\_ New \_\_\_ Renewal \_\_\_\_\_  
Astronomy \$34.00/yr or \$60.00/2years  
    \_\_\_ New \_\_\_ Renewal \_\_\_\_\_  
Mailed Newsletter \$20.00/yr \_\_\_\_\_  
SPMOS Key Deposit \$25 \_\_\_\_\_  
Only pay this if you do not have a Dorm key and want to obtain one.  
Optional Donation: \_\_\_\_\_ (Tax Deductible)  
Total Amount: \_\_\_\_\_  
(Make check payable to PAS)  
Mail to:

Pontchartrain Astronomy Society, Inc.  
16082 Lake Ramsey Rd.  
Covington, LA 70435

Members can also renew their membership and pay dues on the website. Here is the link: <http://astronola.org/join.php>

Pontchartrain Astronomy Society, Inc  
Kent Birkle, PAS-Times Editor  
21067 Lowe Davis Rd.  
Covington, La. 70435

SAGITTARIUS AND CORONA AUSTRALIS.

SCYTHIUS  
SOBIERSKI

O P H I U C H U S

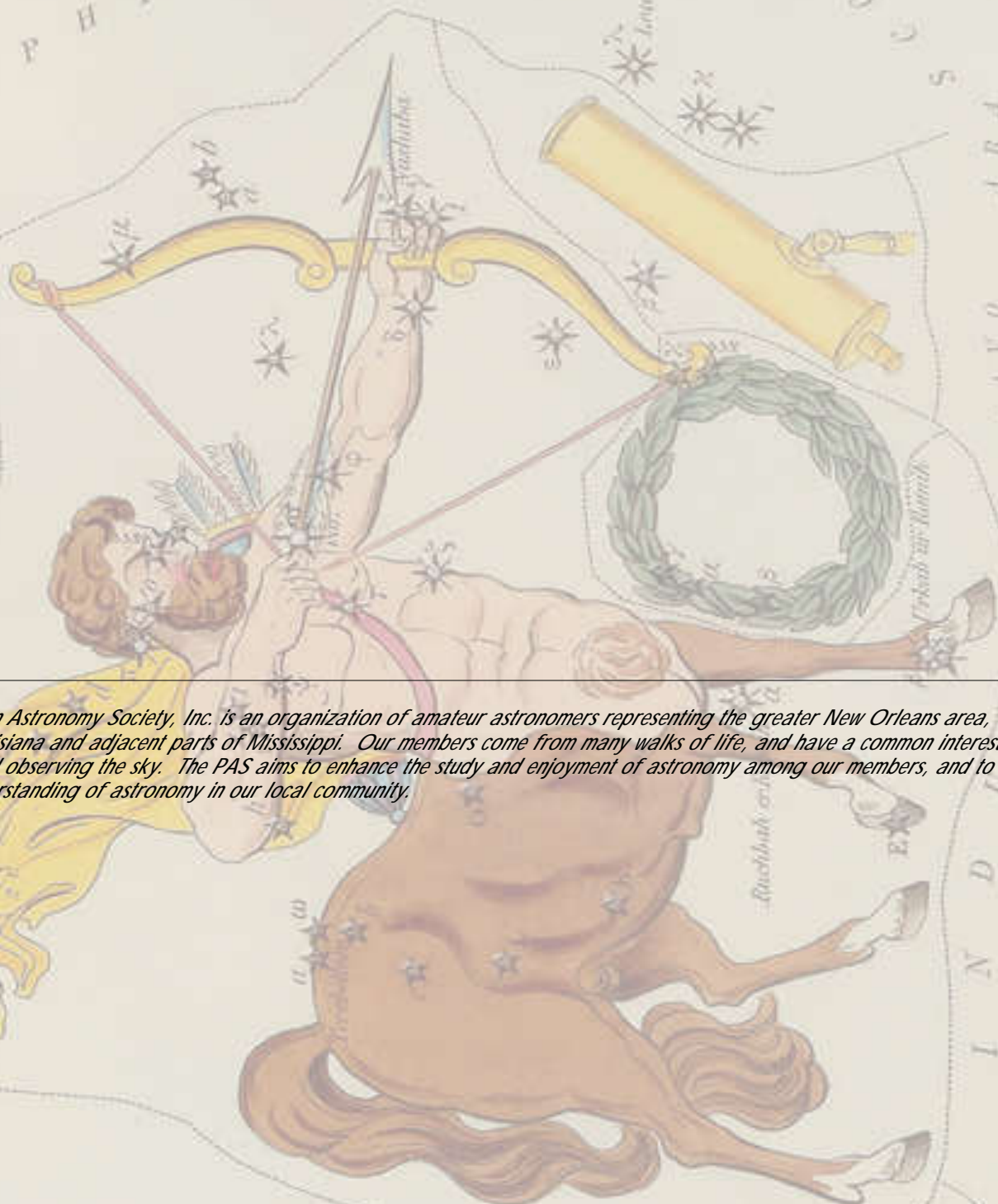
O R P I O

P A V O A R A

M I C R O S C O P I U M A N D T E L E S C O P I U M

SCYTHIUS

Dubouché



The Pontchartrain Astronomy Society, Inc. is an organization of amateur astronomers representing the greater New Orleans area, southeastern Louisiana and adjacent parts of Mississippi. Our members come from many walks of life, and have a common interest in astronomy and observing the sky. The PAS aims to enhance the study and enjoyment of astronomy among our members, and to promote an understanding of astronomy in our local community.

The Constellation Sagittarius will be host to a rare conjunction of Saturn and Jupiter on December 21st

BALLON FEROSTE