



Mid-Hudson Astronomical Association

April, 2018

Website: www.midhudsonastro.org

Yahoo Group: MHAstro

President : Jack Chastain
Secretary: Jim Rockrohr
Newsletter Editor: Rick Versace
Publicity: Paul Chauvet
Speakers: Paul Granich

Vice President: Paul Granich
Treasurer: Karen Tulchinsky
Membership Coordinator: Caryn Sobel
Webmaster: Paul Chauvet
Outreach: (open)
College Liaison: Dr. Amy Forestell

Board of Directors: Joe Macagne, Karl Loatman, Steve Carey, Willie Yee

Reminder: The May Meeting is at the Elting Memorial Library in New Paltz at 7:00 PM

Minutes of the monthly meeting of the Mid Hudson Astronomical Association, April 17, 2018

The meeting was called to order at 7:29 PM by President Jack Chastain in the Coykendal Auditorium at SUNY, New Paltz, NY.

The minutes of the March, 2018, meeting were approved as published in the newsletter.

Officer's Reports:

President: Jack has been working on transition documents and will distribute them for comments when ready. There are also some minor By-Law updates coming.

Membership: Caryn Sobel was not present. Dues of \$25 are due for 2018.

Treasurer: Karen Tulchinski was not present.

Publicity/ Webmaster: Paul Chauvet was not present.

Outreach:

- Joe Macagne volunteered to coordinate our outreach activities.
- **Next Club Star Party:** May 11, 8 PM. Be sure to RSVP with car license plate number, make and model by the Thursday evening before the star party, even if there is only a remote chance that you will attend on Friday evening or Saturday, if postponed due to weather. It's better to have too many people on the list rather than someone who isn't registered.
- **Sam's Point Moon Viewing:** April 21, Ken Bailey coordinating.
- **Dark Skies Talk:** April 25, 6-8 PM at Gino's Pizza in Poughkeepsie. See idsnyc.org for details.
- **Moonwalk on the Walkway:** April 27. Jack coordinating.
- **Bright Ideas:** April 29, High Meadows School, Stone Ridge: solar viewing. See Willie.
- **Girl Scout Camp:** May 19, Ulster County Fairgrounds. Several 'scopes needed. Rick coordinating.
- **Girl Scout Camp:** June 8, Monroe, NY.
- **Private Mohonk Event:** Ken Bailey is coordinating. Details TBD.
- **Paterson Library:** requesting 'scopes for sometime in August.
- **Possible Private Event:** at some TBD Lodge, willing to pay. August 13, 14, or 15. Jack coordinating.
- **Olana Events:** TBD
- **Walkway Events:** New organizational structure. Eric Myers is our representative. Expect invitations for May 12: "Jupiter", July 15: "Moon meets Venus", August 12: "Meteor Shower", September 7: "Neptune in Opposition". These are SEPARATE from the "Moon Walks". First of those is April 27.

Upcoming programs: The following information was shared:

- (None reported. See MeetUp for latest information.)

Old Business:

- The last Star party (April 13) cool with haze and high clouds. About 30 people, 6 'scopes and 2 cameras. Started out with poor conditions, but got better as it got later.
- Club Annual dinner: 4 people attended at The Would Restaurant. Good time had.
- Club telescopes are available to paid-up members:
 - o If you have one of the club 'scopes, take a picture and send it to Jack so we can display them.
 - o 13" dobsonian, currently with Jack Chastain, is available. It was made by Gordon Waite. Some discussion as to whether this is now Waite Research in New Jersey. Jack to investigate.
 - o ETX80 maksutov, currently with Joe Macagne.
 - o 4" Tasco refractor on an EQ mount, currently with Paul Chauvet, is available.
 - o A planetary camera and a "deep space" camera are available. See Willie.
- Dues are Due! \$25 for the year by check or cash. PayPal also available for a slightly higher price.

New Business:

- **NEAF:** April 21-22. Jack will be with the antique telescope group with his 8" Criterion.
- **Walkway over the Hudson:** They have a new organizational structure and Eric Myers is our rep. See outreach, above.
- **May club meeting location:** The May meeting will be at the Elting Library in New Paltz and will start with business meeting at 7:00 and a talk by Ken Bailey immediately after. This is in conjunction with Elting's month of science events.

Observing Reports:

- (none)

Visitors/New Members:

There were about 23 people in attendance at the end of the business meeting.

The meeting was adjourned at about 8:00 PM. The next meeting is on May 15th, 2018, at the Elting Library.

Submitted by James Rockrohr, May 11th, 2018.



What Is the Asteroid Belt?

By Linda Hermans-Killiam

There are millions of pieces of rocky material left over from the formation of our solar system. These rocky chunks are called asteroids, and they can be found orbiting our Sun. Most asteroids are found between the orbits of Mars and Jupiter. They orbit the Sun in a doughnut-shaped region of space called the asteroid belt.

Asteroids come in many different sizes—from tiny rocks to giant boulders. Some can even be hundreds of miles across! Asteroids are mostly rocky, but some also have metals inside, such as iron and nickel. Almost all asteroids have irregular shapes. However, very large asteroids can have a rounder shape.

The asteroid belt is about as wide as the distance between Earth and the Sun. It's a big space, so the objects in the asteroid belt aren't very close together. That means there is plenty of room for spacecraft to safely pass through the belt. In fact, NASA has already sent several spacecraft through the asteroid belt!

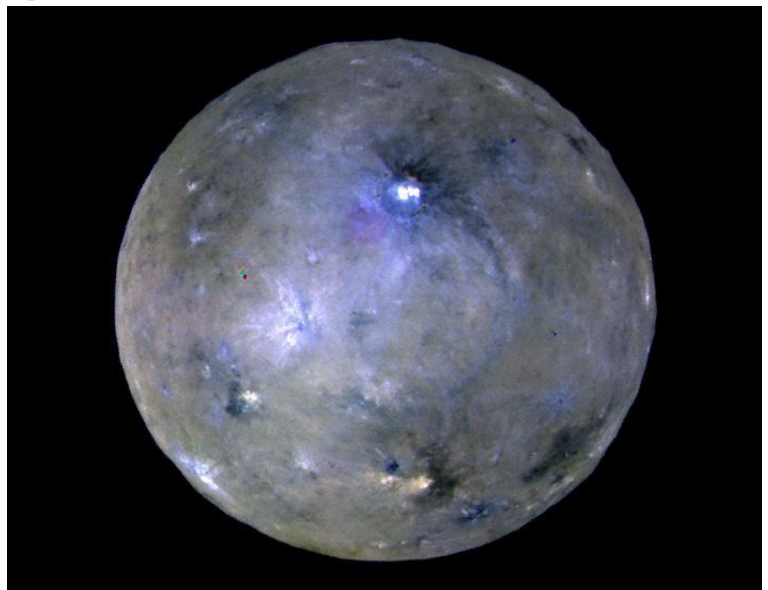
The total mass of objects in the asteroid belt is only about 4 percent the mass of our Moon. Half of this mass is from the four largest objects in the belt. These objects are named Ceres, Vesta, Pallas and Hygiea.

The dwarf planet Ceres is the largest object in the asteroid belt. However, Ceres is still pretty small. It is only about 587 miles across—only a quarter the diameter of Earth's moon. In 2015, NASA's Dawn mission mapped the surface of Ceres. From Dawn, we learned that the outermost layer of Ceres—called the crust—is made up of a mixture of rock and ice.

The Dawn spacecraft also visited the asteroid Vesta. Vesta is the second largest object in the asteroid belt. It is 329 miles across, and it is the brightest asteroid in the sky. Vesta is covered with light and dark patches, and lava once flowed on its surface.

The asteroid belt is filled with objects from the dawn of our solar system. Asteroids represent the building blocks of planets and moons, and studying them helps us learn about the early solar system.

For more information about asteroids, visit: <https://spaceplace.nasa.gov/asteroid>



This image captured by the Dawn spacecraft is an enhanced color view of Ceres, the largest object in the asteroid belt. Credit: NASA/JPL-Caltech/UCLA/MPS/DLR/IDA

2018 Star Party Schedule

| Date | Time | Sunset | End Civil Twilight | Nearest New Moon |
|---------------|---------|---------|--------------------|------------------|
| January 19th | 7:00 PM | 4:55 PM | 5:25 PM | January 17th |
| February 16th | 7:00 PM | 5:30 PM | 5:58 PM | February 15th |
| March 16th | 7:00 PM | 7:03 PM | 7:31 PM | March 17th |
| April 13th | 8:00 PM | 7:34 PM | 8:03 PM | April 16th |
| May 11th | 8:00 PM | 8:04 PM | 8:35 PM | May 15th |
| June 15th | 8:30 PM | 8:31 PM | 9:06 PM | June 13th |
| July 13th | 8:30 PM | 8:29 PM | 9:02 PM | July 13th |
| August 10th | 8:00 PM | 8:00 PM | 8:31 PM | August 11th |
| September 7th | 7:30 PM | 7:18 PM | 7:46 PM | September 9th |
| October 5th | 7:00 PM | 6:30 PM | 6:58 PM | October 9th |
| November 9th | 7:00 PM | 4:41 PM | 5:10 PM | November 7th |
| December 7th | 7:00 PM | 4:25 PM | 4:46 PM | December 7th |

Directions To The Star Party Site

[Lake Taghkanic State Park](#) is in the town Ancram, NY. The park entrance is on the Taconic Parkway 10 minutes north of the exit used for Wilcox park.

Star Parties at Lake Taghkanic are held in the West Parking lot, next to the beach. The skies are darker than in Wilcox, with less stray light to deal with. The horizon is also much lower, especially to the south and east, making many more targets possible.

IMPORTANT: all events at Lake Taghkanic State Park require an **RSVP** which includes license plate number of the car you are bringing (please do so via [Meetup](#)). The park is patrolled by state police, and all non registered cars will be ticketed and risk our use of the park.

General Information:

- ♦ For the foreseeable future, all indoor meetings will be held on the 3rd Tuesday of each month in Coykendall Science Bldg., SUNY New Paltz (directions above) at 7:30 PM. All indoor events are FREE! All are welcome. The presentations are generally geared towards teenagers and up. For more information, call the Club Hotline.
- ♦ Dates listed for star parties are the primary dates. The rain date is the following night unless otherwise noted. Only one session is held for a given weekend, usually on the primary date, Friday, unless postponed (usually due to inclement weather) to the backup date, Saturday. Exceptions to this are noted in the "Scheduled Events" section above.
- ♦ All outdoor events are FREE! All are welcome. If you bring small children, it is **your** responsibility to keep a close eye on them. Please do not bring white-light flashlights. Instead, bring a red astronomer's flashlight or an ordinary flashlight covered with several layers of red cellophane. If in doubt about the weather, check the status of the event at www.midhudsonastro.org.