

Research Committee report for October 2017

As well as doing some imaging, AAI members were busy presenting their results to others this month.

Solar System: Jim Nordhausen caught the dawn crescent moon with Venus nearby with a handheld half second exposure. He has very steady hands.

Nebulae: Helder Jacinto imaged Sharpless2-132 for ten hours, as well as *NGC 281, the Pacman Nebula* in Cassiopeia, for nearly 12 hours in Ha, Oiii, and Sii. He also targeted NGC 7380, the Wizard Nebula (Sh2-142), an open cluster about 9200 light years away in Cepheus discovered by Caroline Herschel in 1787. Tony Sharfman accumulated ten hours on the Crescent Nebula, and 3 hours on the Heart of the Heart Nebula.

Galaxies: Tolga Gumusayak imaged *NGC 7331 and Stefan's Quintet*, and offered the raw data as an imaging processing challenge to others. Tony also imaged the *Fireworks galaxy, NGC 6946*, a grand-design spiral in Cepheus ten million light years from us.

Presentations: For the AAI monthly meeting on October 20 several *members presented their eclipse stories*. Kathy Kawalek and her family saw the total eclipse in Sheridan, Oregon and also enjoyed seeing tufted puffins on the trip. Kathy Vaccari loved the dry sagebrush in Dubois, Wyoming. Clif Ashcraft had a snood on his wooden dark box in Mann Creek State Park in Idaho. Mary Lou and Roger West helped run the HamSCI.org ham radio investigation of the ionosphere at a resort in Gilbertsville, Kentucky with fourteen friends. Al and Bonnie Witzgall took some photos on real film in Marion, Illinois not far from crowded Carbondale.

Dennis Conti spoke at the NASA exoplanet conference in Pasadena on October 12 on "Achieving High Precision Transit Observations with Sub-Meter Telescopes."

Tolga presented "CCD Commander" for The Astro Imaging Channel on October 22.

Other: Steve Lowe is nearly finished constructing his new roll-off roof observatory in his backyard. Clif has removed the old mount for his Schupmann telescope and has poured a new concrete pier for a better mount in Perrineville.

Clif started a discussion of the exciting observation of the merger of two neutron stars detected in LIGO gravitational waves AND light. This was announced on October 16 and heralds a whole new kind of astronomy.

Respectfully submitted, Mary Lou West, Research Chair

