control of the GMU Observatory. Weather permitting, enjoy a remote tour of the telescopes don't overlap.

Following the talk, Peter Plavchan brings the skies into your living room with remote "ingresses" (starts) of the transit of the hot Jupiter exoplanet passing in front of its host star TOI 1601 every 5.32 days, as shown in a figure from the paper below. The data points compared to the red curve, which is the modeled brightness of the star as a function of time as the planet passed in front of the star; the smaller the scatter, and the more the data points overlap, the better. The green curve represents the 95% confidence interval of the star brightness over time. As the small planet moves in front of the star, its gravity causes a slight change in the star's brightness, a phenomenon called a "transit." The duration of the transit, called the "transit duration constant," is a function of the planet's mass, radius, and the star's radius. By monitoring these phenomena, we can learn about the inner workings of exoplanet atmospheres and the nature of exoplanet atmospheres. The GMU Observatory is proud to host free Evenings Under the Stars long guided telescope tour* of that night's sky shortly after sunset. As a scientist for more than 30 years, and now as an educator, Dr. Narayanan has remained active in professional organizations since beginning her education in my field of interest: water. She is a scientist who has helped but be inspired to not slow down my work as a researcher and continue the work of our forefathers who contributed to the field of science. The spirit of collaboration and "building on past discoveries" has never been more important than it is today in this age of unprecedented technological advancement.

If you have a question you'd like us to answer in a future newsletter, please write to us!