Mercury Transit Viewing for the Public

The ETSU Department of Physics & Astronomy is offering the public an opportunity to safely view a rare astronomical event. On Monday, November 11th, the planet Mercury will pass directly between the Sun and Earth, an event known as a transit. The planet will be seen as a very small black dot moving slowly across the face of the Sun. Although there are 14 transits of Mercury occurring this century, not all transits are visible from a given location on the Earth. If you miss this one, you will have to wait 30 years for the next transit visible from East Tennessee (May 2049)!

Since Mercury will only be about 1∕180 the size of the Sun's apparent diameter, a telescope will be needed to magnify the image. However, to safely view the Sun requires special solar filters or viewing techniques. One should never look at the Sun without proper eye protection or serious damage to the eye and even blindness could result. The ETSU astronomers will have numerous telescopes with special solar filters set up on the campus of ETSU to provide the public with a safe means to view this unique astronomical event. The telescopes will be set up on an athletic field on the west side of the main ETSU campus, just north of the Center for Physical Activity. Visitors should enter campus from State of Franklin Road and can park in the large lots adjacent to the athletic field area. The transit will start just after sunrise and end early afternoon. Telescopes will be available for the public at the location above from 9:30 am until 12:30 pm to safely view the event.

Transits of Mercury are not as historically important as transits of Venus due to its very small angular size compared to the diameter of the Sun. It will take just three minutes from the time Mercury just meets the edge of the disk of the Sun until the entire small dot is in front of the Sun’s disk. At about 10:30 am on November 11th, Mercury will be near the midpoint of the transit and closest to the center of the Sun.

Please note that in the event of inclement weather or heavily overcast skies preventing the Sun to be seen, the event will be cancelled. For more information about the event contact Dr. Gary Henson at 423-439-6906 or by email at hensong@etsu.edu.