

## CAS Sky Notes for November 2024

Now that the clocks have gone back, we have long dark evenings for observing – provided the clouds clear!

### Comet Tshuchinshan-ATLAS

This wasn't quite as spectacular as some predicted, but many did get some decent photos. It is now rather faint as it recedes from Earth.

### Planets

#### Mercury.

Mercury reaches greatest eastern elongation on the 16<sup>th</sup> and is an evening object. However, its southerly declination of  $-25^{\circ}$  will make it hard to see in the northern hemisphere.

#### Venus

Venus remains an evening object with a magnitude of  $-4.1$  and its elongation increases to  $40^{\circ}$ , with a phase of 73%, and a diameter of  $16''$ . As with Mercury, its southerly declination also makes it hard to view as it is low in the sky after sunset, but can be seen if you have a good western horizon.

#### Mars

This is in Gemini and near Castor and Pollux. It rises about 9pm and so is well placed before midnight now. It is much brighter, at magnitude  $-0.4$  and its diameter increases to 11 arcsec during the month. Its approximate position is RA 8h 25m, Dec  $+21^{\circ}$ , and its red colour will make it easy to identify.

#### Jupiter

This rises by 7pm now and is well placed for observing later in the evening. It reaches opposition in December. It is unmistakable, with a magnitude of  $-2.8$ , making it a great telescope object, so do get observing!

#### Saturn

Saturn is well past opposition and still visible throughout the evening. The rings have a tilt of about  $5^{\circ}$ . This could make a nice photo. It is still a bit low in the sky but is a little brighter due to more of the rings showing (mag.0.9). Look for Titan, its brightest and biggest satellite which orbits every 16 days. **On 11<sup>th</sup> November Saturn is less than  $0.1^{\circ}$  South of the Moon.**

#### Uranus

Uranus is observable throughout the night (RA: 3h 30m, Dec  $+18.5^{\circ}$ ). It reaches opposition on 17<sup>th</sup> November. Its magnitude is  $+5.6$  and diameter  $3.8''$ .

#### Neptune

Neptune reached opposition on 21<sup>st</sup> September, with a diameter of  $2.4''$  and mag.  $+7.8$ . Its approximate position is RA 23h 50m, Dec  $-2.4^{\circ}$ . **On the 16<sup>th</sup>, Neptune is about  $0.6^{\circ}$  south of the Moon.** This should make it easier to find.

Anyone wishing to Uranus and Neptune, and who would like more details, should contact me at [coord@cotswoldas.org.uk](mailto:coord@cotswoldas.org.uk)

## **Moon**

**1<sup>st</sup> November:** New Moon

**17<sup>th</sup> November:** Full Moon

**9<sup>th</sup> November:** Moon is at First Quarter

**23<sup>rd</sup> November:** Moon is at last quarter

## **Sun**

The Sun is remains active currently, so watch out for large Sunspot groups. Remember to **never look at the Sun directly without a proper solar filter**.

## **Aurora**

The Sun is around its maximum activity and may produce more aurorae. I suggest you download an aurora alert App, such as *Aurora Pro*. The darker nights mean that there is a much better chance of seeing them.

## **Meteors**

The Leonids become visible this month, reaching their maximum around the 17<sup>th</sup>. Unfortunately, that is just after full Moon, making this display less favourable. The ZHR is about 15, so not many each hour.

## **Dark Sky Objects**

The Milky Way is well placed for photography and the Andromeda Galaxy (M31) is high in the sky, making it a good target for photography. A wider angle shot could take in the Milky Way as well. The Perseus Double Cluster is also high in the sky. The Pleiades and Taurus are getting well-placed for observing and photography.