



JERSEY ASTRONOMY CLUB

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NEWSLETTER

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Diary:

December 12 – Christmas Quiz Night, mince pies, mulled wine. Varied questions, you don't need to be Einstein to get the answers!

January 9 2017 – Bring a Scope Evening

Dome News

Neil will be having regular Monday night viewings if the night is clear.

Jersey Astronomy Club Astrophotography Competition

Jersey Astronomy Club is launching this competition to raise people's awareness of astronomy and particularly how easy it is to take photographs of the night's sky with modern digital cameras. These days amateur astronomers with affordable equipment are taking pictures of the planets and deep space better than the Hubble space telescope was producing when first launched.

Taking great close up shots of lunar craters or the rings of Saturn still needs some specialist equipment like a good telescope with a motor drive but anyone can use a normal digital camera to take great night shots.

Categories

1 Solar system, including the Moon, Sun and planets
Close up images of the solar system will probably need a long telephoto lens or a camera attached to a telescope

2 Deep sky, using telescopes

These would be pictures of individual night sky objects from outside our solar system so galaxies, nebulae, star clusters. They will need to be long exposure images taken with a tracking mount that counters the Earth's rotation

3 Nightscapes, wide angle images using just ordinary cameras

These can be anything from wide angle, long exposure to time-lapse images and don't need complicated equipment just a camera with manual controls and a tripod

One adult and one junior (under 16) winner for each category, £25 Prize for each One overall winner with a £50 prize

Rules

Entries to be received by 30th April 2017. Winners announced at the Astronomy Club AGM in June 2017. Consent of a parent or guardian is required for junior entrants. Only 3 entries per person so that they could enter one per category if wished.

All entries to be taken in the period 1st December 2016 to closing date.

The photos must be original work and the sole work of the entrant and not infringe copyright or any rights of a third party or have been entered in a photographic competition before.

Details needed from entrants should include, name, address including e-mail, age if in junior category and therefore date of birth, where taken, date taken, category of entry and title of entry, equipment used, exposure time.

Images to be submitted as JPEG digital files. Digital enhancement is allowed, for example changing colour, saturation etc., but not cutting and pasting. No borders, watermarks or signatures to be visible.

Competition open to residents of Jersey only.

Copyright on all images will remain with the photographer but we reserve the right to publish with acknowledgement of authorship on social media (Facebook, Website) and in the JEP.

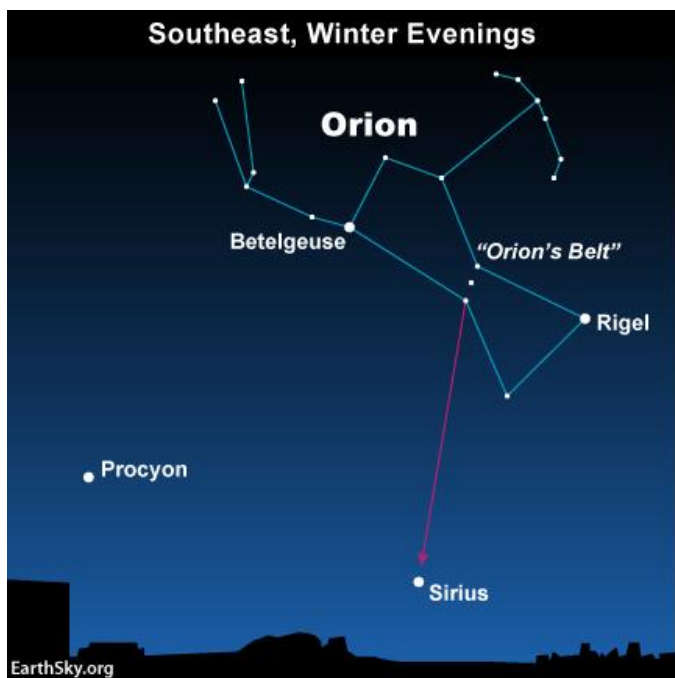
Entries should be emailed to jerseyastronomyclub@gmail.com
Entry is free.

Astronomy Chuckle Zone:

After his first meal on the moon, the 22nd century astronaut said the food was good but the place lacked atmosphere.

Black holes are most commonly found in black socks.

Night Sky gazing in December



The unrivalled constellation of Orion is the stand-out feature of our long December nights which are bracketed by the two brightest planets – Venus as a brilliant evening star, and Jupiter in the pre-dawn. I



Venus' altitude in the South at sunset improves from about 12° to 22° as it tracks northwards in relation to the Sun. By the year's end, it sets in the WSW more than four hours after the Sun and brightens while its gibbous disc swells if viewed telescopically.

The Phases of Venus result from the planet's orbit around the Sun inside the Earth's orbit giving the telescopic observer a sequence of progressive lighting similar in appearance to the moon's phases. It presents a full image when it is on the opposite side of the Sun. It shows a quarter phase when it is at its maximum elongation from the Sun.

Venus presents a thin crescent in telescopic views as it comes around to the near side between the Earth and the Sun and presents its new phase when it is between the Earth and the Sun.

The first recorded observations of them were telescopic observations by Galileo Galilei in 1610.



Jupiter, rising in the E at about 03:00 on the 1st and by 01:25 on the 31st, climbs through our SE sky to stand some 30° high in the S before dawn. Conspicuous at mag -1.8 to -1.9 , it lies above-right of Spica in Virgo and appears 35 arcsec wide when it lies near the Moon on the 22nd and 23rd.

It is a shame that yet another supermoon coincides with the peak of the Geminids meteor shower to swamp what might have been the richest meteor display of the year.

Moon Watch

The Moon glides through Taurus this month. On the night of December 12th, one day before full, it passes in front of the star Aldebaran.

December 14 - Full Moon, Supermoon. The Moon will be located on the opposite side of the Earth as the Sun and its face will be fully illuminated. This phase occurs at 00:06 UTC. This full moon was known by early Native American tribes as the Full Cold Moon because this is the time of year when the cold winter air settles in and the nights become long and dark. This is the last of three supermoons for 2016.

December 21 - December Solstice. The December solstice occurs at 10:44 UTC. The South Pole of the earth will be tilted toward the Sun, which will have reached its southernmost position in the sky and will be directly over the Tropic of Capricorn at 23.44 degrees south latitude. This is the first day of winter (winter solstice) in the Northern Hemisphere and the first day of summer (summer solstice) in the Southern Hemisphere.