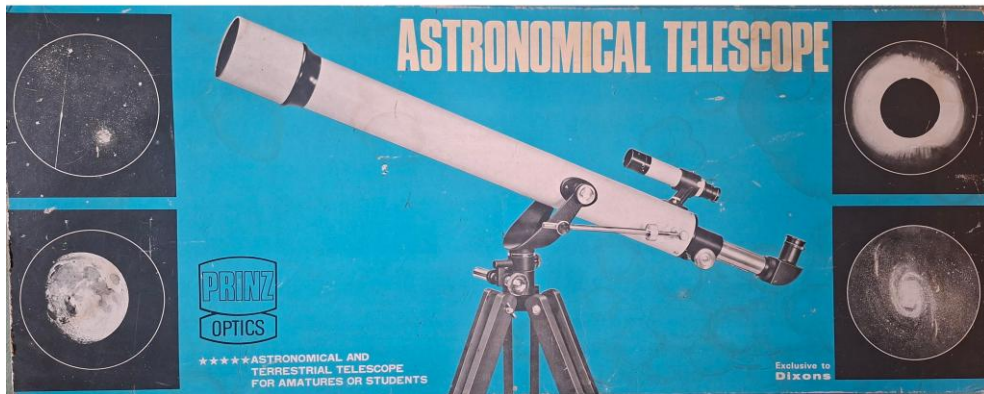




# OASI News

The newsletter of the Orwell Astronomical Society (Ipswich).  
Registered charity 271313.



John Easty, first Chairman of OASI, is a figure about whom, until recently, little was known. Thanks to sterling research work by former member of OASI Michael Allen, key biographic information about John is now available. Clockwise from top-left: (1) John Easty, on his marriage in 1949; (2) his telescope, a Prinz 330; (3) the original box for his telescope. Further details are in an article on p. 18.

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## Chairman's Message

Dear Members,

As we approach the summer solstice, with the hours of darkness diminishing, you may think that it is time to put your telescope away for the summer. However, June marks the beginning of noctilucent cloud season. These high-altitude clouds can sometimes be spotted within 90 minutes of sunset or sunrise during June or July and make an attractive sight looking towards the north-west to north-east. They are worth looking out for and if you manage to take any photos, please post them to the OASI WhatsApp group or send them to [news@oasi.org.uk](mailto:news@oasi.org.uk) for publication in the Newsletter and on the website.

Our two meetings at Newbourne in June and the first meeting in July, will start at the earlier time of 19:00. This will allow us to do some solar observing, if the skies are clear.

I hope to see you at one of our meetings in the coming month.

Clear skies!

Andy Gibbs,

Chairman.

## Committee & Trustees

<b>Chairman</b>	<a href="#">Andy Gibbs</a>	Set overall agenda for OASI, chair committee meetings, press and publicity.
<b>Secretary</b>	<a href="#">Roy Gooding</a>	Outreach meetings (jointly with Chairman), observatory decoration.
<b>Treasurer</b>	<a href="#">Paul Whiting</a>	Finance, supervision of applications for grants. Visits by outside groups, observatory tours, public appreciation of astronomy, outreach activities.
<b>Committee</b>	<a href="#">James Appleton</a> <a href="#">Robin Carpenter</a> <a href="#">Martin Cook</a> <a href="#">Adam Honeybell</a> <a href="#">Matt Leeks</a> <a href="#">Peter Richards</a> <a href="#">Paul Whiting</a> <a href="#">Mike Whybray</a>  <a href="#">Andy Willshire</a>	Committee meeting minutes, web site. OASI@Newbourne deputy coordinator. Membership, Tomline refractor maintenance & user testing. Newsletter. Safety & security. Lecture meetings. OASI@Newbourne coordinator. Astronomy workshops, Child Protection Officer, Orwell Park School astronomy. Librarian.
<b>Trustees</b>	Bill Barton Neil Morley David Payne	

## Contact Details

Events: [www.oasi.org.uk/Events/Events.php](http://www.oasi.org.uk/Events/Events.php)  
Email queries: [info@oasi.org.uk](mailto:info@oasi.org.uk)  
Website: [www.oasi.org.uk](http://www.oasi.org.uk)  
Facebook: [www.facebook.com/groups/445056098989371](https://www.facebook.com/groups/445056098989371)  
YouTube: [www.youtube.com/@orwellastronomical425](https://www.youtube.com/@orwellastronomical425)  
WhatsApp: email Andy Gibbs ([chairman@oasi.org.uk](mailto:chairman@oasi.org.uk)) to be added to the WhatsApp group.  
Message board: <https://groups.io/g/OASI> (members-only).  
Orwell Park Observatory (meeting nights only): tel. 07960 083714

## OASI News

Edited this month by James Appleton.

Please send reports of astronomical activities (observations, studies, queries, analysis of observations, fabrication of instruments, general interest, etc) to [news@oasi.org.uk](mailto:news@oasi.org.uk). The closing date for material is the 15<sup>th</sup> day of the month.

The Newsletter archive is at [www.oasi.org.uk/NL/NL\\_archive.php](http://www.oasi.org.uk/NL/NL_archive.php).

Authors: please note that the Newsletter is publicly available!

## Events

Date, Time & Location	Contact	Event
Wed 03 Jun 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Mon 08 Jun 2026 19:00 <a href="#">Newbourne Village Hall</a>	Paul Whiting, FRAS <a href="mailto:newbourne@oasi.org.uk">newbourne@oasi.org.uk</a>	<a href="#">Newbourne meeting - beginners and new members welcome!</a> 19:00 Doors open and solar observing if the sky is clear.
Wed 10 Jun 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Mon 15 Jun 2026 20:00 Zoom	Paul Whiting, FRAS <a href="mailto:treasurer@oasi.org.uk">treasurer@oasi.org.uk</a>	Pre-recorded talk: <i>The Search for Planet B</i> by Hannah Osborne. (Zoom login details are provided by email to members.)
Wed 17 Jun 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Sun 21 Jun 2026 09:30-16:00 <a href="#">East Suffolk Wireless Revival</a>	Paul Whiting, FRAS <a href="mailto:treasurer@oasi.org.uk">treasurer@oasi.org.uk</a>	Public access event. Solar observing. Booking not necessary.
Mon 22 Jun 2026 19:00 <a href="#">Newbourne Village Hall</a>	Paul Whiting, FRAS <a href="mailto:newbourne@oasi.org.uk">newbourne@oasi.org.uk</a>	<a href="#">Newbourne meeting - beginners and new members welcome!</a> 19:00 Doors open and solar observing if the sky is clear. 19:45 <i>Sky Notes</i> by Bill Barton, FRAS.
Wed 24 Jun 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Sat 27 Jun 2026 10:00-15:00 <a href="#">Christchurch Park, outside Christchurch Mansion</a>	Roy Gooding <a href="mailto:r.gooding908@btinternet.com">r.gooding908@btinternet.com</a>	Public access event. Solar observing. Booking not necessary.
Tue 30 Jun 2026 11:00 <a href="#">The Hold, Fore Street, Ipswich</a>	Bill Barton, FRAS <a href="mailto:bill.barton@oasi.org.uk">bill.barton@oasi.org.uk</a>	Public access event. A presentation by Bill, <i>The Other Side of Basil Brown</i> , about Suffolk archaeologist Basil Brown (1888-1977), concentrating on his work in astronomy. The talk is in association with Suffolk Archives' summer 2026 exhibition <i>The Moon: Our Nearest Neighbour</i> . <a href="#">Details.</a>
Wed 01 Jul 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Wed 08 Jul 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Mon 13 Jul 2026 19:00 <a href="#">Newbourne Village Hall</a>	Paul Whiting, FRAS <a href="mailto:newbourne@oasi.org.uk">newbourne@oasi.org.uk</a>	<a href="#">Newbourne meeting - beginners and new members welcome!</a> 19:00 Doors open and solar observing if the sky is clear.
Wed 15 Jul 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.

<b>Date, Time &amp; Location</b>	<b>Contact</b>	<b>Event</b>
Sat 18 Jul 2026 13:00-20:00 <a href="#">Newbourne Village Hall</a>	Pete Richards <a href="mailto:lectures@oasi.org.uk">lectures@oasi.org.uk</a>	Summer picnic, open to all members of OASI and their guests.
Mon 20 Jul 2026 20:00 Zoom	Paul Whiting, FRAS <a href="mailto:treasurer@oasi.org.uk">treasurer@oasi.org.uk</a>	Pre-recorded talk: <i>Arrokoth and the Sentinels</i> by Greg Smye-Rumsby. (Zoom login details are provided by email to members.)
Wed 22 Jul 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.
Mon 27 Jul 2026 19:30 <a href="#">Newbourne Village Hall</a>	Paul Whiting, FRAS <a href="mailto:newbourne@oasi.org.uk">newbourne@oasi.org.uk</a>	<a href="#">Newbourne meeting - beginners and new members welcome!</a> 19:30 Doors open. 19:45 <i>Sky Notes</i> by Bill Barton, FRAS and <i>Astro News</i> by Paul Whiting, FRAS.
Wed 29 Jul 2026 20:00 <a href="#">Orwell Park Observatory</a>	Martin Cook <a href="mailto:membership@oasi.org.uk">membership@oasi.org.uk</a>	General observing for members of OASI.

The latest list of events is available online: <https://www.oasi.org.uk/Events/Events.php>.

OASI events are free for members to attend. All members are welcome at all events.

## OASI @ Orwell Park

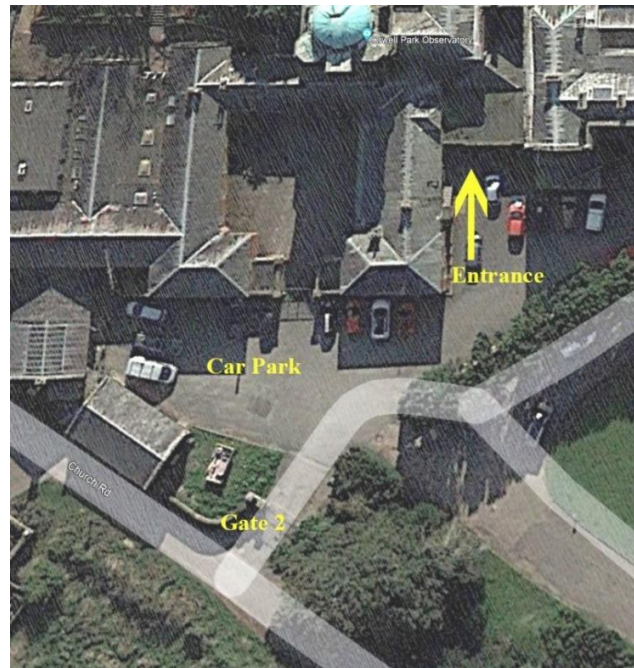
We hold meetings at Orwell Park Observatory every Wednesday evening from 8pm.

Access is via the second gate on Church Road, Nacton. (What3Words: tour.fuse.banks.)

Access requires the combination code or a key fob to open the gate and a key fob to open the door to the observatory. Regular attendees will be provided with a key fob – ask any committee member for details. If you do not have a key fob, ring the observatory number and someone will let you in.

Attendees must follow the below route. Please keep noise to a minimum to avoid disturbing pupils and staff at Orwell Park School.

- Enter through the gate south (towards the River Orwell) of the main gate of the school. The combination code or a key fob is required to open the gate.
- Park as indicated on the above map.
- Enter the school through the double black doors as indicated on the map. A key fob is required to open the door.
- Continue straight through the next two sets of double doors.
- Turn left at the end of the short corridor then turn immediately right.
- Pass through the single door and follow the stairs immediately on the left to the observatory.



## OASI @ Newbourne

Meetings at Newbourne are held in the Village Hall, Mill Lane, IP12 4NP (What3Words: scars.atlas.printing.)

Doors open at 7.00pm in June and early July (this is 30 minutes earlier than usual, to enable solar observing, if skies are clear).

Visitors are welcome. Anyone visiting more than twice will be asked to become a member of OASI.

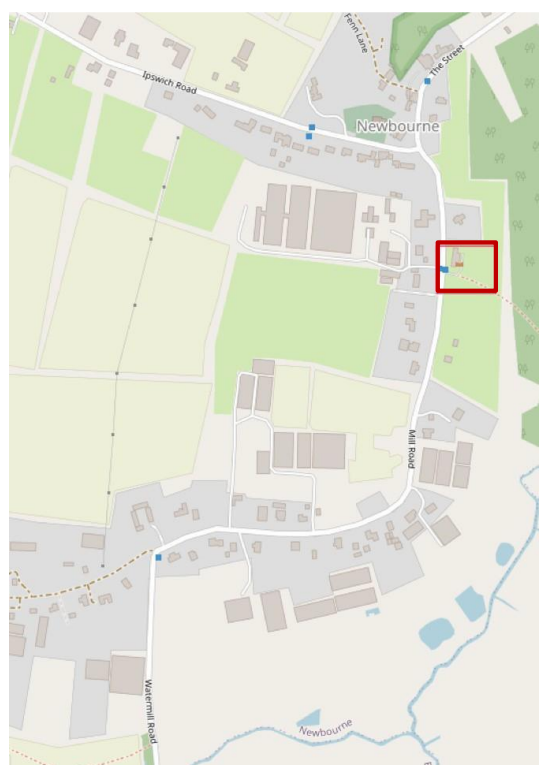
Newbourne dates for 2026		
June	08	22(S)
July	13	27(S, A)
August	10	24(S)
September	14	28(S, A)
October	12	26(S)
November	09	23(S, A)
December	14(Q)	

A = *Astro News* by Paul Whiting.

S = *Sky Notes* by Bill Barton.

Q = quiz by Paul Whiting.

Newbourne Meetings are generally held on the 2<sup>nd</sup> and 4<sup>th</sup> Mondays of each month. # indicates a deviation from the usual monthly pattern.



## Outreach Events

The following outreach events have been organised. Assistance will be appreciated from as many members as possible. Enthusiasm and willingness to engage with members of the public are more important than scientific expertise! Contact the organisers with offers of assistance or to ask for more information.

Date	Event	Organiser	Status
Sunday 21 June	Solar observing at Kirton Playing Field, Wireless Revival	Paul Whiting	Confirmed
Saturday 27 June	Solar observing at Christchurch Mansion*	Roy Gooding	Confirmed
Saturday 08 August	Solar observing outside Suffolk University**	Andy Gibbs	Confirmed
Monday 31 August	Solar observing at Bawdsey Radar Museum	Paul Whiting	Confirmed
Friday 18 September	Lunar observing at Newbourne Village Hall**	Andy Gibbs	Confirmed

\* The alternative date originally proposed for this event, Saturday 06 June, has been cancelled.

\*\* Event is in association with *The Hold* as part of the exhibition *The Moon: Our Nearest Neighbour*.



# The Night Sky in June 2026

Event times are in BST.

Data for the Sun, Moon, planets and ISS is from <https://heavens-above.com> for the location of Orwell Park Observatory, 52.0096°N, 1.2305°E. Data for meteor showers is from the *BAA Handbook* for 2026.

Object	Date	Rise	Set	Mag.
Sun ☉	1	04:41	21:06	
	30	04:39	21:19	
Moon ☾	1	03:10	15:06	
	30	22:15	04:23	
Mercury ☿	1	05:41	22:47	-0.4
	30	06:29	21:51	2.3
Venus ♀	1	07:01	23:47	-3.9
	30	08:19	23:20	-4.0
Mars ♂	1	03:31	18:01	1.3
	30	02:26	18:08	1.3
Jupiter ♃	1	07:56	00:00	-1.7
	30	06:34	22:23	-1.7
Saturn ♄	1	02:51	15:16	0.9
	30	01:01	13:32	0.8
Uranus ♅	1	04:22	20:07	5.8
	30	02:32	18:21	5.8
Neptune ♆	1	02:32	14:32	7.9
	30	00:38	12:40	7.9

## Meteor showers

Shower	Visibility	Maximum ZHR (*)	Prospects for the UK
June Boötids	22 June – 02 July	7 during 27-28 July	Unfavourable

\* ZHR (zenithal hourly rate) is the number of meteors an observer would see in an hour of peak activity if the radiant were at the zenith, assuming perfect conditions.

## Visible passes of the ISS

Date	Mag	Time	Start		Highest Point			End		
			Alt.	Az.	Time	Alt.	Az.	Time	Alt.	Az.
<a href="#">24-Jun</a>	-1.8	03:23:01	10°	S	03:25:27	18°	SE	03:27:53	10°	E
<a href="#">25-Jun</a>	-1.5	02:36:30	11°	SSE	02:37:36	13°	SE	02:39:13	10°	ESE
<a href="#">26-Jun</a>	-2.8	03:22:54	11°	SW	03:25:46	34°	SSE	03:28:52	10°	E
<a href="#">27-Jun</a>	-2.4	02:36:21	19°	S	02:37:48	25°	SSE	02:40:39	10°	E
<a href="#">28-Jun</a>	-2	01:49:45	18°	SE	01:49:53	18°	SE	01:52:16	10°	E
<a href="#">28-Jun</a>	-3.6	03:22:51	10°	WSW	03:26:11	57°	SSE	03:29:31	10°	E
<a href="#">29-Jun</a>	-1.3	01:03:06	11°	ESE	01:03:06	11°	ESE	01:03:30	10°	ESE
<a href="#">29-Jun</a>	-3.3	02:35:59	19°	SW	02:38:07	44°	SSE	02:41:23	10°	E
<a href="#">30-Jun</a>	-3	01:49:15	28°	S	01:50:06	33°	SSE	01:53:11	10°	E
<a href="#">30-Jun</a>	-3.8	03:23:15	10°	WSW	03:26:39	79°	S	03:30:02	10°	E

# A Visit to the Mullard Radio Astronomy Observatory, Cambridge

Neil Short, with another edition of *Short's World*.

On 11 June 2025 I took part in a tour to Cambridge with the Institute of Physics. Part I of the tour featured in last month's *Newsletter*; this month's edition covers Part II.

The Mullard Radio Astronomy Observatory (MRAO) is situated at Lords Bridge, some 10 km by road from Cambridge. The site is very impressive and well worth a visit. It covers a large area, and we toured it in a minibus. We saw both working and decommissioned radio antennas and a related control room. Full coverage of all the equipment and facilities would run to many pages, so my description below covers highlights and provides a brief resumé of capabilities.

The site was developed from 1957 as an offshoot of pioneering work done at the Cavendish Laboratory (on Madingley Road) under the direction of Professor Sir Martin Ryle. The name may be familiar: Ryle was co-recipient, together with Antony Hewish, of the 1974 Nobel Prize for Physics, for the pair's pioneering research in astrophysics. Ryle received the award for his observations and inventions, particularly for the aperture synthesis technique, and Hewish for his decisive role in the discovery of pulsars, based on work undertaken by Dame Jocelyn Bell Burnell, using data from the MRAO.

The first radio telescope constructed on the site was known as the 4C. This less-than-exciting name stems from its role: to generate data for the 4<sup>th</sup> issue of the Cambridge catalogue of radio sources, the 4<sup>th</sup> "C". Built and operational in 1957, it operated at a frequency of 178 MHz.

The latest catalogue, 10C, is the 10<sup>th</sup> series. An instrument gathering data for 10C, very different to the 4C instrument, is the Arcminute Microkelvin Large Array (AMI LA), operating at 15.7 GHz. This is an array of eight 12.8 m diameter, equatorially mounted parabolic dishes delivering an angular resolution of around 30 arcseconds. The antennas, repurposed in 2006, originally formed part of the 1971 "Ryle/5 km" telescope. The array, and indeed other arrays on site, functions as an interferometer, offering an effective resolution defined by the longest distance between a pair of dishes. To achieve such resolution, the interferometer utilises the concept of aperture synthesis, based on recording emission from the sky as the dishes move due to the rotation of the Earth. The amplitude and phase of the received emission are recorded, then subject to a complex procedure, based on an approximate calculation of an inverse Fourier transform, to form an image.

A smaller companion array, the Arcminute Microkelvin Small Array (AMI SA), was constructed in 2004 and is also currently active. It consists of ten 3.7 m diameter dishes, arranged at distances from one another between 5 and 20 m, and providing an angular resolution of around 3 arcminutes. It is used to obtain high resolution images of e.g. supernova remnants and clusters of radio galaxies. Both AMI arrays image what are effectively silhouettes against the cosmic microwave background. For those wishing to delve deeper into this, this technique uses what is known as the Sunyaev-Zel'dovich effect.

Moving on, we travelled to the "One-mile telescope", built in 1964 and now decommissioned. This is an array consisting of three 18 m diameter parabolic dishes, two fixed and one moveable. Each dish operated simultaneously at 1407 and 408 MHz. (Again, the array utilised aperture synthesis techniques). The instrument was used to carry out the 5C radio survey.

Impressive though the dishes are, the highlight in many respects was the control room, a wonderful museum-piece of 1960's and 70's technology, housing tape machines and lots of big knobs and switches. It was great to see such technology again, at least to someone my age!

On the move once more we passed a single, 32 m diameter antenna, forming part of the e-Merlin facility. This UK-wide capability uses optical fibres to link seven large dishes, including the Lovell Telescope at Jodrell Bank Observatory (JBO), to form an interferometer, operated from the JBO.

Continuing the outward journey, we passed a collection of white rectangular boxes. This was the Cambridge Optical Aperture Synthesis Telescope (COAST), built in 1993 and still in use. It is a multi-element optical interferometer with a resolution of one milliarcsecond. It can image the surfaces of bright, large stars. More information: [IAU symposium, vol. 158, Very High Angular Resolution Imaging, 1994, pp.163-166, DOI: 10.1017/S007418090010748X.](#)

As a final note on our tour, I add a touch of sadness. I mentioned earlier that data leading to the discovery of pulsars was gathered at the MRAO site. The aerial system used to gather the data was the Interplanetary Scintillation Array (ISA). Built in 1967, and expanded in 1978 to cover an area of 3.6 Ha, it comprised 4096 dipole antennas, operating in a phased array at 81.5 MHz. Designed by Antony Hewish (see above) to measure the high frequency fluctuations of radio sources, the instrument generated the data that allowed Jocelyn Bell Burnell to identify the first pulsar. The sadness is that the array is nowadays "retired", has lost much of its area, and offers little to see.

Well, that concludes my whirlwind tour of the MRAO. Do consider visiting the site, even if you think you're not interested in radio astronomy: there's a lot of history to enjoy...



**4C telescope.**



**AMI LA.**



**AMI SA.**



**Part of the One Mile Telescope.**



**Control room.**



**e-Merlin antenna.**



**COAST.**



**Part of the ISA (courtesy of Wikipedia).**

# Skywatcher 2mm Long Eye Relief (LER) Eyepiece Surgery

Neil Morley

The Skywatcher 1.25" LER eyepiece series was introduced around 2004 providing focal lengths of 2, 5, 9, 15, 20 and 25mm. A bundled set of 2, 5, 9 and 15mm eyepieces with case and filters was priced at £120. The range featured multi-coated optics, wide eye lenses, soft rubber eyecups and a common eye relief of 20mm. This made them particularly attractive to glasses wearers, allowing the entire field to be viewed comfortably when wearing specs. The apparent field was specified as 45° for the 2 and 5mm eyepieces and 50° for the remainder of the set, similar to Plössls.

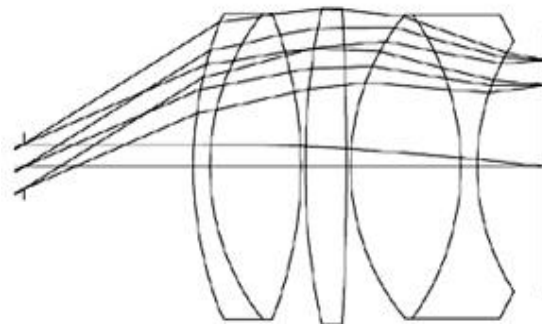


**Skywatcher LER eyepiece set  
(source: [cloudynights.com](http://cloudynights.com)).**

OASI inherited a 2mm eyepiece from the late John Wainwright. Its miniscule focal length made its use questionable even with shorter focal length telescopes. Taking the popular StarTravel 80 telescope with 80mm aperture and 400mm focal length as an example, a 2mm eyepiece provides a magnification of 200x and tiny exit pupil of 0.4mm making it extremely challenging to use. Usually, I aim for 0.75 to 1mm as the minimum exit pupil when observing at higher magnifications with the highest magnifications limited to 2x the telescope aperture in millimetres. Further reductions in exit pupils leads to even more eye floaters being seen in the field with added complications! With a slightly longer focal ratio telescope, such as the Tasco Galaxsee 60mm refractor with a focal length of 700mm, the magnification increases to 350x and the exit pupil reduces significantly to 0.17mm! Realistically it is far too much for the scope. Tests against distant daytime objects were challenging confirming a dim image with extremely poor contrast.

I asked myself a simple question: could the 2mm eyepiece be repurposed into a much more useful longer focal length? My rationale was that eyepieces within the same series like the Skywatcher LER and notably Baader Hyperion tend to share a common optical configuration within the eyepiece housing. Different Smyth or Barlow lens assemblies are deployed, usually inside the eyepiece barrels, to provide the individual focal lengths. Reusing common components helps minimise production costs.

The Skywatcher Smyth lens was easily removed using an adjustable spanner wrench. Disassembling the remaining optics within the eyepiece housing revealed an Erfle configuration comprising two cemented doublets (eye lens and field lens) surrounding a central singlet, known in the trade as a 2-1-2 configuration. Referring to the diagram to the right, the thinner eye lens is on the left hand side and thicker field lens with field stop behind is on the right hand side.



**Erfle eyepiece internal configuration (source: SPIE,  
International Society for Optics and Photonics).**

Without the Smyth lens, the resulting configuration provided ~15mm focal length. This was established via a simple eyeball test by comparing the modified Skywatcher to several other eyepieces in my collection. It meant the Smyth/Barlow lens provided approximately 7x magnification. Two notable side-effects were observed:

1. Reduced eye relief as a result of the Smyth lens acting as a negative Barlow lens (when included, increases magnification and eye relief). In order to use the eyepiece comfortably with glasses, a smaller eye cup was fitted.
2. Insufficient inwards focus travel to achieve focus with the Tasco 60mm. A Smyth lens acts like a Barlow lens and when removed reduces back focus. In order to achieve focus with distant daytime objects, I worked out that 15mm needed removing from the bottom of the eyepiece barrel. This was feasible and still provided sufficient internal thread for the eyepiece barrel. Tests were completed in daytime against distant objects.

It was time to contact Martin Cook for needed lathe surgery! We agreed a date of 30 April 2026 and set to work. I removed the optics from the eyepiece housing using a combination of spanner wrench and lens removal suction tool (respectively at LHS and bottom RHS of image below). Two internal ring spacers were fitted between the lenses: a slightly thicker ring between the more curved surfaces of the eye lens and central singlet and a thinner ring between the less curved sides of the central singlet and field lens. Martin used the lathe to remove 15mm from the eyepiece barrel.

The eyepiece was reassembled and tested. With the Tasco 60mm, focus was successfully achieved with the same daytime objects, but focus travel remained slightly too short when observing nighttime objects at infinity e.g. bright stars, Jupiter and the Moon. The solution was to exchange the original Celestron 1.25" mirror diagonal with a Celestron 1.25" prism diagonal. The prism diagonal has a shortened light path (backfocus) of 63mm when compared to 75mm for the mirror diagonal. This allowed focus to be achieved with both daytime and nighttime objects. With the Skywatcher StarTravel 80 refractor, further tests are needed with a mirror diagonal. The available inwards focuser travel appears greater than the Tasco therefore focus is more likely to be successful with nighttime objects.



**The legend (Martin) at work!**



**Eyepiece optics removed.**



**Resulting eyepiece (LHS) with original Smyth lens assembly (RHS).**

## John Easty (1926-97): OASI's First Chairman

James Appleton

Considerable uncertainty surrounds the details of the formation of OASI. The Society's first Secretary, Michael Allen, who held office in the late 1960s, provided the following brief outline of events. John, an older brother of Michael, had been told by an acquaintance, Tony Pook, of the existence at Orwell Park School of an observatory housing a large telescope. In 1965 or 1966, Michael, John and Tony visited the observatory, following which Michael approached Brian Belle, one of a triumvirate of individuals acting as collective Headmaster of the School, requesting permission to use the telescope. Belle acceded to the request.

Neither Tony nor John lived near Ipswich, and they took no further interest in the observatory, but Michael did, and eventually became part of a small, informal group, comprising five or six individuals, interested in astronomy and the observatory. (It is unclear how the group formed.) The group included John Easty, later to become first Chairman of OASI and Vernon Wilkes, later to become first Treasurer.

Despite his role as first Chairman of the Society, until recently, almost nothing was known about John Easty. By a stroke of good fortune, in late 2025, Michael contacted current OASI Secretary, Roy Gooding, about a potential visit to the observatory (he had not set foot in the building for many decades!) Roy put Michael in touch with me, and we had a lengthy and very useful correspondence about the early years of OASI. Michael is an accomplished researcher in family history, and was able to find, living locally, a niece of John Easty. John's niece kindly provided much biographical information and photographs of John. Here is what is now known about OASI's first chairman.

John William Easty was born on 30 May 1926, in Melton. He was brought up and attended school in Eyke. He married Marjorie Glanfield in the Samford registration district of Suffolk in 1949. The couple lived in The Street, Eyke, not far from John's parents, and John worked for the railway. He was a keen motorcyclist and, while living in The Street, joined the Rendlesham and District Motorcycle Club.

During 1962-65, John and Marjorie lived at 10, Karen Close, Ipswich. They then moved to a bungalow at 177, Henley Road, Ipswich; while living there, John worked for the construction company Fentons, and joined the society that became OASI. They remained in the bungalow until 1975, when they moved to *Two Jays*, Station Road, Melton. While at Melton, John worked first for Dave Allen and later for Captain Robin Sheepshanks at Rendlesham. All John's positions were clerical. Marjorie worked at the cash desk at John Allen's butchery in Woodbridge.

Eventually John and Marjorie decided that they would like to run their own business. They purchased the Police House in Sutton and, in early 1980, opened a post office and village stores in the premises. They sold the business in 1994 and purchased a bungalow at 24 Churchill Crescent, Wickham Market for their retirement.

Sadly, the couple did not live to enjoy a long and happy retirement. Marjorie passed away in 1995 and John died on 20 February 1997, of ischaemic heart disease. His death was unexpected and was certified by the coroner, following a post-mortem without inquest. Both are buried in Eyke Churchyard. They were childless.

Following John's death, in consultation with his relatives, Woodbridge and District Motorcycle Club established in his memory an annual John Easty Memorial Trial, generally held in Rendlesham Forest.

John was the owner of a 60 mm aperture Prinz 330 refractor, mounted on a wooden tripod. The instrument remains in the possession of his niece's family, still housed in its original box, which is in remarkably good condition after almost 60 years!

Unfortunately, there are no written records of OASI prior to February 1972 and thus the date at which John was appointed Chairman is not known. His appointment likely coincided with OASI becoming formally constituted as a society, thought to be in the late 1960s or very early 1970s.

OASI's written records illuminate subsequent events. John retired as Chairman at the January 1973 AGM due to "business commitments". However, he promised to give all the assistance he could to the Society in future. Roy Cheesman replaced John as Chairman, and John became a Trustee of the Society.

It seems that, over time, John's enthusiasm for astronomy waned and, in January 1975, he indicated informally that he wished to resign the position of Trustee. It appears that the Committee at this point abdicated its responsibility, and neither accepted nor rejected his resignation and took no action. For several years thereafter, John had no contact with OASI. Almost eight years after his resignation, matters finally came to a head, the Committee acknowledged that a replacement Trustee was required and, following discussion at the 1983 AGM, Robert Markham took over the role.

See the image on the front cover of this edition.

I am indebted to Michael Allen and John Easty's niece for their kindness in providing much of the information on which this article is based.

# The Effects of AI on Certain Areas of Astronomy and Astrophysics

An article from the library by Andy Willshere.

In the early 1950's Alan Turing published a paper "Computing Machinery and Intelligence". He suggested what became known as the 'Turing Test' which considered whether a machine could emulate the human response. This was not specifically AI, but was considered perhaps the first steps towards it. During 1956, a group of researchers met and coined the phrase Artificial Intelligence. The group believed that machines could be capable of solving problems that required human reasoning. The first true AI programme was the 'Logic Theorist', which was designed to prove mathematical constructs. It was developed by Allen Newell and Herbert A. Simon, during the years 1995 to 1996, and was thought to provide machines with the ability to self-determine. All the while, software engineers and coders have been working diligently to provide computers with ever better capabilities.

Now we must consider whether AI has arrived in spite of humans or because of them. Did it sneak up on us, and will it destroy society as we know it? Should our reaction be to embrace the new future, or to become a Luddite<sup>1</sup>? The choice is ours. I feel that we must retain an element of control. How much are we going to allow machines to learn and who will decide? This last question is the crux of AI and how it will affect the world population. It is far removed from the ancient Greek culture of western philosophy which credited people with the capacity to reason.

So taking all this on board, what can AI do for astronomers and astronomical science? One of our biggest challenges is that as we do more, we generate more data, which gives us the dilemma of how to read and assess vast quantities of information. Artificial intelligence and fast computers offer the promise of speedy analysis of vast datasets. A prime example is the Vera C. Rubin<sup>2</sup> Observatory, formerly known as the Large Synoptic (broad view of object) Survey Telescope (LSST). The observatory is situated in Chile; its construction was completed in October of 2025, after which operations began. The main function of the telescope is to survey the southern sky every night, which will generate a ten year time lapse diary. Each night 10 - 20 TB of data will be recorded. During ten years of mapping, the observatory will create approximately 60 PB (1 PB=10<sup>15</sup> bytes) of raw data, which is expected to include millions of supernovae, approximately five million asteroids, seventeen million stars and at least twenty billion galaxies. Such a large data set provides an ideal scenario in which AI could operate, especially to distinguish between noise and real events. Currently some AI models can produce a 93% accuracy classifying cosmic events after calibration on only fifteen example images. Rapid classifications mean that some cosmic events can be studied in real time.

AI can also function as a pattern identifier. Thus it will improve the accuracy of classifying spectral energy distributions. Their classification by eye can be subjective and error prone.

With the proposed use of AI to drive taxi cabs, could it also be used to pilot spacecraft?

Turning to astrophysics, many research investigations nowadays depend on computer simulations. AI could provide a deeper analysis of results and accelerate the generation of explanatory theories.

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<sup>1</sup> Luddites were named after Ned Ludd who destroyed two stocking frames (knitting machines) in a factory during 1779 and refused to change how he worked on the new machines.

<sup>2</sup> Vera Rubin was an American astronomer who specialised in galactic rotation ratios.

The effect AI may have on the unscrambling of dark matter may be as spectacular. In the Universe there is approximately 69% dark energy and 26% dark matter, with the stars and the rest totalling 5%. More accurate images of gravitational lensing as a function of redshift will enable better mapping of dark matter, leading to volumetric maps. AI could identify dark matter halos, the hypothetical basic unit of cosmological design, in seconds. (Today's interpretive models such as  $\Lambda$ CDM (lambda Cold Dark Matter) suggest that dark matter halos define the distribution of galaxies.) AI could also unite specific data sets into an integrated representation of dark matter. It may discover associations between cosmological data sets which would change how we view astrophysics.

In astrophotography, sharpness of the image of the black hole at M87 was greatly enhanced by using AI.

Most of these improvements can be performed autonomously and therefore require reduced human oversight. However, astronomers will need to check results, especially as problems such as software corruption and errors in data can falsify results and propagate bias. All hypotheses generated by AI must be tested by the scientific fraternity. Perhaps such hypotheses will be part of the new modes of science discovered by AI, but understood and integrated into society by humans.

Maybe, we can suggest to AI that it looks at where our understanding is weak and provides new paradigms for science to work on. This may produce new astrophysical theories. One area where this would be useful is how galaxies and clusters form, and particle speed when considering dark matter correlation.

A final thought in this short missive, is that we may use AI to scan the mind-numbing quantity of scientific primary papers and to discard ones that have little or no use in our cosmic adventures, thereby giving time for informed scientific discovery.

So, is AI a useful tool while heading off to assess the wild blue yonder? I think that the answer must be yes. Will it replace astronomers? In this case *no*. However, we must ask it the correct questions, and fully understand the answers before we put our human ideas and methods into operation. We must maintain parity with AI and allow for transparency within the scientific world.

#### **References:**

[The Dark Universe](#)

[How artificial intelligence is changing astronomy](#)

[Strong Gravitational Lensing as a Probe of Dark Matter | Space Science Reviews | Springer Nature Link](#)

[Data Management | Rubin Observatory](#)

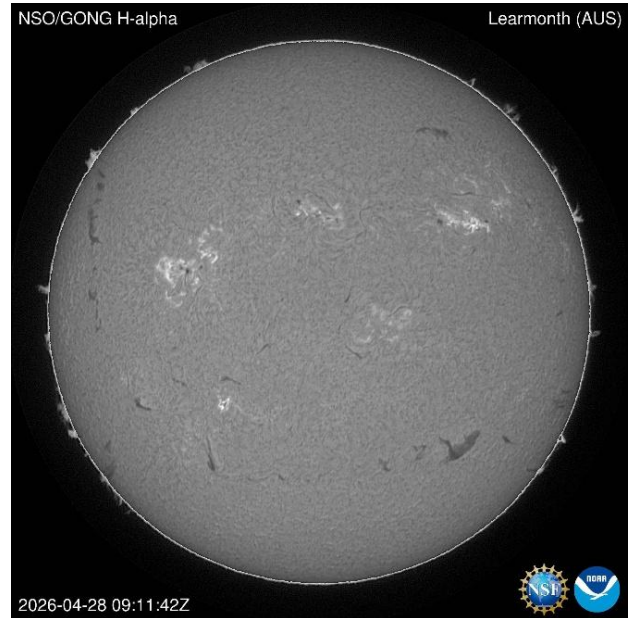
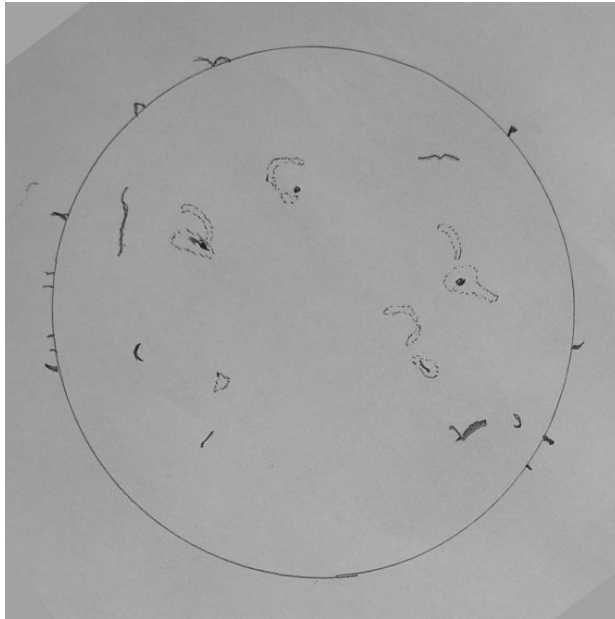
[Dark matter halo - Wikipedia](#)

[AI helps distinguish dark matter from cosmic noise | ScienceDaily](#)

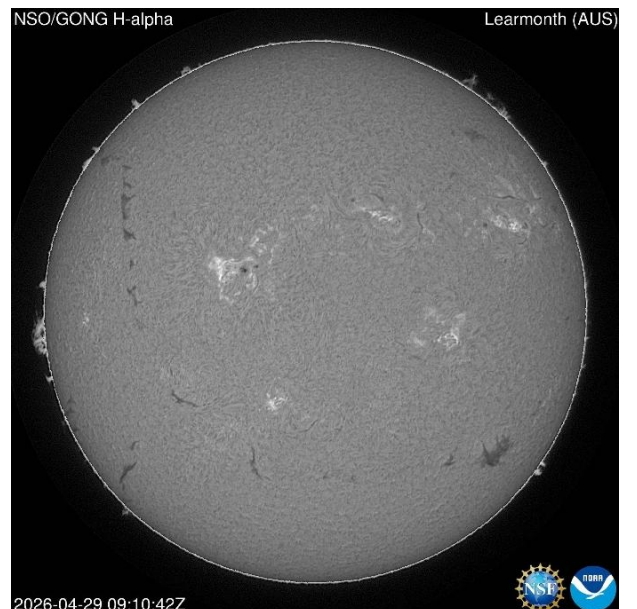
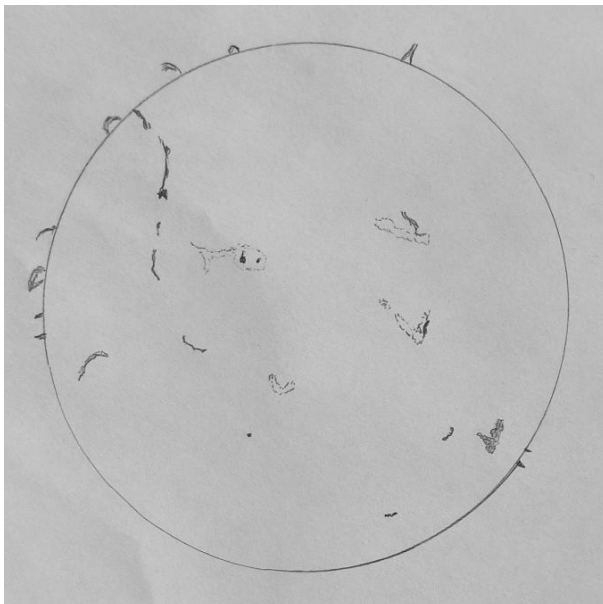
# Members' Observations

**Neil Morley**

28 April 2026, 13:15–13:30 UT. Left: sketch of the solar disk in H $\alpha$  light drawn at the eyepiece of a Lunt LS35 solar telescope, using a 20mm Plössl eyepiece (with B400 diagonal), providing a magnification of 20x. Right: corresponding image by GONG (Global Oscillation Network Group) at the US National Solar Observatory.

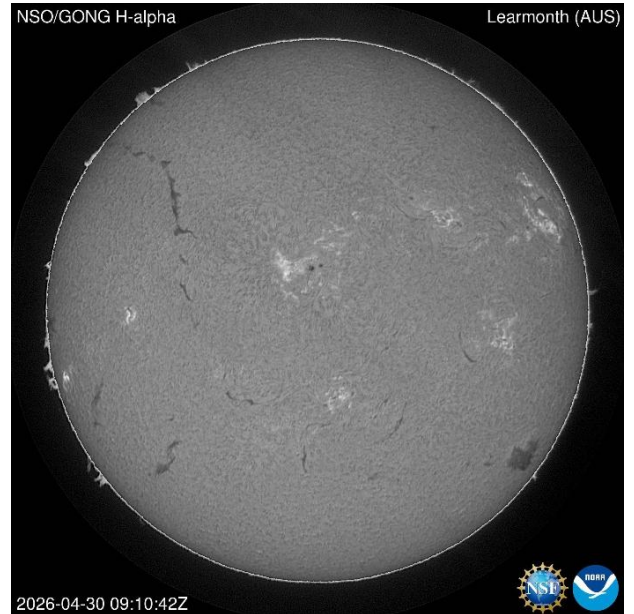
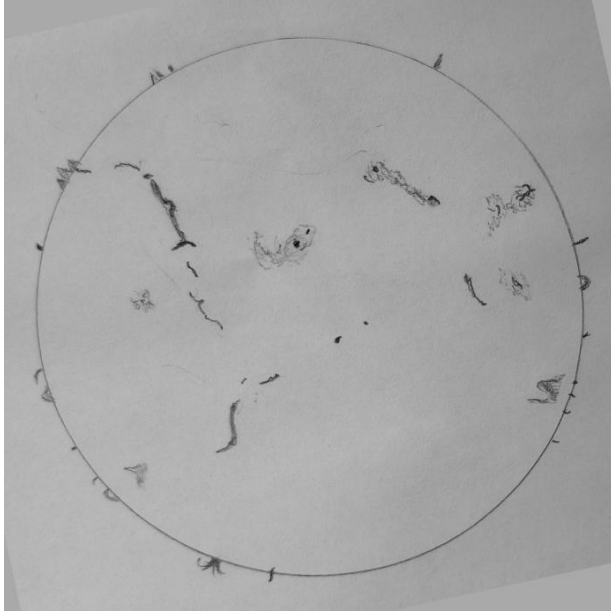


29 April 2026, 14:30–14:45 UT. Details as 28 April.

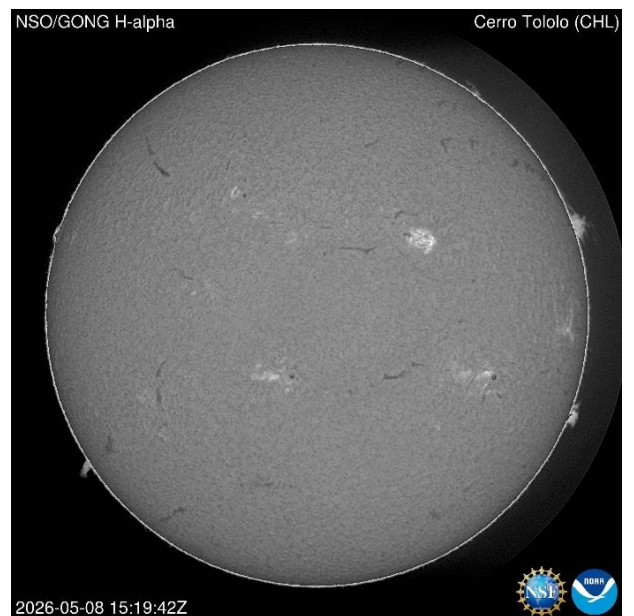


30 April 2026, 14:50-14:55 UT. Left: sketch of the solar disk in H $\alpha$  light drawn at the eyepiece of OASI's Coronado SolarMax II 60mm H $\alpha$  refractor, using a Baader Hyperion 8-24mm zoom eyepiece at 12mm and 8mm settings, providing magnifications of 33x and 50x. Right: corresponding image by GONG.

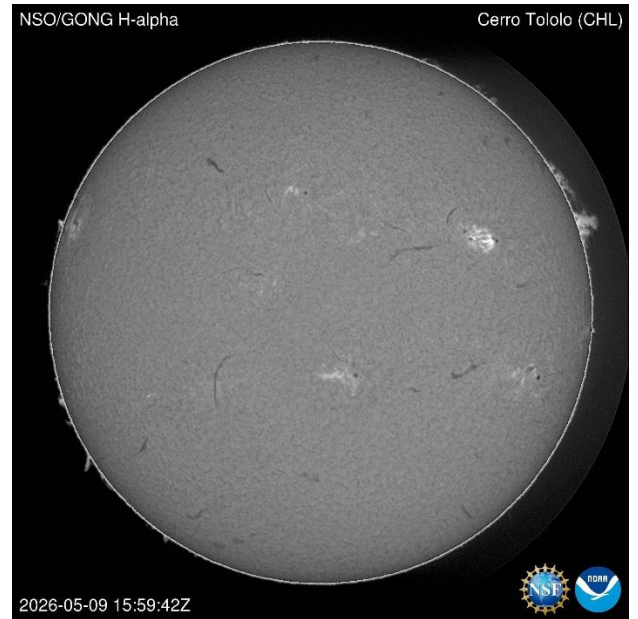
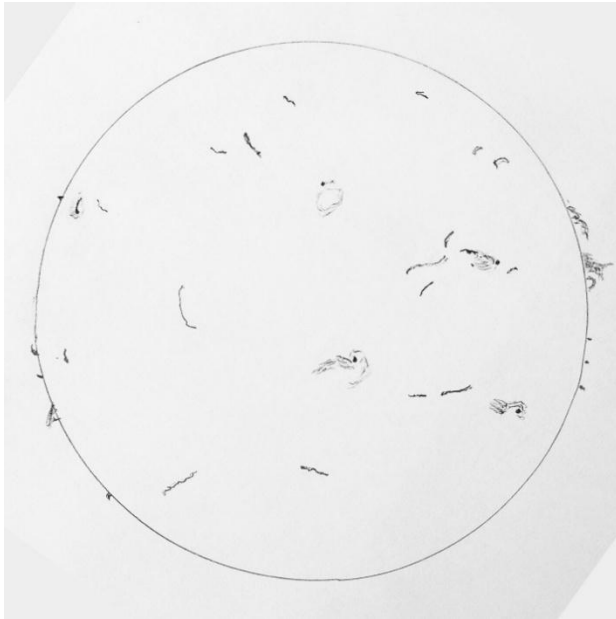
The rotation of the solar disk over the period 28-30 April can be seen by comparing the position of specific features in corresponding images.



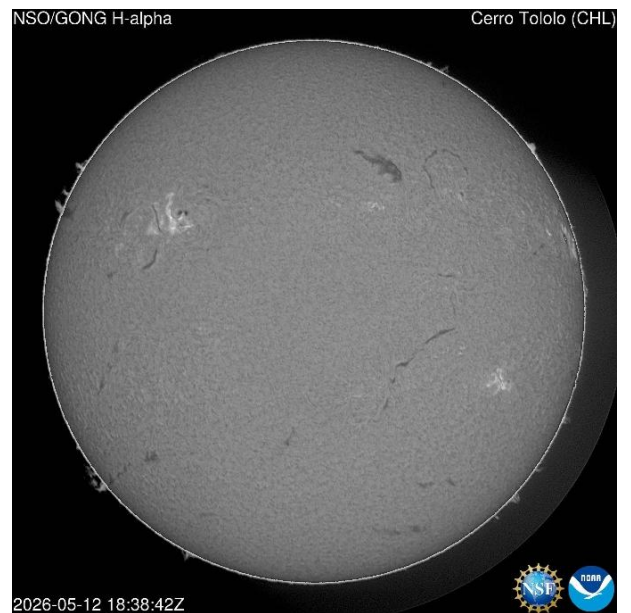
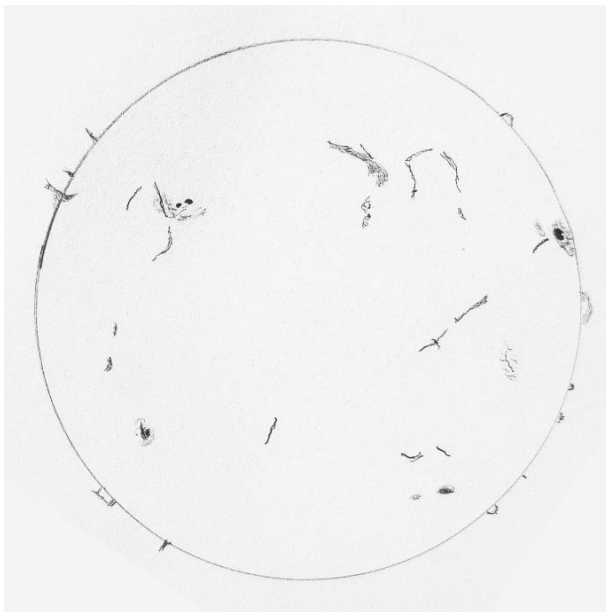
08 May 2026, 14:50-15:05 UT. Left: sketch of the solar disk in H $\alpha$  light drawn at the eyepiece of OASI's Coronado PST 40mm H $\alpha$  refractor using a Baader Hyperion 8-24mm zoom eyepiece between 24mm and 20mm settings, providing magnification of 17x to 20x. Right: corresponding image by GONG.



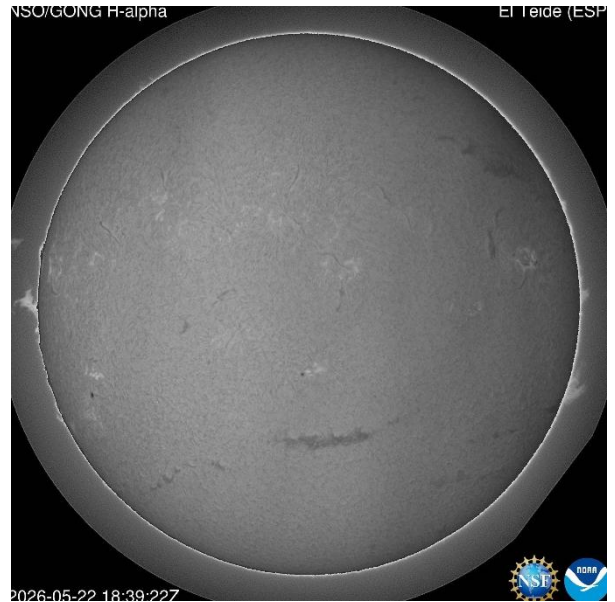
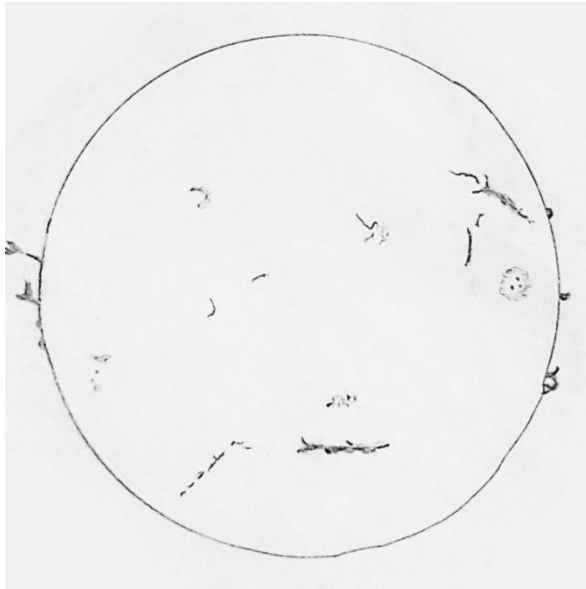
09 May 2026, 14:50-15:05 UT. Details as 08 May.



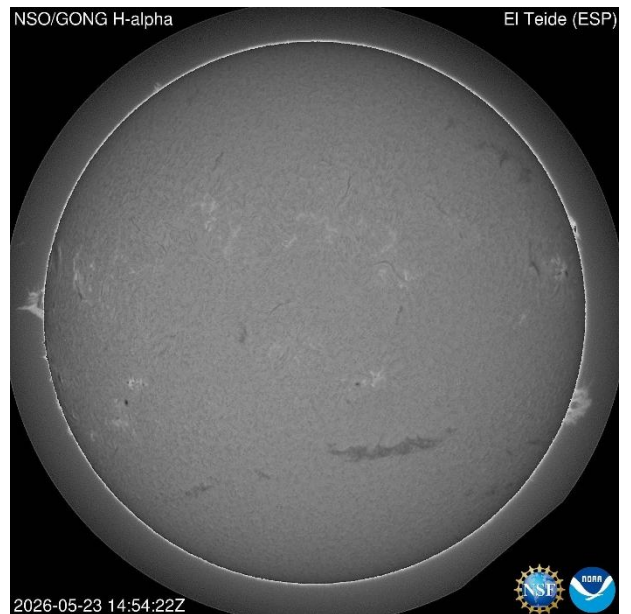
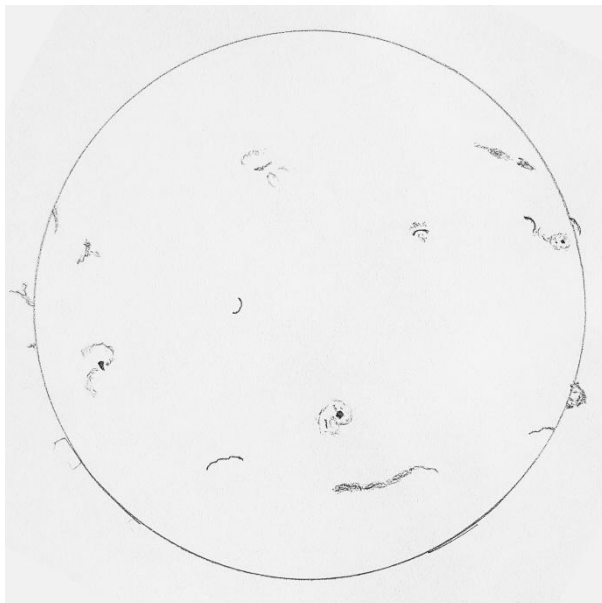
12 May 2026, 17:35-17:50 UT. Left: sketch of the solar disk in H $\alpha$  light drawn at the eyepiece of OASI's Coronado PST 40mm H $\alpha$  refractor using a Baader Hyperion 8-24mm zoom eyepiece at the 14mm setting, providing a magnification of 30x. The sketch was drawn after rains cleared around 17:00, with the PST set up in the entrance of the garage, facing west. The location provided some added shade helping to reduce glare from the Sun and increase the contrast of fainter features visible on the solar disk. Right: corresponding image by GONG.



22 May 2026, 18:15-18:30 UT. Left: a sketch completed using the Lunt LS35 refractor and SVBONY SV135 7-21mm zoom eyepiece at settings of 21 mm and 18 mm, providing magnifications of 19x and 22x. The image produced by the Lunt LS35 is dimmer than those produced by the Coronado PST and SolarMax II refractors; this makes details difficult to see at magnifications significantly higher than those used for today's sketch. Matters were also not helped by the fact that the Sun was at low elevation, meaning that its light had to traverse more of Earth's atmosphere. Below right: corresponding image by GONG.



23 May 2026, 15:05-15:20 UT. Left: a sketch completed using the Lunt LS35 with 20 mm Plössl eyepiece providing a magnification of 20x. Despite the added haze and occasional clouds, more details were visible today than yesterday and sketching proved less of a struggle! Right: corresponding image by GONG.



The solar telescopes used for the sketching are shown below.

The Lunt LS35 is mounted on a manually driven Helios/Skywatcher EQ5 head, in turn mounted on a Meade field tripod. The EQ5 has been converted to alt-az mode by orienting the polar axis vertically. This makes for a light, portable setup (and is a useful technique for larger refractors too).



The 60mm Coronado SolarMax II mounted on the head and tripod also used for the Lunt.

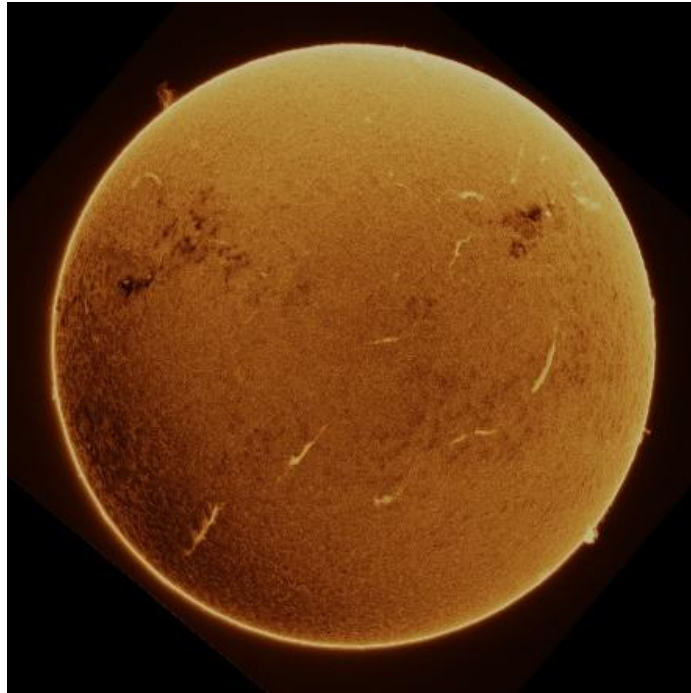


The 40mm Coronado PST mounted on a light-weight field tripod.

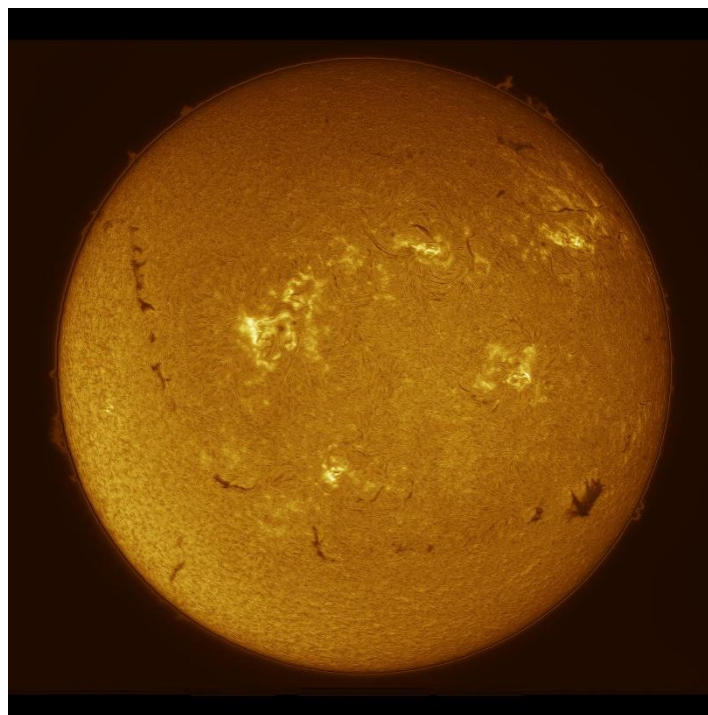


**Steve McElvanney**

22 April 2026. Image of the solar disk captured using a Skywatcher Heliostar 76 telescope, ASI 585 mono camera and Firecapture software and processed using PIPP, Autostakkert, ImPPG, Affinity Photo and an ON1 plugin for extra sharpening. Unfortunately, Autostakkert will not accept flats produced by Firecapture; as a result, the image displays a pronounced gradient. Compare with the sketch by Neil Morley and the GONG image for 22 April on p.21 of the May Newsletter.

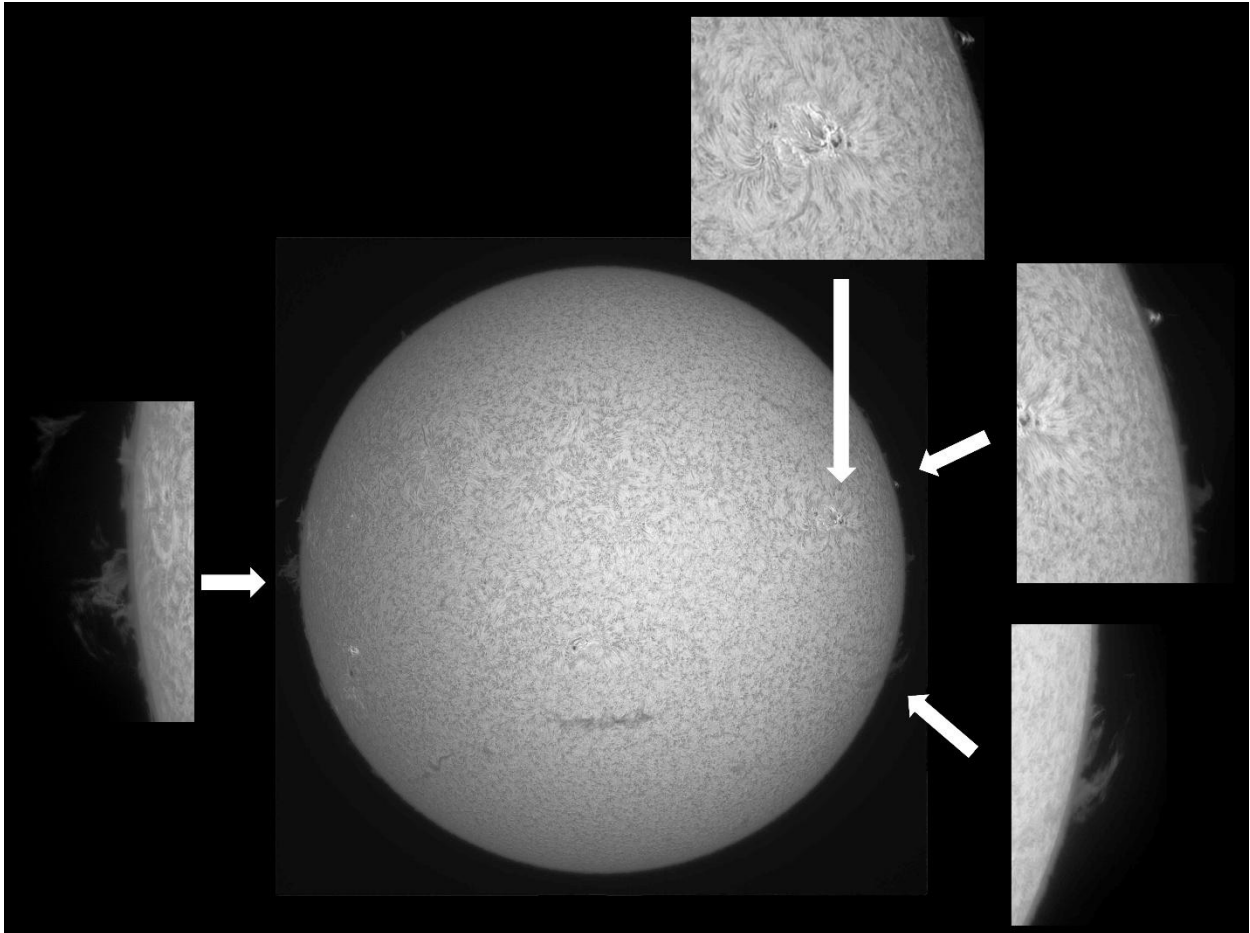


29 April 2026. Equipment and processing as above apart from use of SharpCap in place of Firecapture. Compare with the above sketch by Neil Morley.



**Martin Cook**

22 May 2026. A montage of solar images captured in H $\alpha$  light between 11:15 and 11:27UT. Lunt LS60THa/B1200 telescope and ZWO 178MM (mono) camera. The enlarged images of sunspots, prominences and filaments were taken using a 2.5x Barlow lens. Captured using Sharpcap then stacked and processed in Autostakkert 4, Registax 6 and Affinity Photo. Some nice little prominences appear to be floating off the limb like clouds in the sky!

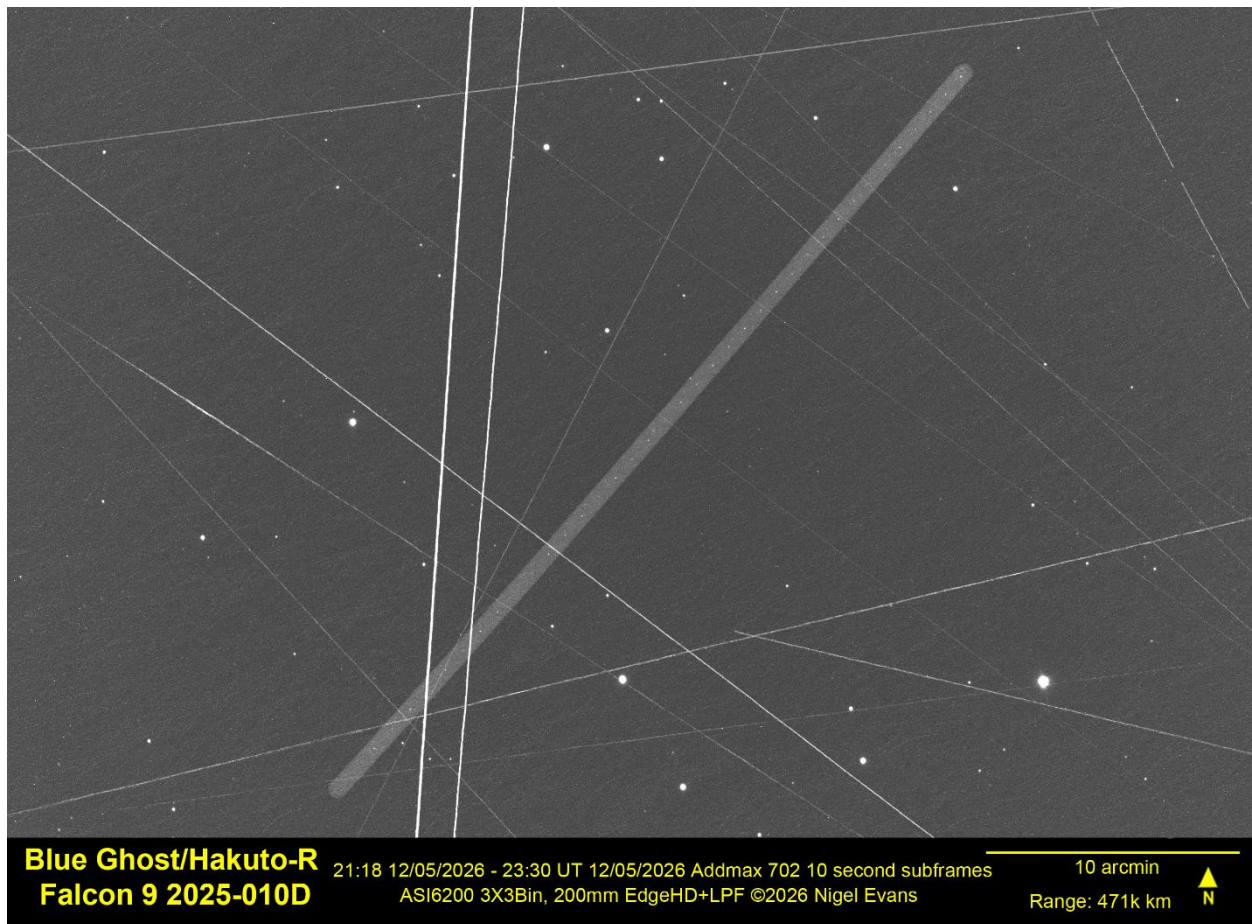


## Nigel Evans

12 May 2026. Flares associated with 2025-010D, the upper stage of a Space X Falcon 9 rocket launched on 15 January 2025. The flares appear as a straight row of dots, bottom-left to top-right, highlighted amongst a dozen or more satellite trails.

The flares are periodic, caused by 2025-010D tumbling in its trajectory. The image is based on 702 individual 10-second frames captured with a 200mm Celestron Edge HD reflector with ASI 6200 camera, 3x3 binned. (Exposures were limited to 10 seconds duration due to the fast apparent motion of 2025-010D; this provided a limiting magnitude of about 17.0.)

In most frames, 2025-010D was invisible. However, on stepping through them one at a time, a flare was visible every 18 or 19 frames, with an average period of about 3.45 minutes.



After launching two landers towards the Moon, 2025-010D entered a highly eccentric orbit around the Earth. Predictions made in early May indicate that it will crash onto the lunar surface on 05 August 2026, unfortunately, just beyond the sunlit limb.

A more comprehensive report on Nigel's observations of 2025-010D and the associated lunar landers (Blue Ghost Mission 1 and Hakuto-R M2 Resilience) can be found [on the OASI website](#).

**Jack Gleed**

May 2026 (precise date not given). Taken outside the Old Ferry Boat Inn, Felixstowe. Galaxies M81 (centre), M82 (top) and NGC3077 (lower left).

Dwarf3 automatic telescope in EQ mode, 30 x 60-second exposures stacked and subjected to a single pass through the Dwarf stellar studio auto-adjust routine.



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