

[Dstl, UK and Australian Astronomers Collaborate in Deep Space Situational Awareness](#)

Operational and retired satellites orbiting more than 36,000 km above the Earth will be tracked in a collaborative international experiment by scientists from the UK's Defence Science and Technology Laboratory (Dstl) and amateur astronomers from Australia and the UK.

Argus 2 is the latest phase of a "citizen science" exercise which assesses the viability of tracking of objects in Space using commercially available cameras and lenses. The experiment is designed to explore affordable options for Space Situational Awareness, the process of tracking objects in orbit and predicting their future paths to help mitigate the risks to UK satellites posed by collisions with debris.

During Argus 1 in 2019 Dstl collaborated with the Basingstoke Astronomical Society (BAS) in the UK to track objects orbiting in the Low Earth orbit (LEO) belt 400km above the Earth. Dstl scientists developed automated image processing tools and in-house orbit estimation software to analyse the large amount of data captured and learned valuable lessons on the surveillance of Space. As part of Argus 2, members of the Tamworth Regional Astronomy Club (TRAC) in Australia will be observing the satellites from the Southern Hemisphere; this is to ensure that results are consistent with those captured by BAS from the Northern Hemisphere and to examine the benefits and challenges of processing observations from two sites.

To track objects in the geostationary (GEO) belt, 36,000 km above the Earth, the Australians will be utilising one of the only two historic 34 inch Hewitt camera/telescopes designed by the Radar Research Establishment in Malvern, Worcestershire, and built by Grubb Parsons. The powerful, 8.5 tonne telescope with 24 inch aperture and f1 focal ratio was developed in the late 1950s to monitor the early generation of satellites.

As part of the project the astronomers will also be observing redundant satellites which have reached the end of their operational life. In accordance with international guidelines such satellites are moved 300 km beyond GEO to the Super-GEO satellite belt, a Space "graveyard". Once there they cannot directly collide with operational satellites in GEO, however the long term motion of these satellites is unknown. Argus 2 aims to better understand the evolution of the debris population to assess the risk posed to satellites critical to the UK that help underpin so much of modern life.

Mike O'Callaghan, Dstl's Space Programme Manager, said: "Space Situational Awareness is fundamental to protecting the operation and security of Space satellites. As Space becomes more crowded the likelihood of collisions increases. By observing current satellites we can help predict how they may behave in future and design measures to avoid collision. The data gathered

with BAS was extremely useful and we look forward to adding a new dimension with the Australians.”

Trevor Gainey from BAS added: “We enjoyed participating in the original Argus 1 project and testing our observational skills. We have more members interested in this follow-on project so are hoping for clear skies.”

TRAC Publicity Officer and Tamworth Regional Council Deputy Mayor, Cr Phil Betts, said the Club was delighted to have the opportunity to assist with this international collaborative project and contribute to the important work being undertaken by Dstl and BAS to help address the risk of possible collisions between satellites.

Cr Betts said TRAC’s involvement in Argus 2, which has the support of the Australian Department of Defence, will see Club members making a valuable contribution to this important field of Space research, utilising equipment ranging from DSLR cameras and amateur telescopes to the Club’s recently restored and upgraded Hewitt Camera.

“The Argus 2 project provides TRAC members with a great opportunity to use their observational skills and equipment for this important research program and may pave the way for similar pro/am and citizen science collaborations in the future, particularly with the Astronomy and Science and Education Centre, Planetarium Theatre and Roll-off Roof Observatory project at Victoria Park in Tamworth set to commence construction this year which will become the Club’s home base,” Cr Betts said.

[UK-Polish TechChallenge launched in Warsaw](#)

The UK-Polish TechChallenge is a new initiative bringing together large corporations and tech start-ups to support and promote innovation in both countries. During the programme, large firms will identify challenges for which they need technological solutions, and start-ups will then pitch innovative solutions for them.

The pilot edition of the TechChallenge, to focus on the fintech and cleantech sectors, was launched on Thursday by British Embassy Warsaw, the Polish Ministry of Development and the Polish Agency for Enterprise Development.

Poland’s Minister of Development, Jadwiga Emilewicz, said:

The UK is, and will always remain, a key partner for Poland. Our ties are strong. With the help of the UK-Polish TechChallenge, we want to strengthen these relations on one more level: by supporting

a partnership of large companies and innovative start-ups. Such cooperation enables small, but flexible and creative companies to strengthen the innovativeness of already established giants, which, in return, will get support in their development and access to new sources of inspiration. This is a programme that meets the realities of the 4.0 economy and its challenges.

British Ambassador to Poland, Jonathan Knott, said:

The UK-Polish TechChallenge is based on three ideas: first, that large companies often have problems that they need to solve, and the solution often requires an innovative approach or a new technology. Second, that both our countries have innovative small companies that offer solutions to those challenges. Third, that by bringing together our tech ecosystems, and building on each other's strengths, we help each other meet the challenges we both face. And both countries benefit from it, as do big corporations, small business and start-ups.

Vice-President of the Polish Agency for Enterprise Development, Adam Banaszak, said:

We are inviting large companies looking for fintech and cleantech solutions, whether for their own use or for commercial use, as well as smaller companies willing to provide these solutions, to take part in the programme. In this way, we are encouraging an exchange of best practices and supporting cooperation of the Polish and British technological ecosystems.

British Officer takes command of Gulf maritime security mission

Commodore James Parkin took over the post during a ceremony at the International Maritime Security Construct (IMSC) headquarters in Bahrain.

The IMSC – which so far consists of the UK, USA, Australia, UAE, Saudi Arabia, Bahrain and Albania – was established in September 2019 to ensure the free flow of maritime trade through critical waters in the Gulf. The group conducts maritime surveillance, providing a deterrent to illegal activity and reassurance to commercial shipping.

Events in the Gulf last summer, including attacks on four tankers off the

coast of the United Arab Emirates and the illegal seizure of the British-flagged oil tanker Stena Impero, saw the threat to commercial shipping rise.

Commodore James Parkin said:

The IMSC is committed to ensuring the safety of shipping in the Gulf region, which contains some of the most important choke points in the world. We recognise the importance of freedom of navigation and will ensure it is upheld by our seven member nations.

While the UK continues to call for de-escalation, the safety and security of our citizens and our interests in the region are of paramount concern to the UK and all other members of the IMSC.

Cdre Parkin will remain in post for around four months and takes over from Rear Admiral Alvin Holsey, US Navy.

[CMA welcomes EU Court ruling in pay-for-delay drug case](#)

The ruling, released today, follows appeals from GlaxoSmithKline and other pharmaceutical companies against the Competition and Markets Authority's (CMA) decision that they had broken competition law. The CMA imposed fines of £45 million on the companies involved.

This ruling has clarified a number of important questions and will help competition authorities, including the CMA, in their work to tackle this harmful behaviour by pharmaceutical companies.

In 2016 the CMA found that GlaxoSmithKline had agreed to make payments totalling over £50 million to other generic suppliers of paroxetine. These payments were aimed at delaying the potential entry of these competitors into the UK market.

The CMA found these 'pay-for-delay' agreements deferred the threat of increased competition, and potentially deprived the NHS of the significant price falls that generally result from generic competition. In this case, when independent generic entry eventually took place, average paroxetine prices dropped by over 70% in 2 years.

Following today's ruling, the case will now go back to the Competition Appeal Tribunal for a final judgment on the appeals.

Andrea Coscelli, Chief Executive at the CMA, said:

“This case shows our ongoing determination to take action against illegal behaviour by drug companies designed to stifle competition at the expense of the NHS. This has been a lengthy process, and we look forward to the CAT’s final judgment.

“Cracking down on harmful behaviour, such as pay-for-delay agreements, is essential to protect the NHS – and so UK taxpayers – from paying more than they should for an important medicine.”

The CMA currently has other, unrelated investigations open in relation to 7 other pharmaceutical drugs.

More information on this investigation can be found on the [Paroxetine investigation case page](#).

Notes to editors:

1. In 2016 GlaxoSmithKline and the generic suppliers – including GUK and Alpharma – appealed the CMA’s decision to the Competition Appeal Tribunal (CAT).
2. The CAT then referred a series of questions to the Court of Justice of the European Union (under Article 267 of the Treaty on the Functioning of the European Union) about the application of law to these types of ‘pay for delay’ agreement.
3. Today’s judgment follows the opinion from Advocate General Kokott from the Court of Justice of the European Union issued on 22 January.
4. The payments made by GSK to the generic companies consisted of cash and other non-cash value transfers.
5. Appeals against the CMA’s decision were brought by Glaxosmithkline Plc, Generics (UK) Limited, Xellia Pharmaceuticals APS/Alpharma LLC, Actavis UK Limited and Merck KGAA.

Changes to licensing of the lethal control of herring gull and lesser black-backed gull

Natural England has today [Thursday 30 January] set out changes to licences for the lethal control of herring gulls and lesser black-backed gulls in England to protect these declining species.

Owing to their poor conservation status, herring gulls and lesser black-backed gulls were not included in [Defra’s general licences](#) issued last year. The breeding population of herring gull has fallen by 60% in recent decades,

with lesser black-backed gulls declining by an estimated 48%.

Assessment carried out by Natural England has since indicated that the scale of activity carried out under licences in recent years is above a sustainable level. Continued activity at these levels is likely to have a harmful impact on the population levels of both species.

For this reason, it is necessary to scale back the lethal control of these gull species. In rural areas, where populations overall are known to be in decline, Natural England will set upper 'safe' number of birds that could be killed. Upper 'safe' levels have not been identified for lethal control in urban populations of gulls, as these are faring better.

Marian Spain, Interim Chief Executive of Natural England, said:

Populations of herring gulls and lesser black-backed gulls have declined significantly in recent years and it's essential that we do all we can to reverse this worrying trend.

I hope that by prioritising the licences we issue, we can ensure that action is taken where it's most needed while at the same time securing the long-term future of these important species. Meanwhile we are working with Defra to explore options for filling current gaps in evidence around urban gull populations, so we can continue to make decisions in the best interests of people and wildlife.

What you should do if you need to undertake lethal control of herring gull or lesser black-backed gull

We have issued a class licence to permit any wild bird control necessary to preserve air safety which covers herring gulls and lesser black-backed gulls.

Beyond this, Natural England will license gull control through individual licences, which will need to be prioritised. Natural England will consider the strength of need in each licence application individually but generally protecting human life and health will be the overriding priority. Any control undertaken under other purposes such as preventing serious damage and conserving wild birds and flora or fauna will need to be targeted.

In more rural areas, where lethal control may have contributed to declining populations, we have established a sustainable number of birds that could be killed or taken – equivalent to no more than 5% of the natural mortality total of each species – without harming their conservation status.

Control levels of nests, eggs and chicks will not be limited in urban areas, where populations are thought to have better breeding success rates. However, Natural England will continue to promote the use of non-lethal methods through integrated management strategies that reduce opportunities for gulls to nest and scavenge in problem areas within the built environment. These include installing netting or wire over vulnerable roosting areas, keeping

food storage and waste facility areas secure and discouraging deliberate feeding of birds by the public.

We are working with Defra to explore options for filling current gaps in evidence around urban gull populations, which would enable us to refine our licensing approach in future.

People who need to carry out licensed activities will be encouraged to submit [individual licence applications](#) in February and March in preparation for the bird breeding season, which is consistent with the majority of user needs. This period will enable Natural England to assess the cumulative scale of control across the applications submitted and take this into account in prioritising the licences to be granted. Natural England will continue to accept licence applications outside this period and will issue licences where there is an imperative need.

[Further guidance to inform potential applicants for licences to control lesser black back gulls or herring gulls is available here](#). We encourage potential applicants to refer to this information before submitting their applications. Applications that have already been made will still be considered by Natural England. In these cases, Natural England will contact applicants if any further information is required in order for Natural England to assess the application.

We have also made available a [Q&A which can be viewed here](#).

Natural England Chair, Tony Juniper's [Letter to Secretary of State](#) (PDF, 89.6KB, 3 pages)