

News story: Revolutionary satellite made of 'the stuff of science fiction' leaves the UK

Up until now, telecommunications satellites were largely fixed, one off, custom machines designed for a specific use or market.

Commissioned by [Eutelsat](#) and built in Britain by [Airbus](#) and [Surrey Satellite Technology](#) (SSTL) in Portsmouth and Guildford, EUTELSAT QUANTUM will be able to adapt to new demands in coverage, bandwidth, power and frequency, enabling it to operate from any orbital slot depending on changing market conditions.

The development of the core technologies integrated into EUTELSAT QUANTUM is supported by the UK Space Agency and the [European Space Agency](#) (ESA) within the framework of a Public-Private Partnership.

Dr Graham Turnock, CEO UK Space Agency said:

Communications satellites like EUTELSAT QUANTUM that can be reprogrammed to adapt coverage and connectivity in orbit could until recently be considered the stuff of science fiction.

Through our €480m development funding in the European Space Agency's ARTES programme, the government's Industrial Strategy and partnering with industry leaders such as Airbus, we are helping UK businesses transform 'the stuff of science fiction' into commercial advantage, resulting in jobs, growth and innovation.

[EUTELSAT QUANTUM Platform build at SSTL](#)

Today the satellite platform was on view to invited guests at a special event to mark the handover to Airbus who will complete the satellite assembly and testing in Toulouse.

Sarah Parker, Managing Director of SSTL said:

The completion of our work on the Eutelsat Quantum satellite platform is an important milestone for SSTL as it represents our first venture into the global commercial telecoms satellite market. The design and assembly of this innovative spacecraft has enabled us to advance the knowledge and skills required to develop highly capable satellite products for the evolving telecoms market, where we are now actively engaged in seeking new opportunities.

The contract to build this EUTELSAT QUANTUM satellite was agreed in 2015. [In](#)

[November last year](#), Eutelsat and Airbus signed a new contract worth hundreds of millions of pounds that will see components and parts for two further communications satellites assembled in the UK. This means that 6 out of 7 of the company's next satellites will be partially built in Britain.

[EUTELSAT QUANTUM – Revolutionising telecoms market](#)

Yohann Leroy, Deputy CEO and CTO at Eutelsat said:

EUTELSAT QUANTUM is a world first and the culmination of many years of research by Eutelsat. Its premium capacity will enable us to offer game-changing optionality and flexibility to our customers in the government, mobility and data markets, who will be able to operate and optimize capacity to adjust coverages in real time, and to do so autonomously. We are delighted to co-operate with our long-standing partners, the ESA, the UK Space Agency and Airbus, and to be able to rely on the world-leading expertise within the UK space industry.

Colin Paynter, Managing Director, Airbus Defence and Space UK, said:

Combining the payload expertise from Airbus in Portsmouth, and SSTL's new geostationary platform provides a very sophisticated package for Eutelsat. The satellite is a world first, fully reprogrammable in orbit, and we're looking forward to seeing it fly.

The UK Space Agency is the largest funder of ESA's programme of [Advanced Research in Telecommunications Systems](#), (ARTES) which transforms R&D investment into successful commercial products and services by offering varying degrees of support to projects with different levels of operational and commercial maturity.

Magali Vaissiere, ESA Director of Telecommunications and Integrated Applications, said:

Eutelsat Quantum is an important programme for both the UK and ESA and a typical example of the success of the ARTES public-private partnership model. Above all, our priority is our industry's health and readiness for the future market challenges, and partnerships like these that improve the competitiveness, competence and business prospects of the companies we support are what we dedicate our efforts to.