Media Release





Stephen Mullighan MP Treasurer Minister for Defence & Space Industries

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Eyes in the sky: Kanyini's first images mark milestone for SA satellite

South Australia's pioneering satellite, Kanyini, has delivered its first images from space, marking a significant milestone for the mission.

Deployed on SpaceX's Transporter-11 mission last August, Kanyini has spent 194 days in Low Earth Orbit, closely monitored by the mission control team at Inovor Technologies, based at Adelaide's Lot Fourteen innovation district.

Since it was launched, the team has been working through commissioning of the satellite's systems, confirming that the solar panels and batteries are functional and X-band radio communications are all operational.

A number of preliminary images have been collected during Kanyini's on-orbit commissioning phase, demonstrating the incredible depth of data the satellite will be able to provide once fully operational.

The first processed images released today, capture high resolution views of South Australian regions, including Kangaroo Island, Yorke Peninsula and Adelaide.

The vast amount of data behind each image allows them to be processed to reveal infrared details normally invisible to the human eye, that can be used in monitoring crop health, vegetation density and changes in inland and coastal water conditions.

The HyperScout 2 hyperspectral imager capturing the views, is a three-in-one instrument that combines hyperspectral and thermal imaging with high-level data processing and Artificial Intelligence capabilities.

The satellite also features an Internet of Things (IoT) payload developed and manufactured in South Australia by Myriota, enabling Kanyini to capture both imagery and IoT data – such as groundwater levels and pipeline condition – from a single satellite.

The Kanyini mission is Australia's first state-owned satellite and is a joint initiative between the South Australian Government, SmartSat CRC, Inovor Technologies and Myriota.

Over the coming months, the mission team will continue to progress the commissioning and calibration process of the satellite's systems, ensuring its functions and data output meet the highest scientific standards.

Once fully operational, Kanyini will deliver critical space data to support future research projects by government and research institutions, particularly in the areas of sustainability and climate impacts.

Kanyini fast facts:

Revolutions around the Earth: 2788

Average speed: 27,386 km/hr

Distance travelled: 9,034,937 km

Orbit height: 516km

Click here to see the images captured by Kanyini.

Quotes attributable to Stephen Mullighan

The release of Kanyini's first images is an exciting moment for the mission team and the South Australian space community, reinforcing our position as a national leader in space technology.

The commissioning of the satellite's ongoing operations will ensure Kanyini can deliver critical real-world benefits once fully operational.

From monitoring environmental changes, to supporting emergency services, Kanyini's data will provide vital insights that will help improve lives and drive innovation across multiple industries.

Quotes attributable to SmartSat CRC Chief Executive Officer, Professor Andy Koronios

Putting anything into space is an extraordinary feat, however the work does not stop at successfully delivering your spacecraft into orbit.

These first images are the result of years of hard work and dedication from our talented team of engineers as they work through the onboard commissioning of the spacecraft.

SmartSat is proud to be funding a suite of projects in artificial intelligence, onboard processing and machine learning aimed at using the data gathered by Kanyini to address challenges in agriculture, water management and the environment. Having access to the wealth of information-dense data gathered from our own sovereign satellite opens up a world of opportunities for industry, academia and government departments.

Quotes attributable to Inovor Technologies Chief Executive Officer, Dr Matt Tetlow

Inovor Technologies is incredibly proud to see Kanyini delivering its first images from space—this is a major milestone for the mission and a testament to the dedication of the team.

Every step of the commissioning process brings us closer to unlocking the full potential of Kanyini's data, which will provide invaluable insights for environmental monitoring and resource management.

This achievement reinforces Australia's growing sovereign capability in space technology. We look forward to further calibration and data collection in the coming months.

Quotes attributable to Myriota Chief Technology Officer & Co-Founder, Dr David Haley

As Kanyini comes to life we are realising critical satellite capabilities that harness the power of space to deliver valuable data for real people here on earth.

We have tested and proven Myriota's home-grown IoT payload and are now integrating Kanyini into Myriota's satellite network where it will soon join our global connectivity service.

We are incredibly excited to be able to utilise a collaborative, South Australian-made satellite to communicate data that improves the management of key resources, both here in South Australia and beyond.