



23 July 2019

News Release

DSTA AND ROLLS-ROYCE COLLABORATE ON DIGITAL TECHNOLOGY

Singapore's Defence Science and Technology Agency (DSTA) and Rolls-Royce have launched the first collaborative digital technology project to boost efforts in the development and deployment of new technologies to optimise engine maintenance. This follows the signing of a Memorandum of Understanding¹ to partner on digital service solutions at the Farnborough Air Show, United Kingdom, in July 2018.

The collaboration will focus on leveraging Machine Vision technology – which is the use of artificial intelligence (AI) to analyse images and videos – for engine borescope applications where a tool-mounted camera is used to inspect engine parts. Automating this process with AI could increase efficiency and performance. Under the agreement, both organisations will jointly develop and test a solution for improving borescope inspection procedures.

Ang Jer Meng, Director Air Systems, DSTA said: "There is much value and potential in tapping AI to enhance the efficiency of the Republic of Singapore Air Force's overall engine maintenance processes. We will continue to team up with global partners such as Rolls-Royce, as we unlock innovative technological solutions for Singapore's defence."

Louise Donaghey, Rolls-Royce Senior Vice President for India and South Asia said: "This collaboration with Singapore will propel us forward in achieving our vision of becoming the world's leading industrial technology company, by helping us overcome the challenges that come with developing and deploying new technologies."

¹ The collaboration harnesses data analytics and aircraft engine digital twins to optimise the time and resources spent on engine maintenance, thereby improving the availability and performance of the Republic of Singapore Air Force aircraft. An aircraft engine digital twin is a real-time digital replica of the aircraft engine, which allows for modelling of different scenarios digitally for improvements in engine design.

About the Defence Science and Technology Agency

The Defence Science and Technology Agency (DSTA), a statutory board under Singapore's Ministry of Defence, exploits science and technology, and provides technological and engineering support for Singapore's defence and security. It delivers leading-edge technological solutions to the Singapore Armed Forces (SAF) by tapping the best technologies and fostering an environment of innovation for defence applications. Its role spans the entire spectrum of capability planning, development, and sustainment of weapon systems throughout their life cycle to ensure that the SAF continue to be a formidable fighting force.

For more information, please visit www.dsta.gov.sg

About Rolls-Royce Holdings plc

Rolls-Royce pioneers cutting-edge technologies that deliver clean, safe and competitive solutions to meet our planet's vital power needs. Rolls-Royce has customers in more than 150 countries, comprising more than 400 airlines and leasing customers, 160 armed forces, 70 navies, and more than 5,000 power and nuclear customers. Annual underlying revenue was £15 billion in 2018, around half of which came from the provision of aftermarket services. In 2018, Rolls-Royce invested £1.4 billion on research and development. We also support a global network of 29 University Technology Centres, which position Rolls-Royce engineers at the forefront of scientific research. The Group has a strong commitment to apprentice and graduate recruitment and to further developing employee skills.

For more information, please visit www.rolls-royce.com