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FOR IMMEDIATE RELEASE

Ontonix Software to Fly Onboard Alsat#1 Microsatellite in 2021.

Como 10-th July 2020. Ontonix, a company developing unique and exclusive HW and SW Quantitative Complexity Management (QCM) technology, will deliver OntoNet™ software system to perform on-board complexity analysis of mission parameters of the Alsat#1 microsatellite which be launched in 2021.

The Alsat#1 will be launched by Nanoracks towards the International Space Station. Nanoracks is both the largest commercial user and private investor on the Space Station. ISS astronauts will install the satellite on the NRCSD Rack Deployer using the Remote Manipulator System. The deployer will place the satellite on a 380-420 km orbit with an inclination of 51.6 degrees.

“The Alsat#1 mission involves the launch of a Cubesat-class satellite built entirely by the ADAA Association, which has brought together universities and companies in the sector to promote this ambitious enterprise entirely financed by private individuals. ADAA is a non-profit association dedicated to the dissemination of science in the fields of astronautics and astronomy. Students from Milan Polytechnic, Lugano Supsi and UCM of Malta engage in different aspects of the satellite's realization. Alsat will have valuable scientific payloads such as the structure built using Additive Manufacturing and a radiation sensor. It is with great pleasure that we welcome Ontonix among the supporters of our initiative with an important contribution of its OntoNet™ software, which will perform on-board real-time analysis of Alsat's mission parameters”, said Mr. Alessandro Barazzetti, who impulsed the Alsat#1 and manager of the project as well as CEO of Swiss QBT.

“Ontonix is proud to contribute its QCM system OntoNet™ to the Alsat project. Our QCM solutions have been designed by aerospace engineers in the 2000s and are being used in various sectors such as defense, medicine, manufacturing and finance. However, this is the first time that our technology will be deployed in orbit” said Dr. Marczyk, the founder and chief technologist of Ontonix. “The key characteristic of our unique technology is that it is able to detect anomalies without actually being trained to recognize them. The number of potential anomalies in complex systems and contexts, such as spacecraft and space flight, is so huge that adopting a Machine Learning approach is impractical, not to say impossible”, he added. “Sudden spikes in system

complexity constitute a formidable early-warning signal of malfunctions, anomalies or cyber-attacks, and their identification is performed in real-time based on raw sensor data without any prior training” he concluded.



Apollo 15 Command Module commander, Col. Alfred Warden, with Alsat#1 during an ADAA event in Italy in 2015.

For information on Ontonix visit [website](#).

For information on ADAA visit [website](#).

For information on Alsat#1 visit [website](#).

For information on Nanoracks visit [website](#).

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