GISTDA'S MICRO AND SMALL SATELLITE PROJECT PLAN

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ABSTRACT

The Geo-Informatics and Space Technology Development Agency (GISTDA) under the supervision of the Minister of Science and Technology as a public organization assumed all responsibilities and activities for space technology and geo-informatics applications in Thailand. Previously, this area of expertise was lying under control of the National Research Council of Thailand (NRCT). Under the lead of the NRCT Thailand has gained experience with Earth Observation Satellites (EOS) since 1971. The first Ground Receiving Station in Thailand was established in 1982 to provide a better access to EOS data for instance LANDSAT, SPOT, NOAA, ERS and MOS.

However, in November 2000 GISTDA was established in order to enhance the utilisation in Remote Sensing and Geospatial Information Systems (GIS). In 2008, GISTDA's first THailand Earth Observation Satellite (THEOS) (later renamed as THAICHOTE) was successfully launched into space. Currently, GISTDA has two fully operational ground receiving station which can accommodate many other EOS include RADARSAT, CosMo-SkyMed and LANDSAT (LDCM). The recent established ground station at Sriracha also has the capability to control and monitor THAICHOTE.

Since then, the Space technology have been developed and become valuable national asset. Therefore, to continue to grow with the GISTDA's vision, "Delivering Values from Space", the space technology and related technology are of importance. We believe the key to success is to learn, develop and implement our own technology and products. Thus GISTDA now considers developing micro and small satellites. The road maps for the research and the development plans are on their way in order to find the optimal compromise between the requirements, sensible scenarios and suitable budget. This includes the short term plan (~1-2 years) and a long term plan (~3-5 years).

In addition, the focus for these micro-satellite/ small satellite projects will be on the technology demonstration, research, know-how and skill development rather than the applications. Nevertheless, the final outcome of these projects should support our future missions and goals. Yet the payload or mission conceptual cooperation or joint projects are quite open and can be discussed case by case. In this context, the limited availability of qualified human resources and budget need to be taken into account.