SPRINT-A 衛星のシステム設計について

山崎 敦 [1]; 上水 和典 [2]; 吉岡 和夫 [3]; 村上 豪 [4]; 小型科学衛星プロジェクトチーム 山崎 敦 [5] [1] JAXA・宇宙研; [2] 宇宙研; [3] 宇宙研; [4] ISAS/JAXA; [5] -

Sytem design of the SPRINT-A satellite

Atsushi Yamazaki[1]; Kazunori Uemizu[2]; Kazuo Yoshioka[3]; Go Murakami[4]; YAMAZAKI Atsushi Small Scientific Satellite Project Team[5]
[1] ISAS/JAXA; [2] ISAS/JAXA; [3] JAXA/ISAS; [4] ISAS/JAXA; [5] -

The first satellite SPRINT-A using the standard bus system is now under development and is launched this summer.

The mission payload, EXCEED, has the main telescope of the extreme ultraviolet imaging spectrometer (EUV),

the camera guiding field-of-view (FOV) for feedback to the satellite attitude control system, and the mission data processor (MDP).

The payload electronics are connected to satellite bus system with the space wire network.

The objectives of the EXCEED mission are mainly two science topics: one is the atmospheric escape from the terrestrial planet by interaction with the solar wind plasma, the other is the plasma transfer mechanism in the Jupiter magnetosphere with the object

of the extreme ultraviolet emissions from the Io torus and the Jupiter's aurora.

The system design of the SPRINT-A satellite is reported in this presentation.