



Wireless harness testbed for modular satellites

Bachelor-/Master Thesis / Practical

Task Description

Novel modular concepts for satellite architecture, which substitute the usually used fixed wired satellite bus with a flexible wireless harness promise a higher flexibility, intra- and inter-satellite operability and have received a lot of attention in the past 1-2 years. One major challenge in such an architecture is to handle mutual RF interference and negative influence of satellite structures on communication.

In this thesis the objective is to build a hardware test-bed based on the UWE satellite structure to test mutual and structure interference on the communication of multiple low-energy transceivers (e.g. BLE) placed on the boards of the Task of the different satellite subsystems.

Recommended Background

Embedded software development, RF communication

Contact

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