## TWEPP 2013 - Topical Workshop on Electronics for Particle Physics





Contribution ID: 221 Type: Oral

## The Design of the Alphasat Payload Processor - Advancing Space Electronics!

Tuesday, 24 September 2013 09:00 (45 minutes)

Alphasat is the most sophisticated and largest European

telecommunication satellite ever built allowing Inmarsat to offer flexible communications to maritime, aeronautical and other mobile customers. Alphasat supports over 400 spot beams processing more than 750 simultaneous channels in L-band.

This presentation will share some of the key technical challenges encountered during the design of the Alphasat Payload Processor - many of the technologies used on this project simply did not exist when the original proposal was drafted.

The beamforming DSP provides unprecedented flexibility and operational capability in terms of routing, channelization and combining channels to the desired beam.

Presenter: BEDI, Rajan

Session Classification: Plenary 1