Schottky components for ESA MetOp SG space mission

Oleg Cojocari^{1*}, Ion Oprea¹, Martin Rickes¹, Matthias Hoefle¹

¹ACST GmbH, 63457, Hanau, Germany *Contact: <u>oleg.cojocari@acst.de</u>

Abstract—ACST GmbH is a leading European commercial supplier of Schottky diodes for millimeter wave and sub millimeter wave applications. With core business in the Schottky diode fabrication technology, ACST has extended its activity towards assembly and environmental testing of THz components and modules for Space missions. This allows gathering experience and know-how in different critical processes in house and provides opportunity for linkage between different stages within the development process of Space THz-electronics. Being involved in several space-related activities, ACST has become a strong partner in the area of development and qualification of THz electronics for space applications.

Several types of ACST Schottky diodes are currently considered for high-frequency receivers of the MWS, MWI, and ICI instruments as part of the second European meteorological operational satellite program MetOp-SG. This contribution will focus on fabrication technology of Schottky components for space applications and will update the status of procurement activity in the framework of ESA MetOp-SG space mission.