R010-18
A 会場 ：9/25　AM1 （9:00-10:30）
10:10〜10:25

#長妻　努 [1)], 坂口　歌織 [2)]
([1] 情報通信研究機構,[2] 情報通信研究機構

Improvement of bias current subtraction for Himawari-8/SEDA-e observation (No.2)

#Tsutomu Nagatsuma[1)],Kaori Sakaguchi[2)]
([1]National Institute of Information and Communications Technology,[2]National Institute of Information and Communications Technology

Space environment data acquisition monitor (SEDA) onboard Himawari-8 has been operating since Nov. 2014. SEDA has two sensors. One is high energy electron sensor (SEDA-e) and the other is high energy proton sensor (SEDA-p). SEDA-e measures internal charging currents produced from high energy electrons (from 0.1 to 4.5 MeV) collected by 8 plates arranged in a stack. Electron fluxes are estimated from the charging currents. Since the charging currents are quite small, it needs to be amplified by operational amplifier. This means that bias current is contaminated as a offset of particle flux. Therefore, we need to remove the bias current effect. We use bias current model based on the pre-flight measurements for subtraction. The bias current model is a function of temperature. This works well for the beginning of Himawari-8/SEDA observation. However, the background flux level tends to be increase as time goes on especially for higher energy channels. Using long period of high energy electron flux and temperature data of the sensor, we try to estimate the optimal bias current as a function of temperature. In this presentation, we will introduce improving bias current subtraction for SEDA-e observation and evaluate the quality of data using inter-calibration of GOES/SEISS data. We also introduce operational space weather intercalibration activity under Global Space-based Inter-Calibration System (GSICS).