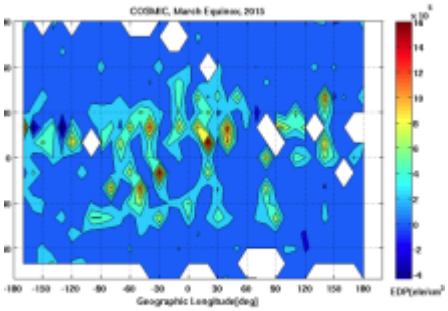
Asebe
Oljira
Wollega University
Poster
This paper describes the variations of the vertical electron density profiles(EDP)and slant total electron content (STEC) values retrieved from Constellation Observing System for Meteorology, Ionosphere, and Climate (COSMIC) measurement during March equinox of 2013, 2015 and 2019 over low latitudes of American, Asian and African longitudinal sectors.
The result indicates that there was a drastic variations of EDP and STEC over the three sectors. The over all maximum EDP values were found in 22 March 2015 and the least was found in 22 March 2019 over all sectors. In 22 March 2015 the maximum EDP was found in American sector, in 22 March 2013 the maximum EDP was found over Asian sector and in 22 March 2019 the maximum value was found over African longitudinal sector. From this study it is probably possible to deduce that during high solar activity phase the low-latitude American sector ionospheric TEC
get enhancement compared to the other sectors and during low solar activity the low latitude African sector TEC get enhancement relative to the other sectors.
Keywords: Electron density profiles; Ionosphere (low latitude ionosphere)



Poster PDF
Oljira_Comparison.pdf
Meeting name
8th International Radio Occultation Working Group Meeting - IROWG-8
Download to PDF