

The Revamped Magnetic Field Investigation on the Europa Clipper Mission

C.T. Russell (1), R.J. Strangeway (1), M.G. Kivelson (1), X.Z. Jia (1)
(1) Earth, Planetary, and Space Sciences, University of California, Los Angeles, CA, USA (ctrussell@igpp.ucla.edu).

When it became necessary to develop a simpler Europa Clipper magnetic field investigation, the magnetometer became a facility instrument procured by the project with the sensors and electronics provided by UCLA. The original co-investigators, under the leadership of M.G. Kivelson, constitute a facility science team that provides the science requirements to be implemented by the project and the subcontractor, UCLA, who provide four fluxgate magnetometers, along a five-meter boom. One of the objectives of the investigation is to determine the thickness of the ice-shell over the European ocean. In this paper, we review what is known about the European magnetospheric environment and how its dynamics may affect the investigation.