

Interactive comment on “Radiation tolerance of the PNI RM3100 magnetometer for a Europa lander mission” by Leonardo H. Regoli et al.

Anonymous Referee #2

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This article deals with the performance of a magnetometer to radiation, in the context of a lander mission at Europa. The results of test campaigns are presented and discussed. The study is interesting, as the authors used so called COFT sensors. The outcome is that 8 out of 9 sensors work well.

In my opinion, the study is clearly described, to the point, with clear conclusions. This article deserves publication in the journal.

A few minor points to be considered by the authors: - Does the attitude and orientation of the lander affect the accuracy of the measurements? It would be useful to see a statement by the authors. - Does the sensor measure the magnetic field in three directions? Please clarify. The plots show only the magnitude of the field. At Europa (and in general), we usually measure the field as a function of direction. The magnitude

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only is not enough to characterise the environment. Please comment. - The test show that the sensors meet the TID requirement. What is the requirement in term of science performances? If the sensor works well but is not able to measure the magnetic field with enough accuracy, it it not very useful. Please comment in the article.

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