

Abstract Submitted
for the HAW14 Meeting of
The American Physical Society

Front-End Electronics Characterization, Production, and QA for the Majorana Demonstrator¹ SOPHIA ELIA, Univ of California - Berkeley, THE MAJORANA COLLABORATION — The Majorana Demonstrator will search for the neutrinoless double beta decay $\beta\beta(0\nu)$ of the isotope ^{76}Ge . In anticipation of the future tonne-scale experiments, its goal is to demonstrate a path forward to a background rate of one cnt/(ROI-t-y) in a 4 keV region around the Q-value of the ^{76}Ge $\beta\beta(0\nu)$. Such a background requirement significantly constrains the design of the front end electronics. Low background and low noise qualifications are a necessity. This poster first presents the characterization and noise performance in single and multi detector systems of the front end electronics developed for MAJORANA . The poster next reviews the full production process and finally describes the Quality Assurance tests developed for the electronics before installation in the experiment.

¹We acknowledge support from the Office of Nuclear Physics in the DOE Office of Science, the Particle and Nuclear Astrophysics Program of the National Science Foundation and the Russian Foundation for Basic Research.

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Date submitted: 23 Jul 2014

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