

Abstract Submitted  
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**Controlling cosmogenic radioactivity in SuperCDMS SNOLAB**

ALAN ROBINSON, Fermilab, CDMS COLLABORATION — The SuperCDMS SNOLAB experiment is being designed with sensitivity far in excess of existing experiments to low-mass WIMP dark matter. To attain this sensitivity, events due to ionizing radiation that mimic dark matter must be controlled. Depending on the source of ionizing radiation, different strategies are required for its mitigation. Cosmic rays and neutron radiation at earth's surface continuously generate an multitude of radioactive atoms in the materials that will be used to build SuperCDMS SNOLAB. Of these isotopes, we are concerned with isotopes with long half-lives and high production rates. The production and effects of cobalt-60, silicon-32, and tritium will be discussed. A new analysis of the silicon-32 concentration in the CDMS-II silicon detectors will be discussed and compared to the measured concentration of silicon-32 in the silicon used by the DAMIC dark matter search.

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