

LNGS SEMINAR SERIES

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New opportunities for dark matter experiments

A diversification of the physics output in many existing rare event searches is possible. In this talk I will present scenarios of the hidden sector with an emphasis of their test in direct detection experiments. For example, I will discuss signatures of dark photons in liquid scintillators as well as signals of an extended neutrino sector in (multi-target) solid state detectors. I will also offer critical comments on DAMA's claim for a positive detection of dark matter, and discuss signal-features that may act as confidence builders for a dark matter discovery.

**MARCH 10, 2015 – 2:30 PM
LNGS - "E. MAJORANA" ROOM**