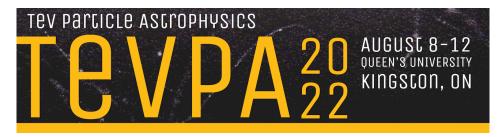
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## Signatures of primordial black hole dark matter at DUNE and THEIA

Tuesday, 9 August 2022 15:50 (20 minutes)

Primordial black holes (PBHs) are a potential dark matter candidate whose masses can span over many orders of magnitude. If they have masses in the  $10^{15} - 10^{17}$  g range, they can emit sizeable fluxes of MeV neutrinos through evaporation via Hawking radiation. We explore the possibility of detecting light (non-)rotating PBHs with future neutrino experiments DUNE and THEIA. We will show that they will be able to set competitive constraints on PBH dark matter, thus providing complementary probes in a part of the PBH parameter space currently constrained mainly by photon data.

## **Collaboration name**

Primary author: DE ROMERI, Valentina

**Co-authors:** TÓRTOLA, Mariam (IFIC, Valencia University/CSIC); MARTINEZ-MIRAVE, Pablo (IFIC (CSIC-Univ. Valencia))

Presenter: DE ROMERI, Valentina

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