

## Freeze-in self-interacting dark matter in warped extra dimension

A classically scale-invariant scalar singlet can be a MeV-scale dark matter, with a feeble Higgs portal coupling at  $O(10^{-10})$ . Besides, an  $O(0.1)$  self-interaction coupling could further serve to alleviate the small-scale problems in the Universe. We show that, such a dark matter candidate can naturally arise in the warped extra dimension, with the huge span of parameter space predicted well within  $O(1)$  fundamental parameters.

### Presentation type

Oral

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