

# Phenomenology 2015 Symposium



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## Axinos at the LHC

*Monday 4 May 2015 17:00 (15 minutes)*

SUSY models with a modified dark sector require constraints to be reinterpreted, which may allow for scenarios with low tuning. A modified dark sector can also change the phenomenology greatly. The addition of the QCD axion to the MSSM solves the strong CP problem and also modifies the dark sector with new dark matter candidates. This talk describes scenarios where the axion's superpartner, the axino may be detectable at the LHC in the decays of neutralinos displaced from the primary vertex. The prospects of distinguishing this scenario from similar decays of neutralinos with gravitinos or RPV are discussed.

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