Lattice 2023



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Type: Parallel Talk

Scattering of pseudoscalar particles in a Sp(4)-gauge theory.

Thursday, 3 August 2023 16:00 (20 minutes)

In this work we consider strongly interacting dark matter candidates which are composite states of $N_f = 2$ fermions charged under a Sp(4) gauge group in the fundamental representation. We present first results from lattice calculations for the scattering properties of two pseudo-Goldstone bosons in the isospin I=2 channel. We report results for searches for bound states and resonances and compare estimates of the interaction rates to astrophysical contraints.

Topical area

Particle Physics Beyond the Standard Model

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