Phenomenology 2015 Symposium



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Lessons Learned from Model Independent Inelastic Dark Matter Direct Detection

Monday 4 May 2015 14:45 (15 minutes)

As an application of the model independent approach to analyzing inelastic dark matter direct detection, as detailed in arxiv: 1409.0536, I will discuss fits to the DAMA annual modulation signal, and corresponding constraints from other direct detection experiments. It is particularly interesting what this tells us about the sensitivity of constraints to uncertainty in detector characteristics, most notably the quenching factor of iodine. I will also comment on the importance of high energy events in constraining an inelastic dark matter scenario.

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