



Contribution ID: 288

Type: talk

Phenomenological aspects of flavoured dark matter

Friday 24 July 2015 15:45 (15 minutes)

Flavour symmetries in the dark sector are a theoretically motivated and phenomenologically appealing possibility. The dark matter particle can be stabilised with the help of flavour symmetries, without the need to introduce an additional discrete symmetry by hand. Apart from the usual searches in direct and indirect detection experiments and high energy colliders, flavoured dark matter generally also gives rise to new flavour violating interactions leading to interesting signatures in rare meson decays.

In this talk I introduce a simplified model of flavoured dark matter in which the dark matter coupling to quarks constitutes a new source of flavour violation, so that the model goes beyond Minimal Flavour Violation. Particular emphasis is put on the discussion of its phenomenological implications in flavour, collider and direct detection experiments.

Author: BLANKE, Monika (CERN)

Presenter: BLANKE, Monika (CERN)

Session Classification: Astroparticle Physics, Cosmology, Gravitation

Track Classification: Astroparticle Physics, Cosmology, Gravitation