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Hadronic interactions of primary cosmic rays with the FLUKA code

Tuesday, August 4, 2015 4:00 PM (1 hour)

The measured fluxes of secondary particles produced by the interactions of cosmic rays with the astronomical environment are often used to infer some of their properties. In this work we investigate the production of secondary particles in inelastic hadronic interactions between several cosmic rays species of projectiles and different target nuclei of the interstellar medium. The yields of secondary particles have been calculated with the FLUKA simulation package, that provides with very good accuracy
the energy distributions of secondary products in a large energy range. An application to the propagation and production of secondaries in the Galaxy is presented.

Collaboration

– not specified –

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