

Simulation of muon bundle multiplicity detection by drift chamber setup

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The detector based on the drift chambers for registration of inclined EAS is being developed in the MEPhI. One of the key characteristic of inclined EAS is multiplicity of muon bundles. Numerical simulation and simulation by Geant4 were performed to study drift chamber abilities for event multiplicity definition. Three methods were developed to reconstruct particle tracks: enumeration, search of a straight section and a histogram method. This work contains results of an application of the reconstruction methods to simulated and experimented data.

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