

Abstract Submitted
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Jet fragmentation functions for identified particles in p+p collisions at 200 GeV in the STAR experiment ELENA BRUNA, Yale University, STAR COLLABORATION — According to theoretical predictions, jet quenching in heavy-ion collisions modifies the jet energy and multiplicity distributions, as well as the jet hadrochemical composition. The measurement of jet fragmentation functions in p+p collisions at 200 GeV provides a baseline to study jet modifications in Au+Au collisions at RHIC. A cone algorithm is used to reconstruct jets in the STAR Time Projection Chamber and Electromagnetic Calorimeter; a study of the jet energy resolution based on PYTHIA+GEANT simulations is reported. We present the results on distributions of jet fragments in p+p collisions at 200 GeV in STAR for charged hadrons and identified particles at different jet energies and cone radii. The results are compared to MLLA (modified leading logarithmic approximation) calculations which provide a good description of the data at higher jet energies.

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