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Effects of Detector Resolution in Measurements of the Multiplicities of Hadrons Within Jets at STAR¹ SUZANNE WHEELER, JAMES DRACHENBERG, Lamar Univ, STAR COLLABORATION — Hadron yields within jets from proton-proton collisions have been proposed as a way to unearth more information on gluon fragmentation functions. The STAR experiment at RHIC provides capability to measure jets at midrapidity and identify their constituent particles by combining information from ionization energy loss and time of flight measurements. It is vital to understand the resolution effects of the different detector subsystems and how they affect the measurement of jet and particle kinematics. These effects are studied in Monte Carlo simulations, where the event generator level can be directly compared to output from the detector reconstruction. The status of this analysis will be presented.

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