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Faddeev and Glauber Calculations at Intermediate Energies in a Model for n+d Scattering¹ CH. ELSTER, T. LIN, Ohio University, W. GLOECKLE, U. Bochum, S. JESCHONNEK, Ohio State University — Faddeev calculations of three-body scattering in the intermediate energy regime are carried out in a model for n+d scattering. In order to go to higher energies, the Faddeev equation is formulated and directly solved without employing a partial wave decomposition, leading to a three-dimensional integral equation in five variables, from which the cross sections for elastic and breakup scattering as well as differential cross sections are obtained. These same observables are calculated based on the Glauber formulation. The first order Glauber calculation and the Glauber rescattering corrections are compared in detail with the corresponding terms in the Faddeev multiple scattering series for projectile energies between 100 MeV and 2 GeV.

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