HADRON PRODUCTION IN NEUTRINO-NUCLEON INTERACTIONS AT HIGH ENERGIES

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The hypothesis of the multi peripheral model is extended to the hadron-nucleus interactions and then generalized to the nucleus-nucleus case. The processing depends on input data that is extracted from the features of the experiments in this field. The number of encountered nucleons from both target and projectile are estimated according to the eikonal scattering approach. The screening effect due to the interaction of the projectile nucleons in successive manner with the target nucleus is considered. The rapidity distributions of fast particles are reproduced at the successive collisions in p-S and 32S-32S interactions at 200 A GeV. A global fair agreement is found in comparison with data of the experiment SLAC-NA-035.