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## Study of strongly interacting matter properties at the energies of the NICA collider using the methods of factorial moments

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The main goal of NICA project is the study of dynamics of quark-hadron phase transitions at the energy range  $\sqrt{s_{NN}}$ =7.7-11.5<sup>-</sup>GeV. The analysis of factorial moments of particle multiplicity, which characterize the size and power of particle clusterization in the phase space, was performed with the hybrid model vHLLE+UrQMD. The model represents the combination of viscous hydrodynamics with two types of phase transition (first-order and 'crossover") and ultrarelativistic quantum molecular dynamics. We will present the difference in the dependence of the factorial moments on ion beam energy for two types of phase transitions

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