

Abstract Submitted
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Analysis of Hadronization in QGP on nuclear collisions SURESH AHUJA¹, Retired — The Standard Model(SM) of particle physics describes LHC pp collisions concerning large momentum transfer scales. But at lower scales the perturbative approach breaks down, requiring development of phenomenological models. There are limitations in SM such as the scale of Higgs Boson mass is being much different from naive quantum-mechanical expectations, Dark matter (DM) remains an enigma, despite extensive astronomical confirmation of its existence, Neutrino masses are observed to be nonzero and elements of the Pontecorvo–Maki–Nakagawa–Sakata matrix have been measured, but these masses are not easily accounted for in the Standard Model. Numerical lattice simulations of Quantum Chromodynamics (QCD) predict the formation of a deconfined Quark-Gluon Plasma (QGP) at a transition temperature. . In a coalescence plus fragmentation approach the heavy baryon/meson ratio is a significant parameter with higher transverse momentum. A coalescence model considering aggregation of charm quarks and stability of top quarks is analyzed which considers inelastic deformation, collision energy (binding energy, and formation of loose particles on reaching plateau in clusters on Hadronization. Replace this text with your abstract body.

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