

Measurement of long-range two-particle correlations with ALICE

Tuesday, 17 August 2021 16:00 (15 minutes)

Measurements of long-range two-particle correlations have long provided critical insights into the properties of the matter created in heavy-ion collisions.

I will present results on long-range two-particle correlations for different charged particles multiplicities in pp at $\sqrt{s} = 13$ TeV and in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV.

These measurements utilize the Forward Multiplicity Detector (FMD), which allows for unprecedented $\Delta\eta$ ranges to be explored (up to $\Delta\eta \sim 8$).

We will compare such measurements to predictions from the relativistic hydro model calculation that supposes the QGP and Monte Carlo generators, which helps us to understand the contribution from non-QGP-like processes in an unexplored kinematic regime.

Experimental nuclear physics

Theoretical nuclear physics

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