

Disentangling flow and signals of Chiral Magnetic Effect in U+U and Au+Au collisions

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We present measurements of the charge-dependent, three-particle correlator $\gamma = \langle \cos(\phi_1 + \phi_2 - 2\phi_3) \rangle$ and elliptic flow v_2 in central and ultra-central U+U and Au+Au collisions at $\sqrt{s_{NN}} = 200$ GeV from STAR. The difference $\gamma(\text{like-sign}) - \gamma(\text{un-like-sign})$ measures charge separation across the reaction plane, a predicted signal of the Chiral Magnetic Effect. In U and Au+Au collisions for which predictions from flow-related backgrounds and magnetic field-dependent effects diverge. Our Degree-Calorimeters which preferentially select body-tipe events [3]. We find that for cases where known, flow-driven, background

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Preferred Track

Collective Dynamics

Collaboration

STAR

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