

Strangeness in Quark Matter 2019



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Strangeness flow in Au+Au collisions at 1.23 AGeV measured with HADES

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We present the preliminary results on an anisotropic transverse flow of particles with strange content (K_s^0 and K^+) in Au+Au collisions at $\sqrt{s_{NN}} = 2.42$ GeV measured with HADES. The strange particle flow in a heavy-ion collision is a good probe for nuclear equation-of-state. Kaon flow was seldom measured at such low centre-of-mass energy region due to sub-threshold production of strangeness. Thanks to the quantity of 2.6 billion events of the 40 % most central collisions this study is now possible. The obtained flow parameters (differential measurement of directed and elliptic flow) are compared with previously published world data as well as with flow of non-strange particles. The agreement of measurement with simulations using transport codes is also checked.

Collaboration name

HADES

Track

Strangeness and Light Flavour

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