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Explorations of the dependence of the specific shear viscosity on charged currents¹ ROY LACEY, Stony Brook University — Azimuthal anisotropy scaling functions are presented for identified particle species, spanning beam energies $(\sqrt{s_{NN}})$ from RHIC to the LHC. The scaling functions, which clarify the respective influence of initial-state eccentricity, expansion dynamics, and final-state viscous attenuation, indicate characteristic signatures for the specific viscosity's dependence on the temperature (T) and the baryon (μ_B) , strangeness (μ_S) , and isospin (μ_I) chemical potentials. The extracted scaling coefficients provide new and unique constraints for the detailed characterization of both the phase structure of the QCD phase diagram and its respective phases' transport properties.

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