

The 8th International Conference on Chirality, Vorticity and Magnetic Field in Quantum Matter



ID de Contribution: 24

Type: **On-line talk**

Pinched singularity and long time tail (online)

vendredi 26 juillet 2024 15:30 (30 minutes)

Hydrodynamic nonlinearity manifests itself as long time tail in the hydrodynamic correlation functions. This corresponds to the singularity of the correlation function in momentum space. We argue that the latter is actually a “pinched singularity” of the integrand in the integral associated with a bubble diagram. We then address how to find the pinched singularity by solving the “Landau Loop Equations” and thus find the long time tail. Finally, by using this approach we read the long time tails of the shear stress tensor correlation functions in two theories: relativistic hydrodynamics and (chiral) magnetohydrodynamics.

Auteur principal: ABBASI, Navid

Orateur: ABBASI, Navid

Classification de Session: Hydrodynamics