

Differential HBT and correlation functions for the exact hydro model.

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We will briefly look at the fundamentals of Hanbury Brown and Twiss (HBT) effect and how the Differential HBT method can be used to detect rotation. Previously we introduced this method for simple models and applied the method to the particle-in-cell relativistic (PICR) fluid dynamics model. Some of these results will be presented and we will then look at the correlation functions and the Differential HBT for a simple exact hydro model with rotation. In the exact hydro model the rotation and expansion of a fluid dynamical model is studied and by applying the Differential HBT to the exact model results we can see that the correlation function is sensitive to rotation.

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