

# Chunhui Zhu (U. de Chile): Fluctuations of TASEP with in-homogeneous particle speeds

## **Abstract:**

The totally asymmetric simple exclusion process (TASEP) is a fundamental model in interacting particle systems where every particle on a line attempts to jump independently to its nearest neighbor from left to right, and the jump is allowed if and only if its target site is empty. In recent years, it has been proven that the fluctuations of one dimensional TASEP with general initial conditions converge in distribution to KPZ fixed point.

In this talk, we consider in-homogeneous TASEP, in which particles jump with different speeds. We study its long time behavior under appropriate scaling and initial data.