



Contribution ID: 16

Type: **not specified**

## Rapidity profiles from 3D Glasma simulations with finite longitudinal thickness

*Wednesday 20 September 2017 16:10 (20 minutes)*

I present the latest results from our work on simulating the early stages of heavy-ion collisions within the CGC picture in three dimensions. In our simulation we introduce an extra parameter for the longitudinal thickness of the nuclei and thereby explicitly break the boost invariance of the system. Consequently the full 3+1 dimensional classical Yang-Mills equations have to be solved numerically. The Glasma resulting from the collision of two such nuclei with longitudinal extent exhibits a Gaussian rapidity profile in its rest-frame energy density. We compare our results to experimental data from RHIC and find reasonable agreement.

**Primary authors:** MUELLER, David (Vienna University of Technology); IPP, Andreas (TU Wien)

**Presenter:** MUELLER, David (Vienna University of Technology)

**Session Classification:** CGC