



Wintersemester 2019/20

**Oberseminar
Geometrische Analysis und Mathematische Relativitätstheorie**

Am Donnerstag, den 17.10.2019 spricht um 14 Uhr c. t. im Raum C9A03

Dr. Edward Bryden
(Universität Tübingen)

über das Thema

Sobolev bounds and the convergence of Riemannian manifolds

For a fixed smooth background Riemannian manifold, we consider a sequence of metric tensors whose Sobolev norms with respect to the background metric tensor are uniformly bounded. It will be shown that the distance functions associated to this sequence are uniformly bounded in a Hölder sense with respect to the background metric. We will discuss how these bounds relate to notions of convergence such as Gromov- Hausdorff (G-H) and Sormani-Wenger Intrinsic Flat (SWIF) convergence.

Hierzu wird herzlich eingeladen.

C. Cederbaum, G. Huisken