

Institut f. Geometrie

**Vortrag**

6.7.2012, 09:00 Uhr

Seminarraum 2, Kopernikusgasse 24/4

## **Geometric Curve Subdivision**

**PROF. KAI HORMANN**

(Univ. Lugano)

While linear subdivision schemes for curves and surfaces are well-understood by now, we still have but a few tools for analyzing the non-linear setting, although non-linear schemes often yield better results than their linear counterparts. In this talk we discuss a geometric condition which guarantees that a nonlinear interpolating subdivision scheme produces tangent continuous limit curves. As an example, we present two non-linear variants of the classical 4-point scheme which satisfy this condition. We further demonstrate some ideas for generating limit curves with higher orders of smoothness.

Johannes Wallner