

## Einladung

Im Rahmen des Schwerpunktskolloquiums „Reelle Geometrie und Algebra“ hält

**Herr Prof. Dr. Niels Schwartz**  
(Universität Passau)

am **Donnerstag, dem 8. Juni 2017**, einen Vortrag zum Thema:

### Spectral spaces and localic spaces

Der Vortrag findet um

**17:00 Uhr** in Raum **F 426** statt.

Es wird Gelegenheit gegeben, sich vorher (ab 16.30 Uhr)  
im Common Center F 441 bei Tee und Kaffee zu treffen.

Alle Interessenten sind herzlich eingeladen.

Andrea Barjasic

Beauftragte für das Kolloquium

#### Abstract:

The spectral spaces (with the spectral maps as morphisms) form a subcategory,  $\text{Spec}$ , of the category  $\text{Top}$  of topological spaces. Spectral spaces can be defined by a list of topological properties. As Hochster showed, they are the Zariski spectra of rings (commutative with unit), equivalently the prime ideal spectra of bounded distributive lattices (Stone). The lecture focuses on the relationship between  $\text{Spec}$  and  $\text{Top}$ . It is a rather simple fact that  $\text{Spec}$  is a reflective subcategory of  $\text{Top}$ . The spectral reflection of a topological space belongs to a special class of spectral spaces, which are called localic spaces. These also arise naturally in the area of pointfree topology. The relationship between a topological space and its spectral reflection will be explained.