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Einladung zu einem Gastvortrag von

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zum Thema

## **Dynamics of Nonlocal PDEs**

Ort: I.2.01 der Universität Klagenfurt

Zeit: Montag, 20. August 2018, um 14:00 Uhr

### *Kurzfassung:*

Recently, nonlocality has emerged as a highly active theme in differential equations. In my talk, I shall give several examples of PDEs, where nonlocal effects play a, sometimes quite surprising, role. I am going to focus on elementary examples of one-dimensional reaction-diffusion equations. We start with dynamics of the FKPP equation with nonlocal convolution terms, then consider nonlocal modulation equations with convolution terms, and then proceed to waves in the fractional-diffusion Nagumo equation. Having illustrated the deterministic PDE case, we also provide one stochastic example, where nonlocality plays a key role in the context of neural fields in the cortex.

Das Institut für Mathematik freut sich auf Ihren Besuch.

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