

Universität Konstanz

Fachbereich Mathematik und Statistik

Schwerpunkt Reelle Geometrie und Algebra

## **Einladung**

Im Oberseminar Modelltheorie hält

## Eliana Barriga

(Universidad de los Andes, Bogotá/University of Haifa)

am **Donnerstag**, **15.12.2016**, einen Vortrag zum Thema:

One-dimensional semialgebraic groups over real closed fields

Der Vortrag findet um **13:30 Uhr** in **G306** statt. Alle Interessenten sind herzlich eingeladen.

**Abstract**: Semialgebraic groups over real closed fields have been intensively studied in the last three decades, and it is a field of current research. These groups can be seen as a generalization of the semialgebraic groups over the real field, studied by Madden and Stanton (1992) for the one-dimensional case, and also as a particular case of the groups definable over an o-minimal structure (see Razenj (1991) and Strzebonski (1993) for the one-dimensional case).

In this talk I will present the results we have obtained in my doctoral thesis project on the classification of one-dimensional semialgebraically connected semialgebraic groups over a real closed field. For this, I will show some results on the existence of definable local homomorphisms between definably compact semialgebraic groups and algebraic groups with generic neighborhoods, as well as some results on covering maps in the category of locally definable groups in o-minimal expansions of real closed fields.

This PhD project is supervised by Alf Onshuus and Kobi Peterzil.