



cmm.uchile.cl

Beauchef 851, edificio norte, Piso 7 Santiago, Chile CP 837 0456

Tel. +56-2 2978 4870

Seminar EDPs

Speaker: Pedro Gaspar, The University of Chicago, USA.

Title: Rigidity and bifurcation of low energy solutions to semilinear PDEs in symmetric domains.

Abstract: Motivated by recent developments on the connections between the Allen-Cahn equation - which is ubiquitous in certain models of phase transitions and separation phenomena - and minimal hypersurfaces, we will discuss variational and geometric properties of low energy solutions to certain PDEs in the sphere and other symmetric domains. Furthermore, we will describe a geometric bifurcation result for solutions of the Allen-Cahn equation in the 3-sphere and point out some relations with the variational theory of minimal surfaces. This is joint work with Rayssa Caju, Marco Guaraco and Henrik Matthiesen.

Thursday (4/22) at 4:15 pm (Chilean time).

https://uchile.zoom.us/j/83420715242?pwd=TXN5eURTTkhORlRyQ1d3eWN0VmpyZz09

Meeting ID: 834 2071 5242

Passcode: 933615

