

5th South West Regional PDE Winter School, 3rd-4th January 2013
Department of Mathematical Sciences (4 West), University of Bath

All talks take place in the Wolfson Lecture Theatre (4W1.7)

THURSDAY 3RD JANUARY

12.00-13.30 registration 4W Level 1

12.30-13.30 sandwich lunch 4W1.1

13.30-15.00 **Philippe LeFloch** (Paris) *The finite energy method for compressible fluid flows*

15.00-15.30 tea/coffee

15.30-17.00 **Frank Merle** (Cergy-Pontoise and IHES) *Global dynamics for the energy critical focusing wave equations*

17.00-17.30 tea/coffee 4W1.1

17.30-18.30 CONTRIBUTED TALKS

17.30 **Timothy Blass** (Oxford) *The Fokker-Planck operator and the stability of randomly forced ODEs*

17.50 **Thomas Hudson** (Oxford) *Stability of screw dislocations in a BCC lattice under anti-plane deformation*

18.10 **David McCormick** (Warwick) *A generalised Ladyzhenskaya inequality and a coupled parabolic-elliptic problem*

19.30 Dinner Wessex House Restaurant (for participants booking Dinner)

FRIDAY 4TH JANUARY

08.00– Breakfast in Wessex House Restaurant for participants staying on campus in Woodlands

09.00-10.30 **Peter Topping** (Warwick) *Finding minimal surfaces using PDE*

10.30-11.00 tea/coffee 4W1.1

11.00-12.00 CONTRIBUTED TALKS

11.00 **Ben Lambert** (Bath) *A Neumann boundary condition for mean curvature flow*

11.20 **Daniel Sutton** (Bath) *Homogenisation of Hamiltonian dynamics*

11.40 **Olena Sivak** (Swansea) *Parabolic nonlinear potential for an estimate of solutions to equations with partial degeneracy*

12.00-13.00 sandwich lunch 4W1.1

13.00-14.30 **Dorin Bucur** (Savoie) *Free boundary methods for spectral optimisation problems*