Program of the IRP Coss&Vita closing meeting and workshop

Monday 9th October

9h30  Welcome coffee

10h00  Opening
10h30  Francesco dell’Isola - University of L’Aquila
      The problem of Synthesis of Metamaterials
11h30  Valentin Calisti - Institute of mathematics of the Czech Academy of sciences
      Emergence of elastostatic strain-gradient effects from topological optimization

12h00  Lunch break

14h00  Luca Placidi - Uninettuno University
      Characterization of the elastic modulus via a strain gradient dynamic model
14h30  Natalia Muhl Castoldi - MSME / Université Paris-Est Créteil
      On modelling spinal growth
15h00  François Hild - ENS Paris Saclay
      Mesoscale DVC Analyses and parameter calibration for pantographic block

15h30  Coffee break

16h00  Massimo Cuomo - University of Catania
      Recent advances in non-linear simulation of slender structures
16h30  Francesco D’Annibale - University of L’Aquila
      Statics and dynamics of a beam-like structure made of a chiral metamaterial
17h00  Pierre Seppecher - Université de Toulon
      One dimensional periodic microstructures exhibiting effective Timoshenko beam behavior

17h30  Aperitif

Tuesday 10th October

9h00  Welcome coffee

9h30  Andrea Colombi, University of Applied Science Zurich
      Architected plates for vibration control
10h00  Max Gattin - MSME / Université Paris-Est Créteil
      Towards ultrasonic monitoring of multiphase architectured media through bandgap tracking
10h30  Anne-Sophie Poudrel - PIMM/ ENSAM Paris
      Ultra-wideband characterization of viscoelastic materials: from quasi-static to ultrasounds

11h00  Coffee break

11h30  Pierre Margerit - PIMM / ENSAM Paris
      Stroboscopic imaging for the dynamical analysis of architectured material
12h00  Martin Poncelet - LMPS / ENS Paris Saclay
      Can we perform homogenization with imperfect boundary conditions?

12h30  Lunch break

14h30  Fabien Amiot/Gael Chevallier - FEMTO-ST
      Towards a second-gradient elasticity pattern based on multi-material 3D printing
15h00  Manon Thbaut - LMS / École Polytechnique
      Capturing boundary effects in asymptotic homogenization solves apparent incoherence of a non-positive strain-gradient stiffness
15h30  J-F. Ganghoffer - LEM3 / Université de Lorraine
      A new look at periodic homogenization methods towards generalized continua and applications to architectured materials

16h00  Coffee break