



UNIVERSITÀ
DEGLI STUDI
DI BERGAMO

**Doctoral Programme in
Engineering and Applied Sciences
University of Bergamo, School of Engineering, Dalmine (BG)**

Doctoral Course (16 h)

Title: Advanced Computational Mechanics of Solids and Structures

**Teacher: Giuseppe COCCHETTI, Politecnico di Milano, Associate Professor
(ICAR/08, Scienza delle Costruzioni)**

Contents:

The course aims at introducing, on a formulation and a computational basis, in the field of structural mechanics, the non-linear analysis of structures, where non-linearities may be linked to kinematics or/and material behaviour.

Schedule:

Friday, September 06th, 2019, 14:30-18:30 (4h).

Formulation and analysis of elastic truss structures with a nonlinear kinematics and implementation of a specific code.

Wednesday, September 18th, 2019, 14:30-18:30 (4h).

Formulation and analysis of elastic-plastic truss structures with a nonlinear kinematics and implementation of a specific code.

Friday, September 20th, 2019, 14:30-18:30 (4h).

Formulation and analysis of elastic-plastic frames. Push-over analysis. Implementation in a specific code.

Friday, September 27th, 2019, 14:30-18:30 (4h).

Formulation and analysis of elastic-plastic solids and implementation in a specific code.