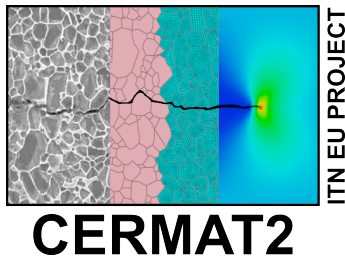




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## AVVISO DI SEMINARIO

Si comunica che **mercoledì 16 marzo alle ore 14.00**  
si terrà presso l'aula **P1** (via Mesiano 77) il seguente corso

### Multi-physics simulations in MEMS

**Prof. Alberto Corigliano**

*Department of Civil and Environmental Engineering, Politecnico di Milano*

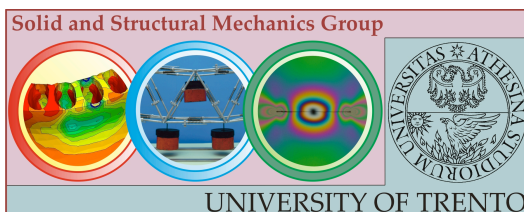
Micro Electro Mechanical Systems (MEMS) are devices which have recently found many applications in the consumer, automotive and biomedical engineering market. Applications and markets for MEMS are now fast expanding due to the incoming Internet of Thing (IOT); as a consequence, the study and design of MEMS is more and more demanding.

Design and reliability assessment of MEMS is more and more based on highly realistic simulations of complex multi-physics processes, in this field modelling accuracy and computing time are contrasting needs that must be suitably balanced. Many different physics are intrinsically coupled in MEMS and it is often impossible to rely only on simplified, fully decoupled simulations. The increasing popularity of MEMS, the necessity to improve their design and to reduce the time to market has forced many researchers and software companies to produce dedicated methods and codes applicable to the solution of typical multi-physics problems in MEMS like e.g. the electro-mechanical, the thermo-mechanical, the magneto-mechanical ones.

The presentation will focus on recent trends and novelties in the field of modelling and simulation for MEMS: important issues like Domain Decomposition (DD) and Model Order Reduction (MOR) strategies will be discussed with reference to coupled and highly non-linear problems for MEMS.

Tutti gli interessati sono invitati a partecipare.

Il seminario è organizzato dal gruppo di Scienza delle Costruzioni  
(D. Bigoni, L. Deseri, N.Pugno, M. Gei, F. Dal Corso, A. Piccolroaz, R. Springhetti)



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