

## INdAM Workshop MACH2019

# Mathematical modeling and Analysis of degradation and restoration in Cultural Heritage

Istituto Nazionale di Alta Matematica INdAM, Roma, 25-29 March 2019

The workshop focuses on mathematical modeling and simulation techniques to improve the current strategies of conservation and restoration in cultural heritage, sharing different experiences and approaches.

Topics of interest will be: corrosion and sulphation of different materials, damage and fractures, stress in thermomechanical systems, contact and adhesion problems, phase transitions and reaction-diffusion models, restoration techniques, and additive manufacturing.

The final goal is to build a permanent bridge between the experts in cultural heritage and the mathematical community.

**Scientific and Organizing Committee:** Elena Bonetti (Università di Milano), Cecilia Cavaterra (Università di Milano), Roberto Natalini (IAC - CNR, Roma), Margherita Solci (Università di Sassari)

**Local Organizers:** Barbara De Filippo (IAC - CNR, Roma), Mara Di Berardo (IAC - CNR, Roma)

**Registration:** [mach2019.roma@gmail.com](mailto:mach2019.roma@gmail.com)

**Information:** <https://sites.google.com/view/mach2019/home>

**Confirmed speakers:** Ferdinando Auricchio, Giovanni Azzena, Antonio Bilotta, Giovanna Bonfanti, Andrea Braides, Gabriella Bretti, Roberto Busonera, Giovanni Caruso, Pasquale Ciarletta, Valeria Comite, Monica Conti, Moritz Ebeling-Rump, Simona Fantacci, Paola Fermo, Francesco Freddi, Michel Fremont, Marco Fuhrman, Elisabetta Giani, Sara Goidanich, Maurizio Grasselli, Frederic Lebon, Carlo Lovadina, Matteo Negri, Carlo Orrieri, Elisabetta Rocca, Riccarda Rossi, Marco Roveri, Gianni Royer-Carfagni, Maria Laura Santarelli, Roberto Scopigno, Matteo Semplice, Salvatore Siano, Michela Spagnuolo, Piero Tiano, Emilio Turco.

The workshop is **sponsored by:** Istituto Nazionale di Alta Matematica "Francesco Severi" (INdAM), Istituto per le Applicazioni del Calcolo "Mauro Picone" (IAC CNR), Dipartimento di Matematica - Università di Milano (UNIMI), Università di Sassari (UNISS).

The workshop has the patronage of

