

**XLV "A. CORBELLA" INTERNATIONAL SUMMER SCHOOL  
ON ORGANIC SYNTHESIS – ISOS 2021  
14<sup>th</sup> – 17<sup>th</sup> June 2021**

ORGANIZING COMMITTEE

L. Lay, A. Casnati, S. Cauteruccio, V. Conte, D. Montesarchio, M. Pineschi, J. Roletto

**PROGRAMME OF LECTURES**

**OPENING LECTURE**

**Ben L. Feringa** (University of Groningen)

*From molecular switches to motors*

**BIOMATERIALS**

**Gianluca Ciardelli** (Turin Polytechnic)

*Tailor-made polymers for biomedical uses*

**Jöns Hilborn** (Uppsala University)

*Chemistry for engineering of human tissue*

Keynote: **Luciano Galantini** (University of Rome "La Sapienza")

*From molecules to supracolloidal structures: Building from the bottom up at the nano- and micro-scale*

**SYNTHETIC METHODOLOGIES**

**Varinder K. Aggarwal** (University of Bristol)

*Transforming abundant functional groups into boronic esters with light*

**Ning Jiao** (Peking University, Beijing)

*Highly efficient nitrogenation reactions*

Keynote: **Luca Pignataro** (University of Milan)

*(Cyclopentadienone)iron complexes for hydrogen transfer and more*

**GREEN CHEMISTRY**

**Luigi Vaccaro** (University of Perugia)

*Green shades in organic synthesis*

Keynote: **Giulia Licini** (University of Padua)

*Catalytic valorization of lignin for a sustainable carbon-neutral future*

**CULTURAL HERITAGE**

**Matija Strlic** (University College London)

*Modelling the lifetime of paper-based collections*

Keynote: **Iliaria Bonaduce** (University of Pisa)

*Conservation issues of modern oil paintings: a molecular model on paint curing*

**SYNTHESIS OF FINE CHEMICALS**

**Alessandro Falchi** and **Massimiliano Mari** (Chiesi Farmaceutici, Italy) *Process safety evaluation for the manufacture of an Active Pharmaceutical Ingredient*

**Maria Isabel Torres-Sanchez** (Givaudan International, Switzerland) *Regulatory affairs: from the research to the marketplace*

**NEW FRONTIERS IN ANALYTICAL METHODS**

**Marco Lucarini** (University of Bologna)

*Elucidation of intermediates and mechanisms in organic synthesis by using electron spin resonance*

**Antonio Randazzo** (University of Naples "Federico II")

*Chemometrics: principles and applications*

**Christoph A. Schalley** (Freie Universität, Berlin)

*Beyond analytics: mass spectrometry as a tool for supramolecular chemistry in the gas phase*

**SPECIAL SESSION**

**Paolo A. Netti** (University of Naples "Federico II")

*Engineering competent human tissues in vitro for regenerative, personalized and precision medicine*