

Inaugural Conference of the Arnold-Regge Center for Algebra, Geometry and Theoretical Physics



Monday, 27 February 2017 - Thursday, 2 March 2017

University of Torino

Scientific Programme

MAIN EVENTS

Inauguration Arnold-Regge Center
Dedication of the Aula Magna (Physics Dept) to Tullio Regge
Public lecture, Alessandria (at ACSAL)
Public lecture, Torino (Giovedì Scienza)
Workshop (Arnold-Regge Legacy and Developments)

PROGRAMME

Monday, February 27th (Torino, Cavallerizza)

12:00 – 14:00 Reception at Cavallerizza, buffet/lunch
14:00 – 15:30 Inauguration of the Arnold-Regge Center (ARCenter)
14:00 – 14:15 Address of Rettore Gianmaria Ajani and of Rettore Cesare Emanuel
14:15 – 14:45 Pietro Fré – Description of the Arnold-Regge Center
14:45 – 15:00 Sauro Additati – Role of Sponsors/Donors of ARCenter
15:00 – 15:15 Address by Viktor Matveev (talk given by A. Sorin, JINR, Dubna)
15:15 – 15:30 Antonio Masiero (INFN)
15:30 – 16:30 Lectio Magistralis on Mathematical Physics by Luis Alvarez-Gaumé (Simons Center)

Mago Classico, Prestigiato Quantico

16:30 – 17:00 Coffee Break

17:00 – 18:00 Memories of Regge and Arnold, coordinator Piero Bianucci
17:00 – 17:30 The figure of V. Arnold in Mathematical Physics , Alexander Sorin (JINR, Dubna)
17:30 – 18:00 The figure of T. Regge in Modern Physics, Riccardo D'Auria (Politecnico of Turin)

Tuesday, February 28th (Torino, Aula Magna of the Physics Department)

9:00 – 11:30 Dedication of the Aula Magna to Tullio Regge.

Address of the Department Director S. Massaglia.
Address of the INFN Section Director A. Rivetti

Contributions on the following topics:

Gravity (L. Castellani)
Phenomenology (L. Magnea)
Statistical Mechanics (F. Gliozzi)
Mathematical Physics (A. Ceresole)

11:20 – 11:30 Address of Daniele Regge, son of Tullio

11:30 – 13:00 Lectio Magistralis by Sergio Ferrara, **L'eredità di Einstein raccolta da Regge e le Simmetrie dell'Universo**

13:00 – 14:00 Lunch (buffet, Aula Magna)

14:00 – 15:30 Round table coordinated by P. Bianucci with G. Peruzzi, A. Ferrari, F. Tibone

15:30 – 16:00 Coffee Break

16:00 – 17:30 Workshop in Aula Magna Regge

First Seminar Session

16:00 – 16:45 V. Mukhanov, **Resolving Singularities in General Relativity**

16:45 – 17:30 V. Del Duca, **Regge, Gribov, BFKL and the high-energy limit of gauge field theories**

17:30 – 18:15 R. Longo, **Non-equilibrium thermodynamics and conformal field theory**

Wednesday, March 1st (Alessandria, Science Department)

9:00 – 10:30 Transfer from Torino to Alessandria (bus)

10:30 – 10:55 Coffee break

Second Seminar Session

10:55 – 11:00 Welcome address of the Director of the Science Department L. Marchese

11:00 – 11:45 A. Slavnov, **The new method of quantisation of gauge theories, applicable beyond perturbation theory**

11:45 – 12:30 M. Capaccioli, **What is a galaxy?**

12:30 – 13:15 A. Zaffaroni, **AdS4 black holes and 3d gauge theories**

13:15 – 14:45 Lunch (buffet – in front of meeting Room 2nd floor)

Third Seminar Session

14:45 – 15:30 A. Marzuoli, **Desargues-Regge spin networks**

15:30 – 16:15 J. Figueroa O'Farrill, **An Erlangen Programme for Supergravity**

16:15 – 17:00 M. Porrati, **Factorisation of IR Dynamics, Soft Hair and the Anna Mae Effect**

17:00 – 17:30 Coffee break

19:00 – 20:30 Public lecture by Claudio Bartocci, with local sponsors of ARCenter, at ACSAL. **La geometria del caos**

20:30 – 22:00 Buffet/dinner offered by ACSAL.

22:00 Return to Torino (bus).

Thursday, March 2nd (Torino, Physics Department)

Fourth Seminar Session

9:30 – 10:15 V. Kazakov, **Quantum field theories integrable in $D > 2$ dimensions**

10:15 – 11:00 A. Sagnotti, **AdS Vacua from Dilaton Tadpoles and Form Fluxes**

11:00 – 11:30 Coffee Break

11:30 – 12:15 G. Korchemsky, **How far is QCD from maximally supersymmetric Yang-Mills theory?**

12:15 – 13:00 J. Nelson, **Symmetry Gravity and Regge**

13:00 – 14:30 Lunch (buffet – in front of Aula Wataghin/Aula Wataghin)

Fifth Seminar Session

14:30 – 15:15 A. Fino, **The symplectic Calabi-Yau problem**

15:15 – 16:00 A. Van Proeyen, **Superconformal formulation of Einstein equations and currents**

16:00 – 17:30 Coffee Break

18:00 – 19:30 Public lecture of Eugenio Coccia at Teatro Colosseo, presented by Piero Bianucci. **IL GRIDO DEI BUCHI NERI. Onde Gravitazionali e nuova fisica: il contributo del Centro Arnold-Regge**

SPEAKERS include:

Luis Alvarez-Gaumé

Claudio Bartocci

Piero Bianucci

Massimo Capaccioli

Leonardo Castellani

Anna Ceresole

Eugenio Coccia

Riccardo D'Auria

Vittorio del Duca

Sergio Ferrara

Attilio Ferrari

José Miguel Figueroa-O'Farrill

Anna Fino

Ferdinando Gliozzi

Vladimir Kazakov
Gregory Korchemsky
Roberto Longo
Lorenzo Magnea
Annalisa Marzuoli
Viktor Matveev
Viatcheslav Mukhanov
Jeanette Nelson
Giulio Peruzzi
Massimo Porrati
Augusto Sagnotti
Andrei Slavnov
Alexander Sorin
Federico Tibone
Antoine Van Proeyen
Alberto Zaffaroni