«ETTORE MAJORANA» FOUNDATION AND CENTRE FOR SCIENTIFIC CULTURE

TO PAY A PERMANENT TRIBUTE TO ARCHIMEDES AND GALILEO GALILEI, FOUNDERS OF MODERN SCIENCE AND TO ENRICO FERMI, THE "ITALIAN NAVIGATOR", FATHER OF THE WEAK FORCES



SUMMARY OF THE 2017 COURSES — ERICE



All Courses are sponsored by the World Federation of Scientists (WFS), the Sicilian Regional Government (ERS), the Italian Ministry of Education, University and Scientific Research and the Galileo Galilei Foundation (GGF). Some of the Courses are under the sponsorship of the Italian Ministry of Foreign Affairs, the Italian Ministry of Health, the North Atlantic Treaty Organization (NATO), the American National Science Foundation (NSF), the Italian National Research Council (CNR), the Weizmann Institute of Science, the European Physical Society (EPS), the Italian National Institute for Nuclear Physics (INFN), the Enrico Fermi Centre, the World Wildlife Fund (WWF), the Commission of the European Communities (CEC), some of the main Italian and foreign Universities and Research Centres, and the World Laboratory

INTERNATIONAL SCHOOL OF MEDICAL SCIENCES

153rd Course: Neuroepidemiology: methods and clinical applications

Directors: M. D'AMÊLIO – P. RAGONESE – W.A. ROCCA – G. SAVETTIERI

3 - 9 March 2017

CONFERENCE ON THE NEW FINANCIAL STATEMENT AS A BUSINESS COMMUNICATION TOOL

Chairman: G. VIVIANO

7 March 2017

• INTERNATIONAL SCHOOL OF PARTICLE ACCELERATORS «KJELL JOHNSEN, GUSTAV VOSS AND

EDMUND WILSON» Director: T.M. TAYLOR

3rd Course: Beam injection, extraction and transfer

Directors: R. BAILEY - B. HOLZER

10 – 19 March 2017

• INTERNATIONAL SCHOOL OF QUANTUM ELECTRONICS

Directors: A.N. CHESTER - S. MARTELLUCCI

59th Course: *The frontiers of attosecond and ultrafast X-ray science* Directors: L. DI MAURO – A. DOMARACKA – M. NISOLI

19 - 28 March 2017

• INTERNATIONAL SCHOOL OF EPIDEMIOLOGY AND PREVENTIVE MEDICINE «GIUSEPPE D'ALESSANDRO»

Directors: G.M. FARA - G. GIAMMANCO - M. SZKLO

50th Course: *Urban health*

Directors: D. D'ALESSANDRO - S. CAPOLONGO

29 March - 2 April 2017

• INTERNATIONAL SCHOOL OF NANOMEDICINE

Directors: M. FERRARI – M. MASSERINI 2nd Course: *New trends in nanomedicine* Directors: M. FERRARI – M. MASSERINI

8 – 13 April 2017

INTERNATIONAL SCHOOL OF CARDIAC SURGERY

Director: U.F. TESLER

7th Course: *Imaging and the heart*

Directors: L.P. BADANO - M. PEPI - J.R. PEPPER - U.F. TESLER

9 – 14 April 2017

INFN ELOISATRON PROJECT

Director: A. ZICHICHI

59th Workshop: *High power cyclotrons for neutrino physics*

Director: W.A. BARLETTA

19 - 25 April 2017

• INTERNATIONAL SCHOOL ON FUSION REACTOR TECHNOLOGY

Director: S. MARTELLUCCI

16th Course: Diagnostics and technology developments in view of iter and demo

Director: D. MAZON 28 April – 4 May 2017

INTERNATIONAL SCHOOL OF MATHEMATICS «G. STAMPACCHIA»

Directors: F. GIANNESSI - M. THÉRA 67th Course: *Stochastic methods in game theory*

Directors: J. RENAULT - M. SCARSINI - R. SMORODINSKY

5 – 13 May 2017

• INTERNATIONAL SCHOOL OF MATHEMATICS «G. STAMPACCHIA»

Directors: F. GIANNESSI - M. THÉRA

68th Course: Graph theory, algorithms and applications

Directors: R. CERULLI - A. GOLDBERG - G.F. ITALIANO - R.E. TARJAN

5 – 13 May 2017

INTERNATIONAL SCHOOL OF BIOPHYSICS «ANTONIO BORSELLINO»

44th Course: *Biophysics of channels and transporters* Directors: A. ACCARDI – M. PUSCH – P. TAMMARO 14 - 20 May 2017

INTERNATIONAL SCHOOL OF BIOLOGICAL MAGNETIC RESONANCE

Director: J.D. PUGLISI

15th Course: *Biophysics and molecular structure* Directors: J.D. PUGLISI – E. VIANI PUGLISI

20 - 28 May 2017

INTERNATIONAL SCHOOL OF STATISTICAL PHYSICS

Directors: P. HÄNGGI - F. MARCHESONI 11st Course: Frontiers in water biophysics

Directors: A. CESARO – L. COMÉZ – G. FRANZESE

22 - 28 May 2017

7th CONFERENCE ON CENTRO FERMI PROJECTS – THE EEE PROJECT – SCIENCE IN THE HEART OF

THE YOUNG

Directors: L. CIFARELLI - A. ZICHICHI

29 - 31 May 2017

• INTERNATIONAL SCHOOL OF CRYSTALLOGRAPHY

Director: T.L. BLUNDELL

50th Course: *Integrative structural biology* Directors: J.L. MARTIN – E. YVONNE JONES

2 - 11 June 2017

INTERNATIONAL SCHOOL OF SUBNUCLEAR PHYSICS

Director: A. ZICHICHI

55th Course: *Highlights from LHC and the other frontiers of physics*

Directors: G. 't HOOFT - A. ZICHICHI

14 - 23 June 2017

INTERNATIONAL SCHOOL OF NEUROSCIENCES «SIR JOHN ECCLES»

Directors: P.F. FERRARI - G. RIZZOLATTI

6th Course: Different elements of primate neural networks in the connectome era

Directors: E. BORRA – K. ROCKLAND

26 - 30 June 2017

INTERNATIONAL SCHOOL OF NEUTRON SCIENCE AND INSTRUMENTATION

Directors: C. ANDREANI - R.G.M. CACIUFFO - R. MCGREEVY

4th Course: *Neutron precession techniques* Directors: P. FALUS – K. HABICHT

30 June - 9 July 2017

INTERNATIONAL SCHOOL OF SCIENTIFIC JOURNALISM AND COMMUNICATION

Director: E. IAROCCI

8th Course: *Unveiling the universe: When science hits the news*

Directors: P. CAMPANA - C. DI GIORGIO

1 - 6 July 2017

INTERNATIONAL SCHOOL OF QUANTUM ELECTRONICS

Directors: A.N. CHESTER - S. MARTELLUCCI

60th Course: Laser-driven sources of high energy particles and radiation

Directors: R.W. ASSMAN - L.A. GIZZI

9 - 19 July 2017

INTERNATIONAL SCHOOL OF LIQUID CRYSTALS

Director: C. ZANNONI

23rd Course: Liquid crystal modelling and simulations: A comprehensive approach

Directors: P. BÎSCARÎ - A. DI CARLO - P. PASINI - C. ZÂNNONI

13 - 19 July 2017

INTERNATIONAL SCHOOL OF ATOMIC AND MOLECULAR SPECTROSCOPY

Director: B. DI BARTOLO

35th Course: *Quantum nano-photonics*

Directors: B. DI BARTOLO - S. GAPONENKO

20 July - 4 August 2017

INTERNATIONAL SCHOOL OF STATISTICAL PHYSICS

Directors: P. HÄNGGI – F. MARCHESONI

12nd Course: X-UV Time resolved spectroscopy and ab-initio methods

Directors: M. CORENO - R. GUNNELLA

22 - 28 July 2017

• INTERNATIONAL SCHOOL OF STATISTICAL PHYSICS

Directors: P. HÄNGGI - F. MARCHESONI

13rd Course: *Model theory of modules, algebras and categories* Directors: A. FACCHINI – S. L'INNOCENTE – M. TRESSL 28 July – 2 August 2017

• INTERNATIONAL SEMINARS ON PLANETARY EMERGENCIES

Chairman: A. ZICHICHI

50th Session – Co–Chairman: T.D. LEE

18 - 24 August 2017

• INTERNATIONAL SCHOOL OF SCIENCE EDUCATION

Director: P. LÉNA

1st Course: Climate change: A challenge for science education

Directors: P. LÉNA – E. PASQUINELLI

1 – 7 September 2017

• INTERNATIONAL SCHOOL ON MIND, BRAIN AND EDUCATION

Directors: A.M. BATTRO – K.W. FISCHER

12nd Course: *Neuroscience and poverty* Directors: A.M. BATTRO – S. LIPINA

1 – 7 September 2017

INTERNATIONAL SCHOOL OF NUCLEAR PHYSICS

Directors: M. BUBALLA - A. FAESSLER - J. WAMBACH

39th Course: Neutrinos in cosmology, in astro, in particle and in nuclear physics

Directors: M. BUBALLA - A. FAESSLER - J. WAMBACH

16 – 24 September 2017

• INTERNATIONAL SCHOOL OF PHARMACOLOGY

Directors: P. MINUZ - G.P. VELO

85th Workshop: Adventures in the lipidome

Directors: G. FITZGERALD - P. MINUZ - C. PATRONO - G.P. VELO

26 – 30 September 2017

INTERNATIONAL SCHOOL OF QUANTUM ELECTRONICS

Directors: A.N. CHESTER - S. MARTELLUCCI

61st Course: Hypersonic meteoroid entry physics

Directors: M. CAPITELLI – G. COLONNA – A. LARICCHIUTA

3 - 8 October 2017

INTERNATIONAL SCHOOL OF CARDIOLOGY

Directors: A. BRANZI – F. FEDELE

19th Workshop: Echocardiography

Directors: F. FEDELE - S. NOVO

9 - 12 October 2017

ADVANCED WORKSHOP OF SPORTS MEDICINE «VINCENZO BAIAMONTE»

11st Workshop: Grow up healthy with sport

Director: F.P. SIELI 12 – 15 October 2017

INTERNATIONAL SCHOOL OF IUS COMMUNE

Directors: M. BELLOMO – O. CONDORELLI – K. PENNINGTON

37th Course: Migrations, Law and Religions in Medieval and Modern Ages

Directors: O. CONDORELLI – F. MARTINO

12 - 16 October 2017

• INTERNATIONAL SCHOOL OF NEUROSCIENCES «SIR JOHN ECCLES»

Directors: P.F. FERRARI - G. RIZZOLATTI

7th Workshop: From activity to interactivity: Harnessing early adaptive neuroplasticity for intervention in atypical

development

Directors: P.F. FERRARI - A. GUZZETTA - R. MONTIROSSO - L. MURRAY

17 – 22 October 2017

INTERNATIONAL SCHOOL OF UROLOGY AND NEPHROLOGY

Director: C. PAVONE

18th Course

Directors: G. CONTI - G. SICA

23 - 27 October 2017

INTERNATIONAL SCHOOL OF STATISTICAL PHYSICS

Directors: P. HÄNGGI – F. MARCHESONI

14th Course

Director: F. MARCHESONI 28 October – 3 November 2017

• INTERNATIONAL SCHOOL OF EPIDEMIOLOGY AND PREVENTIVE MEDICINE «GIUSEPPE D'ALESSANDRO»

Directors: G.M. FARA - G. GIAMMANCO - M. SZKLO

51st Course: Literacy, emotions and evidence: three elements for an effective communication in public health

Directors: L.R. BIASIO - A. CARDUCCI - P.L. LOPALCO

3 – 9 November 2017

INTERNATIONAL SCHOOL OF ETHOLOGY «DÁNILO MAINARDI»

Director: S. PARMIGIANI

41st Course: Theory and methods for observing and measuring dog's social behaviour

Directors: S. PARMIGIANI – E. PRATO PREVIDE – P. VALSECCHI

11 – 16 November 2017

INTERNATIONAL SCHOOL OF MEDICAL SCIENCES

Directors: A. ZICHICHI - I. CARRECA

154rd Course: *Oncology and Geriatry: From bench to bedside*

Directors: I. CARRECA - C. CARÚSO - A. GIORDANO - A. RUSSO

24 – 26 November 2017

• INTERNATIONAL SCHOOL OF BRAIN CELLS AND CIRCUITS «CAMILLO GOLGI»

Directors: E. D'ANGELO - C. GANDINI WHEELER-KINGSHOTT

3rd Course: From cell physiology to integrated brain signals and emerging brain functions

Directors: E. D'ANGELO - C. GANDINI WHEELER-KINGSHOTT

29 November – 3 December 2017

8th CONFERENCE ON CENTRO FERMI PROJECTS – THE EEE PROJECT – SCIENCE IN THE HEART OF THE YOUNG

Directors: L. CIFARELLI - A. ZICHICHI

6 – 8 December 2017

• INTERNATIONAL SCHOOL OF THORACIC MEDICINE

10th Course: *Interstitial lung diseases*

Director: C. VANCHERI 9 – 14 December 2017

More information about the activities of the Ettore Majorana Foundation can be found on the WWW at the following address:

http://www.ccsem.infn.it