

## SIC Symposium Palermo, 18 – 22 September 2023 – *Preliminary Program*

19 July 2023

### **Mo, 18 Sept. (Palazzo Steri, Rectorate)**

14.30 Registrations

15.00 Opening ceremony (welcoming addresses)

15.30 – 17.30 Parallel sessions (2)

Session A (15.30 – 17.30)

#### **Decolonising the Past, Present, and Future of Scientific Instrument Studies (1)**

*Organized by Silke Ackermann, JC Niala, Jahnavi Phalkey and Helmuth Trischler*

Chair: *JC Niala (History of Science Museum, Oxford)*

1) On Decolonisation and the Museum

*Jahnavi Palkey (Science Gallery Bengaluru)*

2) What is 'Islamic Science' exactly?

*Silke Ackermann (History of Science Museum, Oxford)*

3) Safekeeping as an Alternative to Acquisition

*David Pantalony (Ingenium, Ottawa)*

4) (De-)colonising the Deutsches Museum: Coping with the material culture of colonial scientific objects

*Helmuth Trischler (Deutsches Museum Munich)*

5) The VoH Database: An effort to reassess the transfer of astral knowledge across Eurasia before 1700

*Rana Brentjes (Max Planck Institute for the History of Science)*

Session B (15.30 – 17.30)

#### **Educational Demonstrations, Projects, Investigations and Experiences with Historical Scientific Instruments (1)**

*Organized by Elizabeth Cavicchi and Panagiotis Lazos*

Chair: TBC

1) The Museum: Hands-off or Hands-on?

*Jan Waling Huisman (Museum of the University of Groningen)*

2) Much ado about science!

*Flora Paparou (Upper High School of Vrillissia, Greece)*

3) Educational activities with the mathematical machines at school and at the University Museum  
*Michela Maschietto (University of Modena e Reggio Emilia)*

4) Unifying integragraphs and transcendental curve tracers: a new pedagogical device collecting a historical legacy

*Pietro Milici (University of Padua)*

5) Students of Today meet Students of the Past through their instruments, notebooks and themselves

*Elizabeth Cavicchi (Edgerton Center, MIT)*

18.00 Welcome reception

## **Tue, 19 Sept (Faculty of Theology)**

9.00 – 9.30 Post up of posters

9.30 – 11.30 Parallel sessions (2)

Session A (9.30 – 11.30)

### **Decolonising the Past, Present, and Future of Scientific Instrument Studies (2)**

*Organized by Silke Ackermann, JC Niala, Jahnvi Phalkey and Helmuth Trischler*

Chair: *Helmuth Trischler (Deutsches Museum Munich)*

1) Mahogany in the collection of the History of Science Museum

*Helen Pooley (History of Science Museum, Oxford)*

2) The “Coimbra” Portuguese mariner’s astrolabe: the instrument and notes on decolonisation

*Pedro Júlio Enrech Casaleiro (University of Coimbra)*

3) Objects as Arbiters of Justice: Weights and Measures from the Madras Presidency, 1798 – 1856

*Senthil Babu & Roland Wittje (French Institute of Pondicherry and IIT Madras)*

4) Scientific instruments for measuring the human body and their ideological use in the 19th century

*Fotini Asimakopoulou (University of Athens)*

5) Italian Cosmic-ray researches in Eritrea in the 1930s

*Sofia Talas & Fanny Marcon (Museo Poleni, Padua)*

Session B (9.30 – 11.30)

### **Educational Demonstrations, Projects, Investigations and Experiences with Historical Scientific Instruments (2)**

*Organized by Elizabeth Cavicchi and Panagiotis Lazos*

Chair: TBC

1) Primary student teachers' engagement with a historical orrery in the context of informal science education

*Panagiotis Lazos, Constantina Stefanidou & Constantine Skordoulis (National and Kapodistrian University of Athens)*

2) From Cataloguing to Enhancement: how to involve high school students in cultural heritage management. The example with the ancient scientific instruments collections of the University of Catania

*Silvia Majorana, Maura Fugazzotto & Germana Barone (University of Catania)*

3) The Human Body as Scientific Instrument. An educational approach

*George N. Vlahakis & Konstantinos Konstantopoulos (Hellenic Open University)*

4) Biological composite instrumentation in the service of biology education

*Thomas McCloughlin (Dublin City University)*

5) The path of the PARABOLA

*Linnéa Bergsträsser (Europa Universität Flensburg)*

11.30 – 12.00 Coffee break

12.00 – 14.00 **Poster Session**

Chair: *Roland Wittje*

*In alphabetical order of (first) authors:*

1) The historical collections of scientific and didactic instruments of the Palermo Museum of Mineralogy

*Sergio Calabrese, Filippo Brugnone, Lorenza Li Vigni & Paolo Ferla (Università degli Studi di Palermo)*

2) The Visualization of Scientific Instruments on the Web

*Carlos Adriano Cardoso & Décio Martins (Coimbra University)*

3) The Ramsden Circle: some iconographic representations

*Ileana Chinnici & Manuela Coniglio (Osservatorio astronomico di Palermo)*

4) From a Prince to an Observatory, from 'The Leopard' to a museum: the many lives of a telescope in Palermo

*Manuela Coniglio (Osservatorio astronomico di Palermo)*

5) Exchange between the observatories of Palermo and Greenwich: knowledge, data, instruments

*Louise Devoy (Royal Museums Greenwich) & Ileana Chinnici (Osservatorio astronomico di Palermo)*

6) Instruments from the Vatican Spectrochemical Laboratory

*Richard D'Souza (Vatican Observatory)*

7) A Multispectral Examination to Identify Historical Tintype Photographs

(Part of the organized session Open Challenges in the Conservation of Scientific Instruments)

*Medhat Eldabaa (Fayoum University, Egypt), Rasha Shaheen (Egyptian Museum, Cairo) & Youssef Hany Elreweny*

8) A Dough Kneader for your Laboratory: Farinograph and Bread-Making Research in Turkey between 1930-1950

*Barişcan Ersöz (Istanbul University)*

- 9) L'équatorial photographique de l'Observatoire d'Alger  
*Zaki Cherif Grigahcène, Hamid Sadsaoud & Ahmed Grigahcène (Centre de Recherche en Astronomie, Astrophysique et Géophysique, Algiers)*
- 10) How pure was Istanbul's air in the eighteenth century? Spallanzani's eudiometric measurements in Istanbul  
*Özge Hazar (Istanbul University)*
- 11) Alessandro Torlonia's telescope, made by Angelo Lusvergh: Preservation measures before exhibition  
*Tiziana Macaluso (Osservatorio Astronomico di Roma)*
- 12) The "Impossible" Circle  
*Filippo Mirabello, Maria Rosalia Carotenuto & Aurelio Agliolo Gallitto (University of Palermo)*
- 13) Turn of the century massification in Italian education through the lab looking glass: a biography of the physics teaching aids of the MuSEd ISMA fund  
*Rossella Mortellaro (MuSEd, Roma Tre University)*
- 14) Lahore's contribution to scientific instrumentation  
 (Part of the organized session Scientific instrumentation in pre- and early-modern Islamicate societies. Astrolabes and what else?)  
*Mubashir Ul-Haq Abbasi (National University of Science and Technology, Islamabad)*
- 15) Contribution of Gandhara civilization in development of medical tools  
 (Part of the organized session Scientific instrumentation in pre- and early-modern Islamicate societies. Astrolabes and what else?)  
*Naila Abbasi (Abasyn University, Islamabad)*
- 16) Study and restoration of four chemistry didactic poster from late XIX century  
 (Part of the organized session Open Challenges in the Conservation of Scientific Instruments)  
*Angelika Ansaldo Patti, Bartolomeo Megna & Antonella Maggio (University of Palermo)*
- 17) Hazards in the Science Collections  
*Tacye Phillipson (National Museums Scotland)*
- 18) Artistic projects around the collections of old and contemporary scientific instruments (PATSTEC mission in Brittany) of the Rennes's University  
*Julie Priser & Dominique Bernard (Université de Rennes)*
- 19) Les instruments scientifiques du premier laboratoire universitaire français de psychologie expérimentale  
*Christophe Quaireau & Julie Priser (Université Rennes 2)*
- 20) Restoration of Giuseppe Pagano's portrait  
 (Part of the organized session Open Challenges in the Conservation of Scientific Instruments)  
*Sabrina Sottile, Antonella Tarantino, Megna Bartolomeo, Sabrina Carrozza, Laura Guastella & Elisa Milanese (University of Palermo)*
- 21) The 3D digital modeling of instruments of the Museo della Specola  
*Salvatore Speziale (Osservatorio astronomico di Palermo)*
- 22) What do scientific instruments withhold? The preservation of use  
 (Part of the organized session Open Challenges in the Conservation of Scientific Instruments)  
*Isabel Tissot & Marta Manso (LIBPhys-UNL, Portugal)*
- 23) The astronomical instruments of the Abbey of San Martino delle Scale

*Maria Luisa Tuscano (Independent scholar)*

24) Instruments and Archive from the First Poland Cryogenic Laboratory, c. 1881-1927  
*Ewa Wyka (Jagiellonian University Museum)*

14.00 – 15.30 Lunch

15.30 – 17.30 Parallel sessions (2)

Session A (15.30 – 17.30)

### **20<sup>th</sup> Century Instruments**

Chair: TBC

1) Making Eddington's instruments visible at the solar eclipse station in Principe, 1919  
*Luís Artur Marques Tirapicos, Samuel Gessner & Duarte Pape (University of Lisbon)*

2) The Birth and Development of Magnetron Technology in China (1940-1990)  
*Zhao Ke, Nianci Wang & Hongyin Lv (University of Electronic Science and Technology of China, Chengdu)*

3) Cancer research through the Iron Curtain: Manfred von Ardenne, Felix Wankel and a very expensive "bathtub"  
*Martin Weiss (TECHNOSEUM Mannheim)*

4) Automated Interplanetary Station (AIS) 'Venus-4' Landing Module  
*Gergana Todorivna Ivanova (State Polytechnic Museum, Kyiv)*

5) Glimmer in the Dark: The History of China's First Silicon Target Vidicon  
*Nianci Wang & Zhao Ke (University of Electronic Science and Technology of China, Chengdu)*

Session B (15.30 – 17.30)

### **Time Measuring Through Ages, Cultures and Contexts**

Chair: TBC

1) The landscape as a scientific instrument. Meton's observations from the Pnyx to determine the length of the solar year  
*Efthymios Nicolaidis (National Hellenic Research Foundation)*

2) A Case Study on a 17th-century Ottoman notebook on sundials: the Risâle-i tersim-i alât-ı hey'et  
*Gaye Danişan (Istanbul University)*

3) Horse races, falling stars and artillery: Measuring thirds (60th of a second) around 1800 ... or thoughts on the prehistory of Hipp's chronoscope  
*Richard L. Kremer (Dartmouth College)*

4) Catalogue des instruments astronomiques et de mesure du temps en Algérie  
*Ahmed Grigahcène, Hamid Sadsaoud & Zaki Cherif Grigahcène (Centre de Recherche en Astronomie, Astrophysique et Géophysique, Algiers)*

17.30 Visits to the collections

19.00 Early Career Scholars' Dinner

## Wed, 20 Sept (Faculty of Theology)

9.30 – 11.30 Parallel sessions (3)

Session A (9.30 – 11.30)

### **Scientific instrumentation in pre- and early-modern Islamicate societies. Astrolabes and what else? (1)**

*Organized by Taro Mimura and Petra G. Schmidl*

Chair: TBC

1) Rare Instruments in Textual Sources: Theoretical or Materialized

*Taha Yasin Arslan (Istanbul Medeniyet University)*

2) Conceptualising Alchemical Instruments in Byzantine and Early Islamicate Sources

*Vincenzo Carlotta (Università di Bologna)*

3) Islamic surgical instruments. Between ideal and reality

*Fabian Käs (University of Cologne)*

4) Political Role of the Armillary Sphere in the Fatimid Dynasty

*Taro Mimura (University of Tokyo)*

5) An accessory instrument to the astrolabe, made by a 10th-century craftsman

*Pouyan Rezvani (Bayerische Akademie der Wissenschaften)*

Session B (9.30 – 11.30)

### **Collections**

Chair: TBC

1) A Path between Continuity and Innovation: The Instruments of the Laboratory of Physics at Politecnico di Torino

*Margherita Bongiovanni & Emma Angelini (Politecnico di Torino)*

2) Crossroads of material culture in university scientific heritage

*Lubia Díaz Bernal (University of Havana)*

3) Beyond the original functionality. Mechanical artifacts from scientific collections in Mexico: what is preserved?

*Laura Olivia Ibarra Carmona (Independent researcher)*

4) Huth and Parrot laboratories in Tartu/Dorpat

*Lea Leppik (University of Tartu Museum)*

5) The birth of the Astronomical and Copernican Museum in Rome

*Francesco Poppi, Marco Faccini & Giangiaco Gandolfi (INAF - Astronomical Observatory of Rome)*

Session C (9.30 – 11.30)

**Instrument Making and Makers**

Chair: TBC

1) Tools of Knowledge: tracking scientific instruments and their makers over time and space  
*Rebekah Higgitt, Alex Butterworth, Duncan Hay & Sarah Middle (National Museums Scotland)*

2) Interpreting silences and overturning assumptions: women in the instrument trade of 18th-century London

*Alexi Baker (Yale Peabody Museum)*

3) Instruments to think the personal equation

*Loïc Jeanson (University of Lausanne)*

4) What does "achromatic" mean? Refractions on the construction of early achromatic telescope lenses

*Marvin Bolt (Technische Universität Berlin) & Michael Korey (Staatliche Kunstsammlungen Dresden)*

5) On a 17th century grinding machine invented in a Capuchin monastery and corresponding very special lenses found in early Dutch telescopes

*Wolfgang Engels (HistEx GmbH)*

11.30 – 12.00 Coffee break

12.00 – 14.00 Parallel sessions (2)

Session A (12.00 – 14.00)

**Scientific instrumentation in pre- and early-modern Islamic societies. Astrolabes and what else? (2)**

*Organized by Taro Mimura and Petra G. Schmidl*

Chair: TBC

1) The Algier workshop of astrolabes and an overview of Maghribi astrolabes

*Petra G. Schmidl (Friedrich-Alexander-Universität Erlangen-Nürnberg) & Jan P. Hogendijk (Formerly University of Utrecht)*

2) The role of Arabic sources in the analysis of ancient timekeeping instruments

*Anette Schomberg (Charité, Berlin)*

3) An English Quadrant in 18th century Morocco: an anonymous Arabic translation of John Hadley's Treatise

*Justin Stearns (New York University, Abu Dhabi)*

4) Timekeeping Practices in Cultural Context: Two Astrolabic Quadrants by Mizzi & Sutton

*Enes Tepe (Europa Universität Flensburg)*

5) Khujandī's 'Comprehensive Instrument'  
*Bezanur Topçuoğlu (Istanbul Medeniyet University)*

Session B (12.00 – 14.00)

**19<sup>th</sup> and 20<sup>th</sup> Century Instruments**

Chair: TBC

1) Les instruments du cabinet de physique du Lycée Saint-Joseph d'Istanbul  
*Feza Günergun (Istanbul University)*

2) 150 Years theory of image formation in the microscope  
*Timo Mappes (Deutsches Optisches Museum, Jena)*

3) *Training the Modern Physician: The Introduction of the Ophthalmoscope in Medical Education (1850-Early 20th Century)*  
*Corinne Doria (The Chinese University of Hong Kong in Shenzhen)*

4) An Early X-Ray Machine in the Ottoman Empire by Esad Feyzi and Osman Rifat  
*Kevser Rukiye Karabuğa Hatipoğlu (Istanbul Medeniyet University)*

5) From the Mines to the Museum: Vilhelm Carlheim-Gyllensköld  
*Karl Grandin (Royal Swedish Academy of Sciences)*

14.00 - 15.30 Lunch

15.30 – 17.30 Parallel sessions (2)

Session A (15.30 – 17.30)

**Visual Representations: Models, Drawings, Photography and Paintings**

Chair: TBC

1) Knowing by drawing: geometric material models, graphical representations, and instruments in 19th century France  
*Frédéric Brechenmacher (École polytechnique, Palaiseau)*

2) On the Representation of Geometric Solids in Different Contexts  
*Peggy Aldrich Kidwell (Smithsonian Institution)*

3) Illustrating the Unknown - Visual representation of demonstration & research in the collections of the Royal Institution of Great Britain  
*Charlotte New (Royal Institution)*

4) Scientific Instruments, Art and Photography: the study of clouds from nineteenth to early twentieth century  
*Maria Estela Jardim (University of Lisbon)*

5) Lauding science through Veloso Salgado's artworks at the University of Porto  
*Marisa Monteiro (University of Porto)*

Session B (15.30 – 17.30)

### **Mid-18<sup>th</sup> to mid- 19<sup>th</sup> Century Instruments**

Chair: TBC

1) Paper or Brass? A budget instrument from the mid 18th century. Johan Törnsten's observations of the transit of Venus, part 2

*Olov Amelin (Jamtli Foundation, Sweden)*

2) The eudiometer you can use without getting a finger wet

*Jan Tapdrup (Sorø Academy, Denmark)*

3) Analysing and contextualizing John Robison's experiment on the force-distance-relation in electricity (1769?)

*Peter Heering (Europa Universität Flensburg)*

4) A Mysterious Coulomb Torsion Balance in the collections of the Deutsches Museum

*Daniel Liu (Ludwig Maximilian University Munich), Jesse Garrison (University College London),*

*Julien Gressot (University of Neuchâtel) & Elisabetta Rossi (University of Milan)*

5) Nomadic geochemistry in mid-19th century Ottoman Empire: John Lawrence Smith's moving laboratory

*Gönenç Göçmengil (Istanbul University) & Fatma Gülmez Yıldırım (Istanbul Technical University)*

17.30            Visits to the collections

### **Thu, 21 Sept (Faculty of Theology)**

9.30 – 11.30    Parallel sessions (3)

Session A (9.30 – 11.30)

### **Open Challenges in the Conservation of Scientific Instruments (1)**

*Organized by Maria Rosalia Carotenuto, Anna Giatti, Giuseppe Lazzara and Emma Angelini*

Chair: TBC

1) Conservation practices on working instruments. A case study from the Museo Nazionale Scienza e Tecnologia Leonardo da Vinci

*Marianna Cappellina & Luca Reduzzi (Museo Nazionale Scienza e Tecnologia Leonardo da Vinci)*

2) Assessing the conservation status in scientific instrument collections: strategies and tools

*Anna Giatti (Fondazione Scienza e Tecnica, Florence)*

3) An open issue: remove or maintain the alteration layer on the scientific instruments

*Panayota Vassiliou (National Technical University Athens)*

4) Low temperature plasma for protective coatings deposition on metallic cultural heritage assets

*Emma Angelini (Politecnico di Torino)*

5) Master thesis: Study and chosen restoration of ten electrostatic machines from the Rijksmuseum Boerhaave in Leiden

*Mathilde Sneiders (Atelier conservation-restauration Sàrl)*

Session B (9.30 – 11.30)

**Perspectives of Engaging with Instruments (1)**

Chair: TBC

1) Things that Talk: On a new perspective for engaging with scientific instruments

*Ion Mihailescu & Jérôme Baudry (EPFL, Lausanne)*

2) Recollecting collections: using oral histories to create social, sensorial, and emotional histories of school science equipment

*Rosanna Evans (University of Leeds & Science Museum, London)*

3) The Art of Experiences: from the material culture of Nolletian physics to the didactics of Fiscademos (1738-2022)

*Aitor Rodríguez Moreno (Alicante University)*

4) 3D Collection – Making the hidden accessible

*Roberta Flora Spano (ETH Zurich)*

5) Science through the keyhole: revealing scientific practices through workspaces

*Jane Desborough (Science Museum, London)*

Session C (9.30 – 11.30)

**19th Century Instruments**

Chair: TBC

1) A Harmonium with the Mathematically Precise Scale at the Royal Institute of Physics in Rome

*Miriam Focaccia (Museo Storico della Fisica e Centro Studi e Ricerche 'Enrico Fermi') & Giovanni Organtini (Sapienza Università di Roma)*

2) The life process of an Amsler integrator

*Yolanda Muñoz Rey (University of Cádiz)*

3) The Astronomical Spectroscope as a Field Instrument

*Thomas Hockey (University of Northern Iowa)*

4) Crossing contexts: locomotive vibration recorders and seismology in the late 1800s

*Alexandra Rose (Science Museum, London)*

5) Santini, the Meridian Circle and the Paduan Catalogues. The improvement of the modern astrometric data with the use of XIX century stellar catalogues

*Federico Di Giacomo, Simone Zaggia & Valeria Zanini (Astronomical Observatory of Padova)*

11.30 – 12.00 Coffee break

12.00 – 14.00 Parallel sessions (3)

Session A (12.00 – 14.00)

## **Open Challenges in the Conservation of Scientific Instruments (2)**

*Organized by Maria Rosalia Carotenuto, Giuseppe Lazzara and Emma Angelini*

Chair: TBC

1) The lacquering and relacquering of scientific instruments: an interdisciplinary approach to the characterization of layered coatings

*Miriam Truffa Giachet, Julie Schröter Julie & Laura Brambilla (Haute Ecole Arc Conservation Restoration)*

2) "A WARNING FROM MARS". Climate risk assessment in the Museo della Specola, Palermo

*Maria Rosalia Carotenuto, Giuseppe Lazzara, Giuseppe Cavallaro & Bartolomeo Megna (University of Palermo), Dario Camuffo & Antonio della Valle (CNR-ISAC, Padova) & Fernanda Prestileo (CNR-ISAC, Roma)*

3) In situ physicochemical investigations for knowledge and conservation of scientific instruments: case studies

*Leila Es Sebar (Politecnico di Torino)*

4) Preserving the Past, Navigating the Future: Conservation of 19th Century Terrestrial Globe

*Michael Maggen (Former Head of Paper Conservation, Israel Museum)*

5) Preserving Palermo University's scientific legacy

*Marco Di Bella (University of Palermo)*

Session B (12.00 – 14.00)

## **Perspectives of Engaging with Instruments (2)**

Chair: TBC

1) From DATAMI to SCIAME: SciArt Heritage Museum Expanded at JRC Ispra - Site - "Museums as Cultural Hubs: The Future of Tradition"

*Cristina Fiordimela (Politecnico di Milano) & Freddy Paul Grunert (Baltan Laboratories)*

2) What can 16th century artillery instruments tell us as pieces of decorative art?

*Olga Neuymina (Independent scholar, St. Petersburg)*

3) Scientifish or scientific instruments – instruments in technical academia

*Laila Zwisler (Technical University of Denmark)*

4) Reflections from Stephen Hawking's office on the mundane, the ephemeral, and the 'authentic'

*Juan-Andres Leon (Science Museum, London)*

5) The instruments of French Big Science photographed, drawn and ... preserved?

*Jean Davoigneau (French Ministry of Culture)*

Session C (12.00 – 14.00)

## **Late Medieval to Early Modern Instruments**

Chair: TBC

1) Windvanes or astronomical instruments

*Panu Nykänen (Finnish Academy of Technical Sciences)*

2) The concept of globes as instruments in the age of al-Idrisi

*Harald Gropp (Heidelberg)*

3) Equinoctial Armilla Evolved: Taqī al-Dīn Rāṣid's Dhāt al-Awtār  
*Merve Sandallı (Istanbul Medeniyet University)*

4) A clever but short-lived instrument type from fifteenth-century Erfurt: the Theorice Nouvelle  
*Samuel Gessner (University of Lisbon)*

5) Sands of Time: A 16th-Century Treatise on Hourglass  
*Afra Akyol (Istanbul Medeniyet University)*

14.00 – 15.30 Lunch

15.30 – 17.30 Parallel sessions (2)

Session A (15.30 – 17.30)

### **Scientific Instruments in Texts and Archival Sources**

Chair: TBC

1) Extraction of Arrows in Graeco-Roman Antiquity: Instruments and Methods in Texts  
*Hatice Şeyma Selbesoğlu, Tuncay Zorlu & Aytekin Çökelez (Istanbul Technical University)*

2) Scientific Instruments in the Travelogue of Ulrich Jasper Seetzen  
*Meltem Kocaman & Barışcan Ersöz (Istanbul University)*

3) Recent rediscovery of the original manuscript of Cavendish's paper: "To determine the Density of the Earth" (1798)  
*Pierre Lauginie (University Paris-Saclay)*

4) "Falling into a swamp I damaged, alas! not myself, but my last barometer" – Descriptions of scientific instruments and their use in Alexander von Humboldt's correspondence and travel diaries of his expedition to Russia, Siberia and Central Asia in 1829  
*Florian Schnee (Berlin-Brandenburg Academy of Sciences and Humanities)*

5) From inside the archive: modeling the history of the reaction key  
*Alina Volynskaya (EPFL, Lausanne)*

Session B (15.30 – 17.30)

### **Reconstructions and Replications**

Chair: TBC

1) Rediscovering Optics in Ottomans: Taqī al-Dīn's Experiments Replicated  
*Sena Aydın (Istanbul Medeniyet University)*

2) Re-assessing a historic microscope collection through the re-enactment of observations  
*Tiemen Cocquyt (Rijksmuseum Boerhaave)*

3) A 19th century icon at the King's College London: reconstruction and learning from Wheatstone's stereoscopic demonstration apparatus  
*Andreas Junk (Europa Universität Flensburg)*

4) Reconstructing Scientific Discovery – A Case Study of Faraday’s Electric Motor

*David S. Ricketts (Harvard University)*

5) Bringing history to Modern Science Engagement through scientific instruments

*Michael Cutts & Charlotte New (Royal Institution) & David Ricketts (Harvard University)*

17.30 Visits to the collections

## **Fri, 22 Sept (Physics Dept)**

9.30 – 11.30 Parallel sessions (2)

Session A (9.30 – 11.30)

### **Within the Market: On the Identity of Dealers in Scientific Instruments and the Nature of their Commodities**

*Organized by Rossella Baldi, Martina Schiavon and Céline Fellag Ariouet*

Chair: TBC

1) Vendre la précision horlogère à la fin du 18e siècle: les agents de Josiah Emery

*Rossella Baldi (Université de Neuchâtel)*

2) Making Surgical Instruments and Crafting Reputation: The Dynamics of Camillus Nyrop’s Work in Danish Medicine

*Kristin Halverson (KTH Royal Institute of Technology)*

3) The Hartmann comparator: a go-between artillery & sciences instrument

*Martina Schiavon & Céline Fellag Ariouet (Université de Lorraine)*

4) Dealing the ‘Islamic world’ to Europeans: Strategy and identity at the turn of the 20th century

*Sumner Braund (History of Science Museum, Oxford)*

5) The Art Market and Discovery in Mathematical Instruments

*Anthony Turner (Independent scholar)*

Session B (9.30 – 11.30)

### **Early Modern Instruments**

Chair: TBC

1) The Jagiellonian Globe as an early mechanical armillary sphere, a history, provenance, and a technical review

*Małgorzata Taborska (Jagiellonian University Museum)*

2) The Sixteenth-Century Primum Mobile: Instrument, Concept, Data

*Floor Koeleman (University of Lausanne)*

3) **Some** Assembly Required: Instrument Volvelles and Interaction in Giovanni Paolo Gallucci’s *Theatrum mundi et temporis* (1588)

*Stephen Johnston (History of Science Museum, Oxford)*

4) The Mathematical-Physical Cabinet and the Collections of the Early Modern Cologne Jesuits as a University Collection of European Rank?

*Henrike Stein (University of Cologne)*

5) Force, lifting machines, and the perpetuum mobile from Descartes to Smeaton

*Jip van Besouw (Vrije Universiteit Brussel)*

11.30 – 12.00 Coffee break

12.00 – 14.00 Parallel sessions (2)

Session A (12.00 – 14.00)

### **Observatories**

Chair: TBC

1) De l'observatoire astronomique au Laboratoire Temps-Fréquence. Étude, inventaire et patrimonialisation des instruments scientifiques de l'Observatoire de Neuchâtel

*Julien Gressot & Gaetano Mileti (Université de Neuchâtel)*

2) Les quatre instruments principales de l'Observatoire d'Alger

*Hamid Sadsaoud, Zaki Cherif Grigahcène & Ahmed Grigahcène (Centre de Recherche en Astronomie, Astrophysique et Géophysique, Algiers)*

3) The old is reborn: An interwar observatory and astrograph at the crossroads of history

*Monika Ramonaite, Julija Jonusaite & Agne Poskiene (Vilnius University Museum)*

4) Instrumental architecture: Lost and found in the Observatory of Oslo

*Anne Vaalund & Bjørn V. Johansen (University of Oslo)*

5) The Heart of the Observatory: The Stockholm Observatory's 3,5-foot Bird Transit Instrument

*Johan Kärnfelt (University of Gothenburg)*

Session B (12.00 – 14.00)

### **Biographies**

Chair: TBC

1) Charles Fievez, pioneer spectroscopist in Brussels

*Ricardo Manuel Pires Barbosa (Royal Observatory of Belgium)*

2) The surveying instruments and surveying methods by Friedrich Simony

*Petra Svatek (Austrian Academy of Sciences)*

3) Maria Cunitia as a User of Astronomical Instruments and Inspiration to Johannes Hevelius

*Jarostaw Włodarczyk (Institute for the History of Science, Polish Academy of Sciences)*

4) Edward Hutchinson Syngé- Hutchie- The inventor of the near-field optical microscope

*Denis Weaire & John Donegan (Trinity College Dublin)*

5) Curious tides on the Lake of Geneva

*Stéphane Fischer (Musée d'histoire des sciences de Genève)*

14.00 – 15.30 Lunch

15.30 – 17.30 Annual General Meeting of the SIC and Farewell (plenary)

17.30 Visits to the collections

20.00 Conference dinner