

49th ICOHTEC ANNUAL MEETING

“Technology-based and Technology-generated decisions”

24–25 September and 15–16 October 2022

UNIVERSITY OF OSTRAVA, CZECH REPUBLIC (VIRTUAL)

www.icohtec2022.osu.eu

CONFERENCE PROGRAMME

(All times Central European Summer Time)

24 September 2022

8:00–9:30

SESSION 1 – DECISION-MAKING IN MILITARY HISTORY AND TECHNOLOGY

TSZ HO WONG

Japan Wartime Expeditions on Rare-Earth and Chemical Elements and the Manufacturing of War-Related Technologies

YOEL BERGMAN

An exceptional 1982 downing of a fighter jet by the Vulcan Air Defense System- A possible combination of technological-based decisions and human agency?

ALLA LYTVYNKO

Scientific Activities of the National Academy of Sciences of Ukraine at the Russian invasion of Ukraine

9:30–9:45 BREAK

9:45–11:45

SESSION 2 – INDUSTRY AND TECHNOLOGY (1)

SIMONE FARI

Technology-based decisions or Fear-based decisions? Technological unemployment and economic policies to contrast it during the Fourth Industrial Revolution

SYMONE CAMPBELL

EdTech Across the Black Diaspora: Reexamining its Neoliberalist Foundations

KORNILIA PAPANASTASIOU

Adding Artificial Intelligence to Artificial Reproduction: A Historical Perspective

JAN KUNNAS

Lessons From the Past: History in the Anthropocene

11:45–12:15 LUNCH BREAK

12:15–13:45

SESSION 3 – INDUSTRY AND TECHNOLOGY (2)

OLE SPARENBERG

Peat as an overlooked energy resource in 19th century Germany

HAILIAN CHEN

Encountering Western Technology and Engineers: The Failure of a Mining Enterprise in Central China, 1875–1880s

ANNA AGAFONOVA

The First World War and transition to hydropower in the Russian Empire

13:45–14:00 BREAK

14:00–16:00

SESSION 4 – SOCIAL HISTORY AND TECHNOLOGY

ANDREW BUTRICA

“Industrial Nationalism and Napoleonic France”

CYRIL LACHEZE

Establishing a tile factory in 19th century France: technology, social tensions and power issues in commodo and incommodo surveys

CONNOR KA HEI AU YEUNG – US OR HONKONG

Hungered by Thirst: Petrochemical Industry, Research and Security in Early 20th Century East Asia

TOMÁŠ GECKO

Negotiations on the Czechoslovak Patent Court: Power Dynamics, Litigation and Technology Transfers

16:00–16:15 BREAK

16:15–17:45

SESSION 5 – TECHNOLOGY, CULTURE AND DECISION-MAKING

HARALD KLEINBERGER-PIERER

Drawings in decision making – Designs and patents in the Chamber of Commerce Vienna 18th century

SŁAWOMIR ŁOTYSZ

Cinema musicians and transition to ‘talkies’ in Poland, 1920s–1930

KORNILIA PAPANASTASIOUS

Adding Artificial Intelligence to Artificial Reproduction: A Historical Perspective

17:45–18:00 BREAK

18:00–20:00

SESSION 6 – INDUSTRY AND TECHNOLOGY (3): INDUSTRIAL RUINS, INDUSTRIAL HERITAGE, AND THE
TRANSFORMATION OF INDUSTRIAL QUARTERS – PERSPECTIVES OF INDUSTRIAL SITES AFTER DE-
INDUSTRIALIZATION

WAYNE COCROFT

Vanishing technologies – how do we respond to the legacy of late 20th century industry?

STEFAN POSER

Heritage of Rust and Oxidation? History and perspectives of industrial museums after de-industrialization

ROBERT BELOT

The Urbex, or the tribute paid to the industrial ruin

LUC ROJAS

Mining methods: From creation to management of underground mining landscapes in France (18th–21st centuries)

End of Program on 24 September 2022

25 September 2022

08:00–09:30

SESSION 7 – DECISION-MAKING FROM SKY TO SPACE

MARION WECKERLE

A seaplane and its water – technological construction choices and seaplane use in interwar Europe

SABRINA LAUSEN

Decision-making in the cockpits of airliners – Pilots' perspectives on automation in Western Europe and in the Soviet Union, 1960s–1980s

OLENA ZOSIMOVYCH

Ukrainian Satellites for the Needs of Meteorology and the Study of Natural Resources in the 70's – 80's of the 20th century

9:30–9:45 BREAK

9:45–11:45

SESSION 8 – ENERGY AND TECHNOLOGY (1): GAS, ENGINEERS, AND TECHNOLOGY IN LATIN EUROPE UNTIL 1945

MERCEDES FERNÁNDEZ-PARADAS, JUAN MANUEL MATÉS BARCO, ANTONIO JESÚS PINTO TORTOSA
Prosopography of engineers in gas industry in Latin Europe until the 1940s

MERCEDES FERNANDEZ-PARADAS, ISRAEL DAVID MEDINA RUIZ, ANTONIO JESÚS PINTO TORTOSA
Gas engineers, links between France and Spain (circa 1840–1920)

FRANCESC XAVIER BARCA SALOM; JOAN CARLES ALAYO MANUBENS
Gas producer and gas engine in the second half of the 19th century

ALBERTE MARTÍNEZ LÓPEZ; JESÚS MIRÁS ARAUJO
Engineers and the modernization of the gas industry in Latin Europe, 1874–1938

11:45–12:15 LUNCH BREAK

12:15–13:45

SESSION 9 – IT, AI, AND DECISION-MAKING (1):

DEEPAK PRINCE

The Automaton and the mediator: an archaeology of two “Entscheidungsproblems”

SERHII ZHABIN

Cybertonia and hacker movement: subcultures of programmers in USSR and USA

KONSTANTINOS SAKALIS

Imagining a future of decisions made by artificial intelligence, 1940s–present

13:45–14:00 BREAK

14:00–15:30

SESSION 10 – TRACTORS, TRAINS AND DEATH RAYS– ADVANCED TECHNOLOGY AND HIGH
MODERNISM IN EAST ASIA FROM COLONIAL ORIGINS TO COLD WAR FUTURISM, 1930–1980

ERNEST MING-TAK LEUNG

Kolkhoz Under the Imperial Sun – East Asian Collectivisation and Planification, 1878–1978

BEN KLETZER

Getting China Back on Track: Rebuilding and Unifying the Railways through War and Revolution
1945–1952

VIRGINIA L. CONN

Power Stations: Internationalist Scientism in *Death Ray on Coral Island*

15:30–15:45 BREAK

15:45–17:15

SESSION 11 – IT, AI, AND DECISION-MAKING (2)

LUIS VIZCAÍNO

Conceptual analysis of the history of technology as a basis for restructuring technology education

AGNIESZKA DYTMAN-STASIEŃKO

Technology-driven resistance in Poland in the 1980s

LAILA ZWISLER

How computers came to know the world in two ways – making computer models in technical academia in Denmark

17:15–18:15

SESSION 3 – ENVIRONMENT, POLLUTION AND DECISION-MAKING (1)

JOSE SOARES

We must save these waters: the urgency of technology in Portuguese industrial pollution control (1892–1974)

GREGORY AFANASIEV

“The oil inflection” in the energy consumption of the Russian Empire and environmental problems in the late XIX – early XX centuries

18:15–18:30 BREAK

18:30–20:30

KRANZBERG LECTURE

MARIA PAULA DIOGO

Time and Human Agency: how can historians of technology contribute to present day debates?

End of Program on 25 September 2022

15 October 2022

08:00–10:00

SESSION 1 – EDUCATION AND TECHNOLOGY (1): QUANTIFIED CRITIQUE – DIGITAL TECHNOLOGY AND THE CREATION OF SIGNIFICANCE AT UNIVERSITIES

MORITZ MEISTER

Comparative Walkthrough Analysis of CRIS User-Interfaces

FLORIAN BETTEL

Portfolio & Showroom. A hands-on history of technology of research information systems

AGAJA PRZYBORSKI

A praxeological model of media technical communication exemplified by focusing on practices of scientists with CRIS

HANNA LUCIA WORLICZEK

Quantification and Standardised Metrics as Historiographic Tools – The Power and Pitfalls of Bibliometric Analyses for Historical Epistemology

10:00–10:15 BREAK

10:15–11:45

SESSION 2 – EDUCATION AND TECHNOLOGY (2): TECHNICAL EDUCATION IN SPAIN. SOME EARLY EXPERIENCES

ANTONI ROCA-ROSELL

Early steps to technical higher education: a reflect of technological changes?

MARIA MONTAVA-GADEA

The beginnings of technical education in Barcelona: the school of mechanics designed by Francesc Santponç (1808–1821)

M. ROSA MASSA-ESTEVE

The teaching of practical geometry at the Barcelona Royal Military Academy of Mathematics in the eighteenth century

11:45–12:15 LUNCH BREAK

12:15–12:45

POSTER SESSION

TAJANA JAKLENEC

Historical and Contemporary Prefabrication in Croatia

12:45–14:45

SESSION 3 – ENERGY AND TECHNOLOGY (1): TECHNOLOGY, MODERNIZATION, AND THE ENVIRONMENT IN EAST-CENTRAL EUROPE UNDER THE COLD WAR

JOE DJORDJEVSKI

The Technology and the Environment of Tourism in Cold War Yugoslavia

JÍRA JANÁČ

Developing Green Infrastructures in a Red country: Harmonizing Environment and Development in Regional Planning in late-socialist Czechoslovakia

VIKTOR PÁL

Science, Technology, and Recycling in State-socialist Hungary

MICHAELA ZÁVODNÁ

Let them breathe. The technological and ecological aspects of urban transportation in Ostrava region during the Cold War

14:45–15:00 BREAK

15:00–16:30

SESSION 4 – ENVIRONMENT, POLLUTION AND DECISION-MAKING (2): PERSPECTIVES ON THE ANTHROPOCENE

JAMES WILLIAMS

Human agency v. nature's agency

DAVIDE SCARSO

Agency and Political Representation in the Anthropocene

MARIA PAULA DIOGO

The Who's who in the Anthropocene

16:30–16:45 BREAK

16:45–18:15

SESSION 5 – ENVIRONMENT, POLLUTION AND DECISION-MAKING (3): TECHNOLOGY-BASED AND TECHNOLOGY-GENERATED DECISIONS

ANTHONY STRANGES

The Technological Transformation of the 1850s and its Environmental Consequences

PETER WULFF
Radioactive CO₂: a Technology- Based Climate Controversy

ELENA HELEREA
Electrification and Environmental Issues

18:15–18:30 BREAK

18:30–22:00

SESSION 6 – ENVIRONMENT, POLLUTION AND DECISION-MAKING (4): THE ENERGY KNOWLEDGE
CIRCULATION: TECHNOLOGICAL TRANSITIONS AND TRANSBOUNDARY PERSPECTIVES

CARLOS SANHUEZA
Energy and Society: the experts' role

HELGE WENDT
The colonial way into the global coal age

FELIPE TRUJILLO
Energy sources and energy transition discussions. The instituto de ingenieros de Chile's analysis of the future of the Chilean energy matrix (1888–1910)

NELSON ARELLANO
Solar energy techniques in XIX century for sustainability. Inventions, patents, and artifacts in Chile (1872–1930)

CECILIA IBARRA
Transition to hydroelectricity or addition of hydroelectricity to the Chilean energy matrix (1900–1925)?

THOMAS TURNBULL
Toward an Historical Geography of the Chilean Lithium Industry

MARION STEINER
German hydropower in Metropolitan Chile in the first decade of the 20th Century: a local exception from AEG's global business model

End of Program on 15 October 2022

16 October 2022

8:30–10:00

SESSION 7 – ARCHITECTURE AND TECHNOLOGY (1): THE DECISION TO BUILD WITH STEEL –
PREFABRICATED STEEL HOUSES AND THE INNOVATION SYSTEM OF THE STEEL INDUSTRY
(1920s–1970s)

THOMAS SCHUETZ

Steel means progress: Efforts to increase sales in the West German steel industry

SILKE HAPS

PLATAL Plastic-coated steel: from powder boxes to sandwich panels

TOBIAS NOLTEKLOCKE

Historical material research and role of the public materials testing administration (MPA) as element of sector-combining innovation systems

10:00–10:15 BREAK

10:15–11:45

SESSION 8 – ARCHITECTURE AND TECHNOLOGY (2)

ROBIN REHM

Patent and Technology. Architectural Innovation around 1960

HADAS NUR

The construction of a creative agency in the technological era – The case of architects and designers

MATTHIAS BRENNER

The Potential of Digital Fabrication for the Repair of High-Tech Architecture

11:45–12:15 LUNCH BREAK

12:15–13:45

SESSION 9 – INFRASTRUCTURES AND TECHNOLOGY

VLADIMIR KORENSKY

Inland Development of Early Reinforced Concrete in the Russian Empire in the Context of European Knowledge Transfer

LUDOVIT HALLON, MICHAL DURCO, MIROSLAV SABOL

Czechoslovak and Slovak technocracy and technology-based decisions in the interwar period

M. LUÍSA SOUSA

History of technology-based decisions: how recovering forgotten urban mobilities of the past might contribute to policies in cities with low cycling maturity

13:45–14:00 BREAK

14:00–15:30

SESSION 10 – “TO BE OR NOT TO BE.” SCHOLARS IN THE HUMANITIES INVESTIGATING TECHNOLOGY-BASED AND TECHNOLOGY-GENERATED DECISIONS. HOW TO COPE WITH IDENTITY CRISIS

VALENTINA LIMINA

New Technologies for Ancient Landscapes. How technology impacts Archaeology

JACOPO PESSINA

How the Bastion Fort Changed Strategies during the Italian Wars, 1494–1559

SARA ERCOLANI

Catholic Voluntarism between the Fifties and the Seventies: The technological developments that changed the way of presenting the missionary field

15:30–15:45 BREAK

15:45–17:15

ICOHTEC Prize Session

Turriano ICOHTEC Prize

LAUDATION BY DARINA MARTYKÁNOVÁ

Maurice Daumas Prize

Laudation by ELVIRA CALLAPEZ

17:15–17:30 BREAK

17:30–19:30

GENERAL ASSEMBLY

End of Conference