

AGENDA for a workshop on

**The nuclear and social science nexus: challenges and opportunities for speaking
across the disciplinary divide**

December 12-13 OECD NEA

BB Auditorium | 46 Quai Alphonse le Gallo Boulogne Billancourt 92100

Day 1

Coffee 8:30 – 9:00 am

Welcome: 9:00 – 9:05 am Sama Bilbao y León (NEA)

Opening remarks: 9:05 – 9:15 am William D. Magwood, IV (NEA)

Workshop structure and aims: 9:15 – 9:30 am Aditi Verma (NEA) & Markku Lehtonen (Pompeu Fabra University)

Session 1: 9:30 -- 11:00 am Policy

Chair: Arne Kaijser (KTH)

Discussants: Ahmed Abdulla (Carnegie Mellon University), Marianne Fisher (International Atomic Energy Agency)

Pierre-Benoît Joly (IFRIS) & Reza Lahidji (Menon)

The nuclear industry and the conflicting logics of safety, efficiency and openness

Andy Stirling & Phil Johnstone (University of Sussex)

Important hidden interdependencies between support for civil nuclear power and commitments to military nuclear capabilities

Başak Saraç-Lesavre (University of Manchester)

Styles of valuation: Evaluation and valuation of future nuclear investments

Tae Hoon Kim (KTH)

Past lessons for future nuclear technologies in the age of green energy transition: from technological teleology to coexistence

Coffee 11:00 – 11:15 am

Session 2: 11:15 – 12:45 pm Publics

Chair: Claire Mays (Institut Symlog)

Discussants: Kemal Pasamehmetoglu (INL), Denia Djokic (Harvard Kennedy School)

Kapil Patil & Shyamjeet Yadav (Jawaharlal Nehru University)

The Absent Dialogue: Nuclear Power and Social Science Scholarship in India

Nadeem Goussous (Centre Internationale de Formation Européenne)

A Public Perception Analysis for Nuclear Energy: The Case of the Jordanian Controversy

Alexander Neil (Bucephalus Consulting), Todd Allen (Third Way), Duane Bratt (Mount Royal University), Margot Hurlbert (University of Regina), Peter Phillips (University of Saskatchewan), Robert Walker (independent)

Thinking big about small: Using the full lifecycle footprint as an example of a “meaningful engagement” issue

Todd Allen, Suzanne Hobbs Baker, Gabrielle Hoelzle, Carrie Harlow & Aditi Rajadhyaksha (University of Michigan)

A New Methodology for Advanced Nuclear Energy Site Selection for Engagement

Lunch: 12:45 – 1:45 pm

Session 3: 1:45 – 3:15 pm Reactors

Chair: Jeremy Rayner (University of Saskatchewan)

Discussants: Paul Wilson (University of Wisconsin), Claire le Renard (IFRIS)

Allison Macfarlane (George Washington University)

Social Science Insights on Fast Reactors

Sonja Schmid (Virginia Tech)

From “inherently safe” to “proliferation resistant”: New perspectives on reactor designs

Stéphanie Tillement (IMT Atlantique) & Frédéric Garcias (Lille University)

“Back to the future”: The challenge of developing new technologies in intermittent and contested industries

Aditi Verma (NEA)

What can nuclear engineers learn from design studies? A review of the theory and evidence from contemporary American reactor design projects

Session 4: 3:15 – 4:45 pm Waste

Chair: Başak Saraç-Lesavre (University of Manchester)

Discussants: Allison Macfarlane (GWU), Bernard Boullis (CEA)

Andrei Stsiapanau (Vytautas Magnus University)

Public negotiations about nuclear waste geological disposal in Russia

Mito Akiyoshi (Senshu University), William Lawless (Paine College), John Whitton (University of Central Lancashire), Ioan Charnley-Parry (University of Central Lancashire) & William Nicholas Butler (Wofford College)

Effective Decision Rules for Public Engagement in Radioactive Waste Disposal: Evidence from Japan, the United Kingdom, and the United States

Celine Parotte (Spiral Research Center)

A powerless classification system? When the geological disposal option (re)defines radioactive waste categories

Arne Kaijser & Thomas Kaijserfeld (KTH)

No Stronger than Its Weakest Link: The Need for Integrating Social Sciences and Humanities in Organizations Responsible for Radioactive Waste Management

Coffee 4:45 – 5:00 pm

Session 5: 5:00 – 6:15 pm Safety and Culture

Chair: Aditi Verma (NEA)

Discussants: Hideaki Shiroyama (University of Tokyo), Caroline Pike (IAEA)

Elsa Gisquet, Sophie Beauquier & Emilie Poulain (IRSN)

To revisit the safety culture: Toward a new Cultural analysis framework for safety management

Nadezhda Gotcheva (VTT Technical Research Center of Finland)

Management principles and safety culture in complex projects: Insights for stakeholders in Small Modular Reactors Projects

Tatiana Melnitskaia & Alesia Yunnikova (Rosatom Technical Academy)

The Psychological Aspect of Safety Culture: Application of the Theory of Generations for the formation of safety culture among personnel

Cocktail and reception 6:15 – 8 pm

Day 2

8:30-9:00 am coffee

Session 6: 9-10:30 am Learning After Crisis

Chair: Olivier Borraz (Sciences Po)

Discussants: Sonja Schmid (Virginia Tech), Valerie Arnhold (Science Po)

Eri Kanamori (Ritsumeikan University)

“Economizing” TEPCO’s responsibility for the Fukushima Daiichi Nuclear Power Plant Accident

Julius Weitzdörfer (Harvard Kennedy School)

Nuclear law as a (non-)academic discipline

Kohta Juraku (Tokyo Denki University) & Shin-etsu Sugawara (Central Research Institute of Electric Power Industry, Japan)

Structural Ignorance in Nuclear Safety and Emergency Preparedness Controversies: Case of Post-Fukushima Japan

Mariana Lyra (University of Eastern Finland)

Which lessons from recent disasters in the mining industry can be helpful for the challenges in the nuclear industry?

Coffee: 10:30 – 10:45 am

Keynote 10:45am – 12:00 pm

Sheila Jasanoff (Pforzheimer Professor of Science and Technology Studies, Harvard Kennedy School)

Between Dread and Denial: Social Science in the Nuclear Age

Discussants: Pierre-Benoît Joly (IFRIS) & Olivier Borraz (Sciences Po)

Lunch: 12:00 – 1:00 pm

Session 8 1-2:30 pm Pedagogy

Chair: Ian Farnan (Cambridge University)

Discussants: Markku Lehtonen (UPF), Sama Bilbao y Leon (NEA)

Duane Bratt & Brett McCollum (Mount Royal University)

Teaching Nuclear Energy: The Challenges of Interdisciplinarity in the Classroom

Lisa Marshall (North Carolina State University)

Geographies of Energy – A course in sociotechnical decision-making

Denia Djokic (Harvard Kennedy School), Raluca Scarlat (Berkeley) & Marianne Fisher (IAEA)
Perspectives on STS in Nuclear Engineering

Merixell Martell (Merience) & Piotr Stankiewicz (Nicolaus Copernicus University)
The importance of integrating social sciences and humanities in the education of future practitioners. The TEACHENER project

Session 9 2:30 – 4:00 pm Organizational and Institutional innovations

Chair: Maria del Mar Rubio Varas (University of Navarra)

Discussants: Gaston Meskens (SCK-CEN), John Lindberg (World Nuclear Association)

Mariia Iakovleva, Ken Coates & Jeremy Rayner (University of Saskatchewan)
Breaking out of a niche: lessons for SMRs from sustainability transitions studies

Vincent Ialenti (George Washington University)
Mankala chronicles: Nuclear Energy Financing & Cooperative Corporate Form in Finland

Markku Lehtonen (NEA, Pompeu Fabra University)
Framing megaproject pathologies – the NEA and the EPR reactor

Marie Kerveillant (ESSEC), Michaël Mangeon (independent), François Jeffroy (IRSN) & Olivier Saulpic (ESCP)
Nuclear Opening: Hybrid forum or reproduction of a technical dialog between experts? Study of a particular device: the safety option file for CIGEO

Coffee 4:00 – 4:15 pm

Session 10: 4:15- 5:30 pm Research and Praxis

Chair: Christine Fassert (IRSN)

Discussants: Matthew Bunn (Harvard Kennedy School), Egle Rindiviciute (Kingston University)

Olivier Chanton (IRSN), Michael Mangeon (independent) & Alexandre Largier (IRSN)
From concepts to regulatory cognitions and praxis: The long march of a regulatory work about natural hazards

Tom Wellock (US Nuclear Regulatory Commission)
Social Scientists in an adversarial environment: The Nuclear Regulatory Commission and Organizational Factors Research

Susan Molyneux-Hodgson (University of Exeter)

Addressing the Nexus: Approaches to enabling cross-discipline and cross-organizational research and action

Concluding session: 5:30 – 6:30 pm

The future of research at the intersection of nuclear energy and the social sciences

Moderator: Aditi Verma (NEA)
Sonja Schmid (on SIREN)
Stéphanie Tillement (on AGORAS)
Maria del Mar Rubio Varas (on HoNESt)
Daniela Lulache (NEA)
Kemal Pasamehmetoglu (INL)

Organizing committee

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Pierre-Benoît Joly, Laboratoire Interdisciplinaire Sciences-Innovations-Sociétés (LISIS)
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Markku Lehtonen, NEA and Pompeu Fabra University, Barcelona
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