



2024 Earth-Space Symposium on 'Sustainability, Governance, Futures'

Utrecht, The Netherlands
12-13 November, 2024

Co-Hosts:

ERC Project PLANETSTEWARDS - Planetary Stewardship in view
of Earth-Space Sustainability

Utrecht University

Earth System Governance Project



European Research Council
Established by the European Commission



Utrecht
University



Earth
System
Governance

Program Overview

Day 1	November 12 (Tuesday)
Morning Session	
8:30	Registration & welcome coffee
9:00	Opening: PlanetStewards Project & Panel on Earth-Space Systems
10:00	PP 1: Sustainability Governance
10:45	Coffee break
11:15	PP 2: Resource Governance
12:00	Group photo & lunch
Afternoon Session	
13:15	Breaking Captured Futures: Co-Mapping Earth-Space Systems
14:00	PP 3: Ethical & Philosophical Perspectives
15:00	Coffee break
15:30	PP 4: Space Governance Models
16:30	Coffee break
17:00	PP 5: Anticipatory Space Governance
18:00	Evening reception
19:00	Walk to dinner place (optional)
Day 2	
November 13 (Wednesday)	
Morning Session	
8:30	Welcome coffee
9:00	PP 6: Space in Future-Making
10:00	PP 7: Power Dynamics
10:45	Coffee break
11:15	PP 8: Pluriversal & Cultural Perspectives
12:15	Lunch
Afternoon Session	
13:15	Transdisciplinary Panel on Earth-Space Systems
14:00	PP 9: Law & Institutions
15:00	Coffee break
15:30	PP 10: Global Equity
16:30	Coffee break
17:00	Future Space(s) & Strategic Foresight (Parallel Mini-Workshop)
	Constructing Nature in Space (Parallel Mini-Workshop)
17:45	Closing Remarks & Future Activities
18:00	End

Preliminary Program

DAY 1, November 12, 2024 (Tuesday)

8:30 Registration & Welcome Coffee

9:00 **Opening**

Welcome, PlanetStewards Project & Panel on Earth-Space Systems

Xiao-Shan Yap (Chair, Earth-Space Symposium), Director & Principal Investigator, PlanetStewards Project, Utrecht University

Frank Biermann, Founder & Inaugural Chair, Earth System Governance Project; 2024 Volvo Environment Prize Winner; Utrecht University

Pascale Ehrenfreund, President, Committee on Space Research (COSPAR); Former President, International Astronautical Federation (IAF); Co-Chair, Global Future Council on Space of the World Economic Forum (WEF); George Washington University

Tanja Masson-Zwaan, President Emerita, International Institute of Space Law (IISL); Vice President, International Astronautical Federation (IAF); Leiden University

10:00 **Presentation Panel 1: Sustainability Governance**

Space, air, and oceans: Need for cross-institutional coordination to tackle the environmental impact of space debris re-entry

Rania Djojosingito – University of Edinburgh

Sustainably Managing the Triple Planetary Crisis from Space: Disentangling the Astropolitical, (Geo)ecological and Legal Conflicts on Earth

Feja Lesniewska – University of Surrey

Earth-Space sustainability dynamics: Preliminary findings

Lois Miraux

10:45 Coffee Break

11:15 **Presentation Panel 2: Resource Governance**

Synthesizing Frameworks of Sustainability for Futures on the Moon

Marco Janssen – Arizona State University

Protecting extra-terrestrial biodiversity: what space law can learn from protecting biodiversity on Earth

Marjan Ajevski – Open University

Space Resources and the Capitalocene
Thomas Cheney – Northumbria University, Newcastle

12:00 Group Photo & Lunch

13:15 **Breaking Captured Futures: Co-Mapping Earth-Space Systems**
(interactive session)

Jeroen Oomen – Utrecht University (Speaker & Moderator)

14:00 **Presentation Panel 3: Ethical & Philosophical Perspectives**

Resonant (off)worlds. Place-making and 'geoconstructivism' in cosmic imaginations

Paloma Puente-Lozano – University of Madrid

Uncovering a Bridge from Earth-Space to and with Outer-Space

Brit Kolditz – Memorial University of Newfoundland

Environmental policies for lifeless objects

Santiago Vrech – Utrecht University

Situating Astrobiology in a Future-Oriented Earth-Space Governance Model

George Profitiliotis – Blue Marble Space Institute of Science

15:00 Coffee Break

15:30 **Presentation Panel 4: Space Governance Models**

A Green Toolkit for Space: Enabling Sustainable Choices for the UK & Global Space Industry

Rachael Craufurd Smith – University of Edinburgh

The Missing Ingredients for a Polycentric Governance System of Orbital Debris

Jean-Frédéric Morin – Laval University

Enhancing the Role of Games in Space Governance

Anna Hurova

Space for Earth and Earth for Space: Towards a Future Research Agenda for the 18th Sustainable Development Goal

Ioana Bratu – Vrije Universiteit Amsterdam

16:30 Coffee Break

17:00

Presentation Panel 5: Anticipatory Space Governance

The crimes of outer space

Julia Muraszkievicz – University of Amsterdam

Living Amongst the Stars: Conceptualising Freedom of Movement to and from Future Extraterrestrial Human Settlements

Anna Marie Brennan – University of Waikato, New Zealand

Ecocide in Outer Space: Countering Irreversible Harms to the Space Environment

Fiona Naysmith – Open University

Towards Effective Governance: Drawing Lessons to Prevent a Hiroshima in Space

Justine Dousset – Institute of Space Law and Telecommunications Law

18:00

Evening Reception

19:00

Walk to Dinner Place (Optional)

*See next page for Day 2 program.

DAY 2, November 13, 2024 (Wednesday)

8:30 Welcome Coffee

9:00 Presentation Panel 6: Space in Future-Making

From Globalization to Planetization: How Changing the Historical Narrative Can Draw Attention to Earth-Space Sustainability

Brad Tabas – ENSTA Bretagne

From craft to debris: A narrative analysis on how space objects become waste
Vantola Renne – National Land Survey of Finland / University of Lapland

No time for the future? Techniques of Futuring and Conflicting Temporalities in European Space Policy-Making

Nina Klimburg-Witjes – University of Vienna

Socio-technical imaginaries of space utilization in the Anthropocene

Margaux D'Hont – CNES, France

10:00 Presentation Panel 7: Power Dynamics

Cosmolocal production for sustainable space technology

Lucas Lemos – Tallinn University of Technology

Cosmic Commons: Envisioning Governance and Power Dynamics in the Earth-Space Nexus

Srishti Prabakar – Frankfurt University of Applied Sciences

Technological Borders in Space: Taiwan's Pursuit of High-Resolution Satellite Capabilities Amidst Geopolitical Tensions

Yi-Ting Chang – University of Oxford

10:45 Coffee Break

11:15 Presentation Panel 8: Pluriversal & Cultural Perspectives

Star-Spangled Speeches: Spaceflight's Agendas in Asia

Valentine Hoffmann – University of Vienna

Kinship and living in Treaty with outer space

Hilding Neilson – Memorial University of Newfoundland & Labrador, Canada

How to stop Captain Kirk becoming the next Cortez, Coen or Cook

Adrian Young – To70; Leiden University Graduate

Politics of space-making: The role of responsibility and ethics in the multi-planetary paradigm

Claudiu Martin – Complutense university of Madrid

12:15 Lunch

13:15 **Transdisciplinary Panel on Earth-Space Systems**

ESA's Zero Debris Approach

Francesca Letizia – European Space Agency (ESA), ESTEC

Protecting Lunar Sites of Extraordinary Scientific Importance (SESIs)

Martin Elvis – Harvard University; International Astronomical Union (IAU)

Planetary Public Stack

Miha Turšič – Waag Futurelab

14:00 **Presentation Panel 9: Law & Institutions**

Integrating Outer Space into the Regulatory Regime for Environmental Protection to Promote Earth-Space System Governance

Merve Burger – University of Neuchatel

Protecting Ocean Ecosystems from Outer Space Activities: Reflections on regime interaction after the Recent Advisory Opinions of the International Tribunal for the Law of the Sea

Vito De Lucia – Norwegian Centre for the Law of the Sea

Legal Issues of Space Resource Activities: The path towards a new international legal framework?

João Marques de Azevedo – NOVA School of Law

The international legal framework on the utilization of remote sensing satellites in the event of a disaster: analysis of the Copernicus emergency management service and its contribution in the response to the wildfire in Chile

Elisa Leoni – Centre for Higher Defence Studies (Casd) - School Of Advanced Defence Studies (Ssuos)

15:00 Coffee Break

15:30 **Presentation Panel 10: Global Equity**

The North-South Structure of the Global Satellite Industry

Florian Rabitz – Vilnius University

The global construction of the “satellite imperative”: the unique properties of space-based solutionism and its implications for the Global South
Aleksandar Deejay – The Australian National University; Australian Centre for Space Governance

Earth Observation as a Tool to Advance Neocolonial Regimes: The Case of Africa
Smit Rajshekhar Patel

Making Polycentric Governance Work for Earth-Space Sustainability
Philippe Evoy – Université Laval and VU Amsterdam

16:30 Coffee Break

17:00 **Future Space(s): Strategic Foresight** (Parallel Mini-Workshop)
Philipp Kürten – University of Vienna

Constructing Nature in Space (Parallel Mini-Workshop)
Timothy Pape – Bowling Green State University

17:45 **Closing Remarks & Future Activities**
Xiao-Shan Yap – PlanetStewards Project, Utrecht University

18:00 End

* Two creative contributions by Sebastian Levar Spivey (University of Twente) and Athanasios Tsarouchas (Maastricht University) will also be displayed/ presented at the symposium.