

# S.NET 2018

*Anticipatory Technologies: Data and Disorientation.*



**Society for the Studies of New and Emerging Technologies  
Annual Meeting, June 25-27, 2018**

**Faculty of Arts and Social Sciences  
Maastricht University  
Netherlands**

# Practical Information

## Conference Location

The conference venue is the Faculty of Arts and Social Science, Grote Gracht 90-92, Maastricht. The plenary sessions are in the Turnzaal, and three rooms are available for the parallel sessions. The rooms can be found by following the respective color (red, blue or green).

## Registration Desk

The conference registration desk is at the entrance of the conference venue, Grote Gracht 90-92, Maastricht, and will be staffed throughout the conference. In case of emergency you may call Dani Shanley, +31 6 11409083.

## Meals

On Monday, Tuesday and Wednesday a buffet lunch will be provided in the Turnzaal. Breakfast and dinner are on your own. Maastricht offers a variety of restaurants in walking distance from the conference venue. A map of the inner city is provided with your registration packet.

## Special events

Those who arrive on Sunday may join us with a welcome drink, Sunday 24 June, 18.00 hrs, at *Petit Cafe Moriaan*, Stokstraat 12, Maastricht.

A *walking tour* through Maastricht is organized on Tue 26 June, 18.00 – 19.30 hrs. The tour ends at the venue of the Conference Dinner, which is close to the conference venue itself. Many other restaurants are in the vicinity, too.

The *Conference Dinner* on Tue 19.30 – 22.00 will be at Thiessen Wijnkoopers, a winery and restaurant at Grote Gracht 18, close to the conference venue.

## Internet Access

Maastricht University has WiFi available. Those with an *Eduroam* account will log in automatically. Others may send an SMS (text message) with the keyword “SNET” to phone number +31 6 35 777 876. You will receive a user name and password to log in to the Eduroam network.

# Day 1

Monday, June 25

- 11.00 – 12.30      Registration and lunch  
Grote Gracht 90-92
- 12.30 – 12.40      Welcome by Prof. Martin Paul,  
*President of Maastricht University*  
Room: Turnzaal
- 12.30 – 14.00      Keynote Address: Marjolein van Asselt  
Investigation in the digital era  
Room: Turnzaal
- 14.30 – 16.00      Session 1A  
Working with Responsible Research and  
Innovation  
Room: Spiegelzaal (Red)  
Moderator: Conor Douglas

*Looking Forward, Looking Back: The Emerging History  
of Responsible Research and Innovation*  
Danielle Shanley

*The affordances of a distributed biotechnology centre  
in fostering RRI*  
Raffael Himmelsbach, Heidrun Åm

*Responsible Research and Innovation activities in  
investigator driven versus societal challenge research  
programmes of Horizon 2020: a first report from the  
NewHoRRizon project*  
Michael Bernstein, Fern Wickson

14.30 – 16.00

## Session 1B

### Understanding and Addressing the Challenges of RRI in Industry

Room: 0.001 (Blue)

Moderator: Maria J. Maia

*Experience in trying to involve industry in RRI project: Really supporting RRI vs just another socially desirable project?*

Steven Flipse

*PRISMA: The Evolva case*

Lotte Asveld

*RRI and Industry: a pilot project*

Ibo van de Poel

*Obstacles to RRI in Synthetic Biology*

Karsten Bolz, Hadewych Honné

14.30 – 16.00

## Session 1C

### Artificial Intelligence, converging technologies, and disorientation

Room: 0.039 (Green)

Moderator: Tamar Sharon

*Artificial Intelligence Technologies and Decision Disorientation: Why Ontology Matters for Anticipating the Societal, Ethical and Legal Impacts of Artificial Intelligence Products*

Martin Cunneen, Martin Mullins

*Google, Health, and Epistemic Injustice within the Infosphere*

Theodore Stone

*Unravelling the Revolution of Converging Technologies*

Dominique Nijssen

16.00 – 16.30 Coffee Break

16.30 – 18.00 Session 2A  
Medical Science and Technology

Room: Spiegelzaal (Red)

Moderator: Darian Meacham

*Aligning to variable and shifting (user-) settings in developing point-of-care diagnostics for tuberculosis and HIV*

Nora Engel

*Making space for aging in place*

Susanne Oechsner

*From reproducibility to reusability: building an open infrastructure for biology*

Ana Maria Delgado

16.30 – 18.00 Session 2B  
Approaches and their Critics

Room: 0.001 (Blue)

Moderator: Fern Wickson

*Anticipation as Social Process: Scanning Society for Grasping the Future*

Luciano D'Andrea

*Macro-anthropology of emerging technologies*

Arie Rip

*Assessment of RRI – beyond indicator development*

Ingeborg Meijer

16.30 – 18.00

Session 2C

Practicing Responsible Research and  
Innovation

Room: 0.039 (Green)

Moderator: Clare Shelley-Egan

*Risk, Regulation and Responsible Innovation of  
Nanomaterials: Developing an Adaptive Risk  
Governance Framework*

Maurice Brennan

*Biorefinery design for Sustainability, an early stage  
responsible innovation activity*

Mar Palermos Parada

*Parens Patriae and Scientists in the Regulatory  
Penumbra*

Frederick Klaessig

18.00 – 20.00

Drinks (at conference venue)

## Day 2

Tuesday, June 26

9.00 – 10.30      Keynote Address: Cyrus Mody  
When Do/Did High-Tech Organizations  
Become More (or Less) Responsible  
Room: Turnzaal

10.30 – 11.00      Coffee Break

11.00 – 12.30      Session 3A  
Safeguarding the reliability of digitized  
knowledge in knowledge repositories I  
Room: Spiegelzaal (Red)  
Moderator: Tsjalling Swierstra

Special format session: Interactive Panel  
Tsjalling Swierstra, Bjørn K. Myskja, Rune Nydal,  
Anamika Chatterjee, Giovanni De Grandis,  
Annamaria Carusi

11.00 – 12.30      Session 3B  
Deliberation and Imagination  
Room: 0.001 (Blue)  
Moderator: Marianne Boenink

*A Social Lab on RRI in 'Marie Curie': organizing a  
reflexive arrangement for furthering responsibility in  
research and funding practice*

Anne Loeber

*Emerging technologies and the challenges of the  
public sphere*

Lotte Krabbenborg

*Anybody home? A modest proposal for complete mobility*

Clemens Driessen, Lauren Wagner

11.00 – 12.30

Session 3C

Changing Discourses of Innovation

Room: 0.039 (Green)

Moderator: Christopher Coenen

*Social Innovation Research, an Emerging Scientific Discipline?*

Rick Hölsgens

*Disruptive Innovation: Making Sense of a Contested Concept*

Darryl Cressman

*Technology in the Age of Innovation*

Lucien von Schomberg

12.30 – 14.00

Lunch, business meeting S.NET

14.30 – 16.00

Session 4A

Safeguarding the reliability of digitized knowledge in knowledge repositories II

Room: Spiegelzaal (Red)

Moderator: Tsjalling Swierstra

Special format session: Interactive panel

Ane Møller Gabrielsen, Sophia Efstathiou, Lars Øystein Ursin, Berge Solberg, Asle Kiran



14.30 – 16.00

## Session 4B

### Industrial Responsible Research and Innovation

Room: 0.001 (Blue)

Moderator: Maria Maia

*Developing incentives for responsible research and innovation in the field of automated vehicle development*

Steven Flipse

*Risk and Safety Considerations from the Bioengineering Field – A Comparison Study*

Britte Bouchaut

14.30 – 16.00

## Session 4C

### Governing the Future

Room: 0.039 (Green)

Moderator: Nora S. Vaage

*Machine Morality: Ethical Agency and the Future of Governance*

Sylvester A. Johnson

*Critical voices in the light of RRI - Societal engagement as an anticipatory technique*

Daniela Fuchs

*Anticipating Alzheimer's Futures: the Promise of Biomarkers versus Current Ways and Values of Anticipation among Patients and their Informal Carers*

Karen Nielsen

14.30 – 16.00

Session 4D

Assessment of Engaged Social Science Research

Room: Turnzaal

Moderator: Harro van Lente

*Engaged Social Science Research in Nanoscale Science and Engineering Communities: An Assessment of the Center for Nanotechnology in Society at Arizona State University*

Erik Fisher

*Ten years later: Flemish Technology Assessment is dead. Long live Responsible Research and Innovation*

Michiel Van Oudheusden

*The NanoNextNL Programme - Lessons and Legacies*

Harro van Lente

*Parliamentary technology assessment facilitated by ITAS-KIT*

Christopher Coenen

16.00 – 16.30

Coffee Break

16.30 – 18.00

Session 5A

Collaborative Histories: an STS Community Considers the Nano Social Science of the Past Ten Years

Room: Spiegelzaal (Red)

Moderator: Cyrus Mody

Special format session: Interactive Panel

Erik Fisher, Arie Rip, Cyrus Mody, Harro van Lente, Michiel Van Oudheusden, Steven Flipse, Christopher Coenen

16.30 – 18.00

## Session 5B

### Medical Imaginaries

Room: 0.001 (Blue)

Moderator: Roger Strand

*How might coverage Decision-makers respond to future challenges and uncertainties related to drugs for rare diseases? Findings from a Canadian scenario study*

Conor Douglas

*Synthetic biology, iconoclasm and imagination: The synthetic cell as a techno-scientific mandala*

Hub Zwart

*Anticipation of the future and responsibility taking in technology assessment and in medical prognostics*

Marianne Boenink

16.30 – 18.00

## Session 5C

### Human Genome Reaching Out

Room: 0.039 (Green)

Moderator: Tamar Sharon

*Creative approaches for engaging museum visitors in disorienting technologies: the case of human genome research*

Lucia Martinelli

*Auspicious, Anxious or Ambiguous Enactments? Studying the Socialisation of NET through News Media*

Gisle Solbu, Knut H. Sørensen

*Gene Editing for Everyone? Discourses of DIY Biology's Involvement with an Emerging Technology*

Nora S. Vaage

18.00 – 19.30

Walking Tour

19.30 – 22.00

Conference Dinner

Restaurant / Winery Thiessen Wijnkoopers,  
Grote Gracht 18

## Day 3

Wednesday, June 27

9.00 – 10.30

### Session 6A

#### Local and Global

Room: Spiegelzaal (Red)

Moderator: Darryl Cressman

*Planning Innovation from the State: Policy Networks of Ecuador and Colombia*

María Belén Albornoz

*Sharing climate science products in a climate knowledge economy: a study of local communities in northeast Bangladesh*

Scott Bremer

9.00 – 10.30

### Session 6B

#### Imagining Life, Death

Room: 0.001 (Blue)

Moderator: Nora S. Vaage

*Engaging with the Good: Valuing popular neuroscience in society*

Ties van de Werff

*The Promise of Infinity*

Fleming Miller

*Death at intervals: Interrogating imaginaries of 'precision medicine' through fiction*

Anne Blanchard

9.00 – 10.30

## Session 6C

### Futures

Room: 0.039 (Green)

Moderator: Harro van Lente

*A 3D-approach towards Future Technologies We Want*

Ineke Malsch

*When digital health meets digital capitalism, how many common goods are at stake?*

Tamar Sharon

*Estimated Time of Departure*

Roger Strand

10.30 – 11.00

## Coffee Break

11.00 – 12.30

## Session 7A

### Technology Re-Imagined

Room: Spiegelzaal (Red)

Moderator: Christopher Coenen

*From reproducibility to reusability: building an open infrastructure for biology*

Ana Maria Delgado

*Terminating technology: a literature review*

Zahar Koretsky

*Multiple visions and their quest for future: clashes, repercussion, adaption in politicized futures*

Alexandra Hausstein , Andreas Lösch

11.00 – 12.30

## Session 7B

### Potentials of Responsible Research and Innovation

Room: 0.001 (Blue)

Moderator: Conor Douglas

*Consolidating RRI and Open Science: understanding the potential for transformative change*

Clare Shelly-Egan

*Ethical and societal issues of anticipatory machine learning applications*

Martina Baumann, Daniel Frank

*A diagnostic tool for democratic smart city innovations*

Tsjalling Swierstra, Merel Noorman

11.00 – 12.30

## Session 7C

### Societal Contestation

Room: 0.039 (Green)

Moderator: Darian Meacham

*Seed-Links: Visualising diverse agri/cultures to help us teach and navigate contested food futures*

Fern Wickson, Amaranta Herrero, Rosa Binimelis

*Do national anti-GM movements converge in the long term? The cases of Austria, Germany, France, Spain and the UK*

Franz Seifert

*'The environment is our stakeholder': examining the green imperative in synthetic biology*

Sally Atkinson

11.00 – 12.30

Session 7D

The Creative Democracy: Exploring the value of art for public engagement on emerging technologies

Room: Turnzaal

Moderator: Aafke Fraaije , Frank Kupper

Special interactive session organized by: Frank Kupper, Wieke Betten, Aafke Fraaije, Anouk Hetzel

Guests: Hendrik-Jan Grievink, Joyce Nabuurs, Ties van de Werff , Lucas Evers

12.30 – 13.00

Lunch

13.00 – 14.00

Keynote Address:

The Future of FAIR Data

Michel Dumontier

Room: Turnzaal

14.00 – 15.00

Concluding Panel Discussion  
New Orientations

Room: Turnzaal

Michael G. Bennett, Arizona State University

Michel Dumontier, Maastricht University

Roger Strand, University of Bergen

Fern Wickson, GenØk Centre for Biosafety



## Keynote Speakers

### Marjolein van Asselt, Maastricht University

Prof Marjolein van Asselt has a strong profile on governance, risk and uncertainty in both academic and policy circles. Currently she is member of the Dutch Safety Board and was a member of the Scientific Council for Government Policy for many years. She has a Governance chair at Maastricht University.

### Cyrus Mody, Maastricht University

Prof Cyrus Mody is an historian of recent science and technology and has published on the history of nanotechnology and micro-electronics. He studies the commercialization of academic research, countercultural science and technology, and the *longue durée* of responsible research and innovation. He worked at Rice University, Texas, the NSF Center for Nanotechnology in Society and now has a chair at Maastricht University.

### Michel Dumontier, Maastricht University

Prof Michel Dumontier is a Distinguished Professor of Data Science at Maastricht University. His research focuses on the development of computational methods for scalable integration and reproducible analysis of FAIR (Findable, Accessible, Interoperable and Reusable) data across scales – from molecules, tissues, organs, individuals, populations to the environment. Dr. Dumontier leads a new inter-faculty Institute for Data Science at Maastricht University.

# Participants

María Belén Albornoz (6A) FLASCO Ecuador	University of Bergennamika Chatterjee (3A) Norwegian University of Science and Technology	Bettina Graupe Radboud University Armin Grunwald Karlsruhe Institute of Technology
Heidrun Åm (1A) Norwegian University of Science and Technology	Christopher Coenen (4D, 5A) Karlsruhe Institute of Technology	Steven Flipse (1B, 4B, 5A) Delft University of Technology
Lotte Asveld (4B) Delft University of Technology	Isobel Cowper-Coles Rowman & Littlefield International	Daniela Fuchs (4C) Austrian Academy of Sciences
Sally Atkinson (7C) University of Exeter	Darryl Cressman (3C) Maastricht University	Ane Gabrielsen (4A) Norwegian University of Science and Technology
Martina Baumann (7B) Karlsruhe Institute of Technology	Martin Cunneen (1C) University of Limerick	Jacqueline Graff Maastricht University
Roger Bemelmans Zuyd University of Applied Sciences	Luciano D'Andrea (2B) Knowledge & Innovation	Alexandra Hausstein (7A) Karlsruhe Institute of Technology
Michael Bernstein (1A) GenØk Centre for Biosafety	Giovanni de Grandis (3A) University College London	Raffael Himmelsbach (1A) Norwegian University of Science and Technology
Anne Blanchard (6B) University of Bergen	Ana Delgado (2A) University of Oslo	Hadewych Honné (4B) Karlsruhe Institute of Technology
Marianne Boenink (5B) University of Twente	Conor Douglas (5B) Maastricht University	Rick Hölsgens (3C) TU Dortmund University
Karsten Bolz (4B) Karlsruhe Institute of Technology	Clemens Driessen (3B) Wageningen University	Joseph Jandy Gambia
Britte Bouchaut (1B) Delft University of Technology	Sophia Efstathiou (4A) Norwegian University of Science and Technology	Sylvester Johnson (4C) Virginia Tech Manuela Joore MUMC+
Maurice Brennan (2C) University of Birmingham	Nora Engel (2A) Maastricht University	
Scott Bremer (6A)	Aafke Fraaije (7D) Vrije Universiteit Amsterdam	

Asle H. Kiran (4A) Norwegian University of Science and Technology	Dominique Nijssen (1C) Zuyd University of Applied Sciences	Tsjalling Swierstra (3A, 7B) Maastricht University
Frederick Klaessig (2C) Pennsylvania Bio Nano Systems, LLC	Rune Nydal (3A) Norwegian University of Science and Technology	Nora Vaage (5C) Maastricht University
Lotte Krabbenborg (3B) Radboud University	Susanne Oechsner (2A) University of Vienna	Libuše Hannah Veprek Ludwig-Maximilians- Universität München
Anne Loeber (3B) University of Amsterdam	Mar Palmeros Parada (2C) Delft University of Technology	Darja Vrščaj Technical University of Eindhoven
Andreas Lösch (7A) Karlsruhe Institute of Technology	Leslie Quitzow (7A) WZB	Ibo van de Poel (4B) Delft University of Technology
Maria Maia (1B) Karlsruhe Institute of Technology	Arie Rip (2B, 5A) University of Twente	Ties van de Werff (6B, 7D) Maastricht University
Ineke Malsch (6C) Malsch TechnoValuation	Yashar Saghai John Hopkins University	Harro van Lente (4D, 5A) Maastricht University
Lucia Martinelli (5C) Muse Museo Delle Scienze	Franz Seifert (7C) University of Vienna	Michiel van Oudheusden (4D, 5A) KU Leuven
Darian Meacham Maastricht University	Danielle Shanley (1A) Maastricht University	Zahar Koretsky (7A) Maastricht University
Wenzel Mehnert ( UdK Berlin	Tamar Sharon (6C) Maastricht University	Lucien von Schomberg (3C) Wageningen University
Martin Mullins (1C) University of Limerick	Clare Shelley-Egan (7B) Oslo Metropolitan University	Afke Wieke Betten (7D) Vrije Universiteit Amsterdam
Cyrus Mody (5A) Maastricht University	Gisle Solbu (5C) Norwegian University of Science and Technology	Lars Ursin (4A) Norwegian University of Science and Technology
Bjørn K. Myskja (3A) Norwegian University of Science and Technology	Roger Strand (6C) University of Bergen	Fern Wickson (1A, 7C) GenØk Centre for Biosafety
Karen Dam Nielsen (4C) University of Twente	Marit Svingen Centre for Technology and Society	

Sebastian Zezulka  
Germany

Hub Zwart (5B)  
Radboud University