STS Austria

Programme

Digging Where We Stand:
Activism, Community and the Politics of STS

STS Austria Conference 2023

November 27 - 29

Vienna, Austria

Austrian Academy of Sciences

Dr. Ignaz Seipel-Platz 2, 1010 Wien

ÖAW Österreichische Akademie der Wissenschaften

ITA Institute of Technology Assessment

AIT Austrian Institute of Technology

D!ARC Digital Age Research Center AAU–University of Klagenfurt

UNI GRAZ

Business Analytics and Data Science-Center BANDAS-Center

Department of Science and Technology Studies
Institut für Wissenschafts- und Technikforschung

universität wien

Dear Colleagues,

Welcome to the STS Austria Conference 2023 'Digging Where We Stand: Activism, Community and the Politics of STS'! We are looking forward to an interesting three days of discussing the relation between STS and activism and exploring different approaches, motivations and strategies for doing activism and/within/with/regardless of academic STS.

Activism and new forms of political organizing are (once again) gaining traction outside and inside of academia. This is happening alongside calls for more participation in and for the democratization of science. The intensification of current crises, coupled with the disruptive potential of technoscientific capitalism, necessitates significant transformations in the socio-material relations within the realms of science and technology. Postcolonial and feminist critiques of the normative power and epistemic violence in science and technology have been renewed in recent years and push for an ethico-onto-epistemology that urges researchers to reflect their positionality and take a stand. Precarious working conditions in academia intensify the search for agency and clout of critical research and engagement.

This is the time for STS to revisit its relation to activism and engagement, its own community standards and positioning within the labor struggles of the wider academy. What are our standards of and visions for engagement? Where do we as STS researchers draw the boundaries of engagement and what alliances do we enter? How are we multiple and (how) should we join forces nonetheless?

The organizers,
Doris Allhutter (Austrian Academy of Sciences)
Erik Aarden (University of Klagenfurt)
Gwendolin Barnard (Uni Graz)
Juliane Jarke (Uni Graz)
Katja Mayer (University of Vienna)
Masafumi Nishi (AIT/University of Vienna)
Bao-Chau Pham (University of Vienna)
Andrea Schikowitz (University of Vienna)
Dana Wasserbacher (AIT)

Monday, November 27:

Registration 12:30-17:30 (Aula)

13:00-13:30	Opening Plenary (Sitzungssaal)	
13:30-15:00	Exploring activism at STS Austria: plenary participatory floor exercise (Aula)	
15:00-15:30	Coffee break (Aula)	
15:30-17:00	Session 1a: Solidarities and Alliances (Sitzungssaal)	Curated Workshop: Speculative Methods (SE 2, limited seating)
17:00-17:30	Coffee break (Aula)	
17:30-19:00	Public Keynote and Round-Table: Pelin Tan (Batman University): Threshold Infrastructures: Pedagogies of Entangled Topographies (Sitzungssaal)	
19:00-19:15	Early Career Awards (Sitzungssaal)	
19:15-21:00	Reception (Aula)	

Tuesday, November 28:

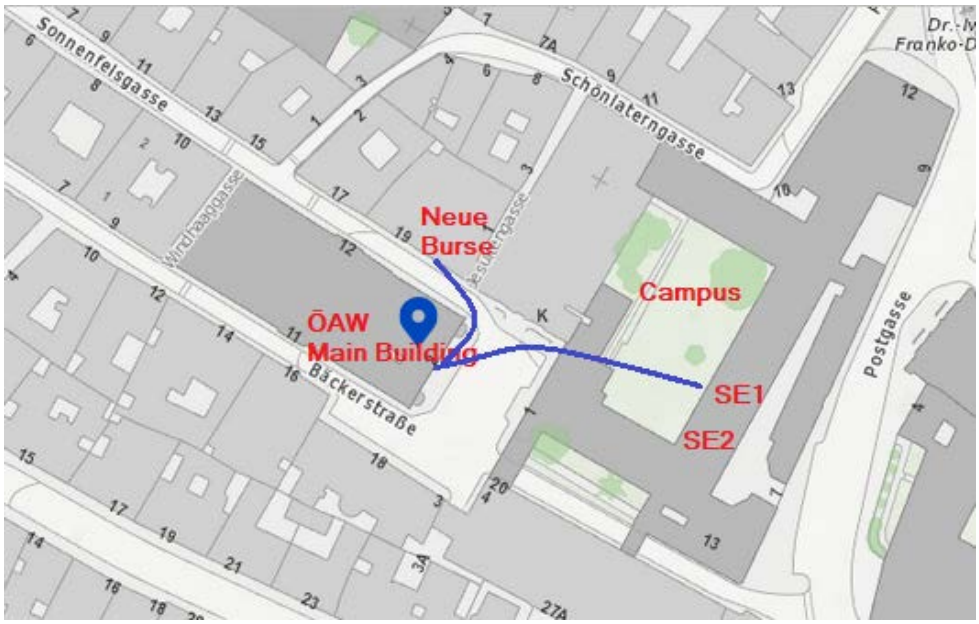
Registration 9:00-14:00 (Entrance Sitzungssaal)

09:30-10:30	Keynote: Stefania Milan (University of Amsterdam): Doing Engaged Research on Data and Algorithms: politics, pitfalls, open questions (Sitzungssaal)	
10:30-11:00	Coffee break (Neue Burse)	
11:00-12:30	Session 2a: The Politics of Open Infrastructures (Sitzungssaal)	Session 2b: Public Engagement & Collaboration with Activists (SE 1)
12:30-13:45	Lunch Break (see STS Austria website for near-by restaurants and take-aways)	
13:45-15:00	Session 3a: Transforming STS (Sitzungssaal)	Session 3b. Socio-Technical Controversies (SE 1)
15:00-15:30	Coffee break (Neue Burse)	
15:30-16:45	Session 4a: Towards More Engaged STS!? (Sitzungssaal)	Session 4b. Activist Practices of STS Scholars (SE 1)
18:00-19:30	Public Keynote: Katta Spiel (TU Wien): Impossible 'Choices' — Activism in the Academy (SE 1)	

Wednesday, November 29:

09:30-11:00	Session 5a: Scholar-Activists: Roles & Identities (Sitzungssaal)	Session 5b: Conceptual Approaches for Caring Research I (SE 1) Screening "Climate Court of Audit Now!" (Aula)
11:00-11:30	Coffee break (Aula)	
11:30-12:30	Special format: Data Walking as Method for Teaching Critical Data Studies (Sitzungssaal)	Screening "Climate Court of Audit Now!" (Aula)
12:30-13:45	Lunch Break (near-by restaurants and takeaways)	
13:45-15:00	Session 6a: Activist (Counter-) Expertise (Sitzungssaal)	Session 6b: Conceptual Approaches for Caring Research II (SE 1) Screening "Climate Court of Audit Now!" (Aula)
15:00-15:30	Coffee break (Aula)	
15:30-16:30	A Manifesto for Activism in STS: participatory conference outlook and closing (Sitzungssaal)	

Location



ÖAW Main Building Aula, Sitzungssaal
Dr. Ignaz Seipel-Platz 2

ÖAW Campus SE 1
Bäckerstrasse 13

Neue Burse Coffee Breaks on Tuesday
Sonnenfelsgasse 19

Session Monday, November 27

Session 1a: Solidarities & Alliances
Monday, November 27: 15:30-17:00
ÖAW Main Building, Sitzungssaal, 1st floor

Chair: *Doris Allhutter*

Amanda Mokoena: Politicizing and Personalizing Climate Science in Africa

Fredy Mora Gámez: Tanteando Beyond Borders: digital experiments with handicrafts in contexts of migration control

Pietro Autorino, Isabella Calattini, Pietro Centorrino: Weaving Grassroots Collective Actions through Participatory Science and Environmental Learning

Laurène Cheilan: Public Engagement and the Caring Academia

Sessions Tuesday, November 28

Session 2a: The Politics of Open Infrastructures: expanding knowledge through activist, participatory, and research-based initiatives
Tuesday, November 28: 11:00-12:30
ÖAW Main Building, Sitzungssaal, 1st floor

Chairs: *Astrid Mager, Katja Mayer & Renée Ridgway*

Renée Ridgway & Alexander Nussbaumer: Designing an Ethical Framework for an Open Web Search Infrastructure

Rafaela Cavalcanti de Alcântara: The Challenge of "Commoning" Smart City Infrastructures: thinking about data integration platforms

Maxigas: Opening Telecommunications to Critical Insights and Public Engagement

Philipp Budka: Community Transport Infrastructures in Northern Manitoba, Canada

Katja Mayer: Re-Opening Artificial Intelligence

Astrid Mager: Automating Welfare: how to open up, re-imagine, and rebuild data infrastructures for the public good

Session 2b: Public Engagement & Collaboration with Activists (SE 1)
Tuesday, November 28: 11:00-12:30
ÖAW Campus, SE 1, Courtyard

Chair: *Juliane Jarke*

Gwendolin Barnard, Seeta Peña Gangadharan, Grace Nelson, Alexis Notabartolo, Klaudia Jaźwińska: Resisting the Digital Spy: US-based worker organizing and co-creating of organizing tools in Amazon warehouses

Masafumi Nishi, Wenzel Mehnert, Eva Buchinger, Michael J. Bernstein: TechEthos: Eliciting Citizens' Values & Attitudes towards Emerging Technologies through a Science Communication Game

Irina Zakharova & Stefanie Büchner: Living Infrastructures – For Participatory Digital Transformation in the Public Sector

Arlind Reuter & Steven Schmidt: Learning from Older Activists: exploring digital practices and citizenship

Session 3a: Transforming STS
Tuesday, November 28: 13:45-15:00
ÖAW Main Building, Sitzungssaal, 1st floor

Chair: *Doris Allhutter*

Sarah Rose Bieszczad, Guus Dix, Jorrit Smit: Reinventing Activism Forward

Claudia G. Schwarz: On Be(com)ing an Activist in and for STS

Robert Braun: Is STS possible without an Ontological Otherwise?

Session 3b: Socio-Technical Controversies
Tuesday, November 28: 13:45-15:00
ÖAW Campus, SE 1, Courtyard

Chair: *Dana Wasserbacher*

Carsten Horn: Datafication and Its Discontents: understanding processes of datafication and digitalization in contemporary (digital) innovation societies through emerging controversies about data centers in Austria, France and Ireland

Kleinhout-Vliek Eva Hilberg, Rob Hagendijk, Paul Martin, Sarah Wadmann: A Market without Price: reflections on the promises and limits of pharmaceutical reform in the EU

Christian Dayé: The Legislative Effect of Ignorance: unknowability in the debate on New Genomic Techniques (NGTs) in the EU

Session 4a: Towards More Engaged STS!?
Tuesday, November 28: 15:30-16:45
ÖAW Main Building, Sitzungssaal, 1st floor

Chair: *Bao-Chau Pham*

Jutta Weber: Staying With The Military Trouble. On STS, Military Technologies and Activist Practices

Max Fochler & Lisa Sigl: A "hinterland" for relevant STS research? What practices help us developing more relevant research and career paths?

Samuele Fratini: Conservative Methods for Progressive Purposes: What the STS Can Do for the Future and Why It Is Not Doing It

Session 4b: Activist Practices of STS Scholars
Tuesday, November 28: 15:30-16:45
ÖAW Campus, SE 1, Courtyard

Chair: *Dana Wasserbacher*

Silke Beck & Michael Nitschmann: Mapping the possibilities for STS to actively engage in democratic and sustainable climate futures

Michael Ornetzeder: It could be otherwise: Tracing and exploring alternative realities with STS research

Miedema Marije: Big Oil, Big Tech & Big Science: reflections from a scientist and a rebel

Sessions Wednesday, November 29

Session 5a: Scholar-Activists: Roles & Identities
Wednesday, November 29: 09:30-11:00
ÖAW Main Building, Sitzungssaal, 1st floor

Chair: *Katja Mayer*

Karen Kastenhofer: From a Normal and a Post-Normal-Science Ethos to a Survival Science Ethos?

Waltraud Ernst: Knowledge as Collective Method and Practice

Sérgio Barbosa: Beyond the Consent Form: playing with fire on WhatsApp research

Raghvendra Singh Yadav & Swati Kumari: Comparative Analysis of Activist Practices among STS Scholars in Europe and Asia: a study of key contributors and their impact

Session 5b: Conceptual Approaches for Caring Research I
Wednesday, November 29: 09:30-11:00
ÖAW Campus, SE 1, Courtyard

Chair: *Andrea Schikowitz*

Iara Franco Schiavi & Sérgio Amadeu da Silveira: The Data Journey approach and SNT in the Brazilian sociotechnical context

Rafaela Cavalcanti de Alcântara: "Cambia, todo cambia": Cuerpo-territorio and buen vivir as lenses to reflect on data commons

Aviram Sharma: Energy Democracy: A Transformative Concept or a Buzzword?

Louis Ravn: The Politics of Boundary Work (online)

Session 6a: Activist (Counter-) Expertise
Wednesday, November 29: 13:45-15:00
ÖAW Main Building, Sitzungssaal, 1st floor

Chair: *Bao-Chau Pham*

Andrea Schikowitz & Sarah Davies: Communicating engaged expertise: How housing activists exchange and negotiate techno-political knowledge

Sarah Schönbauer: Environmental-Engagement: Marine Science between Science and Activism

Thomas Zenkl: Everyday Algorithmic Activism

Session 6b: Conceptual Approaches for Caring Research II
Wednesday, November 29: 13:45-15:00
ÖAW Campus, SE 1, Courtyard

Chair: *Gwendolin Barnard*

Axel Stockburger: Technopolitics: Innovative Formats at the Intersection of Art, Research, Science, and Pedagogy

Dario Feliciangeli, Carina Liersch, Illia Litvin, Paul Wünderlich, Lea Wölfl: (Re)collecting Change, Changing Recollections: how can student voices multiply institutional histories

Doris Allhutter: Ethnography and Political Resistance: revisiting the activist origins of mind scripting

Abstracts: Keynotes

Monday, November 27
17:30-19:00 Sitzungssaal (open to the public)

Pelin Tan, Batman University
Threshold Infrastructures: Pedagogies of Entangled Topographies

Chair: *Monika Halkort*

Structural violence and inter-colonial memory are deeply integrated with the landscapes and topographies of local communities where fragments of layered geontologies operate. The effects of conflict and the active renegotiation of borders demand a transformation in the way that infrastructure is approached and worked with. Here, infrastructures that exist in thresholds such as care, solidarity, and commoning are function and sustained through survival pedagogies and communal interdependencies. In this context, the matter of the scale of threshold infrastructure lies between the planetary and subjectivity in the site of the commons. This presentation will share the experience and methodology of engagement, failures, and solidarity between research methodologies and artistic research in the realm of more-than-human rights and socio-spatial justice. Questions will be the core part of the discussions: How is research possible in a fluid and unconditional conflict territory? How artistic phenomenologies may create many ways of knowing and social coexistence? How critical mapping can be used for the testimony of the more-than-human rights violations? How the rights of non-human assemblies in extractive zones can be supported through art and architectural solidarity? How eco-female labor is creating resistance against slow violence? How pastoralist practices are interrupted through territorial control? How the patchy Anthropocene approach can be combined with artistic research? How to build the De/archive of Tigris Phenomenologies? This lecture will consider the value of balance between theory and activism, the distribution of power of agencies, the broken narratives of dispossession, and the limits and potentialities of artistic practices/research.

Further information:
http://araziassembly.org/
https://padlet.com/mardin2021/archiving-spaciocide-with-video-topographies-2013-2022-41ydkk1upse2clj1
https://padlet.com/mardin2021/the-care-of-seed-an-entangled-kinship-tohumu-onarmak-bir-yol-7dd4qiaxodyzynm3
https://padlet.com/mardin2021/tigris-phenomenologies-yrlmx4ng1qufsukm

The keynote by Pelin Tan is open to the public and will be followed by a roundtable discussion exploring the results of the afternoon workshop on speculative methods.

Tuesday, November 28
09:30-10:30 Sitzungssaal

Stefania Milan, University of Amsterdam
Doing Engaged Research on Data and Algorithms: politics, pitfalls, open questions

Chair: *Katja Mayer*

We know by now that the advance of the datafied society alters and even erodes citizen agency. Studying grassroots practices of engagement with data and algorithms as well as communities at the margins calls for an approach to research in the sociotechnical that takes sides. Engaged research is an approach that, without departing from systematic, evidence-based, social science research, seeks to make a difference also beyond the academic community. It interrogates the impact that our empirical inquiry might have on people and community on the ground, and asks whether and how we can contribute to their goals. Among others, it asks how to make 'research with' rather than merely 'research about', and what is equitable collaboration (co-labor). This talk takes stock of two decades of variably successful attempts to do engaged research at the intersection of people, information, and technology. It reviews the politics of engaged research, its potential and added value, but reflects also on the pitfalls and the open questions.

Bio: Stefania Milan (stefaniamilan.net) works at the intersection of participation, technology, and governance, with emphasis on infrastructure and agency. She is Professor of Critical Data Studies at the University of Amsterdam, affiliated with the Berkman Klein Center for Internet & Society (Harvard University) and the School of Transnational Governance (European University Institute). Currently, Stefania leads the project "Citizenship and standard-setting in digital networks" (in-sight.it), funded by the Dutch Research Council. In 2015-2021 she was the Principal Investigator of DATACTIVE (data-activism.net) and of the Algorithms Exposed (ALEX) project (algorithms.exposed), both funded by the European Research Council. In 2017, she co-founded the Big Data from the South Research Initiative, investigating the impact of datafication and surveillance on communities at the margins. Stefania holds a PhD in Political and Social Science from the European University Institute. Prior to joining the University of Amsterdam, she worked at, among others, the Citizen Lab at the University of Toronto, Tilburg University, and the Central European University. Stefania is the author of Social Movements and Their Technologies: Wiring Social Change (Palgrave Macmillan, 2013/2016), co-author of Media/Society (Sage, 2011), and co-editor of COVID-19 from the Margins. Pandemic Invisibilities, Policies and Resistance in the Datafied Society (Institute of Network Cultures, 2021, download). She is currently preparing a monograph on data activism for Sage. Outside office hours, she loves cycling, boxing, and mountaineering. https://www.stefaniamilan.net/

Tuesday, November 28
18:00-19:30 SE1 (open to the public)

Katta Spiel, TU Wien
Impossible 'Choices' — Activism in the Academy

Chair: *Juliane Jarke*
Sign Language Translator: *Antonia Maier, Anja Pfneisel*

The shaping of our socio-technical environment is predominantly the privilege of a comparatively homogeneous group of people, mainly white, mainly western, mainly within an age range of 20-40 years old, mainly cis-male; with not just amusing, annoying or irritating, but also deadly consequences for anyone else. Associated academic research is similarly reduced to these perspectives; particularly in a German speaking context. Personally, I'm disabled and I'm inter*/trans*; and the academy others me as deviant along both of these lines. I continuously cross boundaries by simply being in an academic space and pointing out the ways it systematically tries to exclude me and my peers. Try being nonbinary in a field that is, fundamentally, built on binary notions, materially and epistemologically.
The research environments I encounter locally and internationally, seem fundamentally unprepared for my presence. I'm researching technological design for neurodivergent people and keep on being reminded how low my colleagues' regard is for my peers and myself, how they dehumanise our being. What I do can be called critical participatory research where I focus on marginalised perspectives, particularly around notions of gender and disability. Though, even when I conduct literature reviews, write essays or do more theoretical work, my work is always seen as activist. Dispassionate research is what we expect and value, passionate research is activism. Yet, I find myself with status, with a research position from which I speak. And what else to do with it than starting to push within existing structures, to push the boundaries to make space; not just because this increases the relevance of the knowledge we produce but because it is the just thing to do. What if not transgressing those boundaries will yield more inequitable processes in the creation of our socio-technical environment? What good are we for as researchers, if we uphold artificial and exclusive boundaries? Activism can be the right choice; but having that choice constitutes a privilege. Activism is inevitable for me, because my mere presence is troubling. It's not a choice.

Bio: Katta Spiel is an Assistant Professor for 'Critical Access in Embodied Computing' at TU Wien. They research marginalised perspectives on embodied computing through a lens of Critical Access. Their work informs design and engineering supporting the development of technologies that account for the diverse realities they operate in. In their interdisciplinary collaborations with neurodivergent and/or nonbinary peers, they conduct explorations of novel potentials for designs, methodologies and innovative technological artefacts. They received their PhD in 2018 from TU Wien and after a year at KU Leuven, they conducted postdoctoral research as an FWF-Hertha Firnberg Scholar, also at TU Wien. Their work has received several international and national awards, including the 'SICGHI 2020 Outstanding Dissertation Award' as well as the 'Förderungspreis der Stadt Wien in der Sparte Mathematik, Informatik, Naturwissenschaft, Technik' in 2022, and, most recently an ERC Starting Grant. http://katta.mere.st/

Abstracts for special formats

Monday, November 27
13:30-15:00 AULA

Exploring Activism at STS Austria: plenary participatory floor exercise

Facilitators: *Sarah Rose Bieszczad (Universiteit Leiden), Guus Dix (Universiteit Twente), Jorrit Smit (Universiteit Leiden, Vrije Universiteit Brussel)*

In the participatory floor exercise, we aim to get everyone talking and taking a stance at the very start of the conference. We begin with a couple of short pitches that highlight different approaches, motivations and strategies for doing activism and/within/with/regardless of academic STS. Afterwards, we facilitate an exercise where people take a position in the room that simultaneously displays their stance towards a number of topics related to activism, academia and the relation to STS which can spark an open and dynamic conversation.

Monday, November 27
15:30-17:00 SE2

Workshop: Speculative Methods

This is a curated workshop. Audience is welcome; however, seating is limited. Workshop results will be presented at the Round table Monday evening.

Chair: *Monika Halkort*
Presenters: *Pelin Tan (Co-founder of the Research Platform Arazi Assembly), Daniela Gandorfer (Logische Phantasie Lab), Sophia Rut & Aaron Kimmig (Lobau Listening Comprehensions Collective), Alexa Färber (Project team Realfiktion Klimarechnungshof)*
Discussants: *Sarah Rose Bieszczad (Universiteit Leiden), Guus Dix (Universiteit Twente), Jorrit Smit (Universiteit Leiden, Vrije Universiteit Brussel), Axel Stockburger (Technopolitics, www.technopolitics.info), Livia Regen (Universität Wien, Degrowth Movement)*

This workshop centers on the examination of creative, speculative practices that culminate in site- and context-specific interventions aimed at uncovering transformational potentials and triggering change. During the workshop, we will feature four project presentations, each exemplifying collaborative endeavors with communities and organizations. These presentations will serve as the foundation for an academic discussion involving experienced activists. This exchange seeks to provide a pragmatic lens through which to analyze the practical implications of these projects, offering activists the opportunity to offer insights from their everyday experiences. By promoting this dialogue, we aim to bridge the gap between theoretical endeavors and practical activism, facilitating a scholarly exploration of the transformative capacities at the intersection of art, science, and activism.

Workshop presentations:

1. **Participatory Normativity and Modes of Commoning: A Decentralized Right to Breathe?**
   Daniela Gandorfer, University of Westminster Law School

   The physical and social atmosphere of this planet shifted in the near past, extending its echoes into an indeterminate future that requires novel tools and modes of collaboration. The outbreak of the SARS-CoV-2 virus together with increasing concern regarding air pollution, the suffocation and murder of George Floyd by U.S. police officer Derek Chauvin in the city of Minneapolis, the echoing of #icantbreathe across the screens and streets of the U.S. and beyond, and a cascade of natural catastrophes such as wildfires, hurricanes, and extreme weather events caused by human-induced climate change are but a few examples that made the shift palpable. Just recently the World Health Organization (WHO) published their finding that 99 percent of the world's population breathes air that threatens their health. Even in regions where breaths were taken for granted – in their iterability and their sustainability – the question of what it means to breathe is raised in the most precarious manners, at times at the very threshold of non/existence. Consequently, calls for legal protections of the act and conditions of breathing became louder and continually resonant as the pandemic contracted more and more breaths. In this presentation I will introduce the challenges faced and methods developed in the course of the A Thousand Breaths (ATB) initiative, an experiment in participatory and distributed normativity, which seeks to develop a right to breathe as a decentralized, non-proprietary, and crossscalar legal concept. Rather than developing a universal right from top-down, the initiative seeks to work with various local communities all over the globe, attending to the importance of difference and incomparability when it comes to breathing injustices (whether pertaining to air pollution, greenhouse emissions, medical oxygen markets, and a range of other phenomena). I argue that it is precisely at the intersection of community-building (creating modes of commoning), art (making the unimaginable imaginable), technology (hijacking the potential), and science that a participatory and decentralized right to breathe can emerge. https://www.lo-ph.agency/dertb

2. **Lobau Listening Comprehensions: exercises in tuning into more-than-human sonic bodies**
   Sophia Rut & Aaron Kimmig, Lobau Listening Comprehensions Collective (LLC)

   Lobau Listening Comprehensions undertakes a site-specific, audio-based investigation of the Lobau (the Vienna Danube floodplains) that includes personal experiences, biological conditions, current political negotiations as well as historical events. We work with sound from different perspectives and through different practices: listening as an experiential moment, oral histories, acoustic ecology, audio as a format of science communication. In doing so, our respective disciplines (cultural studies/journalism, social ecology/environmental history, aquatic ecology/artistic research) intertwine to create a multilayered portrait of the Lobau. We understand Lobau as a cyborg and built a technical adapter to it which we called GERTI. As a site-specific art collective, we are dealing with a wetland area inside the borders of a metropolis: a landscape that we love, far from pristine nature but still full of wilderness romanticism for many. An active site of environmental activism and important habitat for all kinds of aquatic specie. In this talk we show 1. how we built our own site-specific audio tool and decide to use sustainable

technology, 2. we reflect on the question of how our artistic project connects to the struggles of the movement to protect the Lobau.

Lobau Listening Comprehensions Collective (LLC) formed in the Viennese floodplains of Lobau. Julia Grillmayr, Christina Gruber & Sophia Rut, investigate these wetlands with sound using collective listening, oral histories, acoustic ecology and science communication. In doing so, our respective disciplines intertwine to create a multi-layered portrait of Lobau. https://lobaulistening.at/

3. **Climate Court of Audit Now! How to realize a future institution through doing a research-based pre-enactment**

Alexa Färber, Project Team Realfiktion Klimarechnungshof

While national and international policy agreements define climate targets, in many cases compliance with these targets fails due to the lack of political implementation of climate-protective measures. This is certainly true for Austria, where a variety of activist groups continuously draw attention to the lack of legally binding national emission limits. Political commitments and political implementation diverge significantly. Against this background, the research project Realfiktion Klimarechnungshof (Pre-Enacting Climate Change Knowledge, FWF TAI-663, Department of European Ethnology, University of Vienna) explored future institutional practices for climate governance, namely the Austrian Climate Court of Audit (Klimarechnungshof). This audit institution has previously been called for by the highly successful Austrian citizens' initiative for climate protection. The task of this new national audit office for climate should be to examine past and planned political measures for their climate effectiveness and thus enable political accountability.

With the methodology of research based preenactment we explored the potential of such an audit institution. Therefore, we aligned the "Realfiction Klimarechnungshof" with activism and launched the campaign Klimarechnungshof Jetzt! (Climate Court of Audit Now!) in early 2023. Here, we preenacted the work of an Austrian Climate Court of Audit in public assemblies together with various climate experts, such as scientists of different disciplines, activists or public administrators. These "acts" were audio-visually documented and integrated in the homepage of the campaign. Our contribution in the workshop aims to reflect on the intertwining of research based preenactment and activism and the risks, opportunities and challenges associated with this intertwining.

Project Team: Realfiktion Klimarechnungshof (Rebecca Akimoto, Milena Bister, Alexa Färber, Herbert Justnik, Alexander Martos, Stephan Richter, Niklas Schrade, Alessia Scuderi)

Wednesday, November 29
11:30-12:30

Data Walking as Method for Teaching Critical Data Studies

Gwendolin Barnard, Kajetan Hoffmann, Philipp Lechner, Juliane Jarke, Katharina Kinder-Kurlanda, Paula Nauta, Sudhang Shankar, Thomas Zenkl

Stemming from the interdisciplinary field of Critical Data Studies, there has been an increased development of methods for a critical engagement with processes of datafication and data-related practices that are concerned with the recursive (power) relations of digital data, physical infrastructures and social actors. Data Walks are potential research tools to attune researchers to the methodological choices involved in data gathering processes and to the infrastructures making datafication possible. They can also act as a bottom-up intervention in these processes that are usually determined by the top. In addition, they can also be used as a teaching tool to allow students to deeply engage with digital data, datafication processes and data-related practices and to reflect on how different methods co-construct our objects of research and ourselves as researchers.
Funded by STS Austria, advanced Master and PhD students at the Universities of Graz and Klagenfurt conducted their own data walks in the summer term 2023. Initially, students were introduced to the background, aims and research foci of the field of Critical Data Studies. They were then asked to critically compare different approaches to data walking. In groups, they developed and designed their own research project, tested different data gathering practices, analyzed and processed gathered data and presented it. The course was supported by Laura Koksch (Aalborg University) and Mace Ojala (Ruhr University Bochum).

Wednesday, November 29
09:30-15:00

Screening "Realfiction: Climate Court of Audit Now!"

Project team Realfiktion Klimarechnungshof (Rebecca Akimoto, Milena Bister, Alexa Färber, Herbert Justnik, Alexander Martos, Stephan Richter, Niklas Schrade, Alessia Scuderi)

The screening shows videos (German language with English subtitles) that present the research project 'Realfiktion Klimarechnungshof'. They explore novel institutional practices for climate governance, namely the Austrian Climate Court of Audit (Klimarechnungshof), an audit institution that had previously been called for by the highly successful Austrian citizens' initiative for climate protection. The task of this new national audit office for climate should be to examine past and planned political measures for their climate effectiveness and thus enable political accountability. As part of the preenactment, we started a campaign and took up the work of an Austrian Climate Court of Audit in public assemblies together with various climate experts, such as scientists of different disciplines, activists or public administrators. We have, in the mode of a realfiction, elaborated the central knowledge base for both the institution's audit practices and its integration into the existing institutional landscape and created a space for public political debate.

Wednesday, November 29
15:30-16:30

A Manifesto for Activism in STS: participatory conference outlook

Facilitators: *Juliane Jarke (Graz, Austria) and Arlind Reuter (Lund, Sweden)*

In this session, we jointly reflect on what we have discussed, learned and explored during the conference. In addition, we consider how we want to move forward collectively. To do this, we will write a Manifesto for Activism in STS. Manifestos allow to challenge or provoke, they can come in many forms, they can embrace tensions and allow for collaborative speculations. To facilitate the process, we will use a card game for Manifesto Writing that was designed by Julian Hanna (https://www.tilburguniversity.edu/staff/j-r-hanna).

Session Abstracts

Session 1a: Solidarities & Alliances

Monday, November 27: 15:30-17:00
ÖAW Main Building, Sitzungssaal, 1st floor
Chair: Doris Allhutter

Amanda Mokoena: Politicizing and Personalizing Climate Science in Africa

Africa as a region has, for long, experienced the harshest symptoms of climate change, forcing us to adapt early. We have forged intimate understandings of the natural environment, and how our many societies have adapted to the climate crisis has not been by chance. Various African communities have been producing knowledge on co-existing with nature for millennia and this knowledge is continuously adapting to the dynamic climate crisis, and many of us have gone on to stamp this knowledge with university degrees in environmental sciences. Thus, it would seem orderly that this credible scientific knowledge would be considered in climate change discourses. On the contrary, African scholars of climate change are reduced to collectors of data on diseases and poverty as a result of climate change and our expertise in the science of climate change is disregarded. This reinforces the narrative that African thinkers are not valid producers of knowledge and maintains what geographer Farhana Sultana terms "hegemonic hemispheric hamstringing" whereby scholars from North America and Europe only engage canonical literature from their locations, missing out on diverse ways of thinking about global problems, while reinscribing colonial tropes of Majority World scholars as subaltern and incapable of theorizing. I use Sultana's (2022) critical climate justice framework to think beyond arguments that confine Africa's climate change accelerants to the past as land degradation from colonialists' looting of minerals. Instead, I purport that the natural environment is still being colonized and part of that continuing colonialism is in the knowledges applied indiscriminately to "solve" the climate crisis which ignore already existing adaptation strategies in African contexts. Lastly, I look to fellow African activist-scholars who resist and subvert hegemonic modes of knowledge production through solidarities and co-creation outside of academia to think through meaningful ways to harvest scholarship out of climate activism.

Fredy Mora Gámez: Tanteando Beyond Borders: digital experiments with handicrafts in contexts of migration control

Research in the intersections between Science and Technology Studies (STS) and critical border/migration studies has interrogated how knowledge about migration is mediated by data practices, information technologies, inscription devices, definitions, bodies of expertise, categorisations and so forth. This paper wonders about those sociomaterial relations that are not captured and remain unknown by border knowledge and suggests a way to gain a better understanding of them. For doing so, I draw on the decolonial feminist work of Maria Lugones and her notion of tantear practices. Tantear is a Spanish verb that Lugones explains as a tactile searching together in the 'darkness of the unknown'; a productive unknowing that allows individuals to make sense of themselves and their praxis beyond predetermined visions of their identities and the future.

I articulate this notion of tantear into experimental questions like: how to gain a better understanding of sociomaterial relations unknown by (and therefore beyond) border-knowledge? How to make those sociomaterial relations graspable through tantear practices? And how can the digital serve this process? I therefore pay attention to material practices that are common in contexts of migration control and that precisely involve knowing through the tactile by people on the move: Handcrafting. I abandon an understanding of handcrafting as an outcome of a lack of alternatives or a low-skilled practice. Instead, handcrafting is reframed here as a form of expertise, art(isanship) and material practice of knowing. In this paper, I present two ongoing experiments that combine ethnography and digital methods, and that seek to enable the proposed tantear-oriented attention shift through digital mapping. This mapping traces trajectories and relations around handcrafted objects between different actors, including people on the move in contexts of migration control like Greece and Colombia. Tantear through mapping handcrafts, I claim, affords paying attention to trajectories and stories neglected by borders following and creating new alliances, and thinking back and forth in time and space within and beyond borders. I articulate STS scholarship and feminist decolonial thinking to explore how the digital, as a performative tool, might endow us with ways of understanding those other sociomaterial relations that are also crucial in the complex journeys of people on the move.

Pietro Autorino, Isabella Calattini, Pietro Centorrino: Weaving Grassroots Collective Actions through Participatory Science and Environmental Learning

This contribution introduces an experimental methodology that combines action-research, eco-pedagogical teaching, and grassroots environmental monitoring. The central focus lies in bottom-up strategies of scientific activism, exploring methods to gather and organize knowledge to influence political decisions in support of environmental causes. We suggest that it may be of interest to discuss this project in the field of STS. Indeed, we are keen on establishing transdisciplinary perspectives where activist agendas, critique, and positioned experimentalism can provide interesting insights for discussion and further elaboration.

We present a case study centered around a grassroots river monitoring initiative along the Tuscan River Elsa. In this project, anthropogenic impacts were explored using collaboratively gathered physico-chemical and ecological data, engaging scientists, educators, high school students, and activists. The goal was to combine scientific-local knowledge and collective action to develop river management practices, with a vision of coexistence rather than exploitation.

The project has been ongoing for two years and is the most detailed study ever conducted on the Elsa River, awaiting publication. It has initiated a doctoral project at the faculty of Ecotoxicology in Siena, which will investigate the river's health status in a participatory and interdisciplinary manner along its entire course. To date, we have gathered several holistic information, the central focus of the project is on how to exert grassroots political pressure to foster new river management practices. Local activists have organized public assemblies where management proposals will be developed in anticipation of the upcoming city elections in the spring. Four classes from two different schools continue to visit the river to follow environmental lessons and collect physico-chemical data. Comprehensive analysis of the approach's limitations and the case's unique characteristics is conducted through surveys and results interpretation.

Laurène Cheilan: Public Engagement and the Caring Academia

Much has been written about the political and social importance of public engagement with research, but also about how it can impact academic's careers and experiences. Public engagement has become more and more incentivised by funders and academic institutions, in parallel with the mutations of "academic capitalism" (Slaughter & Leslie, 1997) and the consequent complexification of academic work and identities (Davies & Petersen, 2005). Understanding how public engagement institutionalisation plays out in these dynamics of mutations presents particular challenges, because of tensions inherent to academic life in the neoliberal university.

This presentation builds on my PhD research, within an astrophysics/astrochemistry network where public engagement had been made compulsory for PhD students, in response to H2020's demands for more societal relevance. Through an eighteen month long (auto)ethnographical inquiry, I explored how public engagement practices were woven into the network's organisational texture (Gherardi, 2006), with a particular attention to their material and affective components. Through this work, I was progressively brought to reorder my attention around the concept of care, and the various shades of care and neglect that were expressed and materialised around public engagement practices and their institutionalisation in the network. From the interplay between ethics, affects and maintenance (Puig De La Bellacasa, 2016) to the importance of keeping a "vexing" (Nicholls et al., 2021) or "unsettled"(Murphy, 2015) approach of care, thinking of public engagement with research through the care lens allows to acknowledge ambivalence within and around public engagement practices and how they align with academic identities in complex ways. Integrating public engagement to a critical care approach of academic life is not asking how academics can care more or better, but rather how could academia take "the idea of care as its organising principle seriously" (Hakim et al., 2020).

Session 2a: The Politics of Open Infrastructures: expanding knowledge through activist, participatory, and research-based initiatives

Tuesday, November 28: 11:00-12:30
ÖAW Main Building, Sitzungssaal, 1st floor
Chairs: Astrid Mager, Katja Mayer & Renée Ridgway

Renée Ridgway & Alexander Nussbaumer: Designing an Ethical Framework for an Open Web Search Infrastructure

Alternative and open web search infrastructures are 'counter-imaginaries' (Mager 2023), yet what is often missing are the ethical values contained within them. This presentation focuses on designing and implementing an ethical framework for a novel, open European infrastructure (index) in web search that allows downloading of index partitions that can be used for specific purpose search applications and data products, including state of the art AI applications (chatbots, knowledge graphs) that deliver (alternative) search results. The technical infrastructure is being developed by a consortium of 14 research partners and computer centres from seven European countries funded by the European Commission (https://openwebsearch.eu/). A Working Group Ethics, together with members of the research project, simultaneously monitors the research and development of the technical side of the index from an ethical perspective, including its protocols, standards and software as well as data collection and storage, data organization, data analysis and search services. It also focuses on political concerns and social issues, along with organising workshops to create public

awareness. Besides contributing to the STS imagined worlds discourse (Jasanoff 2020), the group will deliver an ethical framework, or a 'values compass' for open internet search. This framework consists of a systematic approach to identify ethical issues, perform ethical checks, and to integrate ethical guidelines in the development process.

Rafaela Cavalcanti de Alcântara: The Challenge of "Commoning" Smart City Infrastructures: thinking about data integration platforms

The United Nations report that "[p]eople-centered smart cities leverage data, technology and services for common good, delivering inclusive and sustainable cities" (United Nations, n.d.). Related to it, UN-Habitat evokes promoting open city data as a path to the deployment of data for the public good, claiming, as outcomes of such measures, citizen empowerment, better data-driven decision-making in cities, in addition to an increased citizen engagement in policy-making (UN-Habitat & Nesta, n.d.). Following this approach to the deployment of new technological tools and data generation in the cities, different agendas have been arising, such as "the right to the digital city", "the right to the smart city", and "the right to the datafied city" (Bria & Morozov, 2018; Cardullo et al., 2019).

The ideas of commons and common data infrastructures are often emphasized when elaborating on possible alternatives to the current widespread notions of the so-called smart cities. Alternative data ownership regimes, open source, open standards, control digital platforms, development of cooperative models of service provision, and digital sovereignty are often mentioned as ways to promote a framework that thinks digital cities beyond neoliberal guidelines (Bria & Morozov, 2018; De Lange, 2019).

As part of the AUTO-WELF project, Lisbon's Urban Intelligence and Management Center has been explored as a case study to understand data analysis and automation deployment to promote welfare. Thus, combined with document analysis, narratives on such a city project obtained through interviews with the staff involved in its operations will help to reflect on materializations and expectations concerning open data infrastructures in the city, mapping practices in this regard. Considering decommodification as a potential pillar of the data welfare state (Andreassen et al., 2021), such an example will also help to look into the tensions between taking city data either as a commodity or a common good.

Philipp Budka: Community Transport Infrastructures in Northern Manitoba, Canada

Infrastructures are at the core of many social transformations, sociopolitical developments, and creative processes of innovation. They have become key indicators and signs of economic development, technological advancement, and modernization. Particularly in small and remote communities, infrastructures are often associated with economic growth, socio-economic wellbeing, and therefore communal sustainability. This paper looks into the role and meaning of transport infrastructures in sustaining remote communities in Northern Manitoba, Canada. In doing so it focuses in particular on questions of infrastructural ownership and control. As of 2021, and for the first time in history, key transport infrastructures – the Hudson Bay Railway and the Port of Churchill – are owned by a consortium of 41 northern communities. The paper draws on ethnographic data that have been collected in the region for the ERC project InfraNorth. As the case of transport infrastructures in Northern Manitoba shows, social relationships and organizational partnerships are key for planning,

developing, building, continuing, and maintaining infrastructures. Infrastructure should therefore be conceptualized as more than just an operational system of technological objects.

Maxigas: Opening Telecommunications to Critical Insights and Public Engagement

I focus on opening up programmable infrastructures to critical insights, transposing digital methods from platforms to infrastructures, the case in point being the next generation 5G mobile phone networks. In comparison with the information infrastructures of the Internet, telecommunications infrastructures are notoriously inaccessible. Internet infrastructures benefit from open standards, elegant protocols, revolutionary imaginaries, public debates and ample civil society engagement. In contrast, telecommunications infrastructures are rendered inaccessible by standards processes conducted by industrial consortia, over-engineered protocol stacks, bland visions, regulatory capture, and the absence of digital rights activists. The convergence of Internet with telecommunications networks renders this situation increasingly problematic, because as computers and networks merge in programmable infrastructures, the future of communication and control will be determined by telecom companies without public debate or civil society participation. In order to address such a research problem and provide an adequate response to the historical moment, I propose, promote and develop the “People’s 5G Laboratory”, a rebuilt mobile phone network for parallel operation and public experiments. The purpose of the research infrastructure is to open telecommunications to critical insights and public engagement through the innovative methodology of “dissection”. Dissection refers to an analytical but experimental approach to gaining a materialist understanding of the medium in which cultures grow. While dissection has been practiced during the Dutch Golden Age as a means to advance science, in particular anatomy, and thus medicine, it has also been instrumental in transforming the societal norms and values, promoting enlightenment ideologies through public experiments and debatable spectacles. By taking a similar approach to telecommunications standards, implementations and deployments, the Critical Infrastructure Lab aims to inject a critique of cybernetics into contemporary debates on emerging technologies of media and culture.

Katja Mayer: Re-Opening Artificial Intelligence

This presentation explores the nuanced interpretations of the terms 'open', 'open source', and 'open science' within the realm of AI infrastructures, including machine learning models and platforms for data and code sharing. It outlines the ambiguous and varied use of 'openness' and the values and practices it embodies. The spectrum of openness ranges from granting access to code and data, ensuring explainability and reusability, to transparency regarding the resources utilized in creating and operating these infrastructures. Just recently, in this context and at the face of new AI regulations, big tech companies were accused of "open-washing", projecting a facade of commitment to open-source and open science principles, and leveraging the positive connotations associated with openness for marketing their offerings, without genuinely aligning with the core principles of transparency or reusability. Conversely, recent years have witnessed a surge in innovative approaches that genuinely address critiques of mainstream AI. These alternatives emphasize unbiased training data, reduced resource consumption for environmental sustainability, and duly recognizing the labor in training and moderating systems like chatbots. The presentation culminates in a discussion on the significance and effectiveness of advocating for algorithmic justice and the role of open activism in this dynamic global landscape.

Astrid Mager: Automating Welfare: how to open up, re-imagine, and rebuild data infrastructures for the public good

(Semi-)Automated decision-making (ADM) systems are on the rise in public sectors including employment, public health, and education. These systems are often driven by values of efficiency, effectivity, or social fraud detection and tend to underestimate the social implications they cause in the respective institutions, but also in society at large (Allhutter et al. 2020, Sztandar-Sztanderska and Zielenska 2022, Lomborg et al. 2023, Geiger 2023). At the same time, alternative imaginaries have started to take shape in the European context trying to re-imagine and rebuild digital technology and data infrastructures for the public good (Mansell 2012, Lehtiniemi and Ruckenstein, 2019, Kazansky and Milan 2021, Mager 2023, Macgilchrist et al. 2023). European values such as data protection, transparency, and digital sovereignty are often mobilized to promote large-scale infrastructures in the areas of research (Mahfoud 2021, Mobach and Felt 2022), cloud computing (Baur 2023), and web search (Mager 2023).

Against this background, the project Automating Welfare (FWF I 6075) examines the implications of datafication and automatization for the welfare and flourishing of European citizens in eight European countries using a case-study approach and a mix of different methods (data journeys, interviews, short-term ethnographies, citizen workshops). In Austria, one of the case studies is exploring the use (and reuse) of health insurance data for fraud detection, but in tandem tries to envision potential future applications oriented towards the public good such as risk prevention or public health initiatives. Another case study is focusing on the Open Commons Linz initiative, which is trying to open up data (and infrastructures) to citizens for communal welfare and educational purposes - fieldwork of both case studies has just been started, first insights will be shared at the conference. How to re-imagine and rebuild data infrastructures for the public good and how to work towards more open, just, and citizen-oriented techno-futures will be discussed in the presentation. Moreover, the role of the researcher in joint activities of envisioning (and encoding) alternative techno-futures will be reflected.

Session 2b: Public Engagement & Collaboration with Activists (SE 1)

Tuesday, November 28: 11:00-12:30
ÖAW Campus, SE 1, Courtyard
Chair: Juliane Jarke

Gwendolin Barnard, Seeta Peña Gangadharan, Grace Nelson, Alexis Notabartolo, Klaudia Jaźwińska: Resisting the Digital Spy: US-based worker organizing and co-creating of organizing tools in Amazon warehouses

Recognizing the widespread use of intense and ubiquitous surveillance in Amazon Warehouses in the US as a critical issue for workers today, researchers at Our Data Bodies collaborated with the workers' organization United for Respect, and the wider Athena Coalition (a community coalition challenging Amazon) to support campaigns resisting algorithmic management. The collaboration demonstrates the productive exchange between scholars and workers together as activists. Associating current labor struggles with those in the past allows for a form of solidarity that breaks from the often ahistorical positioning of technological development. The object of resistance is the technological assemblage of

both soft- and hardware to optimize workers' productivity through the tracking of time-off task and the pick rate leading to high rates of health and safety instances, occupational stress and discriminatory dismissal practices.
At the core of our project was the creation of a timeline and annotated bibliography informing the factors that make the contemporary Amazon warehouse possible. This research contextualizes the experiences of US Amazon workers within a common history and brought together complementary and competing discourses of law and policy, industry practices, and worker movements throughout this history. The creation of the timeline was undertaken collaboratively with Amazon workers whose personal experiences were to be captured by contemporary additions to this history.
This research shows the interactions between business, policy and worker organizing and the narratives surrounding the development and use of new managerial capabilities enhanced by technology. The collaborative approach to this work intervened in the isolation and alienation experienced by both workers in warehouses and researchers seeking to develop knowledge in those spaces. At the same time, the move from a techno-centric view enables further and wider participation in articulating harmful managerial practices and opens up possible interventions in both the policy and worker organizing fields.

Masafumi Nishi, Wenzel Mehnert, Eva Buchinger, Michael J. Bernstein: TechEthos: Eliciting Citizens' Values & Attitudes towards Emerging Technologies through a Science Communication Game
Given the uncertainty accompanying the progress in gath of new and emerging technologies, guidelines for their development are necessary to consider social desirability accordingly. However, as RRI and STS literature points out, eliciting the social desirability of diverse stakeholder groups, involving different levels of understanding and perspectives, creates practical challenges. TechEthos (https://www.techethos.eu/) is an EU-funded project that deals with the ethical challenges connected to new and emerging technologies anticipated to have high socio-economic as well as socio-cultural impact. It aims to facilitate "ethics by design" and will produce operational ethics guidelines for three technology families (Neurotechnologies, Climate Engineering Technologies and Digital Extended Realities) for researchers, research ethics committees and policymakers. To develop these guidelines, we use a scenario-based research approach that allows stakeholders to express their values and attitudes on the ethical dimension of uncertain (new and emerging) technologies and their promises in climate engineering, digital extended reality, and neurotechnologies. By using scenarios as boundary objects, the approach allows for the integration of different levels of understanding and perspectives. In this presentation/workshop, we will focus on the works of public engagement (WP3) in which we developed a science communication game "The TechEthosgame: Age of Technology Impacts" and conducted workshops with vulnerable populations in six different European countries. The results from the expert and citizen engagements will feed into operationalizing, complementing, and enhancing ethical and legal frameworks of the technology families mentioned above. In the presentation, we are planning to give a short presentation about the project and briefly demonstrate the gameplay.

Irina Zakharova & Stefanie Büchner: Living Infrastructures – For Participatory Digital Transformation in the Public Sector

In the last decades a comprehensive change is taking place alongside the introduction of digital infrastructures and respective practices and processes into the organisational structure of various public and private actors. This digital transformation has become a political goal and a desired practice of many public actors, incorporated in their policies and governance strategies. Often, citizen participation is understood as both the means and the goal of digital transformation: citizen's expertise is required to provide adequate services while their acceptance is required for the cervices to be used.

In this contribution we argue that more often than not participatory practices of public actors fall short to achieve these goals. Rather, citizen participation in the development of digital public infrastructures is contained to short phases, for example pilot projects or prototype testing in the final stages of infrastructure design and development. The strengths of participatory approaches to identify the problems the to-be-developed infrastructure aim to solve early on and to attune their design to situated, intersecting lived experiences of its future beneficiaries are thus not fully realized. Instead, much political and financial effort is put into various pilot projects, hackathons, and citizen councils, creating 'dumps' and 'graveyards' of data and ideas. It is supported by the assumption that once a participatory technique is applied, its results can be scaled and applied in different organizational contexts.

This fails to acknowledge the STS view on digital infrastructures as becoming and living rather than stable entities which require not only technical maintenance, but also wide range of personnel and financial resources and work (by both public actors and citizens) required to be successfully integrated in the existing and changing public organizational processes. Drawing on the long-standing STS research traditions and on the sociology of organization, this contribution elucidates how participatory practices can be integrated long-term in the processes of digital transformation of public sector.

Arlind Reuter & Steven Schmidt: Learning from Older Activists: exploring digital practices and citizenship

Digital activism encompasses the use of digital technologies and digital media to create societal change. It is a highly contextualised activity that depends on a variety of political, economic, or social norms, as well as temporal or geographic spaces. Older adults' digital activism is a phenomenon with specific characteristics (Barranquero & Barbas, 2022), yet little is known about how age shapes digital activism and older adults are seldom recognised as civic agents in digital spaces. This ongoing research project explores how older adults engage with digital technologies for citizenship purposes and as part of their activist practices. We present findings from 1) a collaboratively developed manifesto on digital citizenship, 2) a persona co-creation workshop activity, in which older people created "older digital citizens", and 3) in-depth interviews with older activists conducted in Sweden over the course of 12 months. Our findings highlight structural factors that can support or hinder older adults in becoming digital activists and challenge the overarching discourse that techno-political change is driven solely by younger people. We discuss the importance of connecting research on digital activism with research on ageing with regard to future age-friendly efforts and as part of the transition into a more digitalised post-pandemic era.

Session 3a: Transforming STS

Tuesday, November 28: 13:45-15:00
ÖAW Main Building, Sitzungssaal, 1st floor
Chair: Doris Allhutter

Sarah Rose Bieszczad, Guus Dix, Jorrit Smit: Reinventing Activism Forward

"If not us, who? If not now, when? We feel that there is little time to lose in addressing the existential crisis of climate change and its intricate connections to injustices bound up with colonialism, capitalism and patriarchy. And we feel that there are multiple stances for the (European) STS community to take in engaging in activism or in helping others do so." With these words, we concluded our modest contribution to EASST review earlier this year (Bieszczad, Dix & Smit, 2023). At STS Austria we want to push this debate further by exploring the modes of research and activism that make sense in this current moment and by diving deeper into the strategies, tactics and logistics required for them to be effective.

We call this reinventing forward, to underline both the importance of intergenerational learning and situation in the present. We are well aware of not only the activist roots of STS, and the various scholars that have developed activist practices as part of or alongside their research and teaching in STS, but also of the fact that large parts of the field have become somewhat de-activated by politicizing and nuancing everything. There is a significant difference between understanding that knowledge is political and acting on that insight. We feel the need to invent new ways of acting politically on/with/alongside STS research.

Each of us will sketch one way in which STS could move (again) out of the academic niches in which it has become all too comfortable, and lay out personal experiences, political questions, and methodological expectations, to further this urgent conversation on STS and activism.

Claudia G. Schwarz: On Be(com)ing an Activist in and for STS

I start this talk by reflexively looking back at the life events, encounters, and emotions that catalyzed my metamorphosis into an activist in and for STS. I narrate this journey as a lifelong quest(ion) of transmuting my victim identity as a survivor of childhood (sexual) abuse and (sexual) harassment in academia into something more productive. I then move on to share how making my personal experience public and coining the hashtags #MeTooSTS/#WeDoSTS has impacted my life and generated momentum in STS—the latter being exemplified by the theme of this conference. I claim that despite some costs, it is totally worthwhile to become an activist in and for STS. #WeDoSTS serves as a test case for how STS knowledges and sensibilities can be employed to challenge unjust power structures and safeguard our community through new standards, methodologies, and infrastructures. I will dig deeper into how transformative justice (as a means of practicing the #WeDoSTS ethos) could be imagined and actualized equally for those who experience(d) and cause(d) harm in our community without stabilizing victim-perpetrator identities. Transformative justice is not just a process for interpersonal repair but simultaneously an innovative methodology for understanding and changing systemic dynamics in science and society. I predict that the STS of the future will be distinguished from the STS of the past by engaging in such transformative justice processes that apply our own commitments on ourselves. My presence at the conference will also be a live demonstration that digging where we stand is not akin to digging our own grave (aka career or field suicide) but rather

allows for excavating precious pathways towards a better future for all of us. Let's establish this fact together!

Robert Braun: Is STS possible without an Ontological Otherwise?

The central thesis of this paper is that science, and its applications, are captured in Western representational thought (Western ontology grounded in/grounding of Western science, Cartesian and Newtonian worldviews). A more activist STS with the ambition of deactivating this ontology, the politics and the metaphysics of which have brought us to the planetary crisis, requires first imagining an "ontological otherwise" (Woolgar and Lezaun 2013; Escobar 2019). Science, whether categorized under headings of "natural" or "social," as well as more mundane forms of performative sense-making (looking, moving, eating, loving and so forth) employ what may be referred to as a rudimentary and primitive Newtonian ontology. Space and time are assumed to be fixed to underlay material reality.

A quantum ontology (Barad 2007), one candidate for an otherwise, offers a radical ontological reconceptualization of our lifeworld. The paper argues, that quantum theory (Lewis 2016), its interpretations (Everett 2012) and implications for the socionatural (Arias-Maldonado 2015) are too important to leave them to physicists only (cf. Wendt 2015). Rescuing quantum theory from physicists' capture would open social science discussions and take post-classical theorizing in new directions. Such post-classical theorizing should form the basis of a more activist STS.

Quantum relationality points towards new forms of co-habitation, agential powers and kinship with animate and non-animate fellow terrestrials. This paper aims to show that some of our basic intuitions about the world may be plain wrong (Deutsch 2010), that we need to learn to think in terms of this breakdown that goes by the name "the Anthropocene," that we need to build on our understanding it and contribute to creating its successor. Anthropos (Western man) has constructed a world that is "out there," that is populated by determinate, observable, analysable entities – othered humans, animals, non-animate objects. Difference is at the core of Anthropos's constitution of itself as sovereign power.

The Anthropocene is not a geological but a political epoch. It is an epoch characterized by violence against other life forms, against things, by Anthropos against itself. Violence (the placement of the Cartesian cut and its politics) is the ontopolitical mechanics of the Anthropocene; any project that wants to continue the radical reflexivity and ontological turn of STS should begin with imagining and pursuing the ontological otherwise.

Session 3b: Socio-Technical Controversies

Tuesday, November 28: 13:45-15:00
ÖAW Campus, SE 1, Courtyard
Chair: Dana Wasserbacher

Carsten Horn: Datafication and Its Discontents: understanding processes of datafication and digitalization in contemporary (digital) innovation societies through emerging controversies about data centers in Austria, France and Ireland

Datafication through digital technologies is ubiquitous. Processes of turning diverse phenomena into digital data points to supposedly produce objective knowledge have far-reaching impacts. They

transform different sectors of society and bring about new ways of how we make sense of and experience the world we live in. The research project "Innovation Residues" (INNORES) (funded by the European Research Council under Grant Agreement 1010545) grapples with these transformations by comparing different fields of innovation and the residues they leave behind. It approaches data as entities with a 'biography', stretching from collection over storage to deletion, that seesaw between being 'assets' and 'waste' and requires care to be 'kept alive' to be valorized. In my talk, I will present my doctoral research project that INNORES embeds. It takes emerging protests against data centers, one of the material backbones of datafication and an infrastructure of caring for data, as a point of departure for exploring citizens' understandings of data, datafication, and digital innovations. More specifically, I ask how the controversies about data centers in Austria, France, and Ireland (or the lack thereof) illuminate understandings of the life of data and the broader processes of datafication and digitalization in contemporary (digital) innovation societies. I address this question through the lens of "problematization" that I apply to data generated through a 'comparative assemblage ethnography' that explores different ways protesters turn data centers in three nation-states that cover a spectrum of the prominence of protests and disparate arrangements of democratic participation. Thus, my research project (1) develops an original approach of describing datafication through controversies about data centers as its material embodiment; (2) responds to the gap of research into protests against datacenters; (3) brings together Science and Technology and Social Movement Studies to scrutinize knowledges and common goods at stake in these controversies

Kleinhout-Vliek Eva Hilberg, Rob Hagendijk, Paul Martin, Sarah Wadmann: A Market without Price: reflections on the promises and limits of pharmaceutical reform in the EU

The EU is currently engaged in a comprehensive reassessment and potential overhaul of its approach to pharmaceutical regulation, seeking to bring about a single market for medicines in the EU. However, as new conditions for approval are combined with changed time scales for exclusivity, this process is giving rise to concern over the practicality of these suggestions and the competitiveness of the EU on the global level. The aim of making central approval conditional on a mandatory launch of the same product in each member state has quickly become a focal point of debate, along with a turn towards a new definition of 'unmet medical need' or the category of rare (or orphan) disease. As consultations and reports seek to assess the likely effects and promises of such changes, we argue that it is critical to see the current moment in conjunction with long-established dynamics within the pharmaceutical sector, operating in a relatively opaque way based on different forms of exclusivity. In this way, we argue, the pharmaceutical sector has never actually represented a genuine market, which is also one reason why the EU's reforms are already being resisted. We employ a science, technology and society studies (STS) perspective firstly, to set out specific problem framings within the reform proposals, and secondly, to connect these to the policy instruments under discussion. Contextualising the reforms in this way highlights what is missing: access is defined in terms of regulation instead of price, and the generation of competitiveness is understood as a process that can take place without transparency in terms of pricing. In this way, the single market in pharmaceuticals within the EU continues to be a market that operates without reference to price, a situation that is not addressed by any of the regulatory conditionalities under discussion. Overall, our paper shows how employing an STS perspective offers ample opportunities for engagement with and critique of policy reforms, while inviting reflection on the politics of STS.

Christian Dayé: The Legislative Effect of Ignorance: unknowability in the debate on New Genomic Techniques (NGTs) in the EU

In science policy, many kinds of factors can cause changes in national or international regulations. Legislators might have identified an unintended deficiency and, while sticking to the principle that initially informed the regulation, decide to remedy it by reformulating it to fix some loopholes. The culturally shared understanding of a topic of concern might have changed, and lawmakers decide to adapt the legislation in order to be in line with the public opinion. Interest groups and lobbyists might have successfully presented their (or their client's) opinions on an issue. Economic conditions may change, either slowly or by an abrupt crisis, thus necessitating a change in policies (or the formulation of additional regulations). And sometimes, new technologies open up new, hitherto unregulated spaces of legal concern, thus requiring the formulation of new rules (as most recently happened with Artificial Intelligence).

This paper describes yet another type of factors that can cause changes in science policy. It concerns itself with the ongoing policy debate in the European Union (EU) on how to regulate the use of New Genomic Techniques (NGTs) in plant breeding. A 2018 decision by the Court of Justice of the European Union (CJEU) made clear that NGTs were to be legally treated as GMOs. Due to the precision of NGTs, however, it is very hard to find out, without proper documentation, whether a mutation has happened, and if so, where. Also, even if a mutation is found and located, it is technically not possible to determine whether it was produced by the use of technology or occurred naturally. This ignorance, however, creates political pressure, and it is the aim of this article to describe this ignorance as a factor (most likely) causing a policy change in the EU. The combination of (i) other world regions beginning to install less restrictive policies towards NGTs (among them important agrarian regions like South America and China), (ii) the lack of a method to determine whether or not an incoming produce is NGT-free, and (iii) a legal situation where NTGs have to be treated as GMOs (meaning that virtually no GMOs are allowed to be marketed in the EU without permission by the community of states) puts the EU into a situation where it cannot execute its own legislation.

Session 4a: Towards More Engaged STS!?

Tuesday, November 28: 15:30-16:45
ÖAW Main Building, Sitzungssaal, 1st floor
Chair: Bao-Chau Pham

Jutta Weber: Staying With The Military Trouble. On STS, Military Technologies and Activist Practices

In 2022, the total budget of the world's militaries exceeded $2 trillion and more than fifty states were engaged in armed conflict. Wars do not only lead to death, destruction, refugee movements, ecological disasters and the devastation of cities and landscapes, but also to the disruption of global supply chains, energy markets and food systems. In addition, the funding of military research and the development of the military-industrial complex(es) has had a huge impact on our societies since the Cold War.

Given the global social, political, ecological dimensions and the impact of warfare and the defence industry, as well as the multiple discourses and contested narratives, imaginaries, but also practices around (future) combat systems, there is astonishingly little research within STS on the industrial-

military complex. A complex that emerged in the early 1960s and was a prominent issue in the early years of STS. With the 'drone wars', the recent Russia-Ukraine war, and the development of autonomous weapon systems, military technologies have received more attention in recent years. Nevertheless, I would argue that the scope of research on military, technology and society is still marginal given the enormous impact of the military-industrial complex in our (new) world (order).
In my paper, I will briefly outline the history of STS research on warfare, the defence industry and technopolitics, and discuss the reasons and effects of its current reluctance to address these questions. I will ask how we can conduct critical research in this field (which often makes traditional empirical research difficult, if not impossible), but also develop activist practices or cooperate with activist movements.

Max Fochler & Lisa Sigl: A "hinterland" for relevant STS research? What practices help us developing more relevant research and career paths?
In a recent paper project, we have drawn together empirical perspectives and conceptual approaches to understand the range of practices researchers have at their disposal for developing more relevant research and career paths. On this basis, we discuss how a hinterland of practices (Law 2004) for relevant research could be routinized in academia. The metaphor of hinterlands allows to imagine how competencies serve as important condition for relevance, tacitly structuring researchers' motivations and making some kinds of decisions in research and career-making easier to take than others.
Based on biographical interviews (in the field of soil research), as well as an interdisciplinary literature review, we develop a typology of four practice areas that we imagine as actionable for researchers who aim to reorient their research towards more relevance, and as useful for structuring support for relevance within research communities and institutions (e.g., through career development and teaching, or with specialized staff). Our aim was to contribute to "transformation knowledge", a body of knowledge that focuses on facilitating change towards more relevant research in academia and conclude that a longer-term, bottom-up perspective is complementary to currently rather short-term and top-down policies to support relevance.
In our contribution to the STS Austria conference, we want to apply this perspective to ourselves, and the field of STS. We want to discuss what kinds of practices could routinise our engagements with society, and how we can individually and collectively re-orient STS knowledge production in support of our aspirations to foster liveable futures.

Samuele Fratini: Conservative Methods for Progressive Purposes: What the STS Can Do for the Future and Why It Is Not Doing It
Digital technology is growingly perceived as one of the major issues of our age. Yet, salience often comes along with imprecision. More or less Luddite stances are blooming from privacy and surveillance to AI. But throwing the baby out with the bathwater would be a mistake. Techno-pessimism has resulted in a so-called "regulatory turn" (Flew & Wilding, 2021), and several social groups value the need to act and steer digital innovation. "Our age is the age of design" (Floridi, 2020) in the extent to which a multidisciplinary group of experts is committed to re-orienting technological development toward a desirable human future. Among those experts, the STS community appears to be missing in action. While the STS gained its momentum from the analysis of sociotechnical

controversies, it gave up on burning political questions very early (Feenberg, 2017) and scholars largely avoid providing normative considerations (Johnson & Wetmore, 2008). While some scholars attributed this agnosticism to Bijker's "detour into the academy" (1995: 5), the debate over the political role of the STS has always existed within the field. Langdon Winner himself criticized the STS for its "[…] disdain for anything […] that might help people judge the possibilities that technology presents" (1993). Ironically, the STS' potential effectiveness in contributing to the current challenges would be hard to overstate. While mainstream scholarships to digital media have been attempting to understand the social consequences of technology through deterministic, causal, and oftentimes reductionist approaches, the STS has always proved effective in restoring sociotechnical complexity, staying with the trouble, and finding out the society in the machine. The present contribution puts forward a series of topics where the STS would be extremely helpful in establishing a human-centered innovation regime. Conversely, these topics are accompanied by a critical understanding of the reasons that burned the bridges between the STS and normativity, ethics, and political engagement.

Session 4b: Activist Practices of STS Scholars

Tuesday, November 28: 15:30-16:45
ÖAW Campus, SE 1, Courtyard
Chair: Dana Wasserbacher

Silke Beck & Michael Nitschmann: Mapping the possibilities for STS to actively engage in democratic and sustainable climate futures

Human-induced climate change is one of the defining crises of the 21st century and is underpinned by science and calls to follow science. For over 30 years, STS scholarship has sought to understand the role of science in the emerging landscape of climate politics. Case studies in STS have explored how mainstream climate science assesses policy solutions and maps the corridor of political action, often resulting in linear and one-dimensional tunnel visions and scalable techno solutions. In response to perceived crisis, STS scholars often raise the question of how they can engage in politics in a more active way. The push towards a more democratic form of climate politics is happening across a range of spatial scales, documented in studies of how terms like "adaptation" are made and circulate; of how democratic local reckoning with climate change might be scaled up; and in work showing the multiple ways diverse publics and grassroots communities are already participating in, and driving, sustainability transitions through their own diverse framings of the problem, models of expertise, and modes of practice (Chilvers et al., 2021).

To situate STS scholarship in the changing policy landscape, we systematically reviewed cases of real-world STS engagement in climate politics since 2015. Based on co-productionist framework, we develop a heuristic to map choices and roles that STS scholars perform in their engagement practices. We analyse how STS scholars do engage in practice, when, and with what outcomes. Our mapping of choices illustrates the diverse spectrum of roles and possibilities. It also visualizes how the varying choices in the design of engagement shape what, and who is targeted by engagement efforts and coproduces particular results. Based on our mapping exercise and findings, we discuss options for STS scholars to experiment with participatory approaches in climate politics. Thereby, our research sparks important questions about our own reflexivity and normativity.

Michael Ornetzeder: It could be otherwise: Tracing and exploring alternative realities with STS research

In this presentation, I aim to share insights drawn from three decades of STS inspired energy research. Using an interdisciplinary perspective this research has repeatedly shed light on often-overlooked, small-scale, and at that time marginalized developments of sustainable or otherwise alternative energy innovations. My primary objective in these undertakings has been to explore the potential for alternative pathways and provide helpful insights for activists, decision-makers, and the scientific community. It is important to mention that this research has never aligned with political activism. Instead, it represents a steadfast commitment to a rigorous exploration of alternative futures. In this context, STS research within the energy domain has acted as a supportive partner to individuals and groups engaged with alternative forms of energy technologies. Amidst these research pursuits, it is crucial to dispel any misconceptions. My approach within the field of energy-related STS research has consistently avoided overtly activist roles, opting instead to maintain a supportive and collaborative stance. This nuanced perspective fosters a mutual relationship between academic inquiry and real-world activities, nurturing an environment conducive to innovative ideas. For instance, consider the early pioneers of the solar technology movement. Through their collaboration with STS researchers, they have gained valuable insights into their actions, leading to increased reflection on their practices. This reflective stance has, in turn, significantly contributed to the development and acceptance of sustainable solar energy technologies. By illuminating less conventional paths, STS research may serve as a valuable tool for identifying, understanding, and framing activities that exist outside conventional paradigms. It enhances my comprehension of the diverse range of possibilities that exist beyond mainstream narratives. Consequently, it stands as a vital resource for decision-makers and stakeholders navigating the complexities of energy transitions and sustainability challenges in an ever-evolving landscape

Miedema Marije: Big Oil, Big Tech & Big Science: reflections from a scientist and a rebel

In this paper, I critically reflect on being an STS researcher and a climate activist with Scientist Rebellion. Specifically, I am reconciling scholarly research into current personal digital archiving practices and possibilities for sustainable future engagements, and activist research, mapping the ties between Dutch Academia and the fossil fuel industry1.At first, the aim was to keep these two approaches separate, but the more apparent the ties between Big Tech and Big Oil become, the blurrier the boundaries between activism and scholarship get. Current personal digital archiving practices have material environmental impacts; ICT contributes substantially to GHG emissions. This can in part be explained by the dependence of Big Tech on Big Oil, while they claim to be carbon neutral or negative, they are collaborating from the discovery up until the marketing of fossil fuels (Greenpeace,2020). Big Data is not the new oil, it demands new oil. To regain agency over our valuable personal memories, now existing within complex infrastructures governed by commercial actors, I explore opportunities for commons-based collaborations with cultural memory institutions. Big Oil is also closely tied up with academic institutions. To put pressure on the demand from a large segment of the academic community to cut these ties, I am engaged in research practices that aim to highlight the knowledge infrastructures in which I function as an academic. Together with other activists, I'm sending requests under the Dutch Freedom of Information Act to uncover the fossil ties of my home institution, analyse these documents, and contribute to media interventions. By reflecting on how Big

Oil, Big Tech, and Big Science come together and showing the points of friction from a personal perspective, I aim to facilitate a broader discussion in STS on the boundaries of activist engagement as academics.

Session 5a: Scholar-Activists: Roles & Identities
Wednesday, November 29: 09:30-11:00
ÖAW Main Building, Sitzungssaal, 1st floor
Chair: Katja Mayer

Karen Kastenhofer: From a Normal and a Post-Normal-Science Ethos to a Survival Science Ethos?
Weber in his famous 1919 treatise on 'science as a vocation' claimed that university lecture halls were not the place to articulate value statements, not even in defense of democracy. In his view, the demarcation of science and politics had to be maintained for the sake of both realms; even (or, all the more?) in a historical situation in which democracies were under siege. When Merton outlined a set of norms for a shared scientific ethos in 1942, he focused on the sharing of research results within the scientific community, the aspiration of universalism, the safeguarding of disinterestedness and the institutionalization of scrutiny among peers. Again, the clear demarcation of science and other societal spheres was fortified; this time against the historical background of the National Socialist instrumentalization of science for autocratic and holocaust agendas.
Proponents of post-normal science since the 1990s have advocated distinct adaptations in cases where societal stakes were high, uncertainty prevailed, values unclear and decisions urgent (Funtowicz and Ravetz 1993). They did so against the background of then well-established Western democracies and economic prosperity. The norm of universalism was superseded by one of multi-perspectivism; the separation of facts and values, of science and policy was depicted as less straight forward. Advisory science scholars keep contributing to a lively discussion on relating issues (from Weimer and Vining 1988 to Pielke 2007), re-opening questions about an adequate and/or observable post-normal scientific ethos (cp. Kastenhofer 2022).
Since the 1970s, scientists within some fields have also taken to more direct political engagement. Egan (2018) traces the origin of relating 'crisis disciplines' and 'survival science' back to the 1970s, with discussions being especially vivid in the context of conservation biology. With the currently more than ever apparent climate emergency, we observe (and partly engage in ourselves) a new wave of science activism. Scientists issue political statements with calls for imminent action; they get organized and take to the streets. It is very likely that the various ethos linked to various stances co-exist in parallel within the scientific community at large. Overall, we can differentiate a normal science paradigm with a primarily analytical stance from a post-normal science paradigm with an advisory stance and a survival science paradigm with an activist stance.
But little is known, yet, about how many scholars identify with the new trend of survival science activism, what kind of shared ethos underpins this activist paradigm and whether it will be robust enough to sustain survival science as a functional societal sub-system within contemporary democracies. In this contribution, I aim at putting the three paradigms and their ethos up for discussion.

Waltraud Ernst: Knowledge as Collective Method and Practice

Science claims anew authority against fake news. At the same time, science calls for participation of "citizens", "stakeholders", "activists" to participate in collective knowledge projects. Both of these moves are aspects of the present crisis of democratization of science. It creates a major opportunity for STS to reflect on where it stands. Especially feminist STS has always been related to activism, some even claim that feminist theory is "intellectual activism" (Collins 2012). I will examine this positioning by delving into the example of feminist resistance to reproductive and genetic engineering "FINRRAGE" (Stevienna de Saille 2017). De Saille shows that FINRRAGE's cognitive praxis was not only based on an oppositional consciousness, but elaborated an oppositional "conscienceness" as "the combination of raised consciousness and a moral imperative towards particular kinds of action, a general and transferable cognitive meta-frame" (De Saille 2017, 228) as well as "organisational strategies for creating knowledge for resistance" (De Saille 2017, 243). In recent epistemological reflections on activism against algorithmic discrimination and the enhancement of inequalities by digitization, a shift appeared in positioning data activism as "a series of nuanced phenomena that position themselves in a continuum between contestation and recognition" and grassroots data politics as "affirmative engagement with data" on one side and "resistance to massive data collection" on the other. (Stefania Milan/Lonneke van der Velden 2016, 61)

In my paper these two initiatives towards sociotechnical endeavors of major transformative change are presented in their ambivalent positioning. My analysis draws on feminist epistemology as an epistemic strategy to make sense of knowledge projects within major relations of power. In accordance with "agential realism" (Barad 2007) I connect epistemology with ethics to develop a new understanding of sociotechnoscientific activism. Thereby, I also draw on „decolonial, feminist, intersectional ethics, aesthetics and politics of AI aimed at destroying the bio-necro-technopolitical machine" (Paola Ricaurte Quijano 2022, 739).

Sérgio Barbosa: Beyond the Consent Form: playing with fire on WhatsApp research

This paper discusses the challenges of conducting digital ethnography on WhatsApp-based activism. Pro-democracy activists organized political activities in private WhatsApp groups to struggle against the rise of a resurgent authoritarianism, as well as to gather support for a progressive agenda at the local level in Brazil. These political activities organized on private groups are emerging forms of action repertoires meant to be online at first glance but combined with on the ground activities. This researcher disclosed his identity for all group members to initiate the data collection. The (physical) consent form of all group members, however, was not collected. The paper drives from the digital ethnography to discuss ethical challenges faced when researching these closed communities at messaging services level. The study case raised a pivotal research question: What(new) guidelines should be taken in account for making ethics decisions beyond the consent form when investigating private chat apps? This ethical conundrum can be faced depending on three main approaches: affinity, affordances and beyond the consent form. The paper aims to generate discussion on the challenges and the barriers to conduct research at chat apps domain. It recommends(new) guidelines to ethical committees while reflecting of the unbalanced position as a researcher-activist and as an activist-researcher. It suggests a recursive, iterative and dialogic negotiation capable of involving research subjects, a transparent research agenda and methodology, full anonymization of research subject, and re-centralization of the research subject at the core of the process, under the principles of "do no

harm”. To conclude, the beyond the consent form approach is very much desirable when executing digital research with pro-democracy groups mainly based on chat platforms.

Raghvendra Singh Yadav & Swati Kumari: Comparative Analysis of Activist Practices among STS Scholars in Europe and Asia: a study of key contributors and their impact

This research delves into the multifaceted world of activist practices within Science and Technology Studies (STS) by conducting a comparative study between Europe and Asia. Focusing on the work of prominent STS scholars from both regions, this study explores the diverse ways in which these scholars engage in activism and examines the intricate relationships between conducting STS research, participating in political activism, and providing policy advice. In Europe, we highlight the contributions of Dr. Michael J. Sandel for his work on the ethical dimensions of emerging biotechnologies. Dr. Michael's research, exemplified by his seminal Book "The Case Against Perfection: Ethics in the Age of Genetic Engineering", has had a significant impact on shaping bioethical discourse all over the world. On the Asian front, Dr. Meghnad Saha stands out as a leading figure in the area of Astrophysics. His groundbreaking work made significant contributions to the field of nuclear physics and left an indelible mark on the scientific community. Dr. Saha's exceptional scientific endeavors have not only advanced our comprehension of the universe but also inspired countless researchers and students to explore the mysteries of the cosmos, leaving an enduring legacy for the benefit of society. His contribution to a hydraulic research laboratory, irrigation research in India, planning for the Damodar Valley, the Damodar Valley reclamation scheme, multipurpose development of Indian rivers, public supply of electricity in India, national fuel policy, oil and invisible imperialism, fuel in India, some constitutional hindrance to the development of India’s national resources, development of resources and Indian constitution, mineral sources and mineral policy, the problem of industrial development in India, the automobile industry in India, industrial research and Indian industry, industrial policy of the Planning Commission, scientific research in national planning, principles of regional planning, problems of independent India. The article provides a comprehensive overview of Europe and India’s Science policy, including its history, development, and future prospects. Through a comprehensive analysis of these scholars' works, interviews, and case studies of their activist engagements, we aim to address the following key questions: What forms of activism do STS scholars like Dr. Michael and Dr. Meghnad Saha engage in, and how do these practice s differ between Europe and Asia? What motivates these scholars to become activists, and how do their motivations shape the impact of their activism on science, technology, and society? How does the role of STS scholars as political activists intersect with their roles as advisors to policymakers, and what insights can be gleaned from their experiences in Europe and Asia? In an increasingly interconnected world, this study highlights the critical importance of cross-cultural collaboration and knowledge exchange within the field of STS.

Session 5b: Conceptual Approaches for Caring Research I
Wednesday, November 29: 09:30-11:00
ÖAW Campus, SE 1, Courtyard
Chair: Andrea Schikowitz

Iara Franco Schiavi & Sérgio Amadeu da Silveira: The Data Journey approach and SNT in the Brazilian sociotechnical context

This work on progress aims to contribute methodologically and theoretically to critical data studies by investigating and listing concepts that should be considered in investigations of sociotechnical studies operationalized in contexts of the Global South. The objective is thus to encompass the contributions of the data journey approach and the mapping based on Actor-Network Theory (ANT) (Latour, 2012), but at the same time to problematize them as constructions aimed at investigating the sociotechnical reality in the Global North, so that the transfer of such approaches to conditions of the Global South demands conceptual and operational adaptations aiming to contemplate a colonized context. Therefore, the proposal of data journeys (Bates et al., 2016) and ANT are used to investigate the complexity of data movement in the public administration of the city of São Paulo but is require an adaption in them to understand and cover more the regional specificities. Conceptually, the datafication proposal used here is understood as the conversion of life flows into data flows (van Dijck, 2014) to problematize the growing collection of data by the State and technology companies to control and modulate (Deleuze, 2000) social processes, and behavior. It argues for the need to insert conceptual variables that increase the complexity of sociotechnical research, e.g., data colonialism (Couldry & Mejias, 2018), technological dependence, national sovereignty (Silveira, 2022), informality, and coloniality of power (Quijano, 2009), when seeking to understand the socio-material context of datafication in the city of São Paulo. It is concluded that these qualitative research approaches are flexible enough to be inserted in a colonial context, if macrosocial variables can be worked critically for a more realistic analysis of the sociological complexity associated with economic, political, and social aspects.

Rafaela Cavalcanti de Alcântara: "Cambia, todo cambia": Cuerpo-territorio and buen vivir as lenses to reflect on data commons

"Data commons" initiatives aim to place control over data in the hands of communities. The European DECODE project (decodeproject.eu), for instance, "provides tools that put individuals in control of whether they keep their personal information private or share it for the public good" and it is an example of how data commons platforms may be presented as alternatives to Big Tech services. This paper reflects on this initiative to illustrate debates in Western territories regarding counter-hegemonic data uses in welfare contexts and shows how this approach might be expanded through decolonial lenses. With this purpose, it engages with two Latin American perspectives. The first one is buen vivir (Sumak Kawsayin Quechua; in English, the concept has been translated as "good living", "living well", or "well living"), an Andean indigenous concept that, through a community-centered approach, questions Western and liberal notions of development (Acosta, 2016). A dialogue between critical data studies and buen vivir has already been covered by Milan and Treré (2021), for instance. The paper also invokes cuerpo-territorio (body-territory in English), which has been developed as a Latin American epistemology, statement, or idea that calls attention to the inseparability of the

individual body from the collective body, and the human body from the territory (Gago, 2020; Cruz-Hernandez, 2016). It challenges, among others, "the abstract character required by the individual property owner of (neo)liberal modernity" -therefore helping to raise awareness about new extractivisms, such as the impact of algorithm performance (Gago, 2020). By thinking about the DECODE project through cuerpo-territorio and buen vivir, the paper offers new perspectives on the notion of the data commons. Thus, it aims to expand critical debates on data that challenge views and uses that commodify them, exploring how decolonial views on technologies and data commons may influence communities' lives in Europe.

Aviram Sharma: Energy Democracy: A Transformative Concept or a Buzzword?

Energy democracy (ED) is advocated as a tool to move towards a renewable-based, just energy transition by activists and scholars in many industrialised countries. Advocates promote it as a transformative concept ensuing wider democratic engagement of diverse marginalised actors and local communities in energy governance, whereas critiques depict it as a new buzzword. The debate on energy democracy is still largely limited to Western, industrialised countries. Against this backdrop, we will systematically review the literature on energy democracy to delineate the geography of energy democracy. We will analyse the socio-political principles based on which the ideas of democratisation, public engagement and civic participation are envisioned in energy democracy. In addition, we will focus on the characterisation of the common public in such projects using the STS lens and how their participation and engagements are envisioned for operationalising a low-carbon energy future. After setting the conceptual framework, we will analyse how the concept of ED is employed by activists, NGOs and scholars in the global south to drive a low-carbon transition. Rural areas have emerged as hot spots where state and non-state actors are implementing several renewable energy-based interventions. Agrarian societies of the Global South are often divided along deep socioeconomic fault lines. Material possessions and resource use are limited and environmental subjectivities of the rural public are quite different from the post-industrial societies. In such a situation, how does the democratic participation of diverse unequal groups play out in governing the low-carbon transition envisioned by NGOs and other civil society actors? Drawing from the Dharnai experiment of Greenpeace India from rural India, this paper will explore the opportunities and limitations of operationalising the concept of energy democracy in a resource-constrained, hierarchical and unequal society of the developing world. The paper argues that the conceptualisation of the "public" in energy democracy needs to be rooted in the socio-political realities and not merely based on the universalist imaginaries of consumers, prosumers and citizens. This paper will contribute to theorising energy democracy ideals in spaces beyond the liberal democracies of the West.

Louis Ravn: The Politics of Boundary Work: rethinking boundary-work as a matter of care

The concept of boundary-work (Gieryn, 1983), denoting the rhetorical work which variably demarcates science from non-science, has long been a fruitful concept within STS. While its initial theorization neglected the role of power differentials, recent empirical research demonstrates that the performativity of boundary-work depends on positionality (Pereira, 2019). Against this backdrop, this paper advances a reconceptualization of boundary-work as a matter of care (Puig de la Bellacasa, 2011). The now rich body of STS theory proposing to understand researchers' world-making practices as matters of care highlights that scholarly engagements with technoscientific worlds are inherently

fragile and affectively charged. As such, STS concepts, such as boundary-work, are potentially, but never certainly, at the disposal of researchers engaging in activism and politics.
Thinking through boundary-work as a matter of care allows a renewed conceptualization in terms of three central tenets. First, boundary-work can be seen as continually enacting, attuning us to the practice's continuity, its possibilities for change, and attendant ontological politics. Second, boundary-work emerges as locally situated, thus directing attention to its embodied situatedness and the imperative to listen to marginalized voices. Lastly, boundary-work becomes affectively charged as it potentially creates and excludes connections, is always steeped in historically grown power relations, and necessitates response-ability in its enactments.
This renewed concept of boundary-work as a matter of care foregrounds the politics of boundary-work by highlighting the onto-epistemological entanglements (Barad, 2007) into which STS scholars enter, thus providing the basis for a discussion of and reflexivity about them. By rethinking the crucial STS concept of boundary-work as a matter of care, this paper contributes to discussing and coming to terms with the politics of STS

Session 6a: Activist (Counter-) Expertise

Wednesday, November 29: 13:45-15:00
ÖAW Main Building, Sitzungssaal, 1st floor
Chair: Bao-Chau Pham

Andrea Schikowitz & Sarah Davies: Communicating engaged expertise: How housing activists exchange and negotiate techno-political knowledge

STS has a long history of studying and engaging with activism on technoscientific issues. In this paper we explore a case of housing activism, paying attention to how activists communicate knowledge and expertise about the techno-political issues with which they are engaged. Doing so, we contribute to STS literature on (lay) expertise in public controversies. We find that activists balance legitimising their expertise through established technoscientific standards with enacting counter-expertise as alternative to and missing in mainstream debates, and therefore ask: How might we use such practices in our own engaged scholarship?
We draw on a case study of self-managed housing groups in the city of Vienna, based on a multi-sited ethnography conducted by the first author since 2018. These activists – whose aim is to realise more just, diverse and de-commodified ways of housing and living – rely on a broad range of technical, social and political knowledges for realising their practical and political aims. They need to communicate and legitimise their expertise to collaborators and allies, broader publics, political and planning actors. We analyse their public communication (websites, social media accounts, and events such as panel discussions, guided tours, and workshops, complemented by interviews), to suggest that this is contextual and reflexive. Technical knowledges are always contextualised through the activists' political concerns, while communication modalities are constantly reflected upon, leading activists to combine commercial and alternative digital tools with offline communication.

Sarah Schönbauer: Environmental-Engagement: Marine Science between Science and Activism

Climate change is leading to multi-layered and complex changes. These changes have social, epistemic, economic and political implications. In this talk, I focus in particular on the impact of climate change on the scientific community and the positioning work of scientists. I ask: how do scientists perceive environmental change and what are the social and epistemological dimensions of this perception? In my case study, funded by an Erwin-Schrödinger Postdoctoral Fellowship (FWF Austria), I focus on marine scientists and how they deal with climate-change-related environmental change in marine and polar regions. The ocean is characterized by rapid environmental changes. The marine scientists I portray are usually deeply touched, if not shocked, by what they study. These emotional experiences inform their research as well as their scientific outreach and protest activities. Marine researchers investigate environmental changes as part of their field research, publish their findings in scientific papers, and share their research as public advocates. In addition, they protest as activists for the introduction of political regulatory measures to address these environmental changes. Marine researchers thus position themselves as both traditional scientists and activists. I conceptualize researchers' experiences and actions as environmental engagement and present two forms of environmental engagement along this concept, in research and in protest activities. I show that environmental engagement has collectivizing effects and serves coping mechanisms, and that it is equally embedded in a competitive scientific work reality. My study provides new insights into the relationship between environmental change, scientific work, and protest activities in times of climate change. I will think along my results as a blueprint for other disciplines. Not only marine scientists, but also scholars in Science and Technology Studies must reflect on what kinds of positions and environmental commitments are needed in present and future worlds that are dominated by climate change-related changes

Thomas Zenkl: Everyday Algorithmic Activism

Studies on activism and resistance against the harmful effects of algorithms are often limited to those (organised, open, observable) practices that emerge in response to negatively perceived impacts. However, as techno-social relations of epistemic violence are embedded in structural inequalities, rarely operate through modalities of direct force, and frequently manifest indirectly, they often elude peoples' everyday experiences of algorithmic subordination. Thus, "ordinary" users are being denied their ability to resist conceptually and methodologically, as research is confined to the perceptions of "elites" who are not only able to recognize algorithms and their doings, but also to formulate and articulate critique.

In my submission, I aim to present an interpretation of "resistance" against the powerful normative claims and the epistemic harms posed by algorithmic technologies that transcends a narrow focus on the direct, outspoken, and politically articulated acts of critique, that necessarily depend on knowledge, literacy, awareness, and skills and are therefore centred around the epistemically privileged. Instead, and by challenging common understandings of "resistance", I argue for a perspective that recognises the subtle, silent, routinely, not politically articulated or formally organized act of resistance that emerge in opposition to normative articulations of algorithmic truth claims and represent "everyday" acts of activism and resistance. Thus, my aim is to provide an understanding of the resistances to the algorithmic management of daily experience as a tactical bottom-up response to the emergence of fissures in algorithmic power.

Session 6b: Conceptual Approaches for Caring Research II
Wednesday, November 29: 13:45-15:00
ÖAW Campus, SE 1, Courtyard
Chair: Gwendolin Barnard

Axel Stockburger: Technopolitics: Innovative Formats at the Intersection of Art, Research, Science, and Pedagogy
Technopolitics is an independent, transdisciplinary platform of artists, journalists, researchers, and activists who jointly develop innovative formats at the intersection of art, research, science, and pedagogy. It was initiated as a space for lectures and discussions in 2009 and later began to produce interdisciplinary conferences, exhibition formats and artistic research projects. Our common objective is the investigation of large-scale historical processes structured by technoeconomic paradigms from a critical, explorative standpoint. We develop methodologies that generate shared knowledge frameworks for the discussion of specific problems in this context. At STS Austria 23 we propose to present three projects highlighting our approach: The objective of the Technopolitics Timeline is to investigate historical processes structured by techno-economic paradigms through a collection of events from the fields of art, activism, culture, media, politics, economy, technology, and social life that have been relevant for shaping the information society. The timeline functions as a tool to display these events distributed in space simultaneously, thus making relations, omissions and connections visible at a glance. It was presented in different international cities, each time accompanied by an editing workshop, facilitating trans-cultural and trans-disciplinary exchange in order to avoid one-dimensional cultural perspectives of the history of technopolitical events. For Deep Horizon: The Culture of Forecasting, at Kunsthalle Wien, Karlsplatz, Technopolitics developed an exhibition, as well as a set of talks, discussions, workshops, and games, focused on the role of forecasting as a way of providing an aesthetic of the unknown and shaping the uncertain. Under the Curve was an artistic research project about statistics, surveillance and forms of digital capture, which took place in public space in Vienna in 2021. We produced an analogue game in public space to situate the topic between performance and 'serious game'. www.technopolitics.info

Dario Feliciangeli, Carina Liersch, Illia Litvin, Paul Wünderlich: (Re)collecting Change, Changing Recollections: how can student voices multiply institutional histories
In response to the conference theme, “Digging where we wtand: Activism, Community, and the politics of STS,” our contribution delves into the role of student collectives in creating "new histories" of departmental structures and academic institutions. We explore how both formal and informal student communities and activism can catalyze transformation within these institutions and influence the distribution of power within them.
Our contribution centers on our experiences as students within the STS Master Program at the University of Vienna, a program currently undergoing a process of institutional change, sparked by the #WeDoSTS movement. We, as part of a newly founded student council at the department, want to approach these recent changes in an archaeological manner, recollecting our own and other Master and PhD students' experiences. By recalling these memories, we aim to present our situated take on the current "work in progress" and situate it in relation to different past and future epistemologies of our department. Trying to establish more just and reflexive institutional environments - and learning

about some historical traces of the department1 - has prompted us to question who is capable of writing histories of academic institutions and which voices these histories represent. Can the current changes at the department also be recounted through the voices of students, and can they become part of this well-refined history? We, as a small part of the whole student body, do not want to offer definitive answers to the ongoing process. Neither can we speak for the experiences and opinions of others. This is why with this project - which consists of a collection of short vignettes - we want to offer a multitude of situated opinions, perspectives, and stories. To achieve a diversity of voices, we plan to invite current and former Master and PhD students, and students working at the department. Through vignettes, we hope to make these voices integral to the nuanced and evolving history of our academic institution.

Doris Allhutter: Ethnography and Political Resistance: revisiting the activist origins of mind scripting
In the late 1970ies, Marxist feminist collectives began investigating the processes by which women construct themselves into existing power relations. Carving out the collective method of memory-work, Frigga Haug (1990) and colleagues asked how subjects appropriate societal structures and how individuals and collectives reproduce these through everyday theories and sense-making. The method argues for active intervention and change by tracing the social conditions reflected in our mundane memories and questioning the ideologies that colonize a (research) field. Over 30 years, collective memory-work has been applied and adapted in a multitude of projects across the globe.
Asking how social inequality and ideologies of human difference co-emerge with sociotechnical infrastructures, I have used collective memory-work and an adapted version called mind scripting in teaching and research for over 15 years. In my initial adaptation, I integrated Haug's ideology-critical and emancipative goals with the objective of researching the normativity of computing practices and implementing deconstruction in design practice. Later, I started thinking with new materialism and queer-feminist affect studies to analyze the intra-acting modes of infrastructural power that computational concepts, methods and practices enact.
The theoretical and methodological reworking of the method supported its adaptation to STS issues and concepts. In combination with other ethnographic methods, mind scripting has been an extremely rich analytical tool for me to explore techno-epistemic imaginaries, ideologies, and normativities. However, this move also complicated the language used in applying the method, and communicating research results needs to pay more attention to the transformative experience it offers. This talk revisits the activist origins of collective memory-work and the ideology-critical trajectories of adaptations around the world. Mind scripting aims to find ways to articulate techno-scientific objectives and sociotechnical practices in political terms. I want to explore the different ways these political terms can be communicated by reflecting on emancipative moments that different versions offer.