ARCHITECTS OF THE FUTURE

European Policymaking in Times of Uncertainty, Technological Disruption and Societal Adaptation

8th Open European Dialogue
6-8 October 2023 - Helsinki

OPEN EUROPEAN DIALOGUE

This research package accompanies the conversations that took place among members of parliament at the 8th Annual Policymakers Dialogue from 6-8 October 2023.

It is meant as a prompt for conversation and is not intended to represent an exhaustive review of existing literature.

We thank our partners and experts for the contributions made towards the materials shared.

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Politics in a brave new world

1. WHY ARE WE HERE? POLITICS IN A BRAVE NEW WORLD

Being a politician in times of heightened uncertainty and ambiguous futures is a challenge which is felt across the continent and regardless of political colours.

During times of significant transformation, the responsibility of politics to offer guidance on how to steer society becomes particularly poignant.

Our society could be evolving today at a faster pace than ever before.

What does this pace of change mean for the political sector?

How does it affect the way we imagine the future?

A brave new world?

Technological innovation has the potential to radically alter the political playing field due to its profound and often ambiguous societal, economic, and ethical implications.

Recent developments surrounding the use of generative artificial intelligence are but the latest examples of the pace and depth of

change with which politics is confronted.

Beyond the obvious influence on the way in which we consume and make use of information, these technological advancements affect the way we think about environmental policy, the future of the labour market, issues of migration and mobility, as well as foreign policy — to name a few of the affected policy areas.

The tools and approaches available to policymaking, though, are also changing. Many governments are experimenting with innovative governance instruments as technology opens new possibilities for the political sector.

Dialogue Resource: Pulse of the Times: Emerging Technologies

Presented by Aleksandra Przegalińska, Associate Professor and Vice President at Kozminski University

A time for difficult conversations

There is an evident tension between those who see technology as a welcome solution to our societal challenges and those who see the need to urgently address the harm these technologies can bestow upon the well-being of individuals and societies.

The divide grows deeper as a clear path on how to regulate emerging technologies is yet to be found.

Difficult conversations will likely take centre stage in political arenas across Europe, as policymakers will need to engage in complex debates with their constituencies and assist citizens in navigating the evolving relationship between technology, politics, and society.

Against the backdrop of the upcoming EU elections and the European Commission's plan for a twin green and digital transition,[i] national and European policymakers are tasked with building an effective regulatory architecture.

This policy window, while demanding, reveals radically novel opportunities for politicians to have a profound impact on the way we design the future of our societies.

Our dialogue

At the 8th Annual Policymakers Dialogue, 51 members of parliament had a chance to explore today's policymaking challenges through the lens of technological advancements that are changing the world we live in.

By taking into account the perspectives of policymakers across different European countries and parties, we can arrive at a deeper understanding of the complex challenge of regulating disruption and guiding society through fundamental change.

At the 8th Annual Policymakers Dialogue, policymakers examined their own role as architects of our societies' futures. They exchanged insights and first-hand experiences, reflected on value tensions, and shared best practices.

The following chapters serve as a resource for policymakers across Europe who are facing the challenge of finding new solutions in times of uncertainty and change.

GUIDING QUESTIONS

How can politicians approach the regulation of emerging technologies?

How can politics prepare for the potential rise of new societal disparities and ruptures?

How will political forces position themselves vis-à-vis new forms of global competition driven by technology?

How can politicians fulfil their role as architects of our societies' futures while standing on ever-shifting grounds?

ARCHITECTS OF THE FUTURE

Policymaking in times of uncertainty

2. ARCHITECTS OF THE FUTURE: POLICYMAKING IN TIMES OF UNCERTAINTY

In the context of a rapidly changing world, politicians are called to make sense of shifting global power dynamics while grappling with a society in constant evolution — accelerated by disruptive technologies that are changing how we think, work, and function together.

The challenge of formulating effective policies in an environment marked by unpredictable events and complex interdependencies could require new approaches and attitudes for political decision-makers to be able to constructively regulate society. Being a lawmaker operating in such conditions perpetually raises new and complex ethical issues and dilemmas with no easy fixes.

How is the world we live in changing?

How are emerging technologies and shifting societal trends affecting policymaking?

How can policymakers govern the unknown?

What is the role of political decision-making bodies in navigating change?

Adaptation strategies

Increasingly, actors in the policymaking field are investing in more dynamic decision-making processes and have been doing so for a while.[ii] The resilience of linear policymaking models is often questioned[iii] against the backdrop of a political landscape that is perceived as increasingly volatile — with political volatility intended as a measure of how quickly attention shifts from one set of issues to another over time,[iv] a phenomenon frequently attributed to the rise of social media.[v]

Yet, for the many proponents of more agile policymaking, there are also advocates for 'slower politics'[vi] who would welcome a more patient and reflective approach to political decision-making.

COVID-19 provided many governments with a chance to test their crisis-preparedness. COVID-19 Emergency Response Teams[vii] were a commonly deployed strategy. Teams composed of experts in public health, epidemiology, and policy analysis were tasked to deliver real-time advice to inform government decisions with the hope of speeding up decision-making while providing critical expertise.

Nevertheless, these approaches have also garnered legitimate criticisms, from lack of transparency to the risk of over-reliance on experts at the cost of alternative perspectives and the marginalisation of diverse stakeholder viewpoints in critical decisions.

Some consider these approaches a threat due to their ability to lead to exceptionalism or 'emergency politics', where significant restrictions on civil rights and liberties are imposed on citizens without sufficient control.[viii]

One overall lesson learned from COVID-19, according to the OECD, is that investment in risk anticipation capacities remains insufficient in most countries,[ix] especially given that the crisis was not considered an unexpected black swan event, as most national risk assessment frameworks had anticipated some form of a pandemic.[x]

Over the last decade, scenario exercises and anticipatory governance have been promoted as a tool to increase preparedness,[xi] particularly vis-à-vis the challenges posed by disruptive technologies.[xii]

Yet, the proliferation of these innovative approaches is also seen by some as casting doubts on the representativeness and effectiveness of classic democratic institutions.[xiii] The lack of diversity of the participating stakeholders in scenario exercises has also been critiqued. It can create a path dependency based on very restricted considerations of potential futures, built solely upon the input of certain parts of society.[xiv]

The resource-intensive nature of anticipatory methods also raises issues concerning the capacity of governing bodies to implement such approaches, particularly in smaller countries with limited

resources.

As technology facilitates an ever-greater speed of change, these debates and paradoxes of policymaking become even more evident, and there is a lot we still don't know about how emerging technologies will alter our societies.

How can policymakers equip themselves to remain effective even amidst such uncertainty?

THOUGHT-PROVOKING QUOTES

'With almost half of the world's population still offline, the digital divide risks becoming the "new face of inequality"' xv

Amina Mohammed, UN Deputy Secretary-General

'Today, the world is radically more interlinked, fast-moving and information-rich. But our governments aren't.' xvi

Angela Wilkinson, Secretary-General, World Energy Council

'We can succeed only by concert. It is not, "Can any of us imagine better?", but "Can we all do better?"'

Abraham Lincoln

Resources

The [World Uncertainty Index](#) (accessed in 2023) tracks uncertainty across the globe by text-mining the country reports of the Economist Intelligence Unit.

[Case Studies on the Regulatory Challenges Raised by Innovation and the Regulatory Responses](#), OECD (2021)

Dig into different regulatory challenges raised by emerging technologies and the diversity of regulatory responses used to address them. The case studies cover digital innovation in finance, the sharing economy and more.

[Evidence-Based Policymaking in Times of Acute Crisis: Comparing the Use of Scientific Knowledge in Germany, Switzerland, and Italy](#), Hadorn, S. et al., National Library of Medicine (2022)

Case study comparison of systems for integrating scientific knowledge in policy decisions in COVID-19.

[Managing Complexity (and Chaos) in Times of Crisis. A Field Guide for Decision Makers Inspired by the Cynefin Framework](#), Snowden, D. & Rancati, A., Joint Research Centre Publications Repository (2021)

A field guide to help leaders navigate crises using the Cynefin

Framework as a compass. The Cynefin Framework has been used in almost every conceivable sector, whether strategy, police work, public policy, counterterrorism, energy, or healthcare. An online course on the Cynefin Framework is available here.

Further reading

Complexity & Deciding How to Decide: How Can We Better Prepare for a World of "One-offs"?, Begovic, M., UNDP Strategic Innovation (2022)

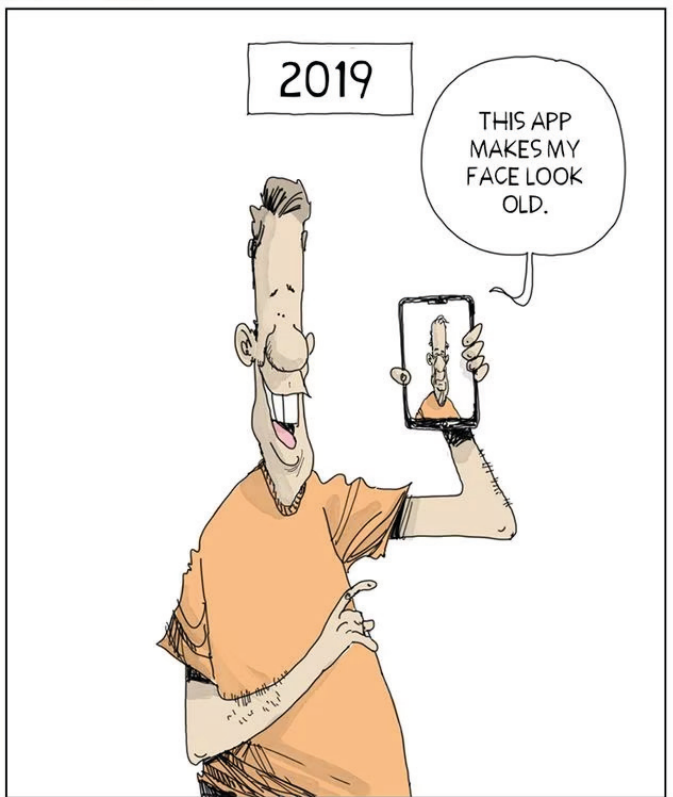**Leadership: Six Studies in World Strategy**, Kissinger, H., Penguin Books (2022)

Complexity: A Philosophical Overview, Rescher, N., Routledge (1998)

Why Do We Take Mental Shortcuts?, The Decision Lab (accessed in 2023) — a brief explainer of the 1974 seminal Kahneman & Tversky paper, **Judgment Under Uncertainty: Heuristics and Biases**

COMIC RELIEF CORNER

TRENDS, OPPORTUNITIES, AND EMERGING CHALLENGES AT THE INTERSECTION OF TECH, POLITICS, AND SOCIETY

3. TRENDS, OPPORTUNITIES, AND EMERGING CHALLENGES AT THE INTERSECTION OF TECH, POLITICS, AND SOCIETY

The intersection of technology, politics, and society has become the epicentre of profound change, where the digital revolution meets the challenges of societal governance.

In this context, technology transcends its role as a mere instrument. It can become a powerful force with the potential to reshape political landscapes, influence societal norms, and challenge the traditional boundaries of governance.

The transformational trends that are powered by technological innovation hold the potential to enhance the democratic process, promote social progress, and ignite innovation.

Simultaneously, they give rise to a host of pressing policy challenges, from safeguarding individual privacy in the age of big-data analytics to addressing the ethical implications of artificial intelligence in political decision-making and on the job market.

How is the nature of existing policy challenges changing because of innovation?

How does the digitisation of government services, data-driven decision-making, and emerging technologies affect the art of governance and policymaking?

What are the governance implications of global interconnectedness?

The future is already here

It's conceivable that technological innovation may represent merely the visible surface of a broader array of global transformations.

Throughout history, humanity has stood at the crossroads of profound revolutions, each catalysed by disruptive forces that fundamentally altered the fabric of society and politics.[xvii]

From the agricultural revolution to the industrial revolution, these transformative moments have often been accompanied by uncertainty and fear.

While the 21st-century industrial revolution we are currently experiencing, the so-called Fourth Industrial Revolution,[xviii] is often referred to as unprecedented,[xix] on the other hand, the contribution and challenge of politics is precisely that of making sense.[xx]

What role do policymakers play in crafting effective responses to these challenges and harnessing the opportunities of technological disruption? How can policymakers ensure that society can reap the full benefits of

technological progress while equitably distributing these across societies, avoiding exacerbation of existing inequalities?

What are the most critical factors contributing to exponential change?

SPOTLIGHT: TRENDS AND DRIVERS OF CHANGE

Digital Transformation of Politics: The use of technology in politics has been steadily increasing. Digital platforms and data analytics are used for political campaigns, voter engagement, and policy advocacy. **Policy Challenge:** Striking a balance between harnessing the benefits of technology for political engagement and safeguarding the integrity of democratic processes, addressing issues like data privacy, cybersecurity, and misinformation.

Digital Transformation of Economies: Technology has accelerated the digitisation of economies, leading to the rise of the digital economy and the gig economy. **Policy Challenge:** Policymakers reflect on how to adapt labour laws, taxation, and social safety nets to ensure a vibrant market while protecting worker rights and ensuring sustainable and equitable economic growth.

Global Connectivity: The internet and multimodal devices have connected people across the globe, enabling instant communication and access to information. **Policy Challenge:** Governments grapple with issues of digital sovereignty, cybersecurity,[xxi] and regulating cross-border data flows.

Automation and Job Displacement: Automation, driven by AI and robotics, is transforming industries and displacing jobs while creating new untapped opportunities. **Policy Challenge:** Policymakers reflect on how to address job displacement, looking at new models of learning,[xxii] reskilling and workforce development, as well as new labour market policies.

Data Revolution & Extractivism: Big data and analytics are revolutionising industries, from healthcare to finance, unlocking new opportunities and insights. **Policy Challenge:** Privacy regulations (e.g., GDPR) and data protection laws aim to balance innovation with data privacy and consumer as well as regulating new technologies to ensure systemic and national security.[xxiii]

Rise of Artificial Intelligence: AI is being used in diverse applications, including autonomous vehicles, healthcare diagnostics, and personalised marketing. **Policy Challenge:** Addressing ethical concerns, algorithmic bias, and regulation of AI technologies has rapidly become a critical priority across countries and at the international level.

Social Media Influence and Diffuse Power Structures: Social media platforms have become central to political discourse. They amplify the spread of information, influence public opinion, and even impact election outcomes. Managing the influence of these platforms and addressing issues like disinformation has become a primary concern for policymakers across Europe. **Policy Challenge:** Regulate digital platforms[xxiv] to mitigate misinformation, polarisation, and the concentration of influence while preserving free speech and user privacy.

Climate Tech and Sustainability: Technology is driving innovations in renewable energy, carbon capture, and sustainable agriculture. **Policy Challenge:** Policymakers face the task of assessing and incentivising the sustainable development of these new technologies while counterbalancing the emergence of new economic disparities.

THOUGHT-PROVOKING QUOTES

'We cannot solve our problems with the same thinking we used when we created them.'

Albert Einstein

'Technology empowers both creators and consumers, but it also raises critical policy choices. The challenge is to preserve the former while protecting the latter. Policymakers play a vital role in this delicate dance.'

Vint Cerf, tech pioneer and one of the fathers of the internet

'Every achievement starts with the decision to try. [...] A revolution is a special change involving a certain sort of reconstruction of group commitments.'

Thomas Kuhn, 'The Structure of Scientific Revolutions'

Resources

The Fourth Industrial Revolution and Technology Innovation Strategic Intelligence Map, World Economic Forum (2023)

Strategic insights and contextual intelligence from the World Economic Forum. Explore and monitor the issues and forces driving transformational change across economies, industries, and systems.

The Semiconductor Investment Tracker, German Marshall Fund (accessed in 2023)

An interactive resource showing new investments in chip manufacturing and R&D in Europe and the US since 2020.

Tech Trends 2023, Deloitte (2023)

A collection of technology case studies highlighting pioneering leaders and organisations throughout the year to create a collage of emerging technology innovations.

Further reading

The New American Foreign Policy of Technology: Promoting Innovation, National Security, and Democratic Values in a Digital World, Kornbluh, K. & Tréhu, J., German Marshall Fund (2023)

AI, Digital Identities, Biometrics, Blockchain: A Primer on the Use of Technology in Migration Management, Bither, J. & Ziebarth, A., Robert Bosch Stiftung (2020)

Seven Business Leaders on How Technology Will Shape Geopolitics, Kastner, A., World Economic Forum (2021)

The Great Chip War: The Challenge For Global Diplomacy, Miller, C., Scribner (2022)

The Rise of Data and the Death of Politics, Morozov, E., The Guardian (2014)

AI: 3 Ways Artificial Intelligence is Changing the Future of Work, Rayner, M., World Economic Forum (2023)

This is the State of Digitalization in Europe in 2023 – Eurostat Report, Wood, J., World Economic Forum (2023)

TECH, POLITICS, AND SOCIETY: A SELECTION OF CHALLENGES AND OPPORTUNITIES

CHALLENGES

1. Technological Disruption: Rapid advancements in technology can lead to job displacement and economic disruptions, posing challenges for workforce adaptation.

2. Data Privacy and Security: The proliferation of data raises concerns about privacy, cybersecurity, and the responsible use of personal information.

3. Digital Divide: The digital transformation may leave marginalised communities behind, exacerbating inequalities in access to technology and its benefits.

4. Ethical Dilemmas: Emerging technologies like AI and biotechnology raise ethical questions related to their responsible development and use, potentially leading to unintended consequences.

OPPORTUNITIES

1. Innovation and Economic Growth: The Fourth Industrial Revolution fuels innovation, fostering economic growth and creating opportunities for entrepreneurship.

2. Global Connectivity: Enhanced connectivity and communication enable global collaboration, knowledge sharing, and new business models.

3. Sustainable Solutions: Technology offers solutions for addressing environmental challenges, promoting sustainability, and mitigating climate change.

4. Healthcare Advancements: Breakthroughs in healthcare technologies improve diagnosis, treatment, and overall health outcomes for individuals and communities.

REGULATING DISRUPTIVE TECHNOLOGIES

EU, national, and international legislative approaches

4. REGULATING DISRUPTIVE TECHNOLOGIES: EU, NATIONAL, AND INTERNATIONAL LEGISLATIVE APPROACHES

The European Union is considered by many a torchbearer in technology governance, with a strong focus on crucial domains such as privacy, data protection, market oversight, and antitrust regulation.

Technology governance refers to the set of policies, regulations, and frameworks that guide and oversee the development, deployment, and use of technology within a society, organisation, or industry.

It involves creating and enforcing rules and regulations to ensure that technology-related activities comply with established standards and legal requirements. This can include data protection regulations, cybersecurity standards, and industry-specific guidelines.

For instance, the General Data Protection Regulation (GDPR), enacted in 2018, has not only established stringent norms governing the collection, use, and storage of personal data but has also exerted a profound influence beyond EU borders, catalysing the evolution of global data protection standards.[xxv]

The European Union's regulatory approach is often characterised by its commitment to harmonisation, consumer protection, and competition policy. These three principles underpin many aspects of EU regulation in the pursuit of a unified and competitive European market while safeguarding the interests and rights of consumers.

SPOTLIGHT: THE EU ARTIFICIAL INTELLIGENCE ACT

The EU AI Act is set to become the world's first comprehensive legal framework for artificial intelligence.

This comprehensive framework, introduced to the public in April 2021, aims to regulate AI systems' development and deployment across various sectors. The general approach proposal was adopted by the European Council in 2022, and the European Parliament adopted its position in mid-June this year.[xxvi] The 'trilogue' negotiations between the European Commission, the Council, and the Parliament are still underway. Once an agreement is reached, the law could become enforceable within the next few years.

Scope: The AI Regulation Act aims to regulate artificial intelligence systems and their applications within the European Union. It applies to both public and private sector use of AI and covers a wide range of AI technologies and applications.

Risk Classification: The Act would classify different AI systems according to their level of risk, including four tiers: unacceptable, high, limited, and minimal. AI systems identified as being of limited and minimal risks would be allowed with few requirements other than fulfilling transparency obligations.

AI systems classified as high-risk, including those used in critical infrastructure, biometrics, education, and law enforcement, would face stricter regulations to ensure safety and compliance with ethical standards, including data quality, transparency, and human oversight. Developers must also conduct risk assessments and adhere to conformity assessments.

Finally, systems considered to have an unacceptable risk, in other words, those considered as posing a threat to people, would be banned with only very limited exceptions. These include systems of social scoring, cognitive behavioural manipulation, or real-time facial recognition software.

SPOTLIGHT: THE EU TOOLBOX

The EU has already implemented a set of regulations aimed at addressing the challenges posed by digital platforms and online services. Alongside the GDPR, two key components of this toolbox are the Digital Services Act (DSA) and the Digital Markets Act (DMA).[xxvii]

The DSA, unveiled in December 2020, seeks to create a comprehensive framework for regulating online platforms and services. It aims to enhance user safety, combat the spread of illegal content, and ensure greater transparency and accountability from online intermediaries.

In contrast, the DMA, also proposed in December 2020, focuses on addressing the market power of big tech companies by imposing strict rules and obligations to promote fair competition in digital markets.

Together, these initiatives are integral to the EU's efforts to modernise and harmonise its digital regulatory landscape in pursuit of a more competitive, transparent, and secure digital environment for EU citizens and businesses.[xxviii]

SPOTLIGHT: ADVANCED REGULATORY APPROACHES IN THE EU

Germany has been recognised for its strong regulatory framework. One prominent example is the 'Gesetz zur Verbesserung der Rechtsdurchsetzung in sozialen Netzwerken', commonly referred to as the Network Enforcement Act or NetzDG. NetzDG was introduced in October 2017 and came into full effect in January 2018. It is designed to combat the spread of illegal and harmful content on social media platforms by enforcing fines for not removing 'manifestly unlawful content' within 24 hours of receiving a complaint.[xxix]

France has often taken a proactive regulatory stance in areas such as data privacy and tech regulation. The country has played a leading role in advocating for strong data protection laws within the EU. The Commission Nationale de l'Informatique et des Libertés (CNIL) is the data protection authority responsible for enforcing GDPR and monitoring data protection practices. France has not hesitated to impose substantial fines on companies found in violation of GDPR. Fines can reach up to €20 million or 4% of a company's global annual revenue, whichever is higher.[xxx]

The Netherlands has adopted an ethics-focused approach to regulating emerging technologies, particularly in the field of artificial intelligence and robotics. One example of this regulatory approach was the development of the [Dutch AI Impact Assessment](#) (AIIA) framework. One of the key elements of the framework is its focus on Ethical Evaluation. The focus on ethics aligns with broader international discussions about the responsible and ethical development and deployment of artificial intelligence. It reflects the Dutch government's commitment to ensuring that AI technologies are developed and used in ways that respect fundamental rights and values, making the Netherlands a pioneer in promoting ethical AI practices.[xxxi]

The Spanish Agency for the Supervision of Artificial Intelligence is the first of its kind in Europe. Established in the fall of 2023, its task is to promote the development of inclusive, sustainable and citizen-centered AI.

Dialogue Resource: [Spain - Study paper on the adoption of a regulation of new technological, disruptive and social realities, constituted within the Economic Affairs and Digital Transformation Commission.](#)

OED Point of Contact: Luke Uribe-Etxebarria, Member of the Spanish Senate and member of the working group on artificial intelligence in the Committee on Economic Affairs and Digital Transformation

Resources

OECD AI Principles, OECD, AI Policy Observatory (2019)

The OECD AI Principles focus on how governments and other actors can shape a human-centric approach to trustworthy AI. As an OECD legal instrument, the principles represent a common aspiration for its adhering countries.

A Framework for the International Governance of AI, Carnegie Council for Ethics in International Affairs (2023)

Proposal for the immediate creation of a global AI observatory supported by cooperative consultative mechanisms to identify and disseminate best practices, standards, and tools for the comprehensive international governance of AI systems.

Further reading

The Brussels Effect: How the European Union Rules the World, Bradford, A. (2020)

Going Nuclear? Precedents and Options for the Transnational Governance of AI, Backovsky, D. & Bryson, J., Horizons (2023)

The EU and U.S. Diverge on AI regulation: A Transatlantic Comparison and Steps to Alignment, Engler, A., The Brookings Institution (2023)
Reflections on the EU's AI Act and How We Could Make It Even Better, Haataja, M. & Bryson, J., Competition Policy International (2023)

The Human Factor in AI-Based Decision-making, Meissner, P. & Keding, C., MIT Sloan Management Review (2021)

Lessons From the World's Two Experiments in AI Governance, O'Shaughnessy, M. & Sheehan, M., Carnegie Endowment for Peace (2023)

What is the EU Digital Markets Act and What Does It Mean For Tech Companies and Consumers?, Willige, A., World Economic Forum (2023)

ETHICAL DILEMMAS AND UNCOMFORTABLE QUESTIONS

5. ETHICAL DILEMMAS AND UNCOMFORTABLE QUESTIONS

Technological disruption, while opening various opportunities for making our democratic systems more resilient, can also unleash a range of unintended and potentially negative consequences.

Profound ethical concerns have been at the core of the societal debate about the use and governance of emerging technologies.

Technologies such as AI are sociotechnical systems constructed by humans, which are created, and thus should be understood, within the context of their society.^{xxxii}

The way these technologies are ultimately designed reflects the sometimes unconscious value judgments of their designers. Often, these values can come into conflict with one another.

Potential consequences

The potential for AI systems to exacerbate existing inequalities, creating new disparities and violating citizens' fundamental rights, is a rising concern.

For instance, large language models (LLMs), such as ChatGPT, may discriminate unfairly and perpetuate stereotypes and social

biases. Past experiments of LLMs have shown that these tools use toxic language (for instance, inciting hate or violence).[xxxiii]

They have also been under scrutiny due to the threat of causing a range of human-computer interaction harms, for example, by providing false information or leading users to misinterpret the capabilities of the tools they are interacting with.[xxxiv]

How can we use new technologies while ensuring that they do not exacerbate existing inequalities and biases or even create new ones?

Emerging technologies are also impacting other fields, such as the workplace. In an age of increasingly non-standard forms of employment and the platformisation of the economy — defined as the penetration of digital platforms in the infrastructures, economic processes, and governmental frameworks of different economic sectors — questions emerge in regard to the management of worker rights.

Applications of AI in medicine have made significant advancements, but here, too, new questions arise. For example, would we want to know in advance whether we will develop Alzheimer's dementia, even though it is not curable?

Finally, the question of the environmental impact and carbon footprint of new technologies and digital tools, from the mining of resources needed to sustain production to the challenges tied to disposal, poses an ongoing political challenge.[xxxv]

Some initial assessments conducted by UNESCO point to the fact that risks associated with AI have already begun to compound on top of existing inequalities, resulting in further harm to already marginalised groups.^{xxxvi}

Ethical questions bring about new governance approaches

Given these risks and concerns, it is the task of policymakers to consider these ethical questions and value judgements during the act of regulation.

Different recommendations and guidelines are already emerging, with EU-wide regulations aiming to ensure the security and privacy of citizens.

Complementing the existing GDPR, the AI Act, and the DSA/DMA, the creation of an EU-wide data hygiene certificate is also being discussed. This would hold minimum standards on the quality of data to be used in algorithms or the integration of mandatory ethical technology assessments prior to the deployment of any AI system.^{xxxvii}

A global values-based challenge

At the same time, against the backdrop of a rise in global

competition to control the developments of technology and the freedoms of people to the internet, efforts to regulate emerging technologies and AI take on a new urgency.

Global internet freedom alone has seen significant declines across the world in the past years.[xxxviii] This decline has been exacerbated by Russia's actions following its invasion of Ukraine, leading to increased suppression of domestic dissent and the closure of independent media outlets.

In numerous nations, individuals face legal consequences for online expression, often resulting in harsh prison sentences, as governments worldwide attempt to control online spaces, both inside and outside their borders. Systematic censorship and a violation of the freedom of expression pose ethical concerns in their own right.

There is no one 'ethic of AI'

Even in democratic systems, the full meaning of what constitutes fundamental rights of citizens in the digital age is far from defined.

Civil society organisations continue to call for increasing the transparency and accountability mechanisms of the proposed regulatory frameworks.[xxxix]

Others criticise the exceptions anticipated for these regulations, for instance, for systems developed or used for national security purposes, which are to be exempt from oversight and controls.^{xl}

There is no one 'ethic of AI'. Those who deal with the ethical issues surrounding artificial intelligence must continuously ask themselves new and often strenuous questions.

SPOTLIGHT: ETHICAL DILEMMAS AND QUESTIONS IN REGULATING AI

Bias and Fairness: How can we ensure that AI algorithms are fair and do not discriminate against certain groups or perpetuate societal biases?

Transparency: How can we make AI systems more transparent and provide explanations for their decisions, especially in critical domains like healthcare and criminal justice?

Enforcement: Ethical guidelines are important, but where and how do they lead to consequences?

Privacy: What safeguards are needed to protect individuals' data and privacy rights in the age of AI?

Accountability: How can we establish accountability in a field where decision-making is increasingly automated?

Data Ownership and Access: Who owns the data used to train AI systems, and who should benefit from its use? How can we ensure private entities developing these technologies manage data responsibly and ethically?

Equality: How can we ensure that the benefits of AI are distributed fairly and that workers are prepared for transitions in the job market?

Automation of Ethics: How should AI be programmed to make ethical choices, and who decides what constitutes an ethical approach?

Security vs. Liberty: How do we strike a balance between using AI for security and respecting civil liberties?

Sustainability: How do the production and operation of AI and technology impact the use of natural resources, such as minerals, energy, and water? How can these technologies be developed while safeguarding sustainability?

THOUGHT-PROVOKING QUOTES

'We author AI, we don't give birth to it.'

Joanna Bryson, Professor of Ethics and Technology,

Hertie School of Governance

'Technology empowers individuals and nations to shape their future, but its impact on society and politics depends on the choices we make. We must harness technology's potential for the greater good while safeguarding our values and democratic principles.'

Brad Smith, President of Microsoft

'The more machines can do, the more human we have to become.'

Christiane Woopen, Professor of Ethics and Theory of Medicine,

University of Cologne

Further reading

Are We Automating the Banality and Radicality of Evil?, Kaspersen, A., et al., Carnegie Council for Ethics in International Affairs (2023)

Ethics of Artificial Intelligence, UNESCO (accessed in 2023)

Critique of Rights, Menke C., Suhrkamp | Insel (2020)

New Research Helps Make AI Fairer in Decision-making, Yurochkin M. & Sun Y., IBM Blog (2021)

Ethical and Societal Challenges of the Approaching Technological Storm, EPRS | European Parliamentary Research Service (2022)

Governing General Purpose AI: A Comprehensive Map of Unreliability, Misuse and Systemic Risks, Maham, P. & Küspert, S., Stiftung Neue Verantwortung (2023)

TRAILBLAZER POLITICS

Innovative practices, tools, and approaches for future-proof policymaking

6. TRAILBLAZER POLITICS: INNOVATIVE TOOLS, PRACTICES, AND APPROACHES FOR FUTURE-PROOF POLICYMAKING

Innovative policymaking projects, often driven by emerging technologies and novel methodologies, enable us to reimagine the functioning of politics and the relationship between society and its elected representatives.

These projects hold the potential to empower citizens with tools for participatory decision-making, enhance transparency in government processes, and promote sustainability and equity.

The policymaking innovation field is prolific in the design of new solutions whose aim is to find even better ways to cater to the diverse needs of citizens.

If governments and political governance systems, at the local and national levels, are to effectively address our biggest global concerns, they'll also need to expand their skill sets.

Demos Helsinki, a Finnish think tank, has recently called on all civil servants and their leaders to build a new ethos for the civil service.[xli] This includes the development of capabilities in problem anticipation and analysis, imagination and innovation,

collaboration across sectors and structures, and adaptive delivery.

Innovation and change are happening not only at the local and national levels but at the international level as well. In 2023, the United Nations announced a massive UN 2.0 institutional modernisation agenda. It's the most comprehensive organisational rewiring since the UN started. This transformation in skills and culture is focused on fostering cutting-edge capabilities in data, digital skills, innovation, foresight and behavioural science — to deliver stronger results, better Member State support, and faster progress towards the Sustainable Development Goals. At the core of UN 2.0 is the so-called 'Quintet of Change', a powerful combination of the proposed new tools and approaches.[xlii]

Initiatives and best practices from across Europe

Practitioners, policy thinkers, and ideators work tirelessly towards new solutions for the way we design the future of politics and society. Find a selection of recent innovative projects and solutions below. Some of them joined us at the Marketplace of Ideas, showcasing the potential of their innovative projects to policymakers across Europe, making connections and sparking ideas for participants to take home.

Innovation Box 1: OpenFisca

Presented by Sandra Chakroun, Core Team Member at OpenFisca

OpenFisca is an open-source engine that writes rules as code. It enables institutions to efficiently share regulation updates and to pool IT costs. Interconnecting rules across public bodies in the form of legible parameters and executable code provides algorithmic transparency and reduces costs.

It also enables economists and researchers to use survey and administrative data to simulate the impact of any past or future reform on the income distribution of a given population. Linking all computed taxes and benefits enables analysing how multiple reforms interact.

In 2019, the first LexImpact simulator was created by the French National Assembly, enabling members of parliament to evaluate reforms on both test cases and the whole French population within a few seconds.

Find out more at: openfisca.org

Innovation Box 2: FutureIndex

Presented by Anselm Küsters, Head of the Department for Digitalization and New Technologies at the Centre for European Policy (cep)

The FutureIndex is a computational linguistic measurement tool of the German organisations Centre for European Policy (cep) and Future-Factory.2050. By analysing the future orientation of Bundestag speeches, they show that the time horizon of parliamentary discourse in Germany decreased, while negative tones on the future increased in the discourse. With the ZF.2050 Future Analysis, they want to send a signal: the future orientation of parliamentary discourse must increase. For only if the long-term future is imagined within political discourse can it actively be shaped.

Find out more at: Future Index Report

Innovation Box 3: UrbanistAI

Presented by Damiano Cerrone, Co-founder of UrbanistAI

Urbanist AI is a generative AI platform for participatory planning and co-design. It is an intuitive web app that transforms citizens and stakeholders from commentators to active contributors in the design process.

Find out more at: UrbanistAI

Innovation Box 4: Rainbow-Tweet

Presented by Florian Hönicke, AI Principal at Jina AI

Rainbow Tweet is a plugin that turns malevolent language posted on social media into more positive messaging. The innovation places itself among other examples aimed at combating hate speech on social media.

The app can be found at: Rainbow-Tweet

Innovation Box 5: National Dialogues in Finland

Presented by Katju Holkeri, Head of Unit for Governance Policy Unit in the Finnish Ministry of Finance

The National Dialogues are a new way of carrying out societal dialogue in cooperation between citizens, communities, and authorities. The focus of the model is on topics that are important to people and communities, and the dialogues are conducted in a way that strengthens inclusion and creates an understanding of different challenges and opportunities based on people's experiences.

Find out more at: National Dialogues

Innovation Box 6: Langwith's Political Bot

Presented by Pablo Garfias Torrent, Co-lead of Langwith Research, with Nicolas Forstner, Co-Lead of Langwith Research

Langwith Research uses AI-powered bots to carry out interviews through messaging platforms, allowing these to be scaled up to any number of participants. Interviewees speak to the bot over apps such as WhatsApp, and it responds with relevant follow-up questions and comments. The team at Langwith imagines two use cases:

1. A bridge between MPs and their constituents. Constituents communicate their general positions, requests, or opinions to the bot, which then relays the summarised findings to MPs.

2. A tool to obtain direct citizen feedback on particular policies (e.g., commissioned by a parliamentary committee).

Find out more at: langwithresearch.com

Innovation Box 7: Elements of AI

The *Elements of AI* is a series of free online courses created by MinnaLearn and the University of Helsinki. Its aim is to inform citizens about the basic principles of AI. Since its launch in 2019, it has been translated into 26 languages and has been completed by over one million people.

Find more information at: elementsofai.com

Innovation Box 8: LabX – Portuguese Centre for Innovation in the Public Sector

LabX – Centre for Innovation in the Public Sector is an organic unit integrated into the Administrative Modernization Agency, the public institute in charge of the areas of administrative modernisation and simplification and electronic administration of the Portuguese

Public Administration. LabX's mission is to contribute to the innovation ecosystem in Public Administration, promoting the renewal of public services in response to the real needs expressed by citizens and companies.

Find out more at: LabX - Centre for Innovation in the Public Sector

Innovation Box 9: Finland Promoting Experimentation as a National Policy

Finland's AI strategy — launched in 2017 — encompasses the setting up of a fertile landscape for new innovations and initiaives committed to making the country a frontrunner in artificial intelligence, harnessing AI for a more experimental public sector.

The government has developed Kokeilun Paikka (Place to Experiment), a platform to connect innovators with capacity-building sources and funding and has been piloting a unique AI-driven virtual assistant, Aurora. The virtual assistant aims to create a platform for people to seamlessly connect with public and private service providers, such as employment agencies and healthcare professionals.

Find out more at: Aurora: Finland's AI Assistant | Kokeilun Paikka: A Place to Experiment

Innovation Box 10: The SkillScale Project

The project addresses the challenge of adapting to a changing labour market driven by technology. While automation is a concern, it often targets specific tasks within occupations rather than entire professions. This results in some jobs disappearing while new ones emerge, causing a digital skill gap. The SkillScale project pioneers research using online data to understand emerging skills and sustainable professions. This knowledge enables the development of a modern skills taxonomy, supporting personalised reskilling recommendations in the face of technological disruption.

Find out more at: OII | SkillScale

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JOINING FORCES IN THE OPEN EUROPEAN DIALOGUE

The APROPOS Group is a non-profit, politically neutral think tank. It operates in the field of democratic innovation and specialises in the development and implementation of process design methods for the political sphere. We believe in the impact that process design can have on improving political communication and cooperation, because we have seen the results first hand. To this end, we design and carry out meetings with policymakers, facilitate conversations, train practitioners, and publish research on political processes to advance the dialogue and collaborative capacities that will be vital for the decades of comprehensive societal changes ahead of us.

The Istituto Affari Internazionali (IAI) is a private, independent non-profit think tank, founded in 1965 on the initiative of Altiero Spinelli. IAI seeks to promote awareness of international politics and contribute to the advancement of European integration and multilateral cooperation. IAI is part of a vast international network, and interacts and cooperates with the Italian government and its ministries, European and international institutions, universities, major national economic actors, the media and the most authoritative international think tanks.

The Barcelona Centre for International Affairs (CIDOB) is an independent and plural think tank based in Barcelona, dedicated to the study, research and analysis of international affairs. Created in 1973 as an International Documentation Centre of Barcelona, it is a private foundation since 1979. CIDOB promotes global governance and good practices – based on local, national and European democratic government – to ensure that people possess the basic elements to live their lives free from fear and in liberty, by facilitating a dialogue that includes all diversities and which actively defends human rights and gender equality. CIDOB is a dynamic community of analytics that works to produce and offer to all political actors – from individual citizens to international organizations – information and ideas to formulate and promote policies for a more secure, free and fair world for everyone.

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ELIAMEP is an independent, non-profit and policy-oriented research and training institute. It neither expresses, nor represents, any specific political party view. It is only devoted to the right of free and well-documented discourse. ELIAMEP's mission is to provide a forum for public debate on issues of European integration and international relations to conduct scientific research that contributes to a better informed and documented knowledge of the European and international environment.

G | M | F
IDEAS LEADERSHIP HOPE

The German Marshall Fund of the United States (GMF) strengthens transatlantic cooperation on regional, national, and global challenges and opportunities in the spirit of the Marshall Plan. GMF contributes research and analysis and convenes leaders on transatlantic issues relevant to policymakers. GMF offers rising leaders opportunities to develop their skills and networks through transatlantic exchange, and supports civil society in the Balkans and Black Sea regions by fostering democratic initiatives, rule of law, and regional cooperation. Founded in 1972 as a non-partisan, non-profit organization through a gift from Germany as a permanent memorial to Marshall Plan assistance, GMF maintains a strong presence on both sides of the Atlantic. In addition to its headquarters in Washington, DC, GMF has offices in Berlin, Paris, Brussels, Belgrade, Ankara, Bucharest, and Warsaw. GMF also has smaller representations in Bratislava, Turin, and Stockholm.

STIFTUNG MERCATOR

Stiftung Mercator is a private and independent foundation. Through its work it strives for a society characterized by openness to the world, solidarity and equal opportunities. We want to help Europe develop a new image of itself. We are committed to more consistently involving African, Asian and Latin American countries in the global world order and want to better understand the actions of China and Turkey and their societies. We also want to foster exchange and encounters between people from these countries. In addition, we help to advance European integration, particularly in the east of the continent.

King Baudouin Foundation

Working together for a better society

The King Baudouin Foundation's mission is to contribute to a better society. The Foundation is an actor for change and innovation, serving the public interest and increasing social cohesion in Belgium and Europe. We seek to maximize our impact by strengthening the capacity of organizations and individuals. We also stimulate effective philanthropy by individuals and corporations. The Foundation's key values are integrity, transparency, pluralism, independence, respect for diversity, and promoting solidarity. The Foundation's current areas of activity are poverty and social justice, philanthropy, health, civic engagement, developing talents, democracy, European integration, heritage and development cooperation. The King Baudouin Foundation is a public benefit foundation. The Foundation was set up in 1976 on the occasion of the 25th anniversary of King Baudouin's reign.

Robert Bosch Stiftung

The Robert Bosch Stiftung GmbH is one of Europe's largest foundations associated with a private company. In its charitable work, it addresses social issues at an early stage and develops exemplary solutions. For this purpose, it plans and implements its own projects. Additionally, it supports third-party initiatives that have similar goals. The Robert Bosch Stiftung is active in the areas of health, education as well as global issues. Since it was established in 1964, the Robert Bosch Stiftung has invested more than 2 billion euros in charitable work.

Bertelsmann Stiftung

The Bertelsmann Stiftung is an independent, private operating German foundation which engages in evidence-based nonprofit activities. Each day, some 360 employees aim to strengthen society, help people achieve their full potential, and develop the systems needed to achieve those goals. The foundation's fields of activity are Democracy & Social Cohesion, Digitalization & the Common Good, Education & The Next Generation, Europe's Future, Health and Sustainable Social Market Economies. In its work on EU-affairs, the Bertelsmann Stiftung advocates for a more sovereign and united Europe that helps shape the world of tomorrow based on its values. To this effect, it provides background, analysis and insights on its website globaleurope.eu.