

Emerging Technologies Debates of Tomorrow

Context

Emerging technologies offer opportunities to resolve global challenges and are a source of many concerns. They have the potential to reshape individuals, organizations and societies. How this might occur will depend on the technologies themselves and how societies decide to use them, which depends on values, aspirations, imagination and the context they live in.

The Industrial Revolution was accompanied by the creation of new institutions such as social security to respond to the socio-economic consequences of the shift from agricultural

to industrial societies. Similar policy shifts might be needed to meet the demands of the digital age. To date, no global framework or set of common principles exists that captures the result of societies' choices and serves as a guideline for future policies on emerging technologies.

The World Economic Forum's Emerging Technologies: Debates of Tomorrow workstream actively engages policy-makers, business and civil society leaders to explore how they want to use emerging technologies to address some of the world's key challenges. The aim of these conversations is to provide global guidelines for local and global policy conversations.

The World Economic Forum has clustered individual emerging technologies into six major technological revolutions:



The Neuro Revolution



The Robot Revolution



The Nano Revolution



The Data Revolution



The Energy Revolution

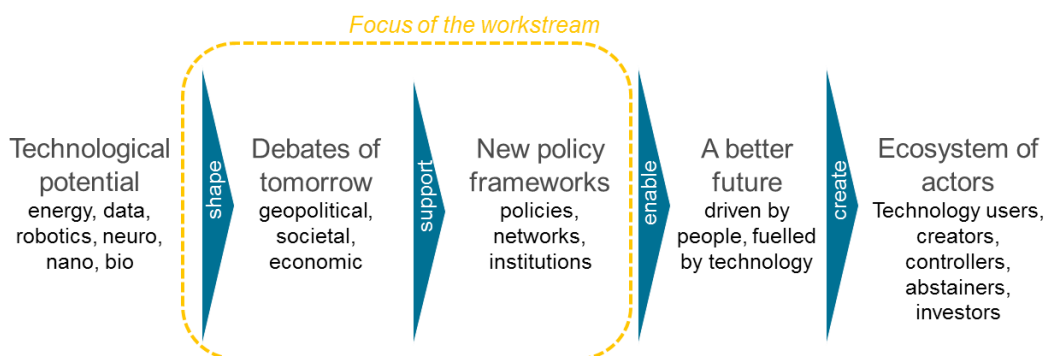


The Bio Revolution

Framework

Emergent artificial intelligence and next-generation robotics could replace most of the current workforce, potentially creating high levels of permanent unemployment. Alternatively, these technologies could create more space for emotional, interactive and creative tasks (e.g. a robot focusing on medical diagnosis, a human focusing on working with the patient). These are two examples of what the future could look like if the above-mentioned technologies become widely used. The outcome depends on individual and collective choices regarding the use of emerging technologies.

The global conversation facilitated by the workstream is about how to harness the technological potential with the aim of developing guidelines on how societies' choices could be translated into new policy frameworks for a better future. This future will redefine the actors who will in turn influence tomorrow's technological potential.



Objectives

The workstream is a creative and highly interactive process aimed at:

- Raising awareness on implications of emerging technologies and on what matters to individuals and societies in that context (e.g. values and aspirations)
- Encouraging participants to proactively think about how they want to harness emerging technologies to address global and regional challenges (in a “future you want” approach)
- Providing a platform for public-private cooperation to develop global guidelines that prepare societies to seize the opportunities and manage the risks of emerging technologies

Outcome and future milestones

In a first phase, the workstream offers a space to create a shared understanding of the potential offered by these emerging technologies and of desirable visions for the future.

In a second phase, the workstream will produce a set of common guidelines or principles that will contribute to policy conversations on the use of emerging technologies.

This is a global debate, and will be featured in the programmes at the Annual Meeting and the Annual Meeting of the New Champions. The workstream also includes workshops at World Economic Forum regional meetings (Middle East and North Africa, Latin America and Africa) focusing on how emerging technologies can be harnessed to address regional challenges; the outcomes of these workshops will feed into the global debate.

In addition, a number of expert conversations and workshops will be organized.

Project team

For more information on the workstream and to get involved, please contact:

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