United Nations Commission on Science and Technology for Development (CSTD) Twenty-eighth Annual Session

Panel on

"Technology foresight and technology assessment for sustainable development"

Tuesday, 8 April 2025, 10.00-13.00 (Geneva time) Room XIX, Palais des Nations, Geneva, Switzerland

Concept note

Background

Effective, evidence-based and proactive strategic planning and preparedness is critical in anticipating and reacting to current and future technological change. Technology assessment and technology foresight are critical in aligning technological innovations with sustainable development objectives. The two practices have significant differences in processes and purpose but are highly complementary since both are aimed at addressing systemic challenges posed by technology. They are on a path towards some degree of convergence, especially in the tools and methods they use. Countries worldwide need to build local capacity for anticipatory technology governance to address both national and global grand challenges.

However, many countries, especially in the developing world, face significant obstacles in implementing effective technology assessment and technology foresight activities. Key challenges include limited human and financial resources, insufficient institutional capacity and sectoral approach, among others. For many developing countries international collaboration and support will be needed to build local capacity and benefit from their adoption and use.

Regardless of a country's development status, the use of technology foresight and technology assessment can help ensure that science, technology and innovation policies do not intensify political and cultural divides, but instead foster inclusive dialogue and governance that can support sustainable transformations. Both practices encourage a culture of experimentation and continuous learning, which is critical in the success of transformative innovation policies.

Objective

This panel aims to discuss the opportunities and challenges associated with technology foresight and technology assessment, the diverse experiences and arrangements across countries with their use, and the role of international collaboration in helping all countries (especially in the developing world) benefit from their adoption and effective use.

Guiding questions for discussion

- How can TF and TA methodologies be improved or adapted by developing and developed countries to better address their sustainable development needs?
- What specific recommendations can be made to guide developing and developed countries in implementing effective TF and TA exercises?
- What governance structures are needed at the national, regional, and global levels to effectively integrate TA and TF into decision-making processes?
- What strategies can be adopted to ensure that TA/TF activities can be harnessed by developing countries for sustainable development?
- How can international cooperation, and the CSTD, support countries to harness TF and TA?

Format of the panel

The panel will begin with the introduction of the Report of the Secretary-General by the CSTD secretariat. Then panelists will make their presentations. This will be followed by discussants and an interactive discussion among panelists and participants. Interventions from participants in the meeting room will have a maximum duration of 3 minutes each.

Supporting documents

- Report of the Secretary-General: Technology foresight and technology assessment for sustainable development (E/CN.16/2025/3), available at: <u>https://unctad.org/system/files/official-document/ecn162025d3_en.pdf</u>
- Issues paper on "Technology foresight and technology assessment for sustainable development", available at: <u>https://unctad.org/system/files/information-document/cstd2024-2025_issues02_tfta_en.pdf</u>
- Other documents are available on the website of the CSTD: <u>https://unctad.org/meeting/commission-science-and-technology-development-twenty-eighth-session</u>