Expert Group Meeting on Rapid Technological Change, Artificial Intelligence, Automation, and Their Policy Implications for Sustainable Development Targets

Mexico City, 26-27 April 2018

Conclusions and Recommendations

Conclusions:

After a fruitful two-day meeting in Mexico City, the Group of Experts reached the following conclusions:

1. New technologies, and artificial intelligence in particular, can be used positively to accelerate solutions to achieve the Sustainable Development Goals, but they can also potentially increase inequality among and within countries - affecting vulnerable groups and fostering a concentration of critical knowledge and wealth - and pose significant ethical questions.
2. In the time frame of the SDGs, technology change could have more pervasive societal impacts than climate change, and at the same time it could vitally contribute to overcoming climate change's worst effects. Therefore, it is urgent to raise awareness of increasingly disruptive power of technology change and to prevent possible negative impacts in the present, instead of mitigating them in the future.
3. The extensive use of artificial intelligence combined with the ongoing technology convergence has the potential to drastically increase economic productivity. However, if unimpeded, it could be negatively aimed at humans instead of improving their quality of life. Against this background, there is a need for all actors to get involved in discussions and analysis of the policy implications related to these technologies.
4. Due consideration should be given to the ethical implications of the possible dual use of new technologies, which could be used as a force for good but also be diverted negatively. To develop ethical policies related to the use of these new technologies, all actors need to get involved in discussions and analysis of the policy implications.
5. It is imperative to raise awareness, facilitate access to knowledge and to disseminate information across the world on the possible socioeconomic and environmental impacts of artificial intelligence and other rapidly changing technologies in our societies, including in the context of the SDGs, as the impacts are spread across the entire range of Sustainable Development Goals and their targets. In this regard, the United Nations system has a special responsibility by responding to the needs of Member States.

Recommendations:

The Group of Experts recommended to consider the following:

1. Member States to recognize the urgency of addressing the economic, social, environmental, political and ethical challenges and opportunities of artificial intelligence and other rapidly changing technologies.
2. Member States to establish and engage national multi-stakeholder mechanisms, with the participation of academia, civil society and the private sector, to foster interactions and discussions among all key players of technological change aimed at designing national strategies or road maps

and public policies to address the impact of rapid technological change, human centered and based on cooperation, exchange of information and best practices.

3. All countries to heavily invest in enhancing their technological capabilities and educate their societies, in order to take full advantage of the opportunities created by these new technologies, including for the achievement of the SDGs and to reduce negative risks.

4. To foster innovation ecosystems and empower young people to flourish as pioneers and creators, as well as to support older people adapting to the significant changes to their daily lives brought about by new technologies.

5. To undertake actions to disseminate trusted information on artificial intelligence and other advanced technologies, counteracting misconceptions, and to better communicate the potential how these technologies can have a positive impact on our daily lives and the potential to transform our societies.

6. To consider the ethical dimension and organize comprehensive public discussions in support of public policy making on accelerated technology change and improvement of living conditions.

7. Member States to favor capacity-building of digital competences, soft and technological skills, enabling environments through investment and infrastructure, public-private partnerships and collaborative partnerships with communities and civil society as well as international cooperation, in order to facilitation the adoption of new technologies.

8. Governments must contribute to raise awareness among decision-makers, technology developers and civil society about the implications, benefits, and potential ethical problems that Artificial Intelligence poses.

9. States should play a leading role in fostering the investment required in building digital and technological infrastructure and establishing the incentives to close the technological gap and protecting vulnerable groups -leaving no one behind-, through a combination of concrete public policies and partnerships with the active involvement of private sector.

10. Policy makers need to acknowledge that innovation is associated with deep uncertainties and, therefore, the long-term transition towards sustainability will only be reached by a combination of existing mechanisms, institutions and technological innovations.

Follow-up at the United Nations:

In this context, the Group of Experts recommends to consider further developing and deepening the discussions at the United Nations on the impact of rapid technological change on sustainable developments, through the Technology Facilitation Mechanism, including its Multi-stakeholder Forum on Science, Technology and Innovation for the SDGs, the UN Commission on Science and Technology for Development through the Economic and Social Council, and the UN General Assembly, with a view to:

1. Promote a wider discussion of these subjects in Member States and regional organizations, based on information and experiences from around the world.

2. In cooperation with all relevant organizations and agencies of the UN System, continue to collect, analyze, and disseminate information, trends and scenarios in a periodic report on the impact of rapid technological change – including artificial intelligence and automation - on societies in general and the achievement of the SDGs in particular, , building on General Assembly resolution A/RES/72/242.

3. TFM partners and others to consider building partnerships and interfaces with universities, labs, innovation incubators, and other entities that are at the technological frontier, potentially in the

form of a "discovery lab" or a network of "observatories", in order to provide trusted, "real-time" information and insights in support of impact assessment and policy debates.

4. Raise awareness on the urgency to take action, in order to reduce technology-related risks and to avoid the negative effects on the achievement of the SDGs.

5. Identify, support, develop and disseminate information among Governments and stakeholders on better practices and public policies, in order to maximize the benefits and minimize potential disruptive technology-related effects.

6. Create an inventory of public policies designed to support Governments in the accomplishment of the SDGs.

7. Promote the participation of academia, the private sector and civil society in the discussions on the impact of accelerated technological change at the UN Technology Facilitation Mechanism, the Commission on Science and Technology for Development, and at the UN General Assembly (Plenary).