# Sforum

Science and Technology in Society forum

## 2021 **Live Online**

#### The 18th ANNUAL MEETING

October 2, 3, 4 and 5, 2021 Kyoto, Japan



Anthony S. Fauci Director, National Institute of Allergy and ctious Diseases (NIAID)







Shinzo Abe Former Prime Minister, Government of Japan Honorary Chairman, STS forum



**Dmitry Chernyshenko** Deputy Prime Minister Russian Federation



Mariya Gabriel Commissioner for Innovation, Research, Culture, Education and Youth, European Commission



Marcelo Luis Ebrard Casaubon Secretary of Foreign Affairs, Government of

#### Message from the Founding Chairman



**Koji Omi** Founding Chairman STS *forum* 

The Science and Technology in Society *forum* (the STS *forum*), was founded in 2004 by Koji Omi, a former Minister of Finance and former Minister of State for Science and Technology Policy and for Okinawa and Northern Territories Affairs in the Japanese government. The STS *forum* aims to provide a new mechanism for open discussions on an informal basis and to build a human network that would, over time, resolve the new challenges stemming from developments in science and technology. The STS *forum* community also explores opportunities arising from science and technology and addresses ways of removing barriers by using science and technology to solve the problems facing humankind.

The rapid progress of science and technology has brought economic growth and enriched the quality of our lives on the one hand. However, advances in science and technology have raised important ethical, safety and environmental issues: possible negative applications are threatening humankind's own future. We call these "the lights and shadows of science and technology." We must develop the lights and control the shadows.

The STS *forum* focuses on many aspects of science and technology in society, for example, technological development in genomics like genome engineering and iPS cell technology; energy and environmental issues, including the use of nuclear power; and social changes brought by ICT and related privacy and security issues.

The scientific community alone cannot address the problems we face today, because they are increasingly complex and because they are also beyond the control of any single country. Thus, it is essential that not only professional scientists, including scholars and researchers, but also policymakers and business leaders from all over the world gather and discuss science and technology issues from the long-term perspective, i.e. 100 to 500 years, for the future of humankind.

This is the fundamental concept of the STS *forum*, where global leaders meet for three or four days at the *forum*'s Annual Meeting in Kyoto in person or online on the first weekend of October.

In 2020, the STS *forum* received special messages from Japanese Prime Minister Yoshihide Suga and from former Prime Minister Shinzo Abe, Honorary Chairman of the STS *forum*, who attended the Annual Meeting for the tenth time since 2006. Other prominent leaders attending in the past have included the prime ministers of France, Sri Lanka and Slovenia and the deputy prime minister of the Russian Federation, in addition to many Nobel Laureates.

In 2020, our Annual Meeting was held virtually from Kyoto due to the COVID-19 pandemic, with the participation of nearly 1,500 leaders from 120 countries, regions and international organizations, and including 15 Nobel Laureates. In addition to the 15-session online program including four sessions on COVID-19 issues, three peer meetings took place onlinethe Science and Technology Ministers' Roundtable, the Global Summit of Research Institute Leaders and the Academy of Science Presidents' Meeting. These meetings were attended by 25 ministers, 26 research institute heads and 19 academy of science presidents. An adjunct meeting, "Regional Action on Climate Change (RACC)" was also held, which was attended by 190 participants. In 2019, the 16th Annual Meeting was held as a regular in-person event, with ten plenary sessions and 24 concurrent sessions on eight themes. There were also 11 side meetings, including the University Presidents' Meeting and the CEO and CTO Meetings. Although these side meetings were not held in 2020 due to the temporary change of meeting format, 41 university presidents, 49 CEOs and 30 CTOs took part in the 2020 annual meeting.

The STS forum launched a "Dialogue between Future Leaders and Nobel Laureates" in 2015, which is now called "Dialogue between Young Leaders and Nobel Laureates." While it was not possible to offer this program in 2020, 129 young leaders participating in 2019 enjoyed stimulating discussions with 11 Nobel Laureates at the 16th Annual Meeting. The STS forum will continue to contribute to nurturing younger leaders in various fields by inviting them to our networking opportunities in Kyoto and elsewhere.

The STS *forum* is also active in organizing outreach activities in the form of workshops. In 2020, three workshops were held: an AA-STS Workshop in New York, an India Workshop in Delhi and a Russia Workshop (online). Planned workshops for ASEAN, the EU and Latin America had to be postponed due to the pandemic.

Now in its second decade, the STS *forum* has grown from a mere conference into a movement for global leaders to address science and technology-related issues for the future of humankind. We hope that many world leaders will join the STS *forum* Annual Meeting in Kyoto in order to "pave the way for future generations."

#### **Our Vision**

# Lights and Shadows

The explosive progress of science and technology has brought economic growth and enriched our quality of life. But it has also brought challenges for society such as climate change and privacy in ICT. The STS *forum* seeks to strengthen the lights and control the shadows of science and technology.

2.

### Collaboration among Academia, Industry and Government

No one country or constituency alone can solve the science and technology-related issues facing humankind. The STS *forum* is a platform for forming collaborative networks among global leaders in academia, industry and government to help build a better world together.

# Long-Term Perspective

The STS *forum* takes the truly long-term perspective of looking 100 to 500 years ahead, thereby seeking to nurture sustainable society for generations to come.

## A Unique Forum

#### What Is the STS forum?

The STS *forum* is a registered non-profit organization led by Founding Chairman Koji Omi and Chairman Hiroshi Komiyama, with former Prime Minister Shinzo Abe as its Honorary Chairman. The *forum* is also guided by a Board and a Council composed of leaders from around the world.

Close to 1,500 participants from 120 countries, regions and international organizations engage in lively discussions for three or four days in early October every year at the Kyoto International Conference Center in Kyoto, Japan or online. Participation in the STS *forum* is by invitation only.

#### Why Attend?

To connect with like-minded people who wish to change the world for the better and who can address the problems we face from a broad range of perspectives.

You will have the rare opportunity to network with diverse groups of global leaders including heads of academic institutions, leading corporate executives and top government officials. In 2020, 15 Nobel Laureates, 34 government ministers, 41 university presidents, 26 research institute leaders, 19 academy of science presidents, 49 CEOs and 30 CTOs attended the STS *forum* 17<sup>th</sup> Annual Meeting live online.

Taking part in many networking meetings and smaller thematic sessions, where you can engage in open and informal discussions with participants from diverse backgrounds and scope of expertise, you gain fresh insights and novel perspectives on the key science and technology issues of our times and explore innovative ideas and initiatives together.

#### What Is the Impact?

The STS *forum* has become a global movement embracing the scientific community and beyond, forming networks among leaders from around the world to share collective knowledge and achieve its full potential. Recognized as an essential venue for science and technology, the STS *forum* issues an official statement summarizing its discussions. This document is widely distributed, in the hopes of building a richer and more sustainable future.



Prime Minister Shinzo Abe of Japan gives a keynote speech at the Opening Plenary in 2019.

#### Concurrent Sessions

A distinctive feature of the STS *forum* is the multiple concurrent sessions on several key themes affecting humankind.

During each session, speakers are allotted 6 minutes to deliver presentations, followed by active discussion. The concurrent sessions are open to all participants, who are invited to engage in practical, face-to-face dialogue on an equal footing.

The concurrent sessions also offer opportunities to build networks across borders and disciplines, bringing together leaders from around the globe who share awareness of the issues we face.



"Dialogue between Young Leaders and Nobel Laureates" in 2019: Prof. Jerome Isaac Friedman of Massachusetts Institute of Technology (MIT), USA [1990 Nobel Laureate in Physics]

#### Plenary Sessions

Plenary sessions feature panels consisting of Nobel Laureates and other leading scientists, policymakers and leaders of industry. As prominent members in their respective fields, the panelists present their views on pressing issues for global society. Plenary sessions are open to the audience for Q&A.



Concurrent Session: Policy Making in Science and Technology based Society in 2019

#### Peer Meetings and Networking

Peer meetings are also held among science and technology ministers, university presidents, research institute leaders, funding agency presidents, academy of science presidents, academy of engineering presidents, heads of foundations and CEOs and CTOs from the corporate world. The STS *forum* also holds an adjunct meeting, "Regional Action on Climate Change." The *forum* also invites selected young participants to participate, in an effort to nurture future leaders with diverse perspectives for the next generation and beyond.

The STS forum offers ample opportunities for network-building and exchanges of views among participants with events such as a welcome reception, buffet lunches, an official banquet and a special buffet dinner at one of Kyoto's cultural heritage sites.

#### STS forum 2020—Live Online

In 2020, the 17<sup>th</sup> Annual Meeting, a virtual meeting due to the COVID-19 pandemic, took place from October 3 to 6, 2020 live online from a base studio in the Kyoto International Conference Center, Kyoto, Japan, with the virtual participation of nearly 1,500 participants from 100 countries and regions and 20 international organizations.



Mr. Shinzo Abe, former Prime Minister of the Government of Japan and Honorary Chairman of the STS *forum*, in the Opening Session (on the screen in Main Hall of the Kyoto International Conference Center).

The overarching theme of this year's annual meeting was "The Role of Science and Technology in the Post COVID-19 Era." Four sessions covered themes specifically tied to COVID-19. Other sessions covered wide-ranging themes such as sustainability, science policy, inclusive participation, energy and the environment and AI.

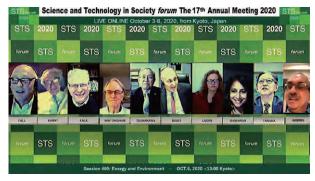
A smaller number of peer meetings took place online among S&T ministers, research institute leaders and academy of science presidents. The Regional Action on Climate Change (RACC) meeting also took place online during the meeting period.



A total of 113 speakers from 37 countries, regions and international organizations participated in 15 plenary-style sessions over four days. In 2020, there were no concurrent sessions, which take place in an in-person setting. Speakers had pre-recorded their remarks, and the session chairs guided live discussions based on remarks made available to participants in advance. There also were Q&A sessions.



Session 102 "Science and Technology in COVID-19 Pandemic"

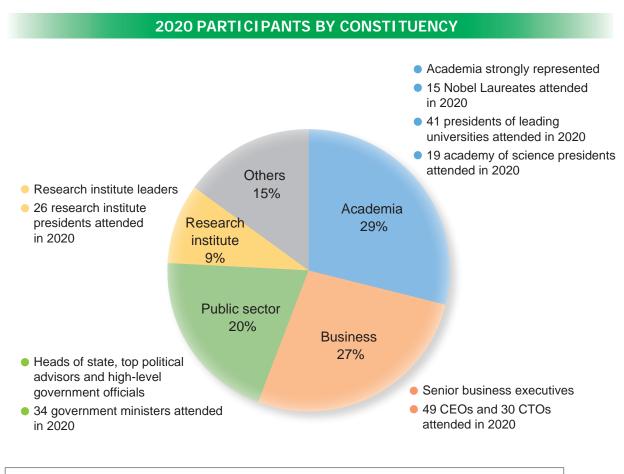


Session 400 "Energy and Environment"

This year's online annual meeting was a great success, and we are confident that we can provide more opportunities for live discussions and networking in a virtual environment at our 2021 annual meeting.

#### **A Global Movement**

In 2020, the number of participants at the STS *forum* 17<sup>th</sup> Annual Meeting held online grew to nearly 1,500 from 100 countries and regions and 20 international organizations. Participants are a well-balanced mix of representatives from academia, industry and government.



- 29% of 2020 participants were attending for the second time, and 28% were attending for at least the third time. Repeat participation is a testament to the enduring value and timeliness of the discussions.
- ♦ 28% of 2020 participants were female.

#### **About Participation in the STS forum**

- Participation is by invitation only.
- All sessions are conducted in English.
- Participants are requested to make their own travel arrangements to and at the venue.

#### Among the Speakers of the 17th Annual Meeting, STS forum 2020



Karen Andrews Minister for Industry, Science and Technology, Australia



Sarah Mbi Enow Anyang Agbor African Union Commission (AUC), Ethiopia



Kelvin K. Droegemeier The Office of Science and Technology Policy, U.S.A.



Michelle Bachelet
Office of the High Commissioner for
Human Rights (OHCHR), Switzerland



Henry A. McKinnell Moody's Corporation, U.S.A.



**Dr. Bernard Bigot** ITER Organization, France



Ada E. Yonath Weizmann Institute of Science, Israel [Nobel Laureate 2009 (Chemistry)]



George Fu Gao Chinese Center for Disease Control and Prevention, China



Shinya Yamanaka Kyoto University, Japan [Nobel Laureate 2012 (Physiology or Medicine)]



Ilham Kadri Solvay, Belgium



Sethuraman Panchanathan National Science Foundation (NSF), U.S.A.



Takeshi Uchiyamada Toyota Motor Corporation, Japan



Ashwani Kumar Supreme Court, India



**Leila Zia**Wikimedia Foundation, U.S.A.



Hammam Riza
Agency for the Assessment and
Application of Technology (BPPT),
Indonesia



Erwin Neher
Max Planck Society, Germany
[Nobel Laureate 1991 (Physiology or Medicine)]



Yoshua Bengio Mila - Quebec Al Institute, Canada



Pedro Wongtschowski Ultrapar Participações S.A., Brazil



Fabiola Gianotti
European Organization for Nuclear
Research (CERN), Switzerland



Terry Brady
Underwriters Laboratories Inc., U.S.A.