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**●October 4–6, 2015 --- The 12<sup>th</sup> Annual Meeting of Science and Technology in Society *forum* (STS *forum*) was held at International Conference Center in Kyoto, Japan.**

At 10:00 a.m. on Sunday, Oct. 4, Mr. Koji Omi, Founder and Chairman of STS *forum*, declared the meeting open. In his welcoming remarks, Chairman Omi said, "I hope that those world leaders here will participate in the STS *forum* in the spirit of 'noblesse oblige' and discuss the actions our generation must take for the sake of future generations."

This year, we had the honor of welcoming three prime ministers at the Opening Session: Mr. Shinzo Abe of Japan, Mr. Manuel Valls of France, and Mr. Ranil Wickeremesinghe of Sri Lanka. In his speech, Prime Minister Abe, who is the Honorary Chairman of STS *forum* as well, cited the words of the science fiction writer Arthur Clarke that any advanced technology seems strikingly similar to magic, saying, "I hope that a great number of magicians who captivate the world emerge from the STS community." Then, Prime Minister Valls delivered a speech with reference to the COP21 United Nations Climate Change Conference in Paris in December this year. "It is absolutely essential that we curb global warming, otherwise the future of humanity will be in grave danger," said Mr. Valls, "but we are still far from the binding, universal agreement that we need to reach." Prime Minister Wickeremesinghe of Sri Lanka quoted a passage of Winston Churchill: "The empires of the future will be the empires of the mind." And he said, "As I see you gathered here today from all corners of the world, I realize how true this has turned out to be."



## Report on The 12th Annual Meeting



The Opening Session alone attracted about 930 participants. The presence of other important dignitaries namely Mr. Arkady Dvorkovich, Russian Deputy Prime Minister, Dr. John Holdren, Assistant to the President for Science and Technology and Director of the White House Office of Science and Technology Policy (OSTP), and Mr. Sadayuki Sakakibara, Chairman of Japan Business Federation (KEIDANREN) reconfirmed the significance of the subsequent 38 sessions and 11 supplementary meetings.



## Report on The 12th Annual Meeting

The three-day meeting brings together about 1,200 participants from nearly 100 countries, regions and international organizations. A highlight of the forum this year was the “Dialogue between Future Leaders and Nobel Laureates” held on Saturday, ahead of the forum. Seventy-seven young scientists from 25 organizations in 18 countries were divided into groups and had lively but friendly discussions with the following seven Nobel Laureates: **Prof. Hiroshi Amano**, Nobel Laureate Physics 2014; **Prof. Jerome Isaac Friedman**, Nobel Laureate Physics 1990; **Prof. Yuan Tseh Lee**, Nobel Laureate Chemistry 1986; **Prof. Ryoji Noyori**, Nobel Laureate Chemistry 2001; **Sir Richard J. Roberts**, Nobel Laureate for Physiology or Medicine 1993; **Prof. Akira Suzuki**, Nobel Laureate Chemistry 2010; **Dr. Torsten Nils Wiesel**, Nobel Laureate Physiology or Medicine 1981.

These 77 young scientists were expected to attend the entire forum and submit their feedbacks afterwards. Dr. Joe Brown from Georgia Institute of Technology, U.S., wrote, “I was able to make contacts with other leaders that I expect to last throughout my career. This was an incredible opportunity and I am very grateful for it.” Dr. Lalita Attanatho of Thailand Institute of Scientific and Technological Research echoed, “It was a rare opportunity for me to participate with science and technology leaders in a range of fields that I would not normally be exposed to.”



## Report on The 12th Annual Meeting

There were 28 Concurrent Sessions, four more than the last year, under seven different themes and many rooms were so full that the staff had to find extra chairs. The most popular session was "S & T Diplomacy and International Collaboration" with an audience of 118, followed by the session called "Industrial Innovation" with 103. Among ten Plenary Sessions, "Energy and Environment" was the most popular one with 536 attending, followed by "Society Changed by ICT" with 344, "Global Health" with 326, and "Research and Innovation" with 313. A Summary of these sessions will be published at the beginning of December.



Usually the number of attendees wanes on the third day, but this year the Closing Session enjoyed a big success with an audience of 300. Moderated by Prof. Yuan Tseh Lee, President Emeritus of the Institute of Atomic and Molecular Sciences, Academia Sinica in Chinese Taipei and Nobel Laureate, speakers such as H.E. Naledi Grace Mandisa Pandor, Minister of Science and Technology in South Africa, Mr. Takehiko Nakao, President of Asian Development Bank, H.E. Mr. Abdullah Bin Hamad Al-Attiyah, Chairman of Foundation for Energy & Sustainable Development in Qatar, and Prof. Jerome Isaac Friedman, Institute Professor and Professor of Physics Emeritus, Massachusetts Institute of Technology and Nobel Laureate, made impressive speeches urging progress towards maintaining sustainability for the future of Humankind. At the end, Chairman Koji Omi of STS forum described the major points of the Statement published on that day and announced that the next Annual Meeting would be held at the same venue from Sunday, October 2 to Tuesday, October 4, 2016. "I look forward to all of us gathering here again in order to pave the way for future generations!" concluded the Chairman.



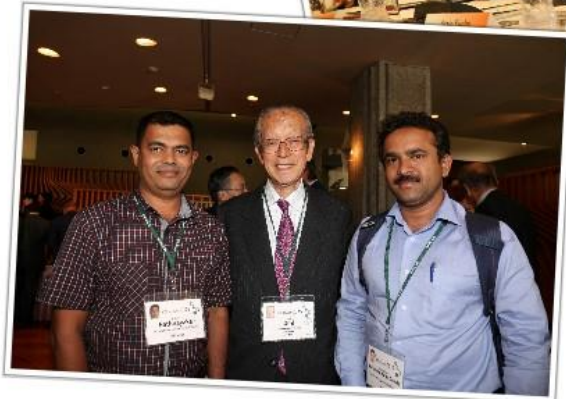
## Where did he go? Whom did he meet?

**August 30 – September 4, 2015:** Chairman Omi went to Alpbach, Austria, to attend the “European Forum Alpbach”. It was the 70<sup>th</sup> anniversary of the meeting and hundreds of participants from different backgrounds gathered to explore and discuss the many facets of inequality. Chairman Omi personally exchanged information and views with many dignitaries including H.E. Heinz Fische, President of Austria. Later, he flew to Vladivostok, Russia, to attend the “Eastern Economic Forum”.

**November 5 – 18, 2015:** Chairman Omi delivered a speech on Science in Policy Making at the “World Science Forum” in Budapest, Hungary, on Nov. 7, 2015. Among other speakers were many familiar names from STS forum such as H.E. Naledi Pandor, Minister of Science and Tehcnology of South Africa, Dr. Rush D. Holt, CEO of AAAS, and Dr. Zakri Abdul Hamid, Science Adviser to the Prime Minister of Malaysia.

From Budapest, the chairman took part in a conference call of the Program Committee Meeting of STS forum.

Then he flew to Berlin, Germany, to attend the Falling Walls Conference as a member of the Board of Trustees.





**The Honorable  
Deborah L. Wince-Smith**  
President and CEO  
Council on Competitiveness

The STS Forum's mission to encourage the use of science and technology to solve the problems of humankind has grown ever more important in our turbulent and transforming world. Across the international community, there is great concern about ensuring energy, adequate water and food for the world's growing population. These are also all linked to our noble goals of peace, progress and prosperity for all nations, and sustainability for the future.

These global resource challenges present a golden opportunity for innovation. We live in the midst of great revolutions in science and technology, a time of profound potential to move the world from scarcity to abundance. Technology is driving a historic shift to sustainable and renewable energy at all scales. Nanotechnology could revolutionize water purification and treatment.

We are on the cusp of technological revolution in food production. Biotechnology is poised to deliver more resilient crops with higher yields and foods with more nutrition. Powerful digital technologies, data science, and other systems are already providing tools to optimize production and raise productivity in agriculture. At the cutting edge, indoor vertical farming is emerging from the convergence of different spheres of science and technology. We are beginning to see expansive warehouses serving as indoor farms, growing lettuces and other vegetables using nutrient formulas, tunable LED lighting, and microclimates designed to optimize plant growth. Compared to traditional agriculture, these indoor farms use 95 percent less water, optimize nutrient density, use no pesticides, and harvest the food once or twice a month rather than just once or twice a year.

In an example of international cooperation, U.S. companies provided key technologies for the construction of the new Shanghai Tower—the world's second tallest building and one of the greenest. Compared to conventional technologies, approaches used in the Tower reduce energy use by 21 percent, reduce water consumption by 40 percent, and reduce the building's carbon footprint by 34,000 metric tons per year, equivalent to taking 7,000 cars off the road.

International partnerships among the global science and technology community can play a pivotal role in solving challenges at the nexus of energy, water and global food, while also driving human progress and sustainable economic development. The STS Forum is an important mechanism for global engagement and building networks of leaders who can mobilize technology and talent in international collaborations to solve these problems. It is this tremendous potential for good, to shape a brighter future for us all, that keeps me coming to the STS Forum year after year.

***STS forum is led by 83 Council Members from 28 countries and regions. For those who are not familiar with them, we take great pleasure in introducing some members.***



**Prof. Harriet Wallberg**

University Chancellor, Swedish Higher Education Authority;  
Professor, Department of Physiology, Karolinska Institutet

Prof. Harriet Wallberg has been University Chancellor of Sweden since 2014. She was President of Karolinska Institutet (KI) between 2004-2012. She is a member of KI's Nobel Assembly selecting the recipient of the Nobel Prize in Physiology or Medicine. She earned her medical and doctoral degrees at KI. Prof. Wallberg has served as Secretary General of the Swedish Research Council in Medicine. She served on the Swedish Government Research Advisory Committee 2011-2012. She has received Honorary Doctorates from Univ of Minnesota, USA 2010, Trinity College, Ireland 2011 and Seoul National Univ, Korea 2012. She has been honored with H. M. the King's Medal for distinguished achievements in medical education and research 2008.



**Mr. Charles (Chad) O. Holliday, Jr.**

Chairman, Royal Dutch Shell plc

Mr. Charles O. (Chad) Holliday, Jr. is Chairman of Royal Dutch Shell. He was appointed in May 2015, having previously served as a Non-Executive Director since 2010.

He is also currently the Presiding Director for Deere & Company and the Lead Independent Director for CH2M Hill. He is Chair of the National Academy of Engineering, a founding member of the International Business Council and an Advisor to the US Department of Energy. He is chairman emeritus of the board of the U.S. Council on Competitiveness. He has previously served as chairman of The US Business Council, Catalyst, the Society of Chemical Industries (American Section), and the World Business Council for Sustainable Development. Chad formerly served on the Board of Bank of America Corporation for six years, and as Chairman from 2010 to 2014. In his executive career, Chad was Chief Executive Officer of DuPont from 1998 to 2009, and Chairman from 1999 to 2009. Chad has a BS from the University of Tennessee and an Honorary Doctorate from Washington College and the Polytechnic University of New York.

STS forum (NPO)

Sanno Grand Building 419,  
2-14-2, Nagatacho, Chiyoda-ku,  
Tokyo 100-0014, Japan

TEL : +81-3-3519-3351 / FAX : +81-3-3519-3352  
[information@stsforum.org](mailto:information@stsforum.org) [www.stsforum.org](http://www.stsforum.org)