OPPORTUNITIES FOR THE MEDIA AT
CTBT: SCIENCE AND TECHNOLOGY 2013 CONFERENCE

Map showing the location of the Conference
OVERVIEW

An overview of the events at the CTBT: Science and Technology Conference 2013 (SnT2013) on 17 and 18 June 2013 that will be of interest to the media. All events will take place in Hofburg Palace in Vienna, Austria unless otherwise indicated.

MONDAY 17 JUNE

9:30 – 9:45  Introduction and Welcome to the Journalist’s Seminar (Gardesalon)
Thomas Mützelburg, Public Information Officer, CTBTO

10:00 – 13:00  Conference Opening Ceremony (Grosser Redoutensaal)
Choir of the Musikgymnasium Vienna
Dance and Drumming Act by the West and East African group Afrococo
Welcome by Lassina Zerbo, Conference Head and Executive Secretary Elect, Preparatory Commission for the Comprehensive Nuclear-Test- Ban Treaty Organization
Ban Ki-Moon, United Nations Secretary-General (Video Message)
Reinhold Lopatka, State Secretary, Federal Ministry for European and International Affairs, Republic of Austria
Tibor Tóth, Executive Secretary, Preparatory Commission for the Comprehensive Nuclear-Test- Ban Treaty Organization

11:00 – 11:30  Coffee Break

Keynote Lectures
Moderator: Siegfried S Hecker, Former Director Los Alamos Laboratory
Hans Blix, Former Head of IAEA
Roald Sagdeev, Gorbachev’s science advisor
Ellen Tauscher, Former US Under Secretary of State

13:00 – 14:00  Press Conference (Lunch also available) (Kleiner Redoutensaal)
A question and answer session with the morning’s keynote speakers and CTBTO’s Executive Secretary for journalists to explore questions such as why the world needs a Comprehensive Nuclear-Test-Ban Treaty and its verification regime. Why hasn’t the Treaty become internationally binding? How science supports the work of the CTBTO and ensures it can detect a nuclear explosion anywhere and anytime?

Speakers include:

Hans Blix, Former Head of IAEA
Roald Sagdeev, Gorbachev’s science advisor
Ellen Tauscher, Former U.S. Under Secretary of State
Tibor Tóth, Executive Secretary, CTBTO

Moderator: Annika Thunborg, Spokesperson, CTBTO

15:30 – 16:30 Background briefings on CTBT and Verification regime (Vienna International Centre – VIC)

What is the Comprehensive Nuclear-Test-Ban Treaty (CTBT) and why it is important? Why even though the Treaty is almost universal it has yet to become law. How does the Treaty’s verification regime ensure no nuclear explosion goes undetected?

Thomas Mützelburg, Public Information Officer, CTBTO

16:30 – 17:30 Tour of CTBTO’s Operations Centre and Roof Top Monitoring Station (VIC)

Enrique Castillo & Bernd Wernsperger, IMS, CTBTO

TUESDAY 18 JUNE

8:15 – 9:30 Off-the record informal breakfast briefing (Breakfast available) (Gardesalon)

Eight countries must ratify the CTBT before the Treaty can enter into force. These countries are: China, Egypt, India, Iran, Israel, North Korea, Pakistan and the USA. Why have these countries not ratified? How can the obstacles to ratification be overcome?

Hans Blix, Former Head of IAEA
Pramit Pal Chaudhuri, Foreign Editor, Hindustan Times
Ellen Tauscher, Former US Under Secretary of State
11:00 – 12:30  **Media briefing 1: North Korea’s Announced Nuclear Test – Latest Scientific Analysis** (Gardesalon)

Experts in nuclear physics, radionuclides and seismology provide insights into North Korea’s third nuclear test in February 2013 from the evidence gathered by CTBTO’s International Monitoring System and other sources. The speakers will also touch upon the North Korean nuclear program and previously conducted nuclear tests.

**Speakers:**

- **Siegfried S Hecker**, Stanford University, and former Director, Los Alamos Laboratory
- **Mika Nikkinen**, Radionuclide Specialist, CTBTO
- **Paul Richards**, Lamont-Doherty Earth Observatory, Columbia University, USA
- **Anders Ringbom**, Deputy Research Director at the Swedish Defence Research Agency, Division of Defence & Security Systems and Technology
- **Lassina Zerbo**, Director of the International Data Centre and Executive Secretary-elect, CTBTO

Moderator: **Annika Thunborg**, Spokesperson, CTBTO

13:00 – 14:00  **Science Press Conference** (Lunch also available) (Kleiner Redoutensaal)

Scientific and technological innovations enhance the efficient and cost-effective verification of the Comprehensive Nuclear-Test-Ban Treaty. The science press conference will present a selection of new innovations that will be discussed at SnT2013 and offer potential for advancing verification.

**Speakers:**

1. Introduction by **Lassina Zerbo**, Conference Head and Executive Secretary-elect, Preparatory Commission for the Comprehensive Nuclear-Test-Ban Treaty Organization.
3. Noble gases are a key indicator if an explosion was nuclear in nature or not, and the CTBTO has constructed a network of radionuclide monitoring stations to identify unusual quantities of xenon in the atmosphere. However, a few large radio-pharmaceutical facilities also release xenon, which can decrease the sensitivity of the CTBTO’s radionuclide monitoring. Scientists are therefore building a transportable xenon mitigation system to reduce the release of xenon into the atmosphere from such facilities. **J Camps**, Belgian Nuclear Research Centre (SCK•CEN), Mol, Belgium
4. Unexploded mines from World War II off the coast of Denmark are helping seismologists to assess the quality of their seismographic network. As the Danish Navy searches for and detonates the unexploded mines, the seismologists learn more about the detection threshold of their network by comparing information received from the navy with readings from the seismographs. Tine Birgitte Larsen, Geological Survey of Denmark and Greenland

5. Advances in sensor technology, computers and communications are leading to new geophysical techniques that could support the forensic inspection of the ground surrounding a suspected underground nuclear explosion. Alexander Peter Annan, CEO of Sensors & Software Inc in the USA, will present a new world of applied geo-physics for the near-surface.

6. Geographic information systems provide an opportunity to view recent man-made and natural changes to an extensive geographical area. Ward Hawkins of Los Alamos National Laboratory in the USA explains how image comparison could strongly benefit an on-site inspection team before and during an inspection (speaker tbc).

7. Moderator: Iain Stewart, Communications advisor, CTBTO

14:30 – 15:30 Media Briefing 2: Civil and Scientific Uses: Meteors, whales and tsunamis (Gardesalon)

As the CTBTO’s International Monitoring System listens for nuclear explosions, it also gathers data on a wide range of phenomena from meteors to tsunamis to the movement of whales which in turn help scientific understanding and disaster mitigation.

Speakers:

1. The detection of the meteor which exploded over Chelyabinsk, Russia in February 2013 by infrasound monitoring stations and how infrasound data is helping researchers better understand our weather. Pierrick Mialle, Acoustic Officer, CTBTO and Elizabeth Blanc, Research Director, Department of Analysis and Monitoring of the Environment, Commissariat à l’énegie atomique (CEA), France

2. As CTBTO’s hydroacoustic stations monitor for underwater explosions, they also overhear the calls of whales. Scientists have started to build a system inspired from the CTBTO’s International Data Centre system which will both locate the whales and measure the acoustic velocity in the oceans. This in turn sheds light on the little known cetacean migration patterns and on variations in ocean temperature which is vital for the long term monitoring of the Earth’s climate. Ronan Le Bras, University of Vienna

3. Mark Prior of the International Data Centre in the CTBTO will briefly explain how CTBTO’s international monitoring system helps the work of tsunami early warning centres.

4. A dense ocean floor network of multiple sensors ranging from seismometers to hydrophones detected the March 2011 tsunami off the coast of Japan 15 minutes earlier than onshore stations. Further advances in the early warning system will be presented at the briefing. Yoshiyuki Kaneda of the Japan Agency for Marine-Earth Science and Technology

5. Moderator: Kirstie Gregorich Hansen, Public Information Officer, CTBTO
18:30 – 22:00  ‘Screening of the play ‘Reykjavik’ by Pulitzer Prize winner Richard Rhodes (Grosser Redoutensaal)

‘Reykjavik’ re-enacts the Reykjavik summit in October 1986 when U.S. President Ronald Reagan and Soviet General Secretary Mikhail Gorbachev came close to abolishing all nuclear weapons. More than 25 years later, the drama of the meeting and its potential to fundamentally change the course of history continue to ignite the imagination and inspire hopes for the future.

19:30  Panel Discussion

‘How can science help the Comprehensive Nuclear-Test-Ban Treaty enter into force?’

**Panellists:**

- **Hans Blix**, Former Head of IAEA
- **Pramit Pal Chaudhuri**, Foreign Editor, Hindustan Times
- **Patricia Lewis**, Research Director, Chatham House
- **Roald Sagdeev**, President Gorbachev’s science advisor
- **Ellen Tauscher**, Former US Under Secretary of State

20:30  Reception

This event is being hosted by the CTBTO and the governments of Mexico and Sweden, the two coordinators of the process to promote the Treaty’s entry into force.