

The Implications of Paris Research and Workshop Project Tokyo Workshop on the Global Stocktake

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Implications of Paris Research and Workshop Series

- The Paris Agreement of 2015
 - Adopted by consensus on 12 December 2015
 - Opened for signature 22 April 2016 (Earth Day) in NYC
 - Entered into force 4 November 2016
- Left many of the details to be worked out later



Some remaining questions

- Nationally Determined Contributions are Goals, that need policies measures and business models to realize.
- Article 6 allows countries to jointly implement NDCs

- There will be a Global Stocktake in 2023 (and Facilitative Dialogue in 2018)
- 1.5 degree limit



The Implications of Paris Research and Workshop Series Approach

- **Fill High-Priority Research Gaps**—Identify important gaps in understanding and conduct research to help fill those gaps.
- **Conduct Workshops**— The workshops serve two functions.
 - Identify the most important research gaps in our knowledge
 - Communicate to the most recent findings to key decision makers

Source: <https://marylandday.umd.edu/>



May 3-4, 2016 Workshop Key Findings

- ▶ How will **national circumstances, institutions** and goals influence the implementation of NDCs and what are their emissions implications?
- ▶ Can new **international institutions** make NDCs more effective?
- ▶ What are the best measures of progress toward long-term objectives for the **Global Stocktake**?
- ▶ Can **Sustainable Development Goals** be achieved simultaneously with the goals of the Paris Agreement?
- ▶ What roles will **technology** and control of non-energy emissions play in achieving NDCs and the long-term Paris goals?



Source: <https://www.provost.umd.edu/>

University of Maryland, College Park

NTNU, Trondheim, Norway



Source: <https://www.ntnu.edu/dafx15/>

March 5-6, 2017 Workshop Key Findings

- ▶ **Transport**—implications of alternative technology and infrastructure development pathways (electrification, bioenergy, H₂).
- ▶ **Power Sector**—negative emissions, and the roles of specific technologies, e.g. natural gas.
- ▶ **Sector Interactions**—interactions between end-use sectors, non-CO₂ emissions and land-use
- ▶ **Business Models, Policies, and Measures**—development of new business and finance models .

The Global Stocktake Workshop

Goal: Identify research needed to inform the Global Stocktake

Article 14

- *“The Conference of the Parties serving as the meeting of the Parties to this Agreement shall periodically **take stock of the implementation of this Agreement** to assess the collective progress towards achieving the purpose of this Agreement and its long-term goals (referred to as the **"global stocktake"**)”*
- *First Global Stocktake in **2023** and every five years thereafter*
- *The Global Stocktake “shall inform Parties in updating and enhancing, in a nationally determined manner, their actions and support ..., as well as in enhancing international cooperation for climate action.”*



The Global Stocktake Workshop

- Session 1: Overview of the Workshop and Keynote
- Session 2: Research to measure progress in emissions and land use, and non-CO₂
- Session 3: Research to measure progress in technology, policy, institutions, communications and adaptation
- Session 4: Research to measure progress toward business models, financial instruments, and green development strategies
- Session 5: Research Needs and Future Directions



Some Preliminary Thoughts About Findings



Source: <http://www.flickr.com/photos/bribri/9977683204/>

The Global Stotcktake has two goals

- Assess progress toward
- Inform Parties in updating and enhancing their NDCs

The research to inform the Global Stocktake

- Developing and exploring pathways that couple near-term NDCs to long-term MCSs
- Better understanding the role of land-use, negative emissions (BECCS and/or sinks and/or free-air capture)
- Research to better understand how to address “hard to reduce” emissions
- Development of business models, development-bank and central-bank strategies, reducing financial barriers and de-risking finance
- Examination of realistic policies and measure, particularly those that link the large scale global to near-term local and regional decision makers
- Interactions between institutions, policy and technology
- Research and communication of useful lessons
- Exploring futures that jointly consider mitigation and adaptation
- Joint consideration of SDGs and climate

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