Climate Indicators & the Sustainable Development Goals

Claire Ransom
Climate Monitoring and Policy, WMO
Before we get started...

On your phones or computers, please go to:

www.Menti.com

And use the code

4636 9478
The Sustainable Development Goals

- Agenda for 2030
- Comprised of 17 goals
- Globally agreed in 2015
7 Indicators & the SDGs

Climate Indicators and Sustainable Development
Demonstrating the Interconnections

Impacts
- Temperature and Energy
- Atmospheric Composition
- Ocean and Water
- Cryosphere
- Surface Temperature
- Atmospheric CO₂
- Ocean Acidification
- Sea Level
- Glaciers
- Arctic and Antarctic Sea Ice Extent

Risks
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100,000 km² of glaciers
Headwaters of 10 major rivers
Food & water for 3 billion people

Glacial Mass Balance
Flooding in Uttarakhand, India

- 200 people missing or perished
- Damaged two hydropower stations
- UNESCO World Heritage Site
Ocean Heat Content
Marine heatwaves

⚠️ Unprecedented harmful algal blooms in Hokkaido, Japan

👉🏻 Salmon & sea urchin die off

💰 7.6 billion yen (€58 million) in damages
Ocean Acidification
Ocean Acidification

- Coral Formation
- Marine Shell and Skeletal Formation
- Marine Food Web Alteration
- Fishing Yields
- Reduced Livelihoods
- Natural Heritage
- Conflicts

Legend:
- Change in the Climate System
- Ecosystem Services Degradation
- Impact on Human Societies
- Feedback loop
- Gender Implications

Sustainable Development Goals:
- 1: No Poverty
- 8: Decent Work and Economic Growth
- 11: Sustainable Cities and Communities
- 14: Life Below Water
- 2: Zero Hunger
- 16: Peace, Justice, and Strong Institutions
Coral Triangle

- 76% of the world's coral species
- Employs 2.25 million fishers
- Sustains 120 million people
How can we quantify how much climate change is hindering progress toward achieving the SDGs?
Next Steps

State of the Climate 2011-2020
• Focus on sustainable development
• Analysis of 15 key extreme events & impacts on national ability to achieve SDGs

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