



Climate Change, from AR5 to AR6

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bit.ly/ipcc_outreach_centralasia

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**WIDESPREAD
OBSERVED IMPACTS**

A CHANGING WORLD



**INCREASING
MAGNITUDES
OF WARMING INCREASE
THE LIKELIHOOD OF**

**SEVERE AND
PERVASIVE IMPACTS**



**RISKS OF
CLIMATE CHANGE
INCREASE
WITH CONTINUED
HIGH EMISSIONS**



CLIMATE CHANGE REDUCING AND MANAGING RISKS

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Key Risks in Asia

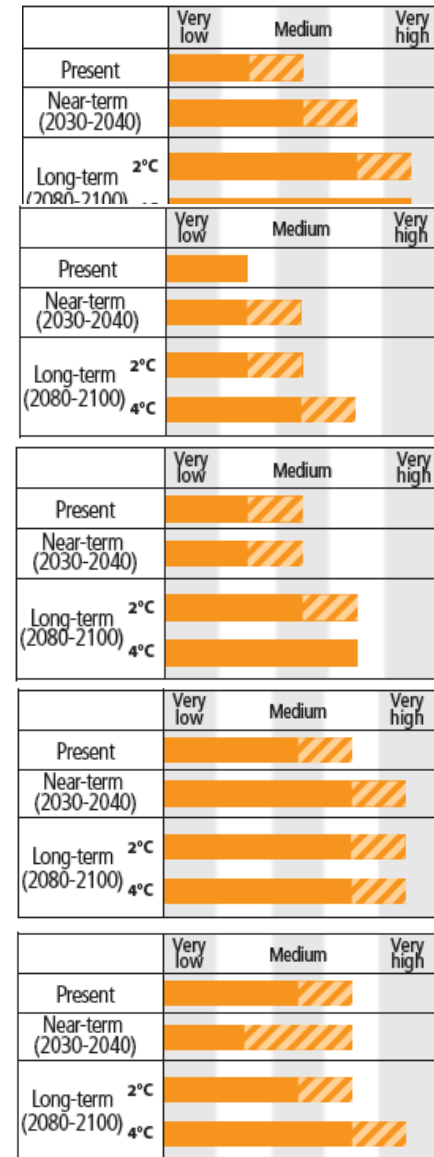
Increased risk of heat-related mortality (high confidence)

Increased risk of drought-related water and food shortage causing malnutrition (high confidence)

Increased risk of crop failure and lower crop production could lead to food insecurity in Asia (medium confidence)

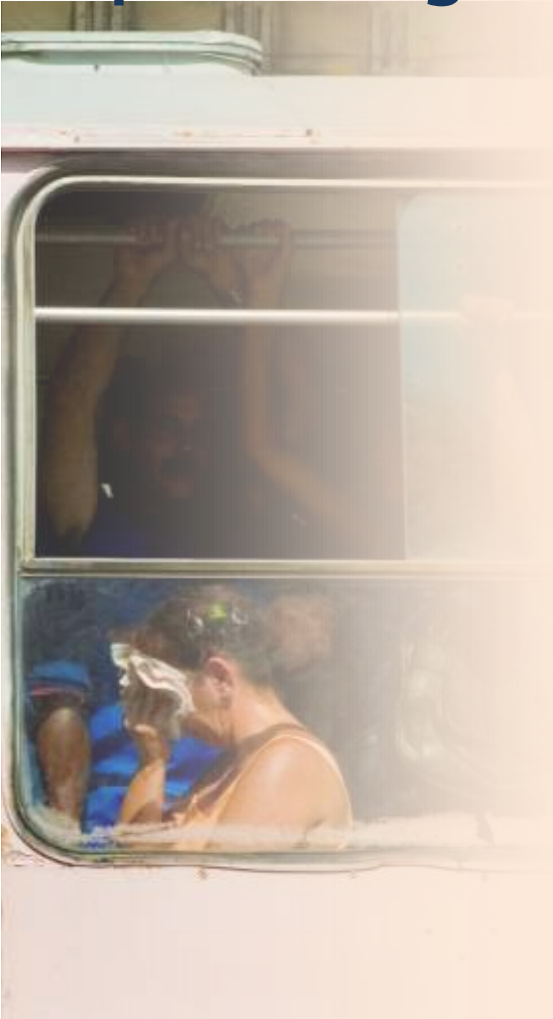
Water shortage in arid areas of Asia (medium confidence)

Exacerbated poverty, inequalities and new vulnerabilities (high confidence)



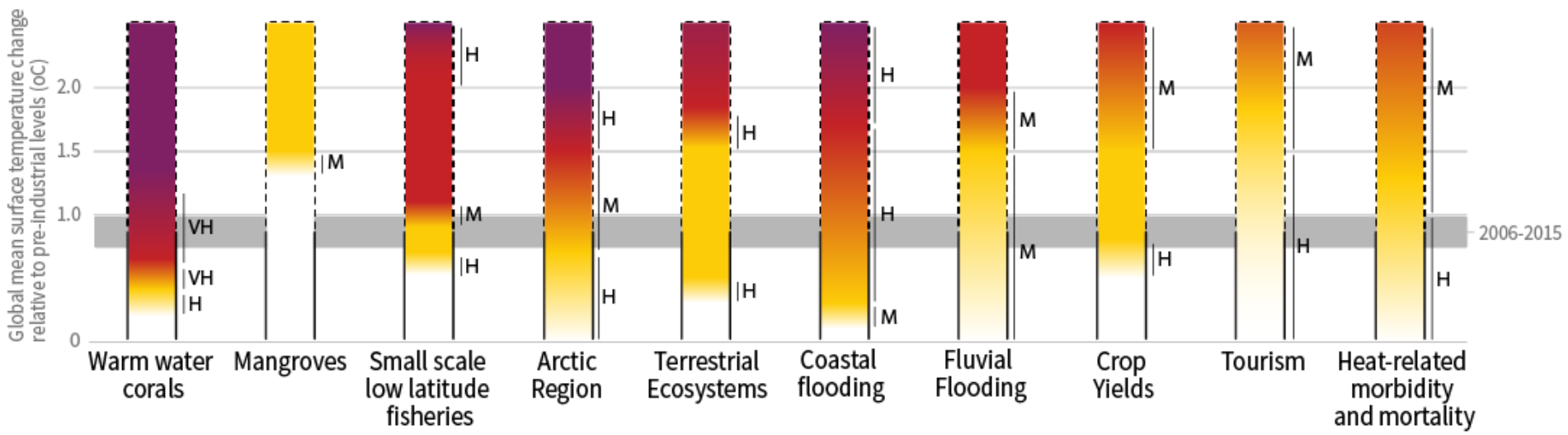
Impacts of global warming 1.5°C (At 1.5°C compared to 2°C)

- Less extreme weather where people live, including extreme heat and rainfall
- By 2100, global mean sea level rise will be around 10 cm lower but may continue to rise for centuries
- 10 million fewer people exposed to risk of rising seas
- Lower impact on biodiversity and species
- Smaller reductions in yields of maize, rice, wheat
- Global population exposed to increased water shortages is up to 50% less
- Lower risk to fisheries and the livelihoods that depend on them
- Up to several hundred million fewer people exposed to climate-related risk and susceptible to poverty by 2050



Jason Florio / Aurora Photos

Impacts and risks for selected natural, managed and human systems



Confidence level for transition: L=Low, M=Medium, H=High and VH=Very high

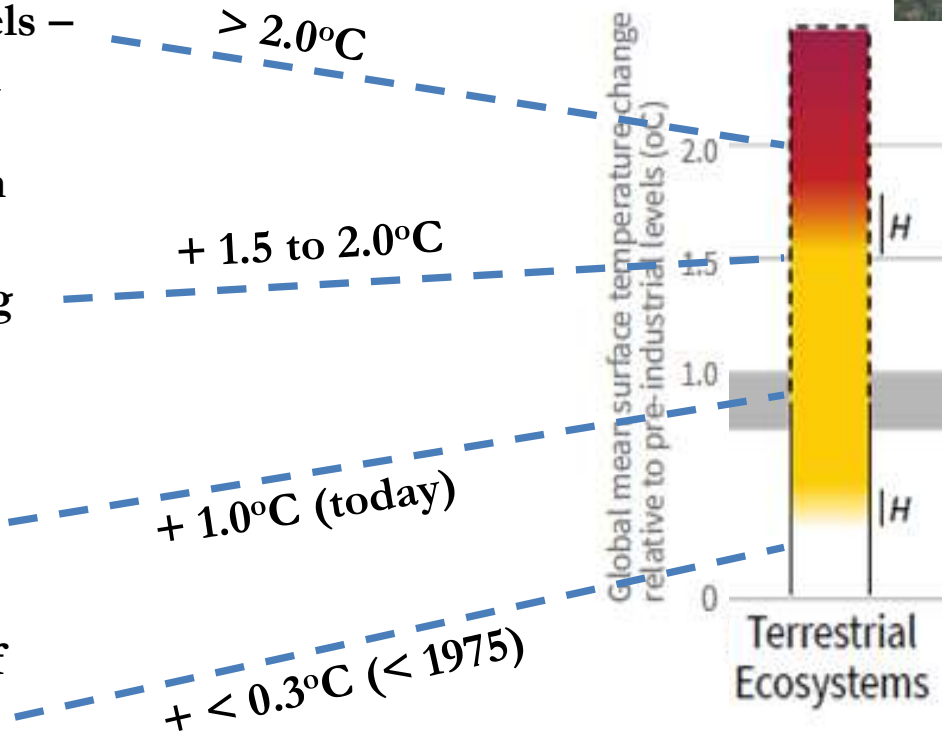
Global Warming of 1.5°C

Biome shifts and species range losses escalate to very high levels – adaptation options very limited

Extensive shifts of biomes with doubling or tripling of the plants, animals or insects losing over half of their climatically determined geographic ranges

Some climate change impacts evident

No detection and attribution of impacts of global warming on terrestrial ecosystems



Adaptation is already occurring

- 
- Combining Traditional and Scientific Knowledge
 - Adapting Communications Infrastructure
 - Coastal & Water Management
 - Environmental Protection & Land Planning
 - Disaster Risk Management
 - Development Planning
 - Early Warning Systems
 - Mangrove Reforestation
 - Water Resources Management
 - Disaster Risk Management
 - Basic Public Health
 - Livelihood Diversification
 - Planning for Sea-Level Rise
 - Planning for Reduced Water Availability
 - Municipal-Level Actions
 - Adapting Energy & Public Infrastructure
 - Ecosystem-Based Adaptation
 - Water Resources Management
 - Resilient Crop Varieties
 - International Cooperation
 - Marine Spatial Planning

IPCC AR5 - Chapter 24, Asia: Coverage - 51 countries/regions

Source: IPCC, 2013

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Central Asia (5)

- Kazakhstan
- Kyrgyzstan
- Tajikistan
- Turkmenistan
- Uzbekistan

Contribution invited from Central Asia

North Asia (2)

- Mongolia
- Russia (East of Urals)

East Asia (7)

- China, Hong Kong Special Administrative Region (Hong Kong SAR)
- China, Macao Special Administrative Region
- Japan
- North Korea
- People's Republic of China (China)
- South Korea
- Taiwan Province of China (Taiwan POC)

West Asia (17)

- Armenia
- Azerbaijan
- Bahrain
- Georgia
- Iran
- Iraq
- Israel
- Jordan
- Kuwait
- Lebanon
- Palestine
- Oman
- Qatar
- Saudi Arabia
- Syria
- United Arab Emirates
- Yemen


South Asia (8)

- Afghanistan
- Bangladesh
- Bhutan
- India
- Maldives
- Nepal
- Pakistan
- Sri Lanka

Southeast Asia (12)

- Brunei
- Indonesia
- Lao People's Democratic
- Malaysia
- Myanmar
- Papua New Guinea
- The Philippines
- Republic Cambodia
- Singapore
- Thailand
- Timor-Leste
- Vietnam



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- **Current national commitments are not enough to keep to either 1.5°C or 2°C**
 - **Would require deep changes in all aspects of society (e.g. energy, land, buildings, transport, food & diets, cities)**
 - **New technologies, efficiency, cleaner energy sources, less deforestation, new land uses, sustainable agriculture**
 - **Good news is there is movement in the right direction in lots of these areas but would need to do more, faster**
 - **But this would require greater collective ambition**

THANK YOU FOR YOUR ATTENTION!

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