

Taking action on the evidence: the three IPCC Special Reports together

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INTERGOVERNMENTAL PANEL ON climate change

Global Warming of 1.5°C

An IPCC special report on the impacts of global warming of 1.5°C above pre-industrial levels and related global greenhouse gas emission pathways, in the context of strengthening the global response to the threat of climate change, sustainable development, and efforts to eradicate poverty.




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Summary for Policymakers



WG I WG II WG III


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The Ocean and Cryosphere in a Changing Climate

This Summary for Policymakers was formally approved at the Second Joint Session of Working Groups I and II of the IPCC and accepted by the 51st Session of the IPCC, Principality of Monaco, 24th September 2019

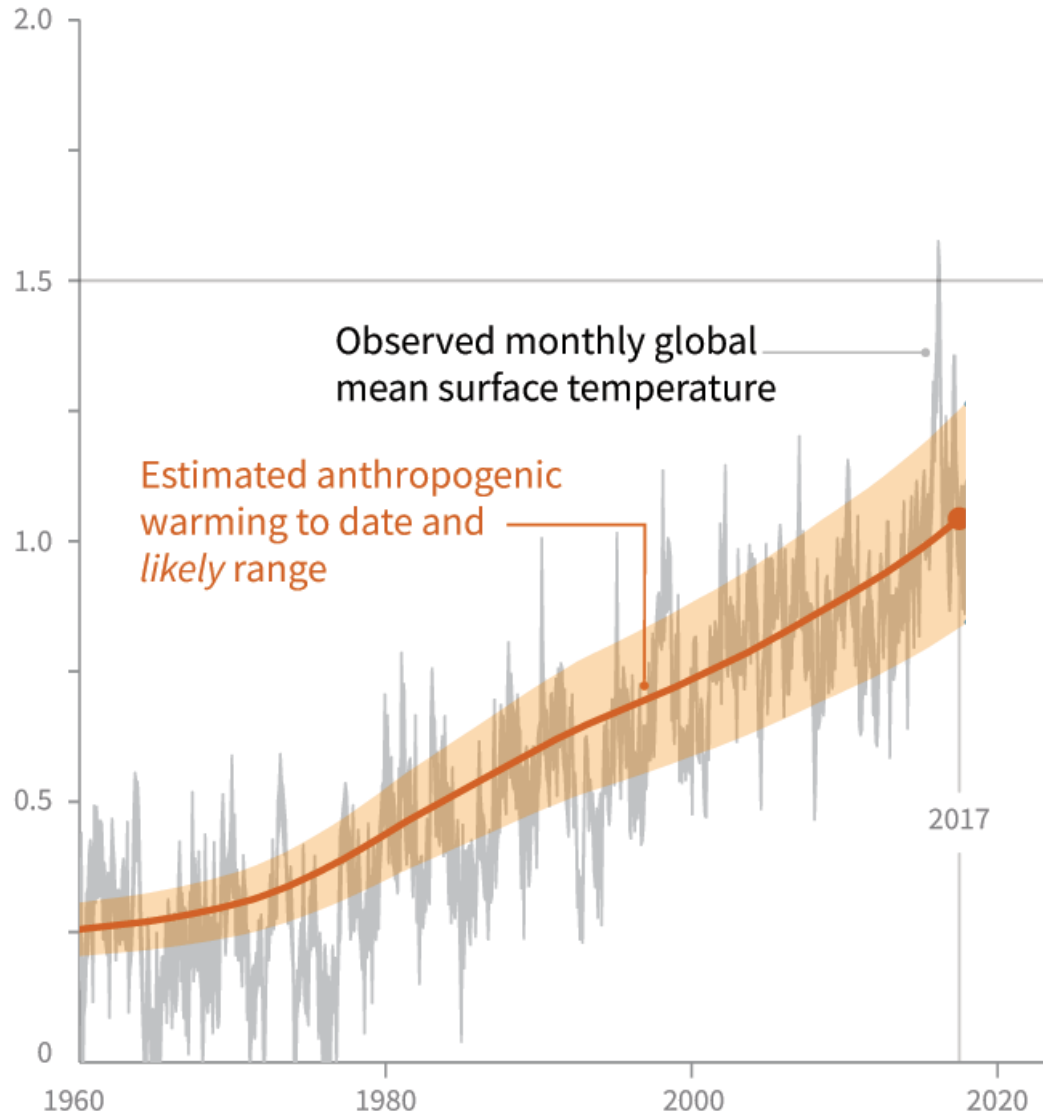
Summary for Policymakers



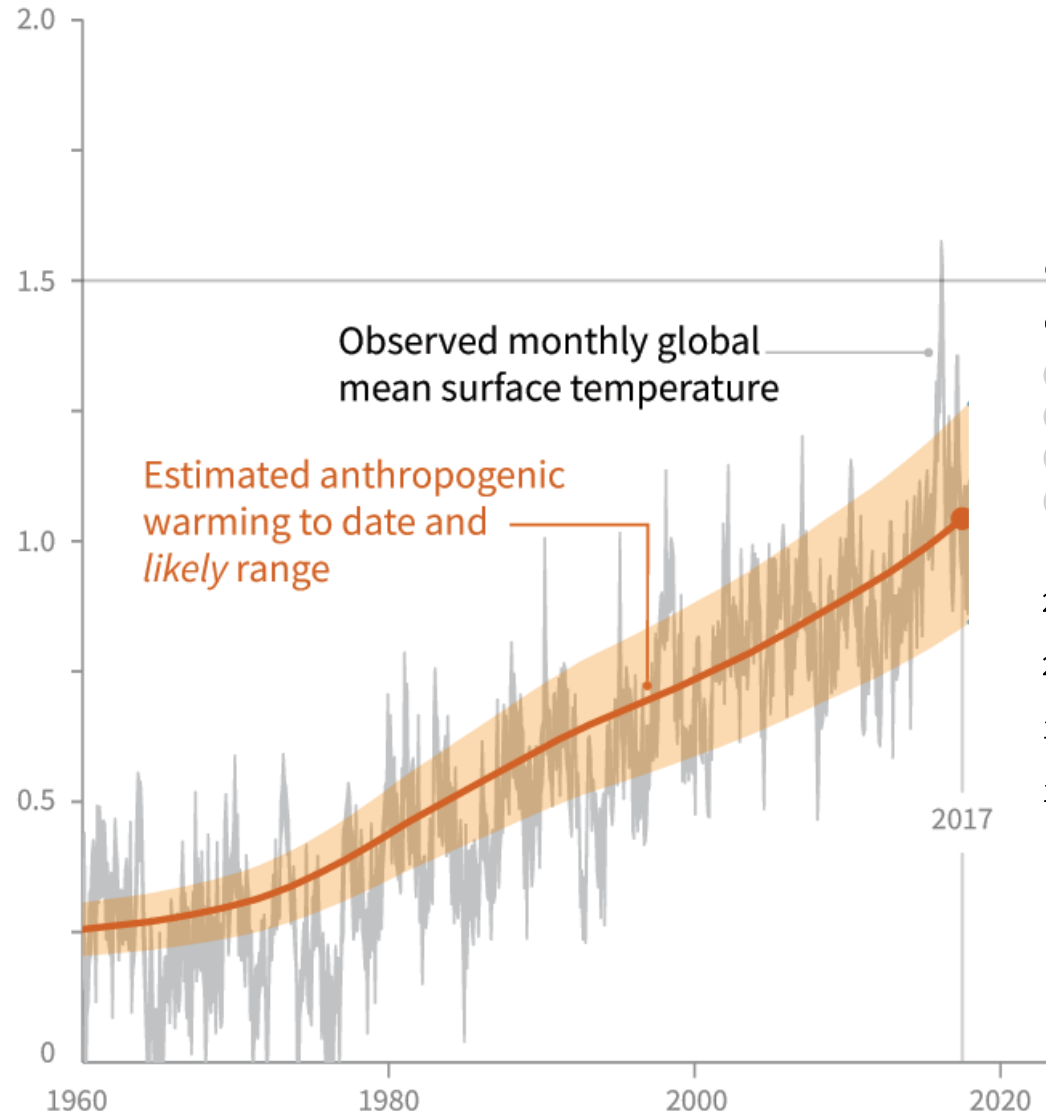
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Global warming relative to 1850-1900 (°C)



Global warming relative to 1850-1900 (°C)

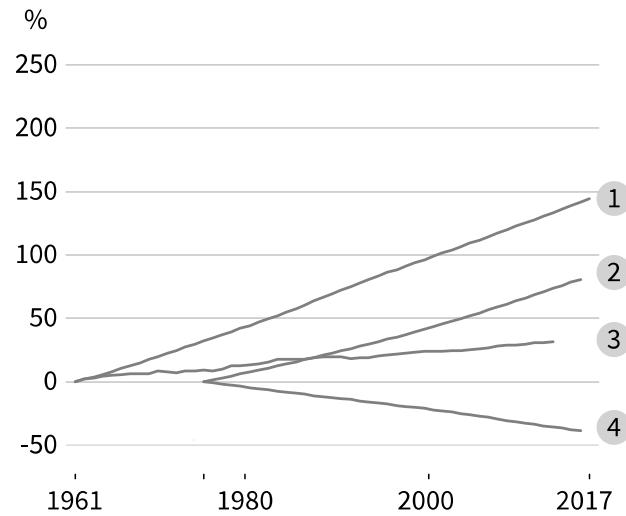


E. Food demand

Increases in production are linked to consumption changes.

CHANGE in % rel. to 1961 and 1975

- 1 Population
- 2 Prevalence of overweight + obese
- 3 Total calories per capita
- 4 Prevalence of underweight

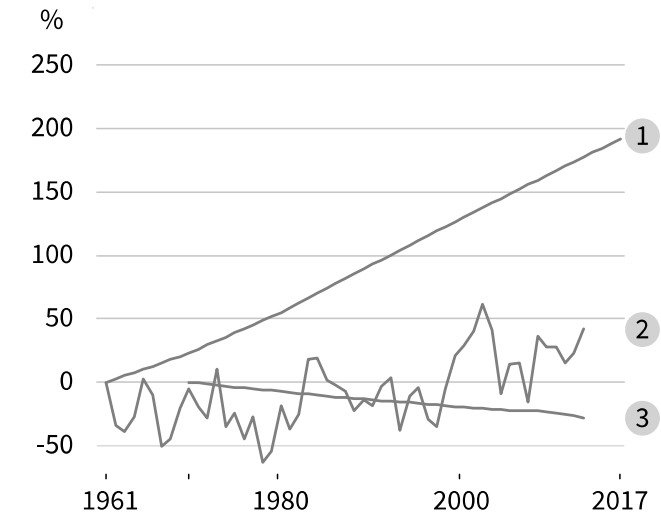


F. Desertification and land degradation

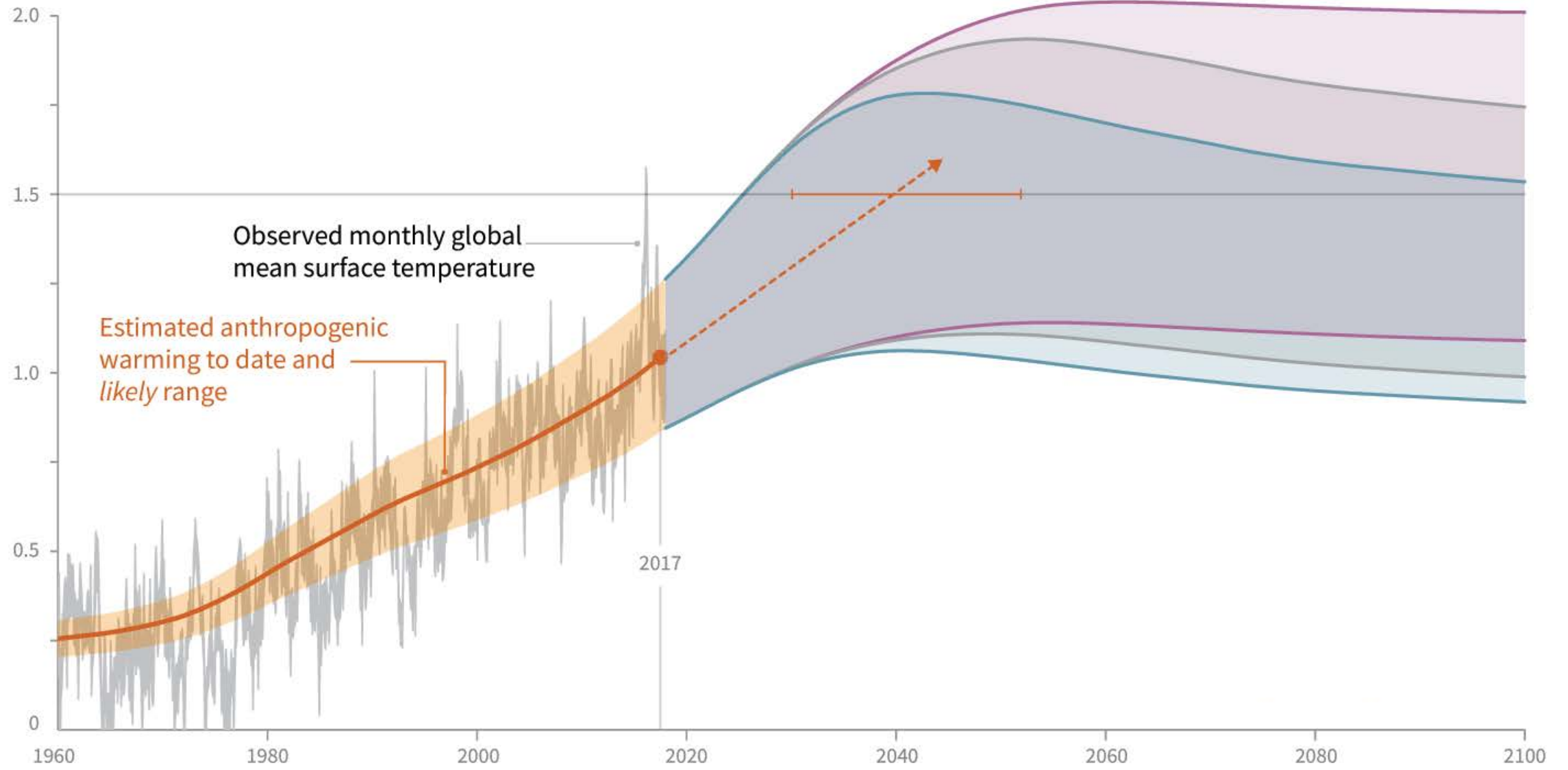
Land-use change, land-use intensification and climate change have contributed to desertification and land degradation.

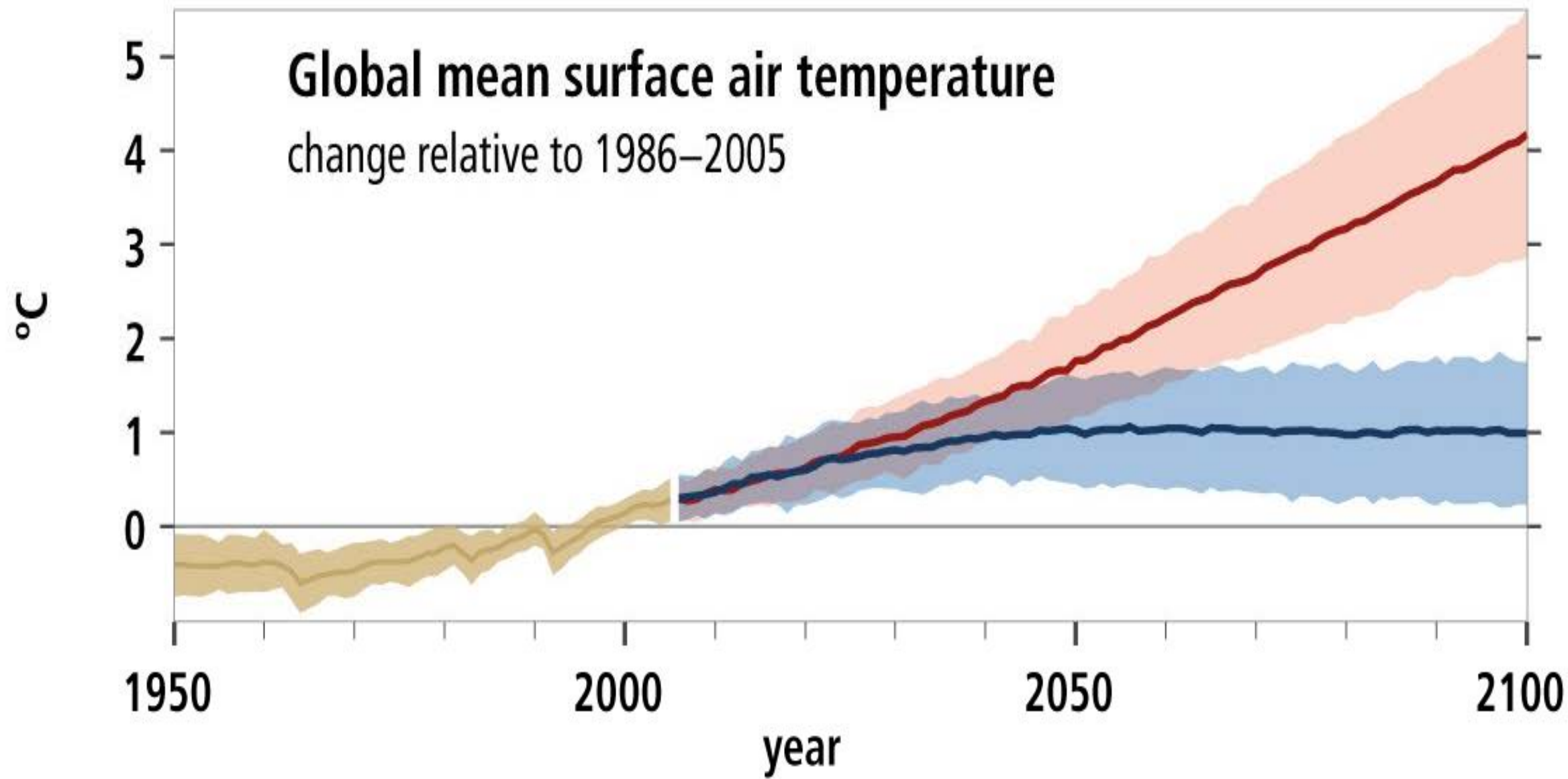
CHANGE in % rel. to 1961 and 1970

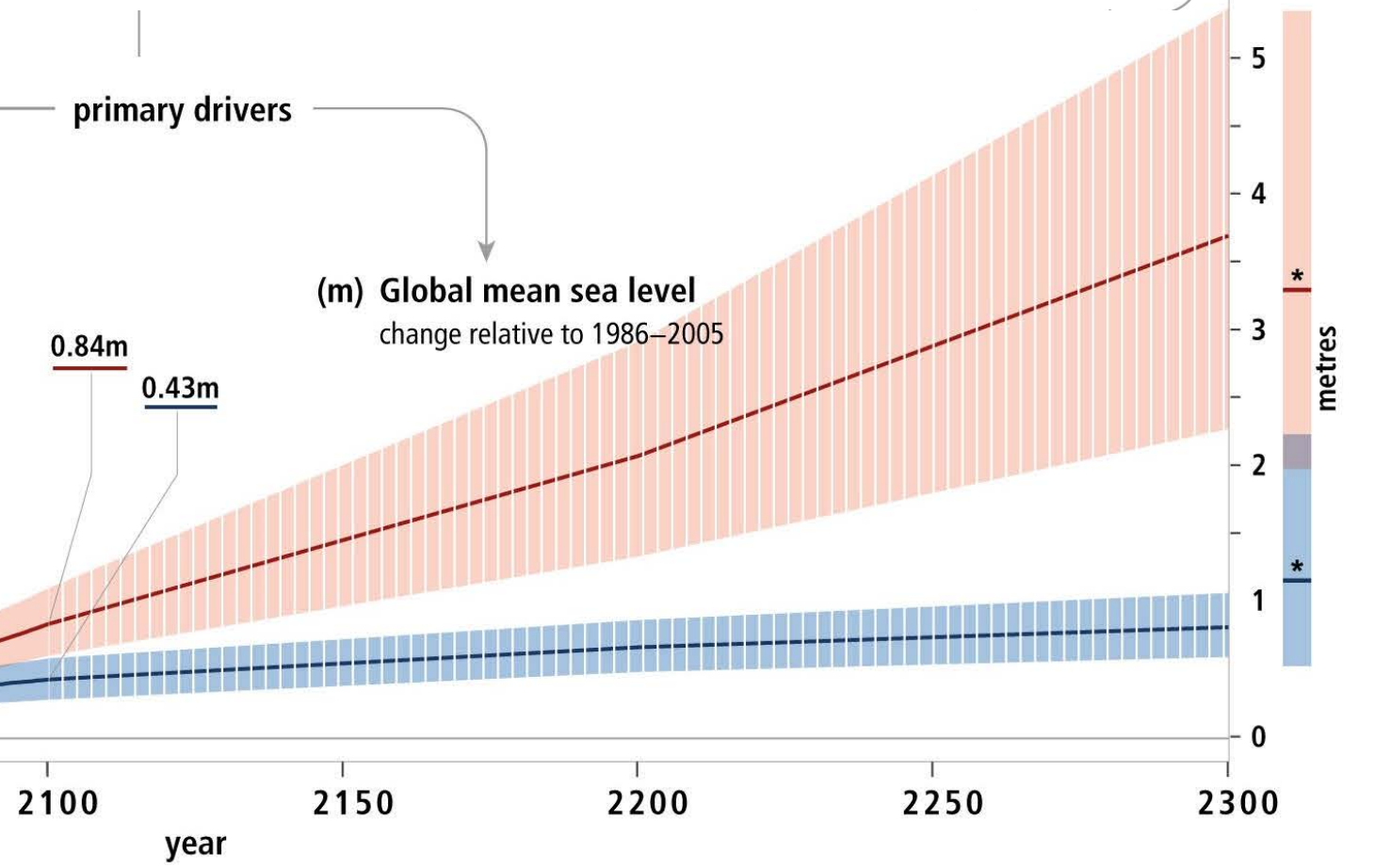
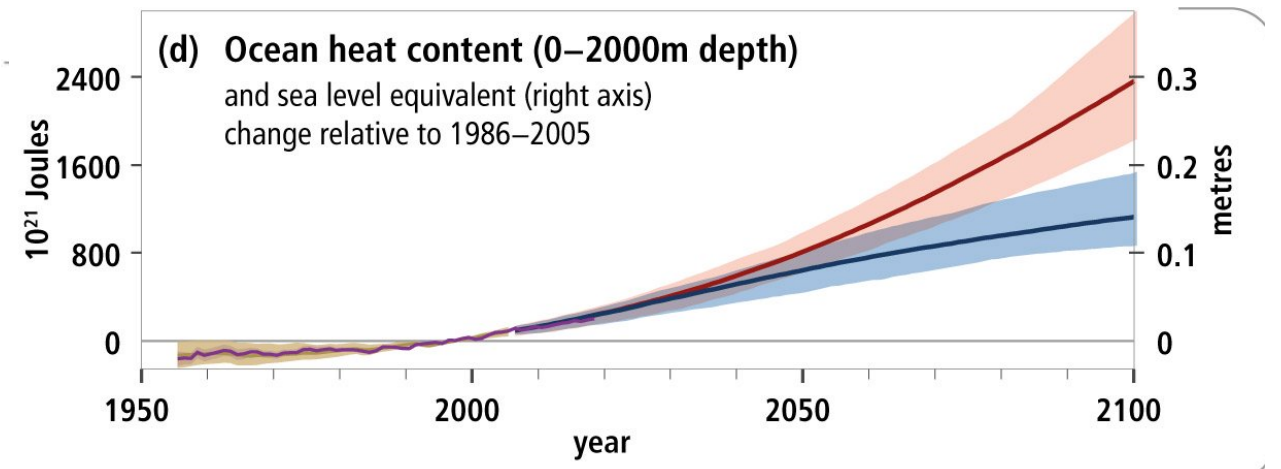
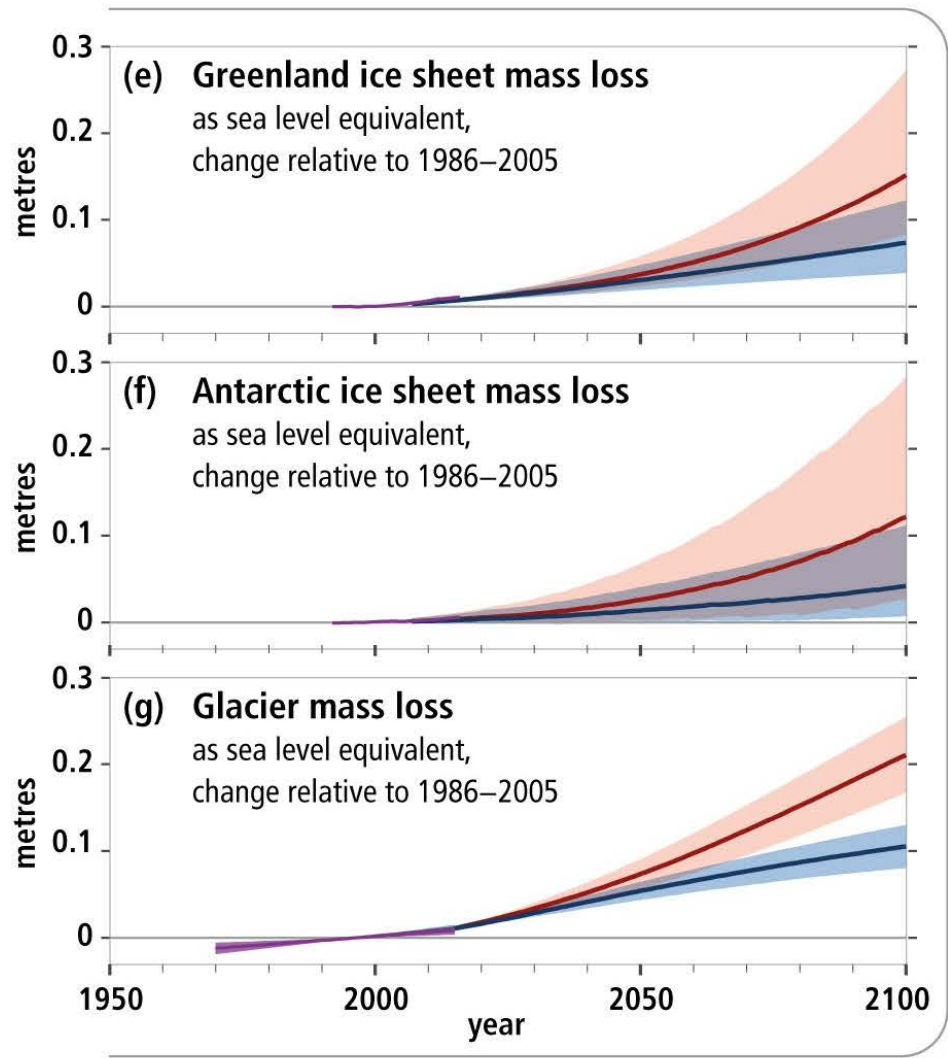
- 1 Population in areas experiencing desertification
- 2 Dryland areas in drought annually
- 3 Inland wetland extent



Global warming relative to 1850-1900 (°C)

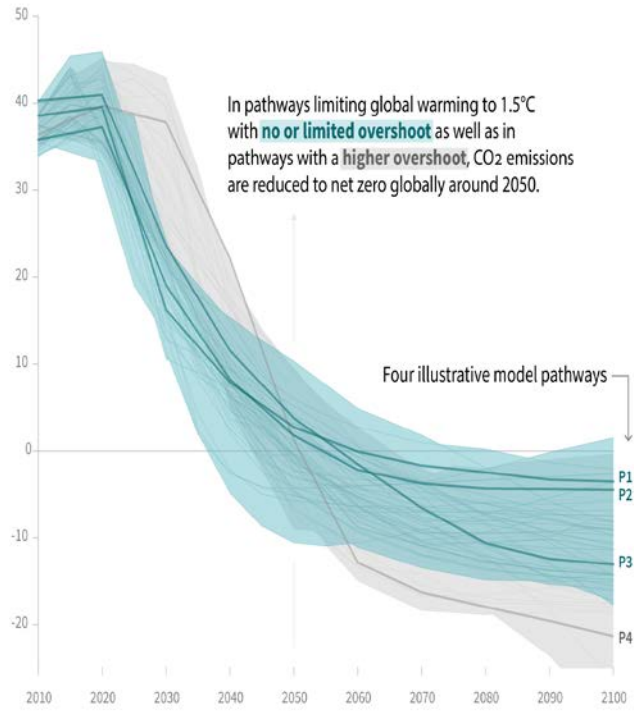




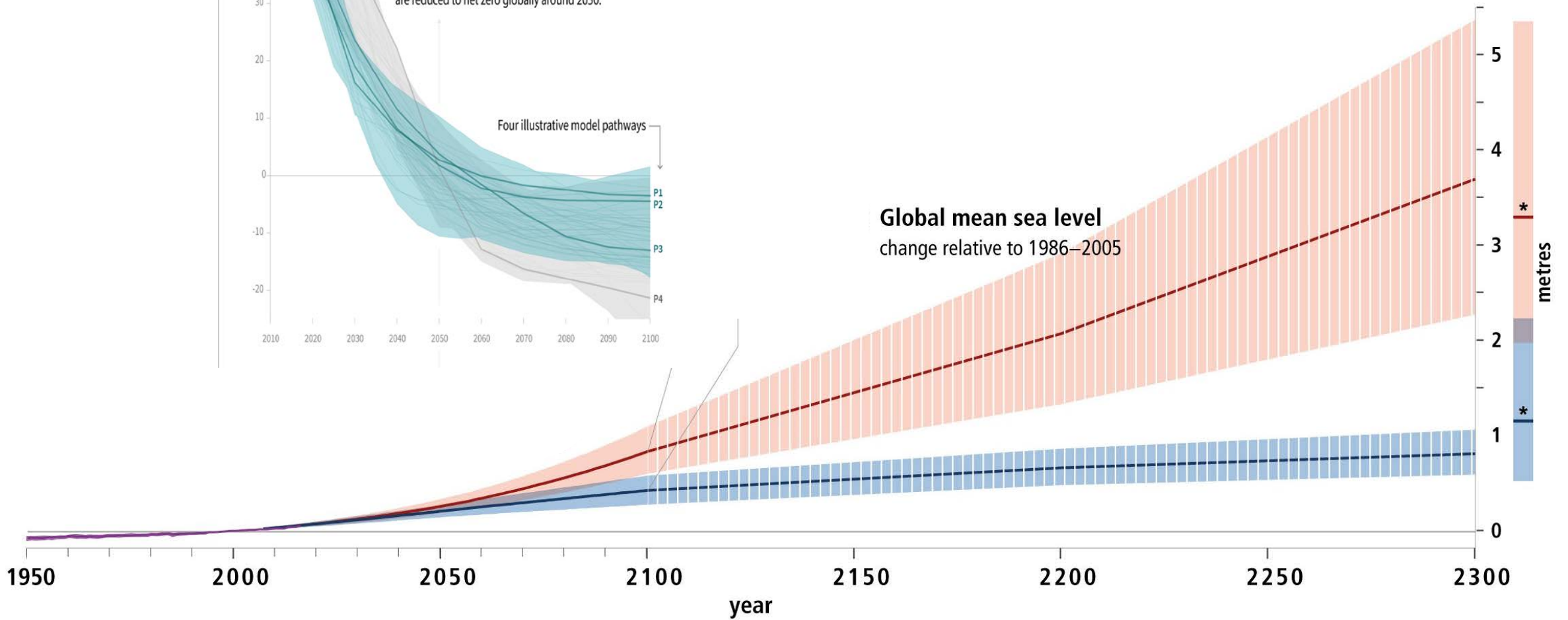


Global total net CO₂ emissions

Billion tonnes of CO₂/yr

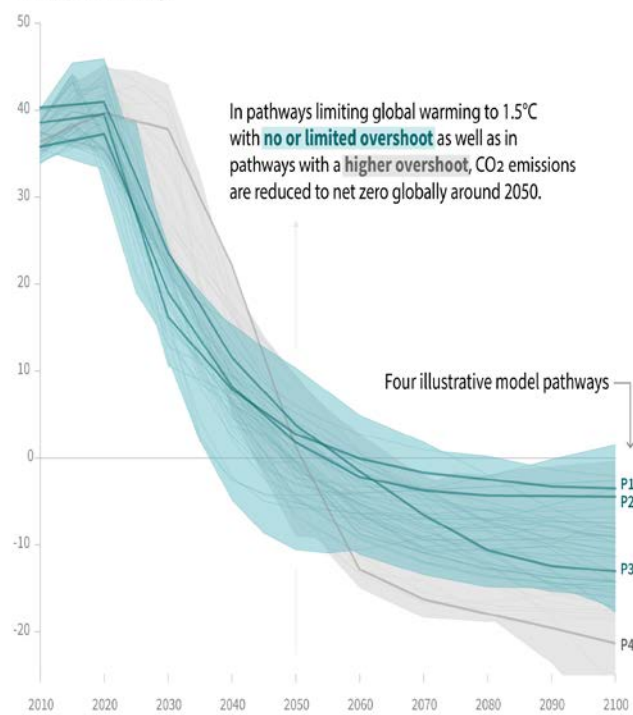


Global mean sea level change relative to 1986–2005

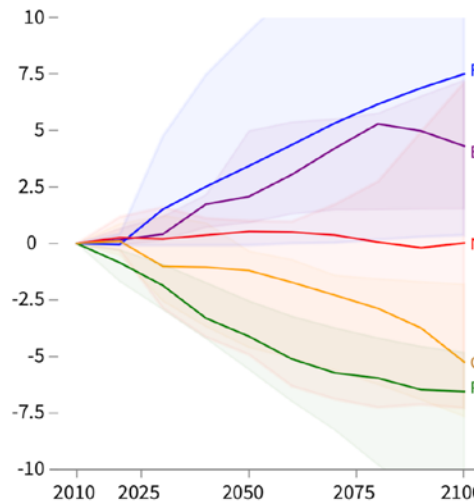


Global total net CO₂ emissions

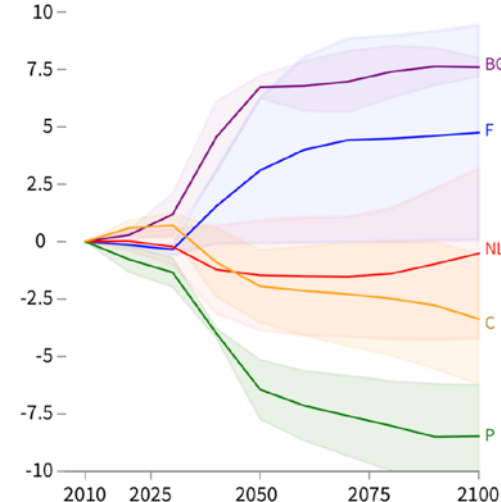
Billion tonnes of CO₂/yr



SSP1 Sustainability-focused Change in Land from 2010 (Mkm²)



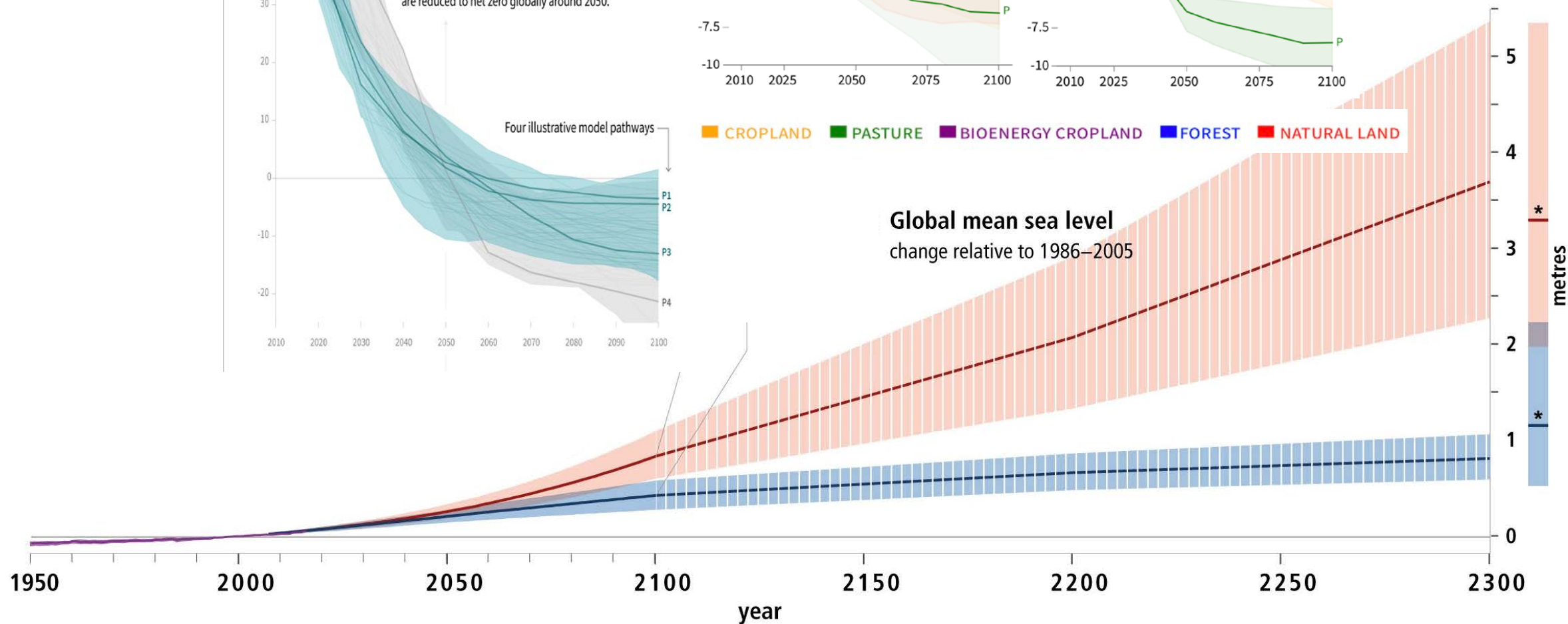
SSP5 Resource intensive Change in Land from 2010 (Mkm²)



■ CROPLAND
 ■ PASTURE
 ■ BIOENERGY CROPLAND
 ■ FOREST
 ■ NATURAL LAND

Global mean sea level

change relative to 1986–2005



SSP1 Sustainability-focused
Change in Land from 2010 (Mkm²)
10 -
7.5 -

SSP5 Resource intensive
Change in Land from 2010 (Mkm²)
10 -
7.5 -

Climate action on short and long timescales

Increasing need for adaptation action to address existing risks

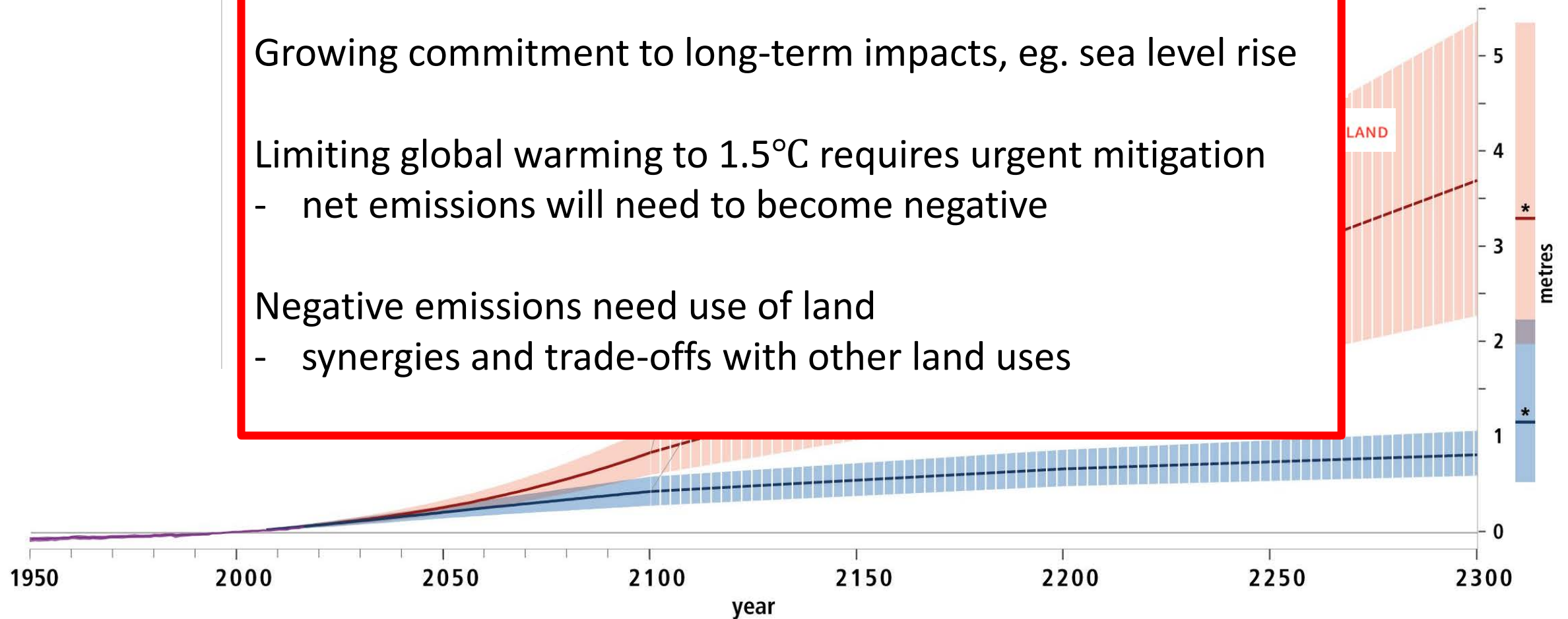
Growing commitment to long-term impacts, eg. sea level rise

Limiting global warming to 1.5°C requires urgent mitigation

- net emissions will need to become negative

Negative emissions need use of land

- synergies and trade-offs with other land uses



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