

The imperative for urgent climate action to protect health



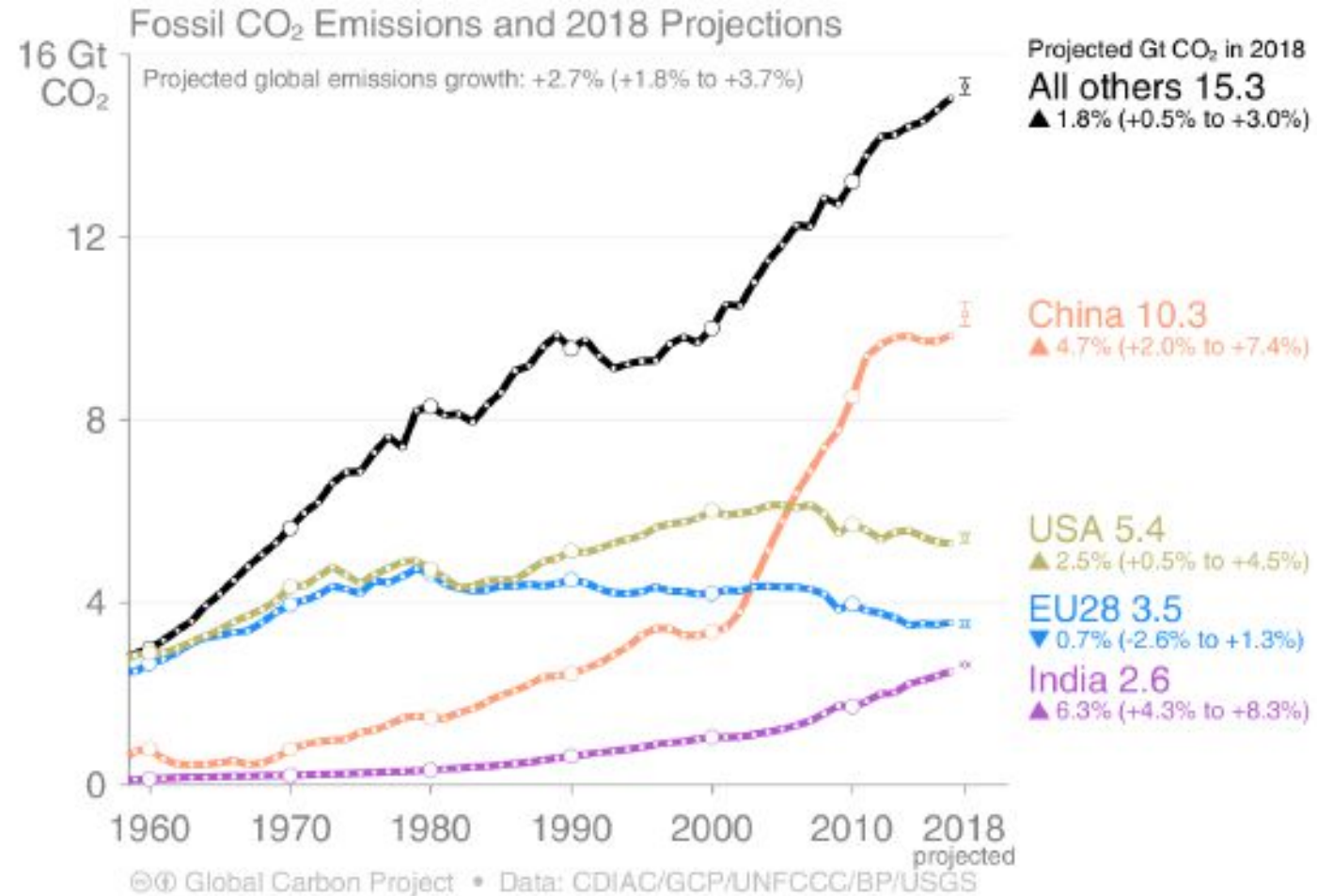
Andy Haines



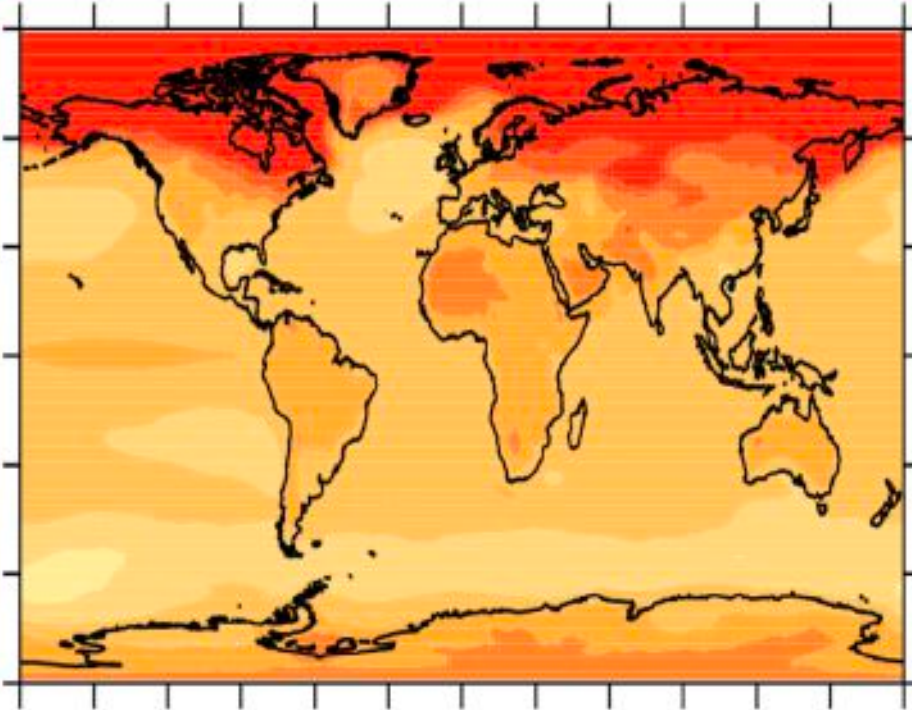
LONDON
SCHOOL *of*
HYGIENE
& TROPICAL
MEDICINE

Emissions Projections for 2018

Global fossil CO₂ emissions are projected to rise by 2.7% in 2018 [range: +1.8% to +3.7%]
 The global growth is driven by the underlying changes at the country level.



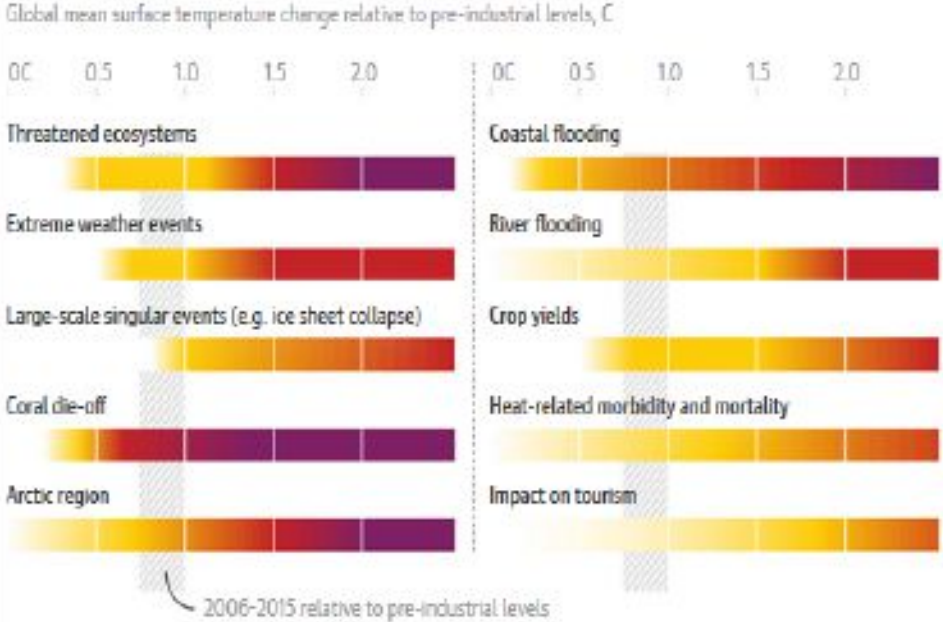
Regional temperatures at 1.5C and rising risks



1 °C 2 °C 3 °C

Temperature Increase

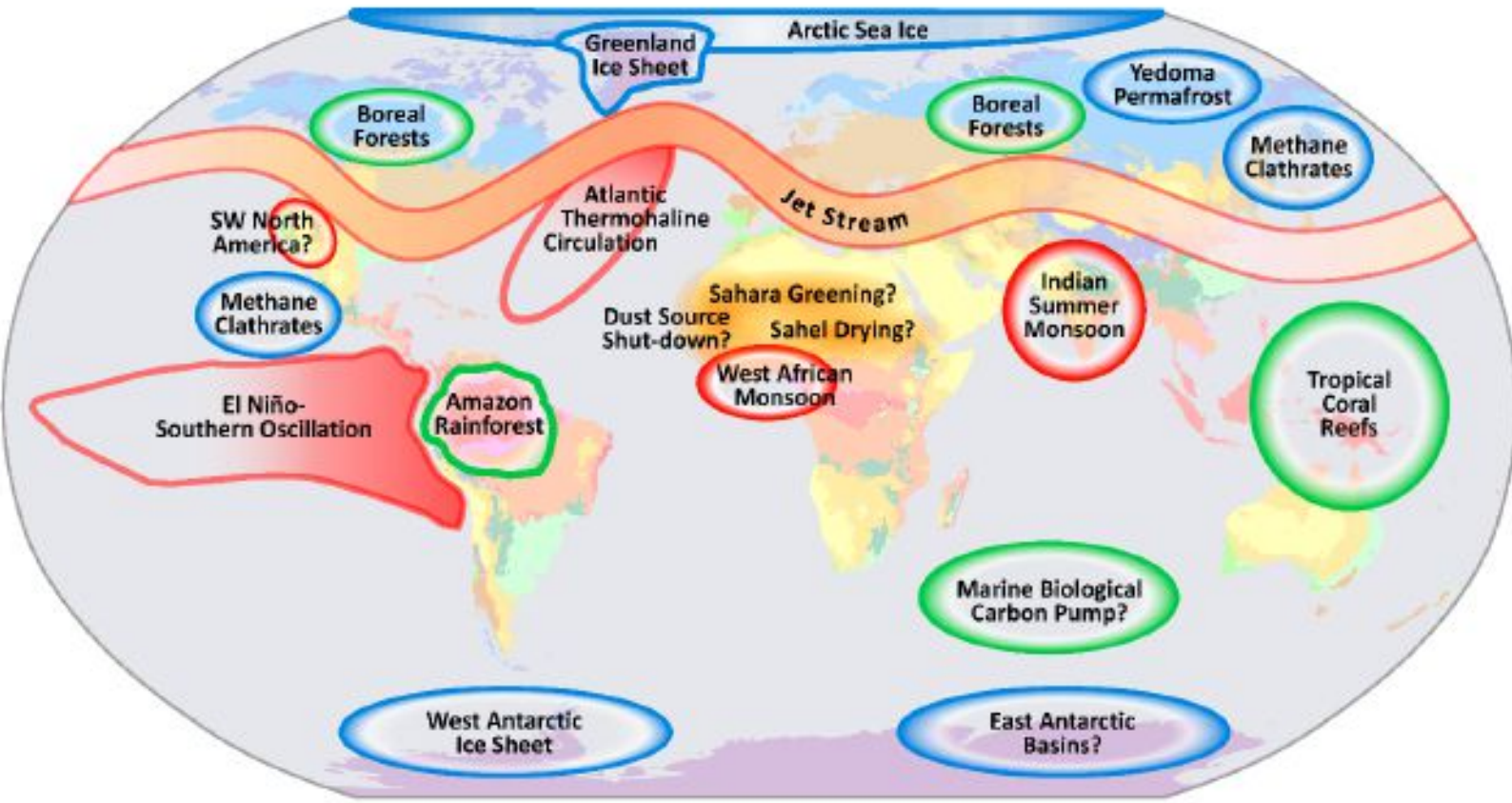
Rising temperatures, rising risks



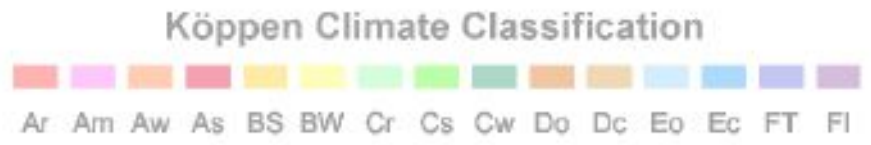
Guardian graphic. Source: IPCC Special Report on Global Warming of 1.5C

Climate tipping points- the potential for non-linear, self reinforcing changes PIK-

Potsdam Institute for Climate Change

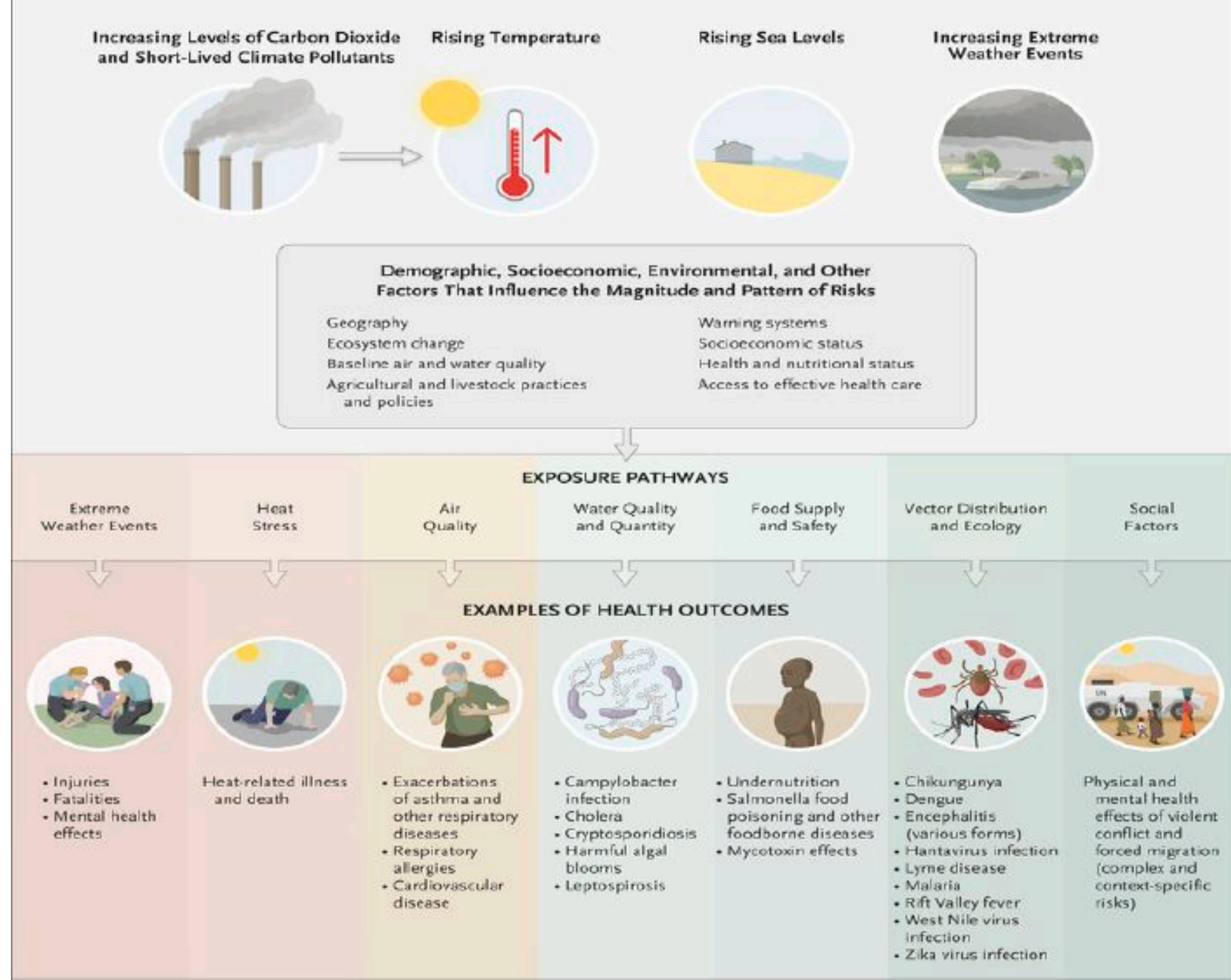


- Cryosphere Entities
- Circulation Patterns
- Biosphere Components

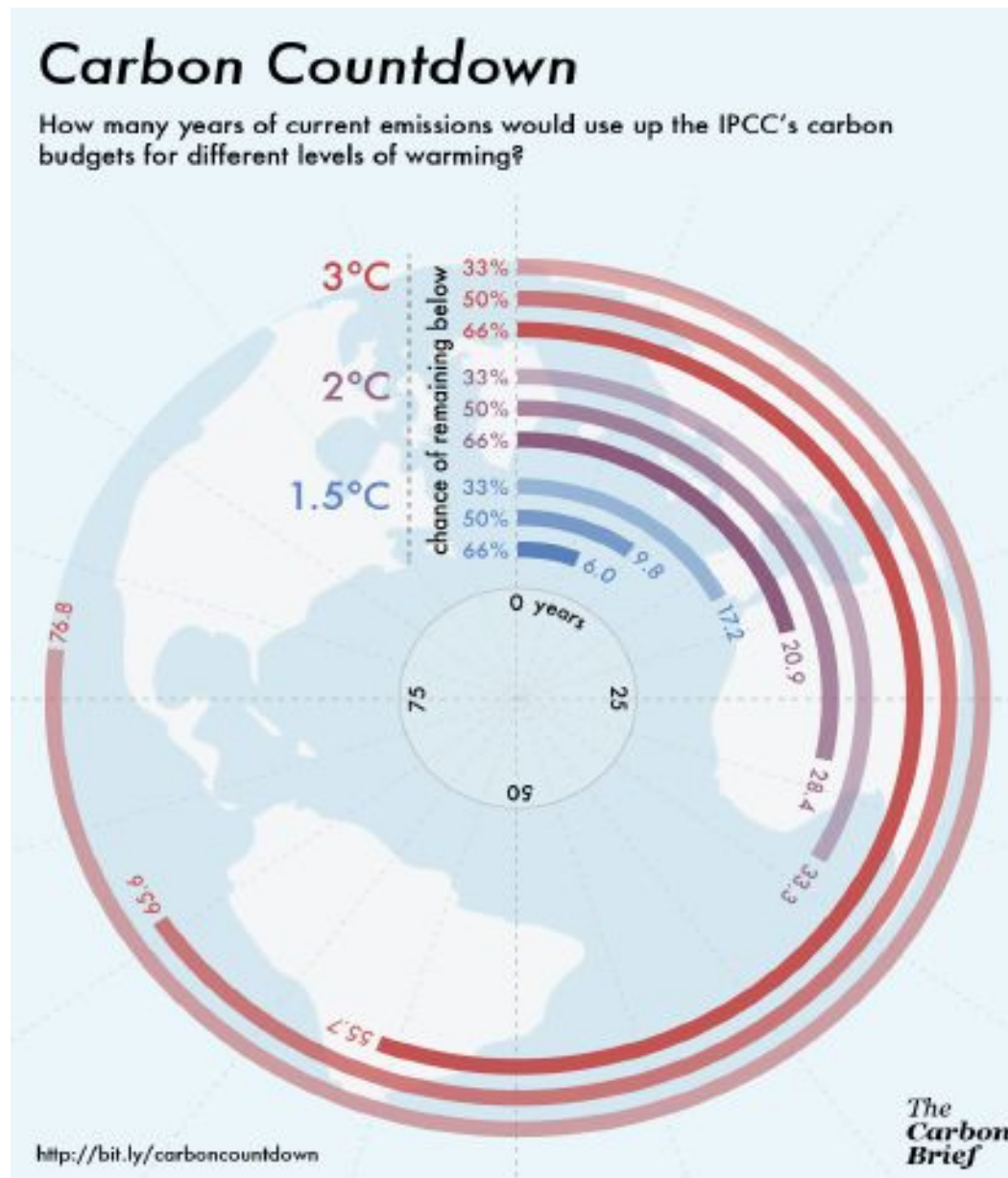


Climate change is a health emergency

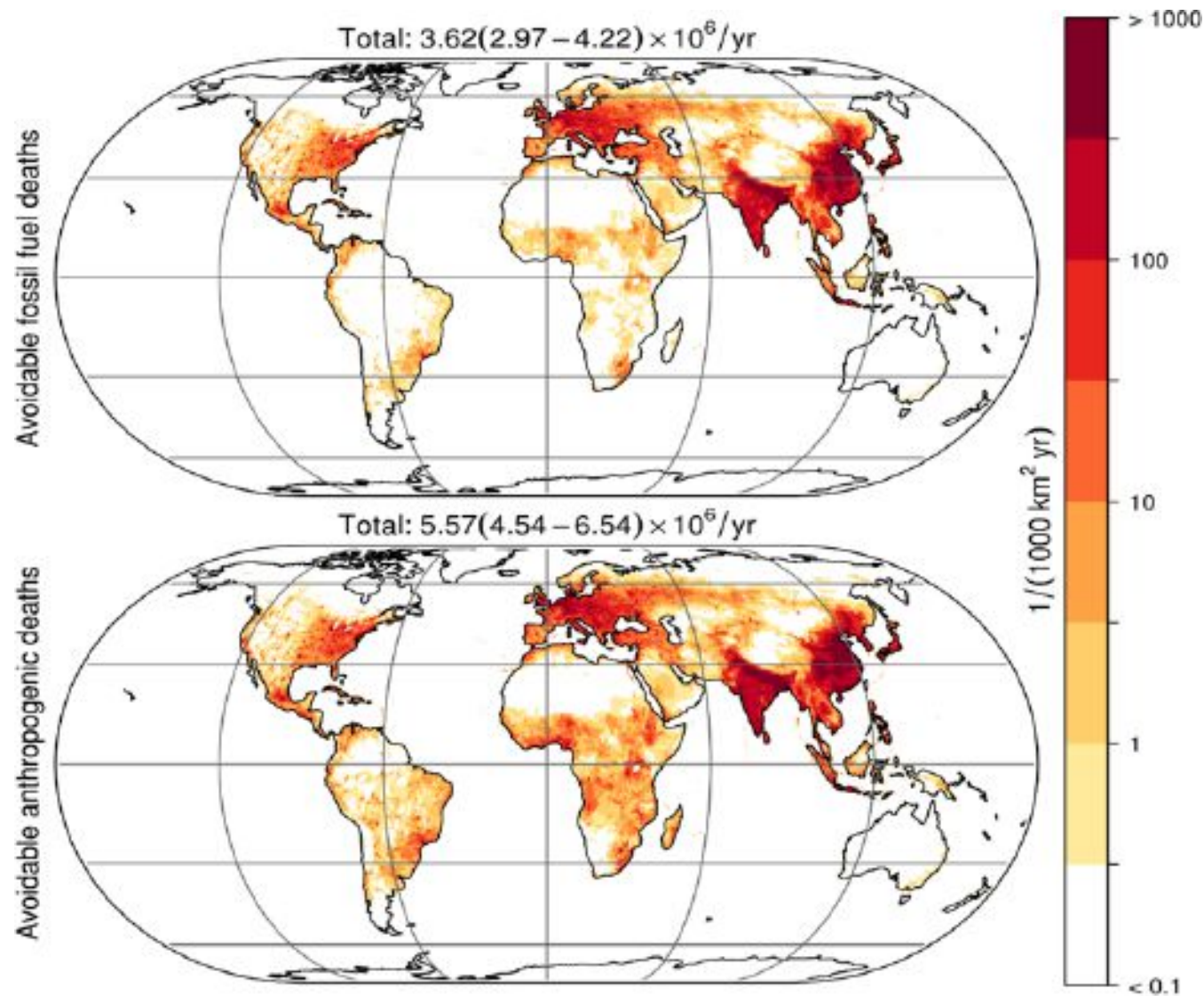
Haines and Ebi NEJM 2019



The need for urgent action



Health co-benefits of decarbonizing the world economy-millions of deaths averted annually from reduced ambient air pollution (Lelieveld, Klingmüller Pozzer, Burnett, Haines, Ramanathan PNAS 2019)



Climate action for urban health

**Accessible
efficient public
transport and
active travel**



**Universal
access to
clean low
carbon energy**



**Safe access to
green spaces
and ecosystem
strategies for
resilience**



**Housing
Improvements
Water and
Sanitation**



AIMS FOR 2050

Mayor of London, draft Environment Strategy

Climate change and energy

London will be a zero carbon city – with a zero emission transport network and zero carbon buildings.

C neutral

Waste

London will be a zero waste city. 85% of London's municipal waste will be recycled.

Zero waste

Adapting to climate change

London and Londoners will be resilient to severe weather and longer-term climate change impacts, such as flooding, heat risk and drought.

Climate resilient

Green infrastructure

More than half of London's area will be green, and tree canopy cover will increase by ten per cent, by 2050.

50% green

Air quality

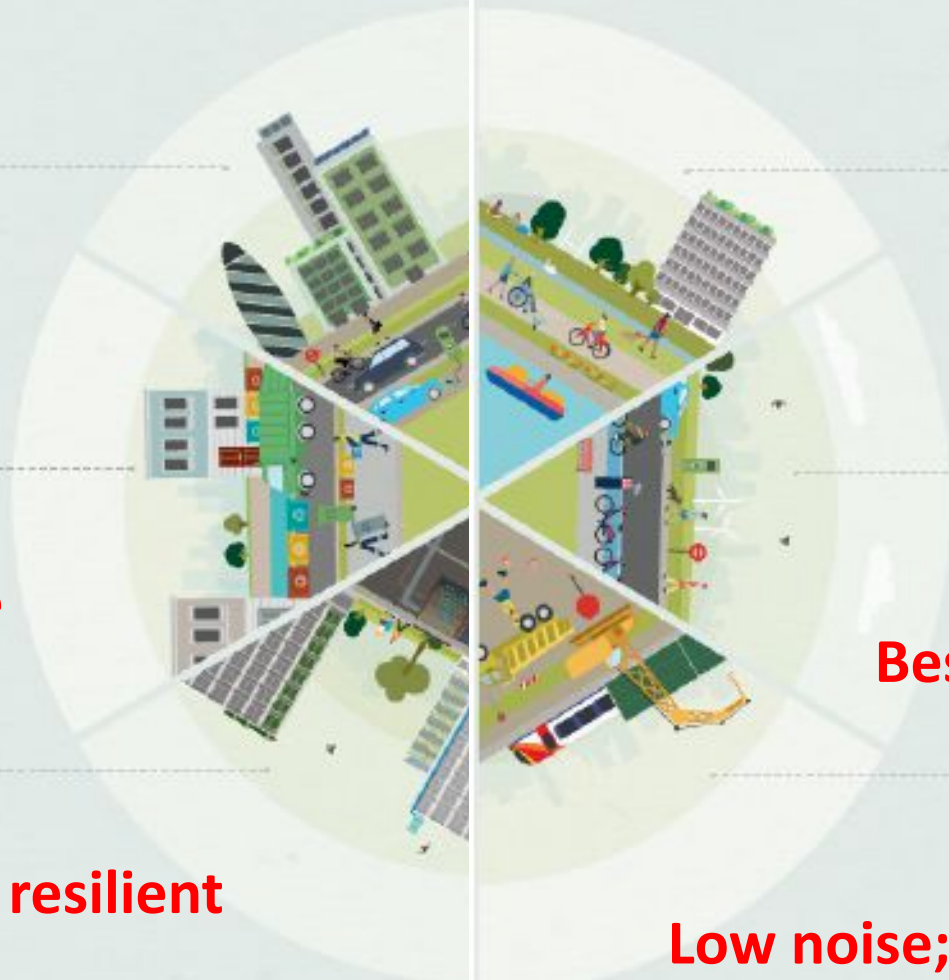
London will have the best air quality of any major world city by 2050, going beyond the legal requirements to protect human health and minimise inequalities.

Best air quality

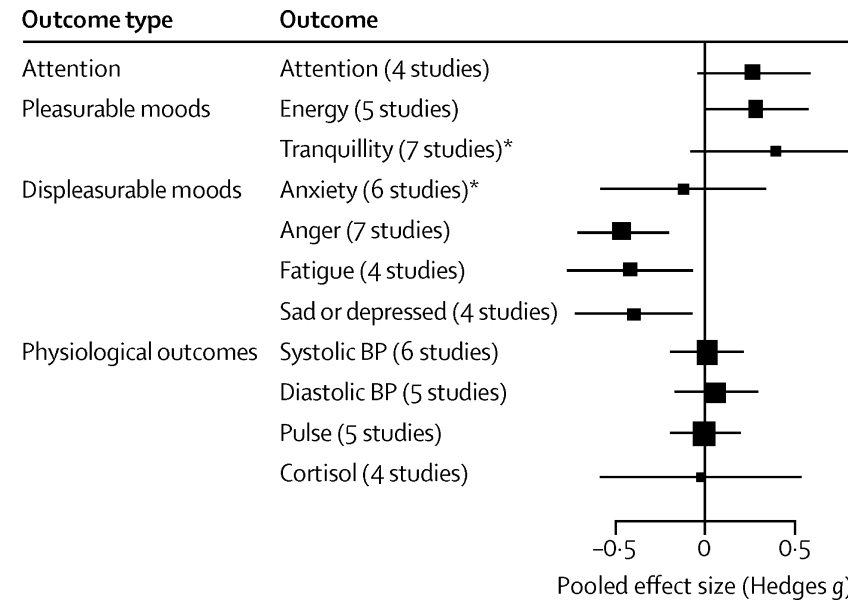
Noise

The number of people adversely affected by noise will be reduced, and more quiet and tranquil spaces will be promoted.

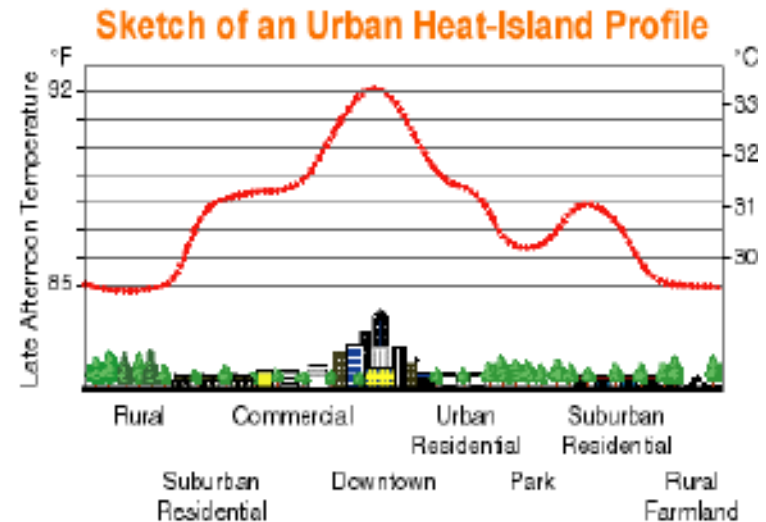
Low noise; tranquil spaces



Psychological and physical benefits from exposure to natural environments and tree planting



Bowler and colleagues the Collaboration for Environmental Evidence



The EAT-Lancet Commission - planetary health diet and targets for sustainable food production that can prevent 11 million premature adult deaths per year and lead to a sustainable global food system by 2050.

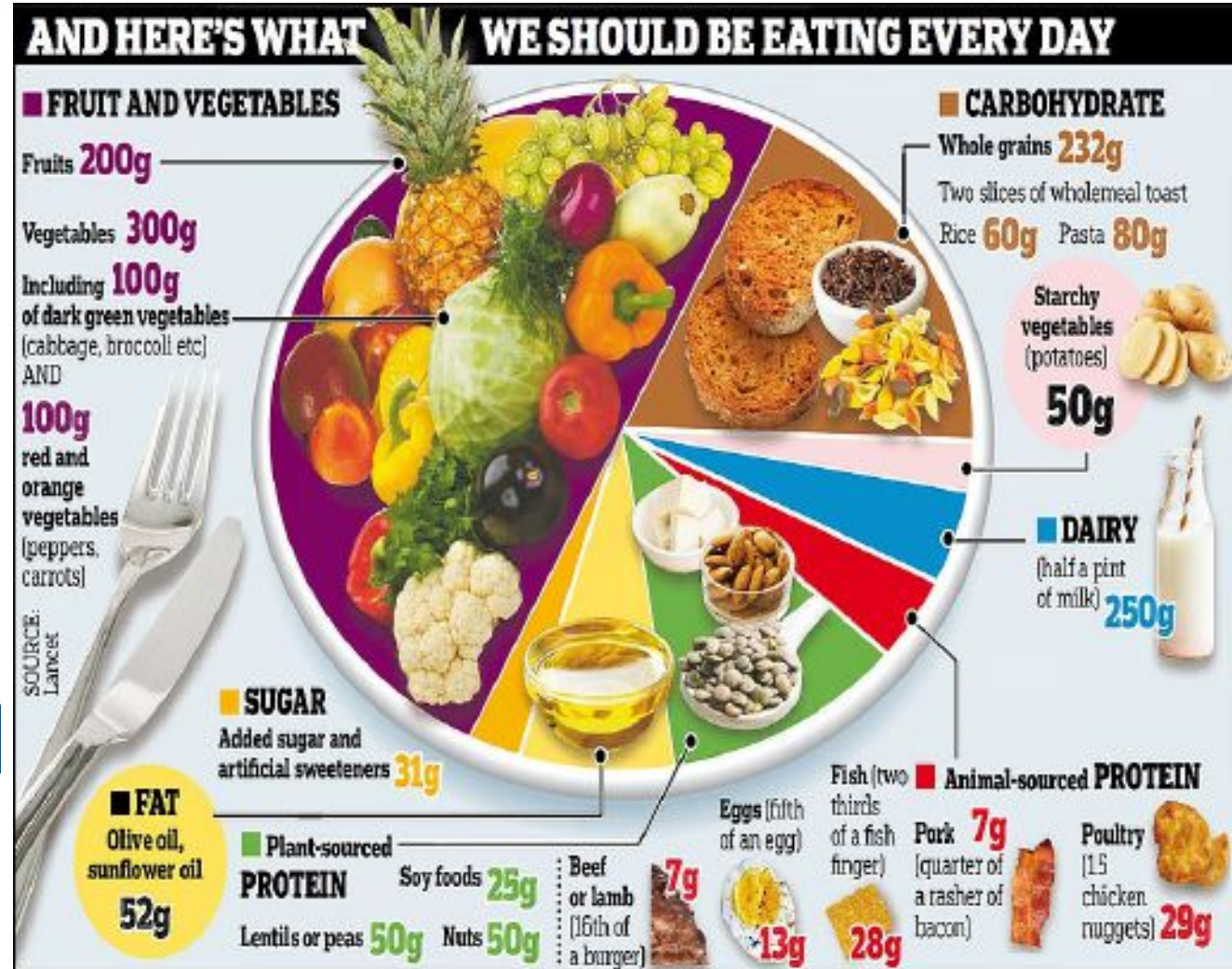
THE LANCET

Food in the Anthropocene: the EAT-Lancet Commission on healthy diets from sustainable food systems



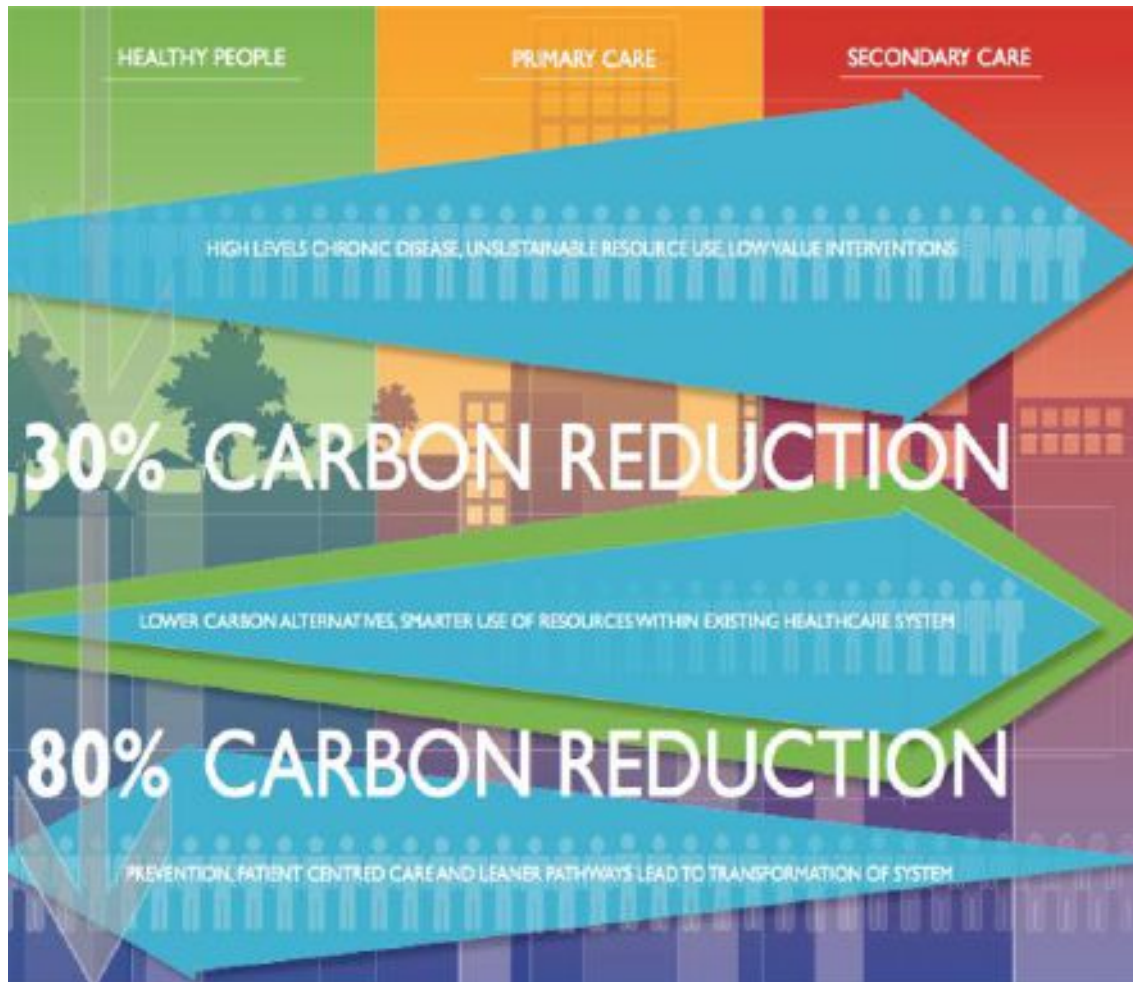
"Food in the Anthropocene represents one of the greatest health and environmental challenges of the 21st century."

A Commission by The Lancet



Towards an environmentally and socially sustainable health system

- Reduce energy use, GHG emissions (~5% total) and environmental footprint while increasing resilience .



Under 2 Degrees Celsius: Fast Action Policies to Protect People and the Planet from Extreme Climate Change

<http://ccacoalition.org/en/resources/summary-under-2-degrees-celsius-fast-action-policies-protect-people-and-planet-extreme>

