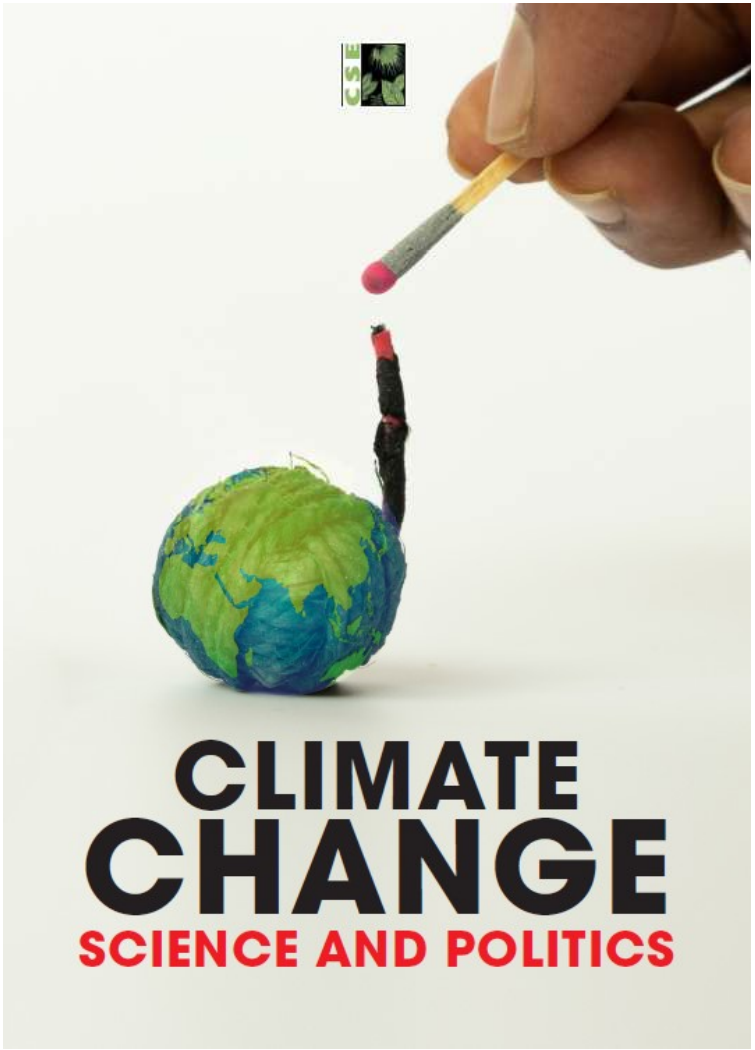
Climate Change: Science and Politics

Your essential reading on why we must act on climate change, and why action has to be ambitious and equitable

A Centre for Science and Environment (CSE) Publication
April 20, 2021



CSE and International Climate Policy

Landmark paper in 1991 | Commentary on UN / UNFCCC negotiations since Rio, 1992 | Commentary on US elections 2020

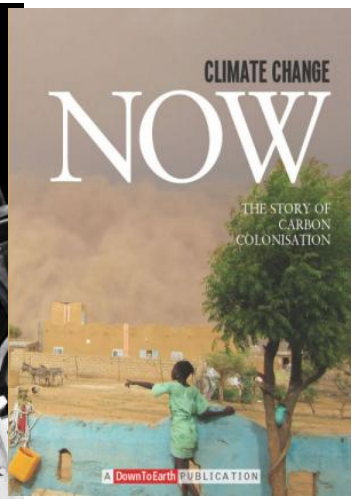
Global Warming in an Unequal World

A Case of Environmental Colonialism

Anil Agarwal and Sunita Narain

CSE has led the discourse in climate policy for 3 decades – advocating for equity and the principle of Common but Differentiated Responsibilities

Critical publications

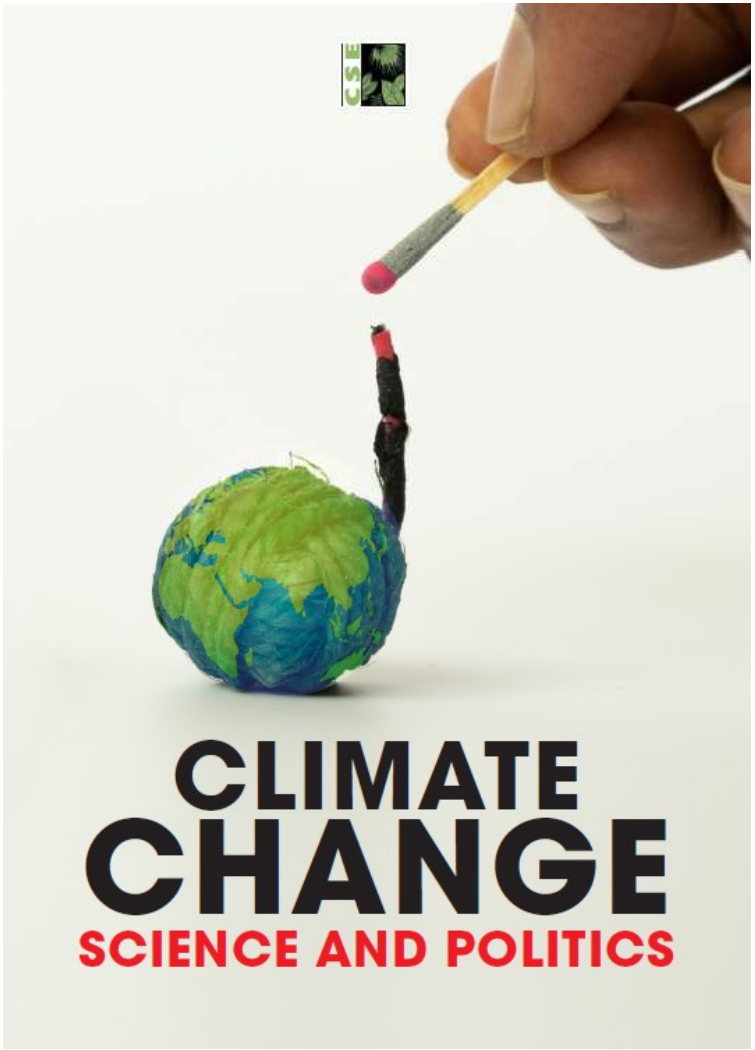


This book and the road to COP26

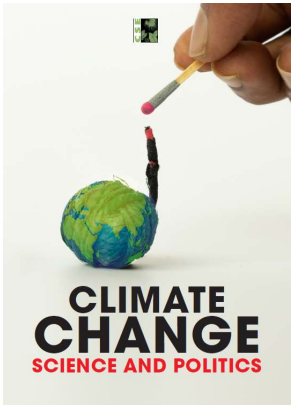
- Presents a ‘state of the art’ on climate change issues in the build-up to CoP26
- Informs and guides you on the developments in climate change; science, impacts and negotiations from 1990s to present day
- Acts as a jump-off point for transformative climate action to meet the 1.5 or even the 2°C goal of the Paris Agreement
- Will act as a guide and reference for civil society multipliers; knowledge is what will drive action we believe

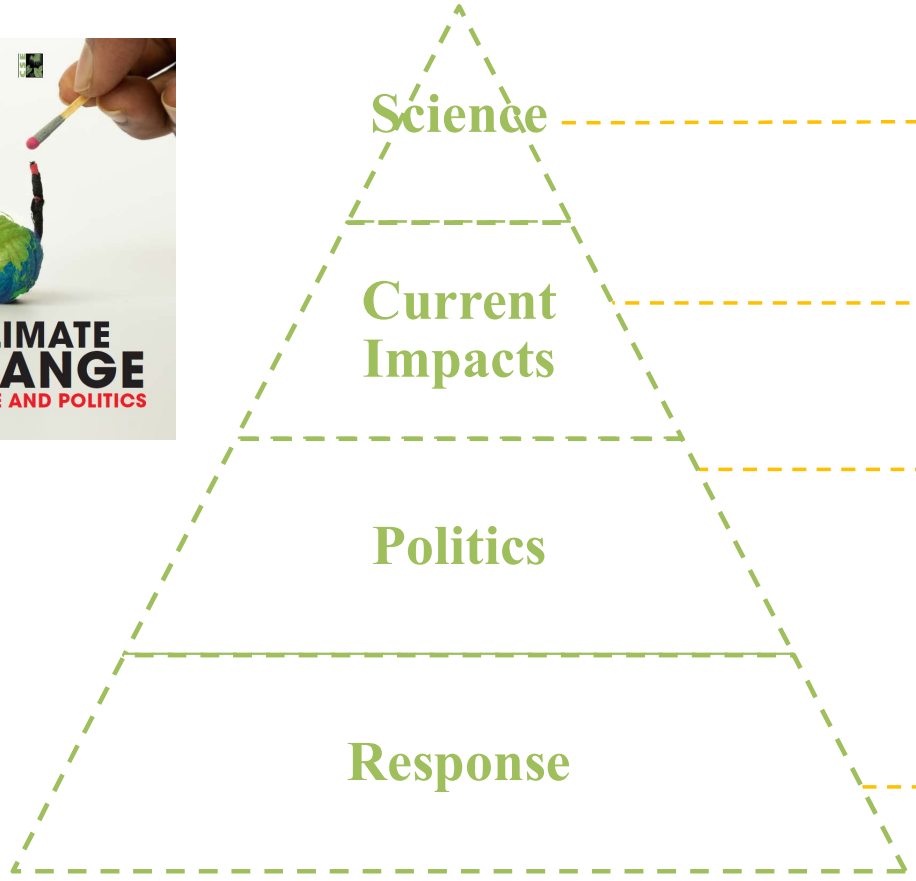
UN CLIMATE CHANGE CONFERENCE UK 2021

IN PARTNERSHIP WITH ITALY



Climate crisis explained: From the science to our complicated response





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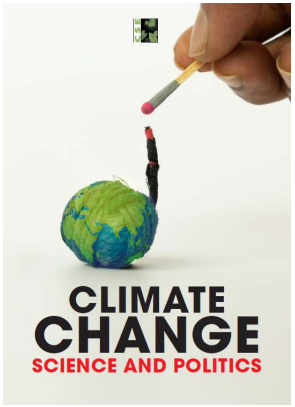

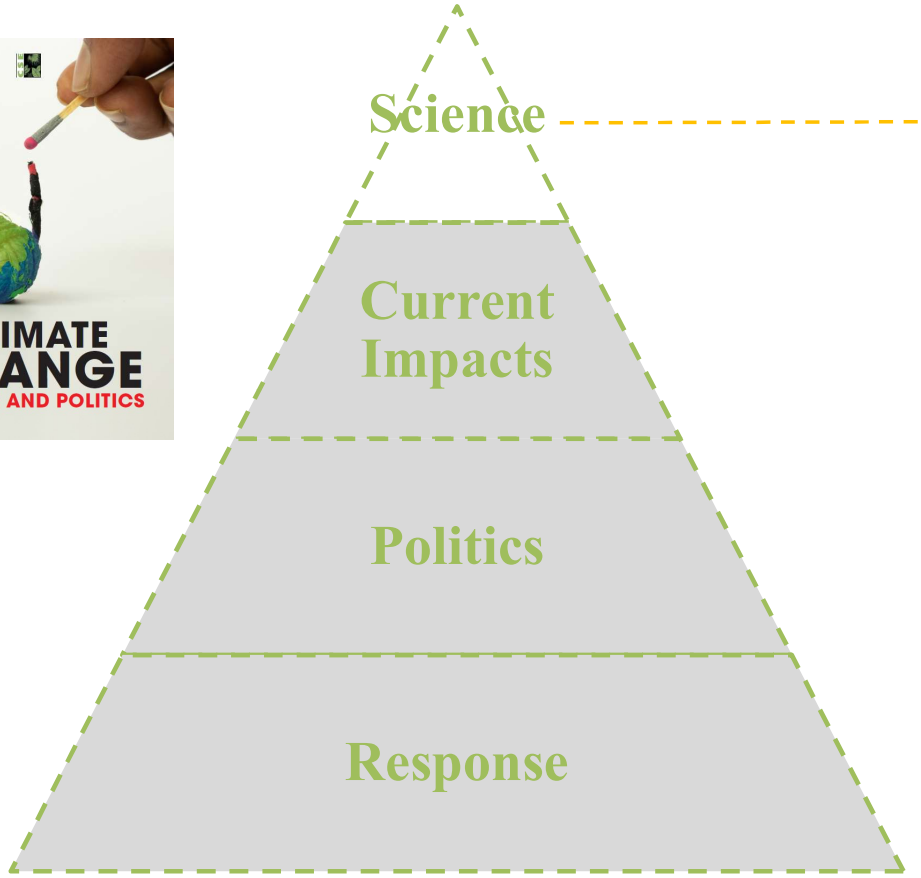

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The Fundamentals of Climate Change 1

Human activities have caused most of the global warming observed over the past 50 years, mainly through the burning of fossil fuels – scientists confirm

GHG concentrations were at 457 ppm in 2018 - dangerously close to the levels which will lock us into 2°C of warming

10 warmest years on record have all occurred since 1998, and nine of the 10 have occurred since 2005

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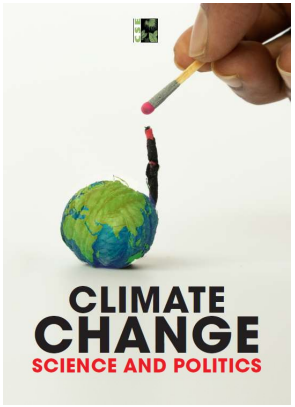

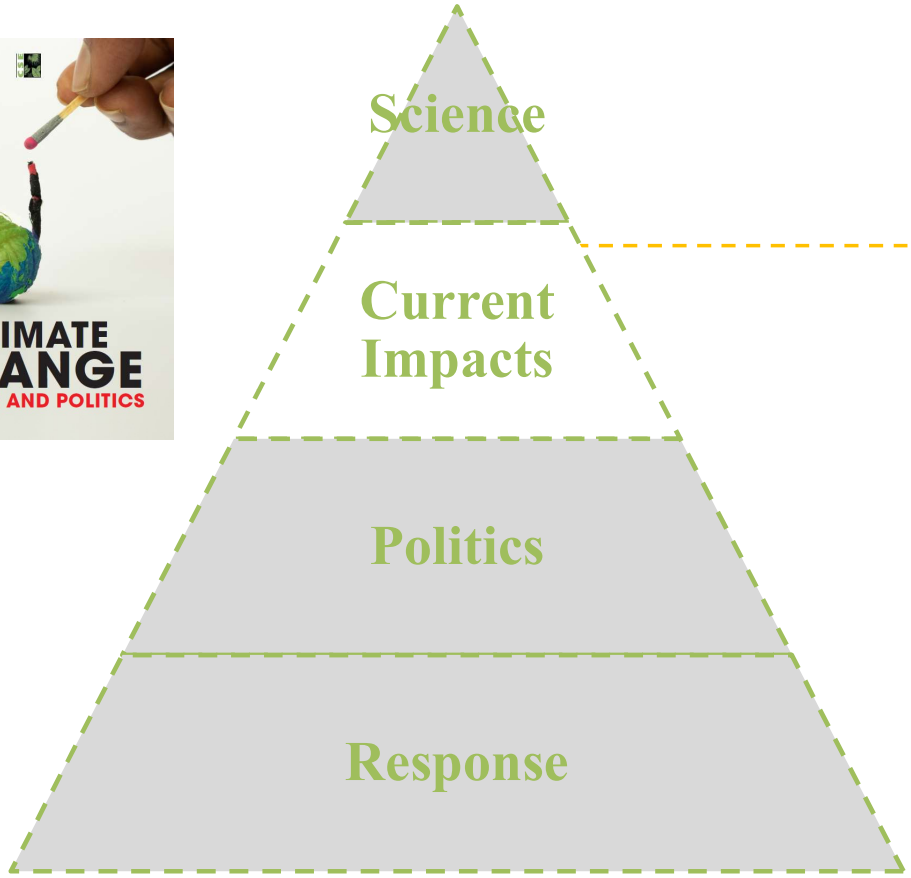

Atmospheric CO_2 emissions have exceeded 417 ppm, almost double of preindustrial levels, despite the COVID-19 slowdown

Climate disasters displaced approximately 9.8 million people in the first half of 2020 alone

The US has historically emitted the most (25%), and is the second highest current emitter (15%) – it still has a carbon intensive economy

Rising temperatures and erratic rainfall patterns could cost India 2.8 per cent of its GDP

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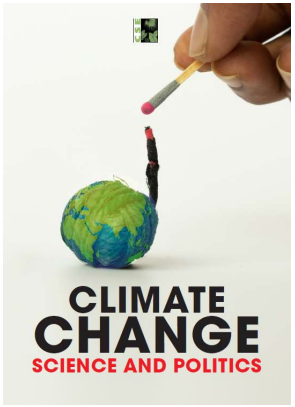

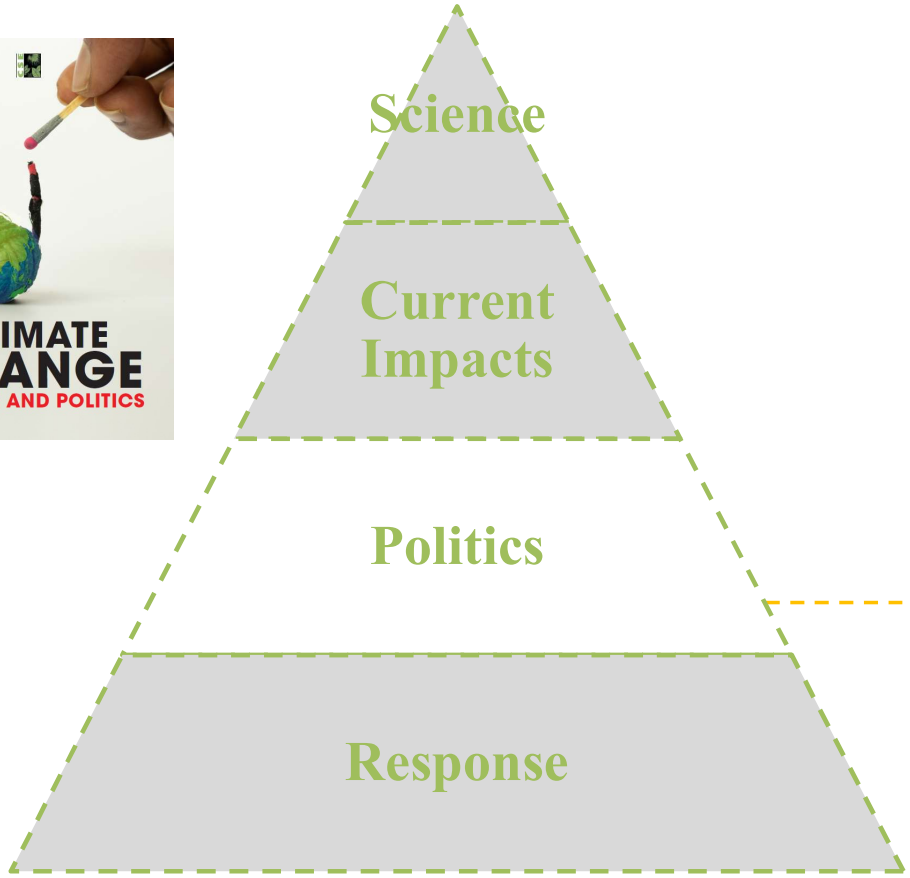

The Kyoto Protocol was imperfect but ambitious, and it failed due to US withdrawal

The Paris Agreement was then negotiated to allocate equal responsibility to all countries

Ambitious domestic targets are needed from countries

COP26 in Glasgow has a loaded agenda – climate finance, the Paris rulebook, enhanced targets from countries

CHAPTER 5
Negotiations - Then and Now 67

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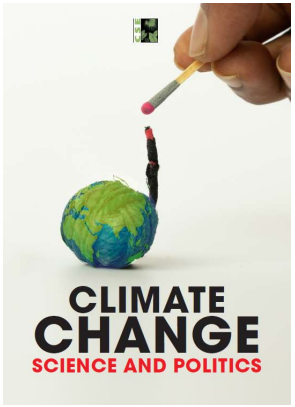
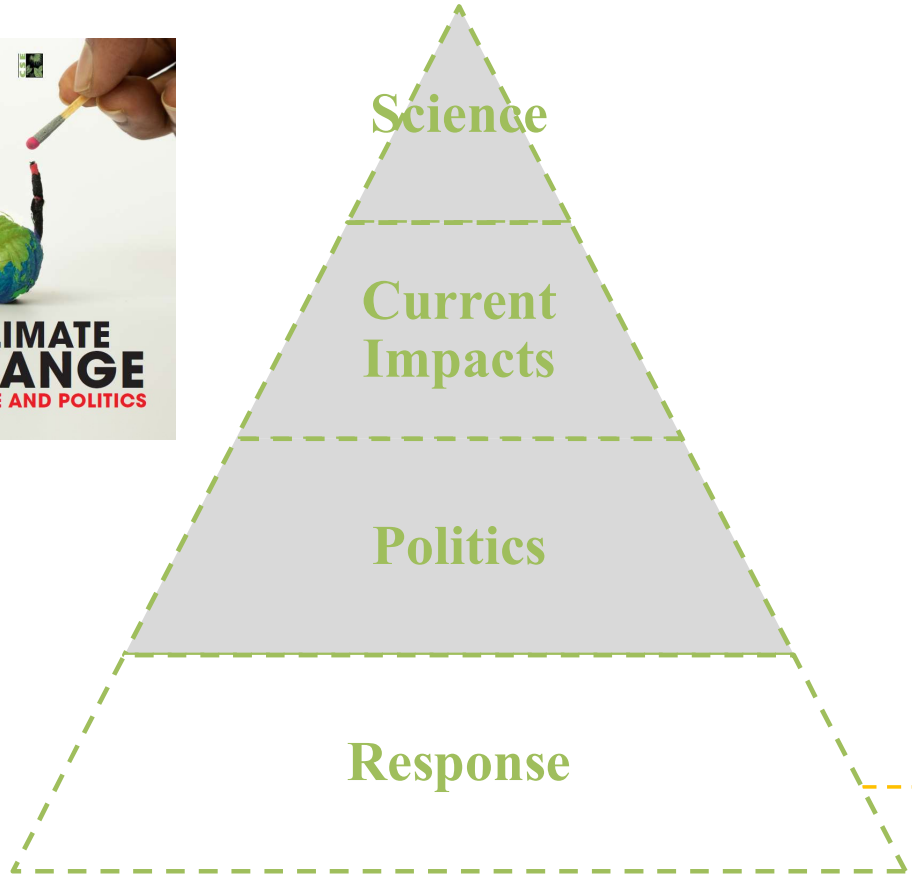




By November 2020, 127 countries had pledged their Net Zero ambitions including China, Japan and the EU

Forests can absorb only a small fraction of human-driven CO_2 emissions, and are declining in sink capacity

Only 420-570 Gt more from the carbon budget can be emitted till the end of this century

Developed countries must phase out coal plants, and commit to $100b in financing for equitable burden-sharing

Critical themes

Historical responsibility

Developed nations are the highest historical emitters of carbon dioxide emissions

The **US is responsible for 25% and EU-28 for 22%** cumulatively

China has rapidly caught up – it can now be considered a developed nation

Compromised negotiations and CBDR

Climate change is **a global challenge, but with differentiated responsibility and differentiated impacts**

Climate negotiations have seen developed countries attempt to place **equal burden on developing countries for emissions reduction** – going against the principle of CBDR

The race towards Net Zero

The IPCC says that the **world must reach 'net zero' by 2050**, but the pathways to do so focus on unreliable natural sinks and under-developed negative emissions technologies

Net zero plans announced so far are **unambitious, lack specificity, and neglect the principle of CBDR**

Critical themes

There is an urgent need for greater ambition, as well as equitable allocation of the carbon budget

Developed countries carry 15% of global population, but will eat into 25-30% of the remaining budget even if they rapidly reduce their emissions

In BAU, China will use roughly 1/3 of the global 2°C carbon budget by 2050 and 1/3 of the global 1.5°C carbon budget by 2032

The consumption of the 'carbon pie' has been extremely inequitable

India and other developing countries, therefore, must stake claim to the remaining carbon space to **avoid climate apartheid**

What's next? – In Focus

2030 commitment

- Amidst the noise around setting targets for net zero emissions, this book raises the issue that countries must be **on track to meet their 2030 commitments under the Paris Agreement at the minimum and raise ambition for action NOW**

Reducing gross emissions

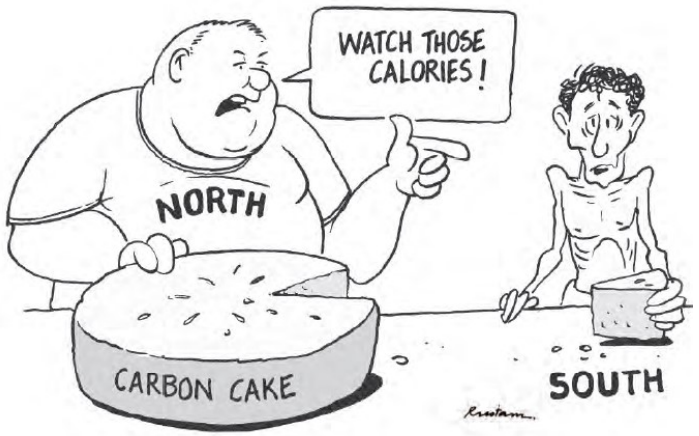
- Unless we **reduce our emissions drastically**, we cannot be net zero. An 'emit now and clean-up later' approach needs to be avoided

The distraction of carbon removal

- There is an **over-reliance on planting trees and the use of unproven technologies** in countries' mitigation goals, that distracts from sector-wise deep decarbonization pathways

Carbon budget

- The **share of the carbon budget** available for each country in a 1.5 and a 2°C scenario according to its historical emissions, needs to be widely understood, and accompanied by pathways to adhere to the same



"Remember, climate change is a great equaliser; rich and poor, all will be affected"

- Sunita Narain, Preface, Climate Change: Science and Politics

What's next? – In Focus

Developed countries must do more

- Historical emitters must be held accountable by **centering fair shares and equity** in the CoP 26 agenda
- They must set more ambitious NDCs that will focus on **a quicker fossil fuel phaseout (coupled with earlier Net Zero targets) than developing countries**, allowing the latter the space to raise their standards of living

Global South must be proactive rather than reactive

- Developing countries in the Global South **must proactively set viable short, medium and long-term goals that complement their respective development trajectories**, through decarbonization targets (unconditional and conditional to finance)

Article 6

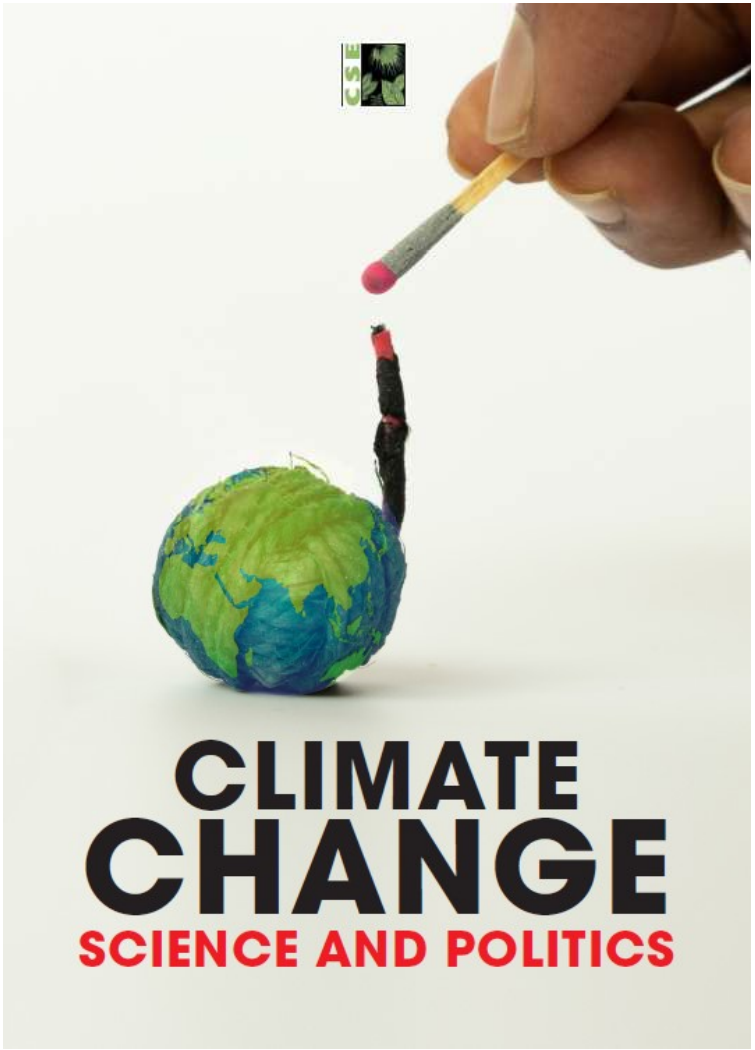
- Rules and guidelines under Article 6 **need to be finalized**, to avoid the mistakes of the Kyoto-era markets

Climate finance

- The $100 billion annual **fund transfer from developed nations must be mobilized**, and a post-2020 progressively increasing amount must be announced

Coming up – From CSE

- This book sets the groundwork for CSE's upcoming analyses on critical themes ahead of COP26
- This is our base document for our upcoming roundtable discussions, public consultations, and agenda at COP 26
- It will be used to develop training programme curricula
- It is also intended for use by multipliers in civil society (educators, media, civil society organizations, government) to educate themselves and get engaged in climate action



Thank you