
**Research
Paper**

**Environment and
Society Programme**

October 2021

Raising climate ambition at COP26

Anna Åberg, Antony Froggatt and Rebecca Peters



Chatham House, the Royal Institute of International Affairs, is a world-leading policy institute based in London. Our mission is to help governments and societies build a sustainably secure, prosperous and just world.

Contents

| | | |
|-----------|---|-----------|
| | Summary | 2 |
| 01 | Introduction | 4 |
| 02 | Increasing the ambition of the NDCs | 8 |
| 03 | Support to climate-vulnerable developing countries | 21 |
| 04 | Advancing the Paris Rulebook | 33 |
| | Conclusion and recommendations | 44 |
| | About the authors | 46 |
| | Acknowledgments | 46 |

Summary

-
- The COP26 climate change summit takes place at the beginning of *the* crucial decade for climate action. All regions of the world are already dealing with increasingly severe climate change impacts, and every additional increment of warming escalates the risks to people, ecosystems and communities. To have a chance of keeping global warming to 1.5°C – and avoiding the most disastrous consequences – emissions need to *halve* by 2030 and reach ‘net zero’ by 2050. COP26 has a critical role to play in putting the world on a safer path.
 - This paper sets out what a positive outcome at COP26 would look like, arguing that substantial progress must be made in three main areas: raising the ambition of 2030 nationally determined contributions (NDCs); providing support to and addressing concerns of climate-vulnerable developing countries; and agreeing the remaining details of the ‘Paris Rulebook’, which provides guidance for implementing the 2015 Paris Agreement.
 - Increasing the ambition of NDCs is vital. By signing the Paris Agreement, world leaders have committed to keeping the rise in the global average temperature to ‘well below’ 2°C above pre-industrial levels, preferably 1.5°C. The first round of targets, submitted in 2015, was not consistent with these goals. Parties are, however, due to submit new or updated NDCs ahead of COP26. As of September 2021, 85 countries and the EU27 had done so; a handful of governments have proposed new targets but not yet submitted them formally. While some of the NDC updates have been relatively strong, they only narrow the gap to 1.5°C by, at best, 15 per cent (4 GtCO₂e).
 - A positive outcome in Glasgow would require NDC enhancements that are large enough to ensure that the 1.5°C target can be achieved. Governments that have not yet submitted 2030 targets need to do so, while those that have submitted unambitious NDCs should revisit their pledges. Strong action from the G20 countries, which account for around 80 per cent of global emissions, is key. Should the level of NDC ambition by COP26 be insufficient to align with a 1.5°C pathway, governments will need to present a strategy for closing the gap in the early 2020s, which should include revisiting NDCs earlier than the Paris timetable dictates and accelerating decarbonization through initiatives in high-emitting sectors.
 - While climate change affects all nations, it is generally those who have emitted the least that continue to be the hardest hit. In many climate-vulnerable developing countries, a lack of financial resources is among several constraints that negatively affect their ability to mitigate and adapt to climate change. COVID-19 has aggravated this challenge: while industrialized countries have

implemented unprecedented stimulus measures to support their economies – and vaccinated large parts of their populations – many developing countries continue to face a health and economic catastrophe.

- Developed countries must deliver on their 2009 pledge to mobilize \$100 billion per year for climate action in developing countries. This is important for raising ambition and crucial for avoiding a breakdown in trust. The implementation of many developing country NDCs is also – at least partly – conditional upon the receipt of enhanced levels of finance. An ambitious outcome in Glasgow will require enhanced support for and increased attention to the key issues of climate change adaptation and ‘loss and damage’.
- A positive outcome at COP26 would, finally, entail making substantial progress on advancing the remaining elements of the Paris Rulebook. While the Paris Agreement provides an overarching framework for action, the rulebook outlines the processes, guidelines and tools needed to implement it in an effective and transparent way. Most elements of the rulebook were agreed at COP24 in Poland in 2018, but some were left unresolved. Key issues at COP26 include agreeing on common review and implementation time frames for the NDCs; resolving disputes around the rules governing international carbon markets; establishing rules for transparent reporting; and providing further guidance on how the ‘global stocktake’ is to be conducted.

01

Introduction

COP26 is the most important climate summit since COP21 in Paris in 2015. Over the past year, the global politics of climate change have shifted, with the election of President Joe Biden and the announcement of China's carbon neutrality target.

Addressing climate change is the defining challenge of our time. Around the globe – and across the suite of UN organizations – there is widespread recognition of the urgency to reduce greenhouse gas (GHG) emissions and to prepare for a world that is, and will continue to be, severely impacted by climate change.

The foundational treaty of the international climate change regime – the United Nations Framework Convention on Climate Change (UNFCCC) – was adopted at the Rio Earth Summit in 1992.¹ Its signatories agreed to ‘achieve... stabilization of greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system’.² The states that have ratified the UNFCCC meet annually at the ‘Conference of the Parties’ (COP) to assess and review the implementation of the convention.³ The COP has negotiated two separate treaties since the formation of the UNFCCC: the Kyoto Protocol in 1997, and the Paris Agreement in 2015.⁴

The Paris Agreement was adopted by 196 parties at COP21 in 2015 and entered into force less than a year later.⁵ The goals of the treaty are to keep the rise in the global average temperature to ‘well below 2°C above pre-industrial levels’, ideally 1.5°C; enhance the ability to adapt to climate change and build resilience; and make ‘finance flows consistent with a pathway towards low greenhouse gas emissions and climate-resilient development’.⁶ The agreement adopts a ‘bottom-up’

¹ Coen, D., Kreienkamp, J. and Pegram, T. (2020), *Global Climate Governance*, Cambridge Elements, Cambridge University Press.

² United Nations (1992), *United Nations Framework Convention on Climate Change*, https://unfccc.int/files/essential_background/background_publications_htmlpdf/application/pdf/conveng.pdf.

³ Coen, Kreienkamp and Pegram (2020), *Global Climate Governance*.

⁴ Ibid.

⁵ UNFCCC (2021), ‘The Paris Agreement’, <https://unfccc.int/process-and-meetings/the-paris-agreement/the-paris-agreement>.

⁶ UN (2015), *The Paris Agreement*, https://unfccc.int/sites/default/files/english_paris_agreement.pdf.

and non-standardized approach, where parties themselves set their national emission reduction targets and communicate these to the UNFCCC in the form of nationally determined contributions (NDCs).⁷

As things stand, the targets⁸ that were submitted in the run-up to COP21 are not sufficient, even if fully implemented, to limit global warming to 2°C, much less 1.5°C.⁹ The Paris Agreement was designed, however, to generate increased ambition over time via two components: a collective ‘global stocktake’ during which progress towards Paris Agreement goals is assessed based on country reporting,¹⁰ and the ‘ratchet mechanism’, which encourages countries to communicate new or updated NDCs every five years, with the expectation that ambition will increase over time.¹¹ The results of the stocktake are scheduled to be released two years before NDC revisions are made.¹² This sequencing is designed to allow national plans to account for the global context of the climate assessment. The first global stocktake is to be conducted between 2021 and 2023, and will be repeated every five years thereafter.¹³ The results of the first stocktake are due to be published around COP28.

We really are out of time. We must act now to prevent further irreversible damage. COP26 this November must mark that turning point.¹⁴

UN Secretary-General António Guterres, 16 September 2021

The 26th Session of the Conference of the Parties (COP26) to the UNFCCC is to be hosted by the UK, in partnership with Italy. After a year-long delay, the conference is now scheduled to take place in Glasgow, Scotland, between 31 October and 12 November 2021.¹⁵ Organizing an in-person event during a pandemic presents a substantial challenge. The UK government is providing vaccines to accredited delegations, but doses only started to be delivered at the beginning of September 2021 and restrictions, such as quarantine requirements,¹⁶ pose further obstacles to participation.¹⁷ An alliance of 1,500 civil society organizations are among those calling for a second postponement of the COP, citing concerns about a lack of plans to enable safe and inclusive participation of delegates from, not least, the Global South.¹⁸ The UK government is, however, adamant that it will proceed with the conference as planned.¹⁹

⁷ UNFCCC (2021), ‘Nationally Determined Contributions (NDCs)’, <https://unfccc.int/process-and-meetings/the-paris-agreement/nationally-determined-contributions-ndcs/nationally-determined-contributions-ndcs>.

⁸ The targets put forth prior to COP21 were called ‘intended nationally determined contributions’ (INDCs). Once parties ratified the agreement, the INDCs turned into NDCs.

⁹ UNEP (2018), *Emissions Gap Report 2018*, Nairobi: United Nations Environment Programme, https://wedocs.unep.org/bitstream/handle/20.500.11822/26895/EGR2018_FullReport_EN.pdf?sequence=1&isAllowed=y.

¹⁰ UNFCCC (2021), ‘Global Stocktake’, <https://unfccc.int/topics/science/workstreams/global-stocktake>.

¹¹ Yeo, S. (2016), ‘Timeline: The Paris Agreement’s ‘ratchet mechanism’, Carbon Brief, <https://www.carbonbrief.org/timeline-the-paris-agreements-ratchet-mechanism>.

¹² UNFCCC (2021), ‘Global Stocktake’.

¹³ Ibid.

¹⁴ UN (2021), ‘“Tipping point” for climate action: Time’s running out to avoid catastrophic heating’, <https://news.un.org/en/story/2021/09/1099992>.

¹⁵ UK Government (2021), ‘UN Climate Change Conference – COP26’, <https://ukcop26.org>.

¹⁶ Both vaccinated and unvaccinated delegates from countries on the UK’s ‘red list’ are required to quarantine upon arrival in the UK.

¹⁷ Craft, B. (2021), ‘Delivering an inclusive COP26 in the age of Covid-19 requires more than vaccines’, Climate Home News, 5 July 2021, <https://www.climatechangenews.com/2021/07/05/delivering-inclusive-cop26-age-covid-19-requires-vaccines>.

¹⁸ Climate Action Network (2021), ‘Climate Action Network calls for postponement of formal COP26 negotiations due to lack of plans to ensure safe and inclusive participation’, press release, 7 September 2021, <https://climatenetwork.org/2021/09/07/can-cop26-postponement-statement>.

¹⁹ Farand, C. (2021), ‘UK rejects campaigners’ call to postpone COP26 climate talks again’, Climate Home News, 7 September 2021, <https://www.climatechangenews.com/2021/09/07/uk-rejects-campaigners-call-postpone-cop26-climate-talks>.

The pandemic has changed understandings of global risks, the interconnected nature of economies and the role of governments in preparing for and responding to existential threats. This may provide impetus for accelerated climate action. The postponement of COP26 itself has been of considerable significance. Over the past year, the global politics of climate change have shifted, with the election of President Joe Biden and the announcement of China's climate neutrality target being particularly important. Moreover, the economic recovery packages that are being rolled out to counter the economic consequences of the pandemic present an opportunity to accelerate the green transition.²⁰ To date, however, the members of the G20 have prioritized investments in fossil fuels above those in clean energy,²¹ and only 10 per cent of the global expenditure is estimated to have been allocated to projects with a net positive effect on the environment.²²

The pandemic has changed understandings of global risks, the interconnected nature of economies and the role of governments in preparing for and responding to existential threats.

COP26 is the most important climate summit since COP21 in Paris, and it differs from earlier COPs in several ways: it is the first test of the ambition-raising ratchet mechanism and marks a shift from negotiation to implementation. An ambitious outcome at COP26 requires substantial action to be taken *before* the summit – and outside the remits of the UNFCCC process – as well as at the actual conference.

Human activity has already caused the global average temperature to rise by around 1.1°C above pre-industrial levels, and every additional increase in warming raises the risks for people, communities and ecosystems. To avoid the most catastrophic climate change impacts, it is essential world leaders make every effort to limit warming to 1.5°C. Working group I of the Sixth Assessment Report of the IPCC shows it is still possible to keep warming to this critical threshold, but that unprecedented action must be taken now.²³ As John Kerry, special presidential envoy for climate, stated, '[t]his test is now as acute and as existential as any previous one'.²⁴

COP26 has a critical role in getting the world on track for a 1.5°C pathway, and in supporting those most affected by climate change impacts. It also constitutes a key test for the credibility of the Paris Agreement and the UNFCCC process overall. But what can and should the Glasgow summit achieve more specifically? The objective of this paper is to discuss what a positive outcome at COP26 would

²⁰ UNEP (2020), 'Emissions Gap Report 2020', Nairobi: United Nations Environment Programme, <https://www.unep.org/emissions-gap-report-2020>.

²¹ EnergyPolicyTracker.org (2021), 'G20 countries', <https://www.energypolicytracker.org/region/g20>.

²² Finance for Biodiversity Initiative (2021), 'Majority of \$17.2 Trillion Covid Stimulus Packages "Doing More Harm Than Good" to Environment', <https://www.f4b-initiative.net/post/majority-of-17-2-trillion-covid-stimulus-packages-doing-more-harm-than-good-to-environment>.

²³ IPCC (2021), *Climate Change 2021: The Physical Science Basis*, <https://www.ipcc.ch/report/sixth-assessment-report-working-group-i>.

²⁴ Kerry, J. (2021), 'Remarks on the Urgency of Global Climate Action', US State Department, 20 July 2021, <https://www.state.gov/remarks-on-the-urgency-of-global-climate-action>.

entail, with the dual aims of encouraging increased ambition and contributing to an informed public debate. The main argument put forth is that substantial progress must be made in three main areas, namely on increasing the ambition of NDCs; enhancing support to and addressing concerns of climate-vulnerable developing countries; and advancing the Paris Rulebook to help operationalize the Paris Agreement.

COP26 is undoubtedly hugely significant and national government pledges in the run-up to Glasgow will contribute to shaping the level of future GHG emissions. However, the event is not only critical in terms of reaching an ambitious outcome on climate, it is also an important opportunity to judge the level of confidence in the international process and the UNFCCC.

02

Increasing the ambition of the NDCs

A key element of COP26 will be the level of ambition of the revised NDCs put forward by governments to the UNFCCC and the extent to which these keep the 1.5°C global warming target agreed in Paris within reach.

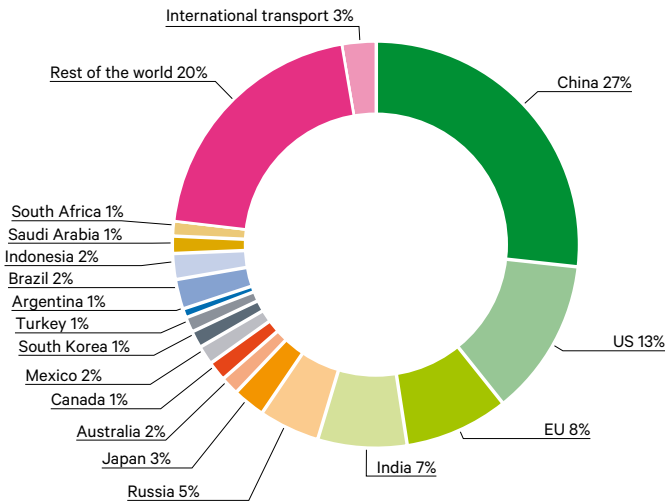
According to the United Nations Environment Programme (UNEP), greenhouse gases (GHGs) in 2019 totalled 52.4 gigatonnes of CO₂ equivalent (GtCO₂e)²⁵ of which the majority was CO₂ (38 Gt), then methane (9.8 Gt), nitrous oxide (2.8 Gt) and F-gases (1.7 Gt).²⁶ The same year, GHG emissions were approximately 59 per cent higher than in 1990 and 44 per cent higher than in 2000. The six largest emitters – together accounting for 62 per cent of the global total – were China (26.7 per cent), the US (13 per cent), the EU (8 per cent), India (7 per cent), Russia (5 per cent) and Japan (3 per cent) (see Figure 1).²⁷

²⁵ When including (more uncertain) emissions associated with land-use change the figure is 59.1 GtCO₂e.

²⁶ UNEP (2020), *Emissions Gap Report 2020*.

²⁷ Olivier, J. G. J. and Peters, J. A. H. W. (2020), *Trends in Global CO₂ and Total Greenhouse Gas Emissions: 2020 Report*, Netherlands Environmental Assessment Agency, <https://www.pbl.nl/en/publications/trends-in-global-co2-and-total-greenhouse-gas-emissions-2020-report>.

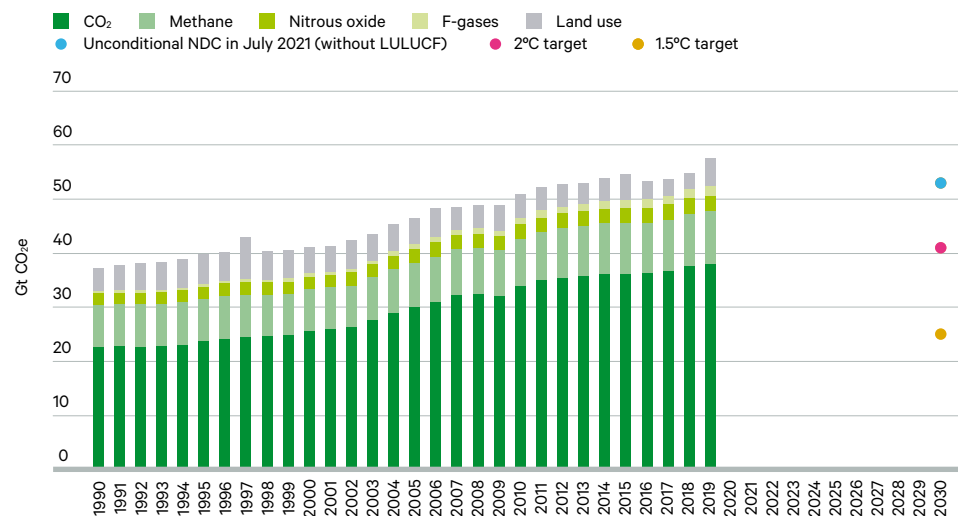
Figure 1. Global GHG emissions in 2019



Source: Olivier and Peters (2020), *Trends in Global CO₂ and Total Greenhouse Gas Emissions: 2020 Report*.
 Note: GHG emissions for the EU include the UK.

According to UNEP, the implementation of the first round of NDCs would result in an average global temperature increase of 3°C above pre-industrial levels by the end of the century, with further warming taking place thereafter. If these NDC’s were fully implemented, emission levels are expected to be in the range of 56 GtCO₂e (with unconditional NDCs) to 53 GtCO₂e (with conditional NDCs) by 2030.²⁸ To align with a 2°C pathway, the ambition of the second round of NDCs would need to triple relative to the original targets, leading to emissions levels of around 41 GtCO₂e in 2030. Alignment with the 1.5°C target would require a fivefold increase in ambition, leading to emission levels around 25 CO₂e in 2030 (see Figure 2).²⁹

Figure 2. Current global GHG emissions and 2030 targets



Source: UNEP (2020), *Emissions Gap Report 2020*; Olivier and Peters (2020), *Trends in Global CO₂ and Total Greenhouse Gas Emissions: 2020 Report*.
 Note: LULUCF = land use, land-use change, and forestry.

²⁸ A number of countries pledged greater emissions cuts (conditional) with international assistance.
²⁹ UNEP (2020), *Emissions Gap Report 2020*.

The Paris Agreement states that parties shall communicate an NDC every five years,³⁰ and that each submission shall constitute a progression in terms of ambition.³¹ Parties conveyed their first round of targets prior to COP21, and were due to submit new or updated plans in 2020.³² COP26, originally scheduled for November 2020, would then take stock of the collective level of ambition of these plans *vis-à-vis* the temperature targets of the Paris Agreement. The postponement of the COP by one year has in practice (albeit not formally) extended the deadline for submitting NDCs to ‘ahead of COP26’.

Where do we stand?

The delay of COP26 has given countries more time to put forward NDCs and longer-term decarbonization targets. This effort gained significant traction when China pledged to achieve carbon neutrality by 2060 and peak its emissions before 2030, during the general debate of the 75th Session of the UN General Assembly (UNGA) in September 2020.³³ Then, in November 2020, the UK submitted its NDC, pledging a 68 per cent reduction in emissions by 2030 (based on 1990 levels)³⁴ and later added a 2035 target of 78 per cent.³⁵ The EU has, moreover, put forward a 55 per cent reduction target relative to 1990 levels,³⁶ with some countries within the bloc going even further, including Germany, which agreed on a 65 per cent reduction target.³⁷

The election of President Biden has fundamentally changed the US’s position on climate change, leading to, among other things, the country re-joining the Paris Agreement.³⁸ At a specially convened Leaders Summit on Climate – hosted by the US – the Biden administration presented an NDC with an emission reduction target of 50–52 per cent³⁹ (based on 2005 levels, which is equivalent to 40–43 per cent below 1990 levels⁴⁰). During the summit, countries including Canada, Japan and others pledged more ambitious NDC targets.⁴¹

³⁰ UN (2015), *Paris Agreement*.

³¹ *Ibid.*

³² UNFCCC (2021), ‘The Paris Agreement’.

³³ Harvey, F. (2020), ‘China pledges to become carbon neutral before 2060’, *Guardian*, 22 September 2020, <https://www.theguardian.com/environment/2020/sep/22/china-pledges-to-reach-carbon-neutrality-before-2060>.

³⁴ UK Government (2020), ‘The UK’s Nationally Determined Contribution under the Paris Agreement’, <https://www.gov.uk/government/publications/the-uks-nationally-determined-contribution-communication-to-the-unfccc>.

³⁵ UK Government (2021), ‘UK enshrines new target in law to slash emissions by 78 per cent by 2035’, <https://www.gov.uk/government/news/uk-enshrines-new-target-in-law-to-slash-emissions-by-78-by-2035>.

³⁶ Climate Action Tracker (2020), ‘EU’, <https://climateactiontracker.org/countries/eu>.

³⁷ Sheahan, M. (2021), ‘Germany aims for 65 per cent CO₂ emissions reductions by 2030’, Reuters, 5 May 2021, <https://www.reuters.com/business/sustainable-business/germany-aims-65-co2-emissions-reduction-by-2030-sources-2021-05-05>.

³⁸ US Department of State (2021), ‘The United States Officially Rejoins the Paris Agreement’, press statement, 19 February 2021, <https://www.state.gov/the-united-states-officially-rejoins-the-paris-agreement>.

³⁹ Government of the United States (2021), ‘United States of America Nationally Determined Contribution: Reducing Greenhouse Gases in the United States: A 2030 Emission Reduction Target’, <https://www4.unfccc.int/sites/ndcstaging/PublishedDocuments/United%20States%20of%20America%20First/United%20States%20NDC%20April%2021%202021%20Final.pdf>.

⁴⁰ Climate Action Tracker (2021), ‘Ambitious US target upgrade reduces the 2030 global emissions gap by 5–10%’, <https://climateactiontracker.org/climate-target-update-tracker/usa>.

⁴¹ Climate Action Tracker (2021), *Global Update: Climate Summit Momentum*, <https://climateactiontracker.org/publications/global-update-climate-summit-momentum>.

While there is more pressure on governments to act on climate change, due to its increasingly devastating impacts, there are also more opportunities for carbon mitigation through available alternative technologies and systems, as well as falling renewable energy costs (see Box 2).

Table 1 details the NDC targets put forward by G20 countries prior to COP21 in Paris and the extent to which these have since been revised. The updated NDCs have been assessed by the independent body, Climate Action Tracker, which has analysed to what extent the NDCs align with the 1.5°C pathway. The analysis also looks at domestic policies and actions, which are important as they provide an indication of whether governments are following through on their promises.

Table 1. Nationally determined contributions of G20 Countries

| | Paris 2030 NDC agreement | Reviewed, revised NDC/ mitigation plans | Net zero | Climate Action Tracker domestic target rating | Climate Action Tracker domestic policies and action rating |
|-----------|---|--|------------------------|---|--|
| China | Peak carbon dioxide emissions around 2030 with best efforts to achieve this earlier; reach peak coal use by 2025. | Policy statement: Peak emissions before 2030. | Carbon neutral by 2060 | Insufficient | Insufficient |
| US | Reduce emissions to 26–28 per cent below the 2005 level in 2025 and make best efforts to achieve 28 per cent. | Revised NDC: An economy-wide target of reducing net GHG by 50–52 per cent below 2005 levels in 2030. | 2050 | Almost sufficient | Insufficient |
| EU | At least 40 per cent reduction in emissions, from 1990 levels. | Revised NDC: 55 per cent reduction based on 1990 levels. | 2050 | Almost sufficient | Almost sufficient |
| India | Reduce the emissions intensity of GDP by 33–35 per cent by 2030 from 2005 level. | – | – | Critically insufficient | Almost sufficient |
| Russia | Reduction in GHG by 2030 to 70 per cent relative to the 1990 level, taking into account the maximum possible absorptive capacity of forests and other ecosystems. | – | – | Highly insufficient | Highly insufficient |
| Japan | Emissions reduction of 26 per cent by financial year (FY) 2030 compared to FY 2013 (25.4 per cent reduction compared to FY 2005). | Policy statement: Cut emissions by 46–50 per cent below 2013 levels by 2030, with strong efforts towards achieving a 50 per cent reduction. | 2050 | Almost sufficient | Insufficient |
| Brazil | 37 per cent decrease in emissions below 2005 levels by 2025. | Revised NDC: Confirms the commitment originally presented to reduce GHG in 2025 by 37 per cent, compared with 2005. Additionally, Brazil commits to reduce its emissions in 2030 by 43 per cent, compared with 2005. | – | Highly insufficient | Insufficient |
| Indonesia | Set unconditional reduction target of 29 per cent and conditional reduction target up to 41 per cent of business as usual (BAU) by 2030. | – | – | Critically insufficient | Insufficient |
| Iran | 4 per cent reduction below BAU in GHG emissions by 2030. | – | – | Critically insufficient | Critically insufficient |
| Canada | Committed to reduce GHG by 30 per cent below 2005 levels by 2030. | Policy Statement: 40–45 per cent reduction from 2005 levels by 2030. | 2050 | Almost sufficient | Highly insufficient |

Raising climate ambition at COP26

| | Paris 2030 NDC agreement | Reviewed, revised NDC/ mitigation plans | Net zero | Climate Action Tracker domestic target rating | Climate Action Tracker domestic policies and action rating |
|--------------|--|--|----------|---|--|
| South Korea | Reduce GHG emissions by 37 per cent from BAU by 2030 across all economic sectors. | Revised NDC: To reduce 24.4 per cent of GHG emissions from 2017 levels by 2030. | 2050 | Insufficient | Highly insufficient |
| Mexico | Unconditionally reduce GHG and short-lived pollutant emissions (below BAU) by 25 per cent by 2030. This commitment implies a reduction of 22 per cent of GHG and a reduction of 51 per cent of black carbon. | Revised NDC: Mexico submitted a revised NDC without raising ambition. | 2050 | Insufficient | Highly insufficient |
| Saudi Arabia | The actions and plans outlined in this submission seek to achieve mitigation co-benefit ambitions of up to 130 million tons of CO ₂ e avoided by 2030. | – | – | Critically insufficient | Critically insufficient |
| Australia | Economy-wide target to reduce GHG emissions by 26–28 per cent below 2005 levels by 2030. | Revised NDC: This target is a floor on Australia's ambition. Australia is aiming to overachieve on this target. | – | Insufficient | Insufficient |
| South Africa | South Africa's annual emissions by 2025 and 2030 will be in a range between 398 million tonnes (Mt) of CO ₂ e and 614 MtCO ₂ e, as defined in national policy. | Policy statement: Shift its intended emissions peak 10 years earlier to 2025. | 2050 | Insufficient | Almost sufficient |
| Turkey | Up to 21 per cent reduction in GHG from BAU by 2030. | | – | Not included | |
| UK | As part of the EU NDC, agreed at least 40 per cent cut in GHG emissions by 2030, based on 1990 levels. | First NDC: Committing to reduce economy wide GHG emissions by at least 68 per cent by 2030, compared to 1990 levels. | 2050 | 1.5°C compatible | Almost sufficient |
| Pakistan | Pakistan intends to reduce up to 20 per cent of its 2030 projected GHG emissions (1,603 Mt) subject to availability of international grants amounting to about \$40 billion at current prices. | – | 2050 | Not included | |
| Thailand | Reduce GHG emissions by 20 per cent from BAU level by 2030, which could increase to 25 per cent subject to enhanced access to technology and funding. | Revised NDC: A revised NDC was submitted, but no changes in ambition. | – | Critically insufficient | Critically insufficient |
| Vietnam | By 2030, will reduce GHG emissions by 8 per cent compared to BAU, using domestic resources. With international support reduction could increase to 25 per cent. | – | – | Critically insufficient | Insufficient |

Source: UNFCCC (2021), 'NDC registry', <https://www4.unfccc.int/sites/NDCStaging/Pages/All.aspx>; Climate Action Tracker (2021), 'Climate target updates slow as science ramps up need for action', <https://climateactiontracker.org/publications/global-update-september-2021>.

As of September 2021, 85 countries and the EU27 had submitted new or updated NDCs, covering around half of global GHG emissions. Some parties, like China and Japan, have proposed new targets but not yet submitted them formally while around 70 parties – including G20 countries like India, Saudi Arabia and Turkey – have neither proposed nor communicated a revised NDC target. Several parties have, moreover, submitted new NDCs without increasing ambition. These include Australia, Brazil, Indonesia, Mexico, New Zealand, Russia, Singapore, Switzerland and Vietnam.⁴² In some of these cases, adjustments in baselines mean that ambition has *de facto* decreased (Brazil and Mexico).⁴³ Analysis published by Climate Action Tracker in September 2021 shows that the NDC updates only narrow the gap to 1.5°C by, at best, 15 per cent (4 GtCO_{2e}). This leaves a large gap of 20–23 GtCO_{2e}.⁴⁴

Net zero pledges may encourage reliance on negative emissions technologies, such as bioenergy with carbon capture and storage, which have still to be tested at scale to assess land requirement, efficiency and economic viability.

Similar analysis from the UN underscores the need for further NDC enhancements.⁴⁵ If all current NDCs are implemented, total GHG emissions (not including emissions associated with land use) in 2030 are projected to be 16.3 per cent *higher* than in 2010, and 5 per cent higher than in 2019. The emissions of the parties that have submitted new or updated NDCs are, however, expected to fall by around 12 per cent by the end of the decade, compared to 2010 levels. The UN report also highlights the importance of providing support to developing countries, as many of these have submitted NDCs that are – at least in part – conditional on the receipt of additional financial resources, capacity-building support, and technology transfer, among other things. If such support is forthcoming, global emissions could peak before 2030, with emission levels at the end of this decade being 1.4 per cent lower than in 2019. However, even the full implementation of both the unconditional and conditional elements of the NDCs would lead to an overshoot of the targets of the Paris Agreement – as alignment with 1.5°C and 2°C require cuts of 45 per cent and 25 per cent, respectively, by 2030 (relative to 2010 levels).⁴⁶

A large number of countries are also making more long-term net zero emissions or carbon neutrality pledges. As of September 2021, just over 130 countries had made such commitments, but not all of them have formally presented them to the UNFCCC.⁴⁷ Examples include large economies like China, Japan, Brazil, the US, South Africa, South Korea, and the EU, as well as climate-vulnerable developing countries like the Marshall Islands, Barbados, Kiribati and Bangladesh.⁴⁸ Climate

⁴² Ibid.

⁴³ Climate Action Tracker (2021), *Global Update May 2021: Climate Summit Momentum*.

⁴⁴ Climate Action Tracker (2021), *Global Update September 2021: Climate targets slow as science ramps up need for action*.

⁴⁵ Covering the 86 new or updated NDCs submitted by the end of July 2021, as well as the first round of targets.

⁴⁶ UNFCCC (2021), *National determined contributions under the Paris Agreement*, Synthesis report by the secretariat, <https://unfccc.int/process-and-meetings/the-paris-agreement/nationally-determined-contributions-ndcs/nationally-determined-contributions-ndcs/ndc-synthesis-report>.

⁴⁷ Ibid.

⁴⁸ Energy & Climate Intelligence Unit (2021), 'Net Zero Tracker'.

Action Tracker estimates that if these long-term targets – and the NDCs – are fully implemented, global warming could be limited to 2°C.⁴⁹ Most of the net zero pledges are, however, formulated in vague terms that are not consistent with good practice. The long-term targets are, moreover, only credible if they are backed up by ambitious and robust 2030 NDCs,⁵⁰ given that substantial cuts in emissions must occur this decade. An additional concern that has been raised when it comes to net zero pledges is that they may encourage reliance on negative emissions technologies, such as bioenergy with carbon capture and storage (BECCS), which have still to be tested at scale to assess land requirement, efficiency and economic viability.⁵¹

Box 1. Marrakech Partnership for Global Climate Action⁵²

The Marrakech Partnership for Global Climate Action was launched at COP22. It provides a framework to strengthen collaboration among governments and other key stakeholders – such as international and regional initiatives and coalitions of cities, regions, businesses, investors and civil society – to achieve the Sustainable Development Goals (SDGs) and the targets of the Paris Agreement. The main objectives of the partnership are to:

- Enhance collaboration among governments and non-party stakeholders – such as at the Petersburg Climate Dialogue (28–29 April 2020).
- Expand participation, for example, through the Race to Zero Campaign under the Climate Ambition Alliance, which was launched in 2019 by Chile, UNFCCC and UNDP, with a goal to achieve a 10-fold increase in climate commitment targets by COP26.
- Foster conditions for breakthroughs on key tipping points to transform systems – such as through Climate Action Pathways, which was launched in 2019, to help parties and non-parties to identify actions and options needed by 2021, 2025, 2030 and 2040 as well as steps to achieve these visions in areas such as energy, industry, human settlements, transport, land use, oceans and coastal zones, water and resilience.
- Enable continuity and coherence – such as through the Race to Zero Dialogues (November 2020) to ensure that milestones throughout the year build on one another by focusing on transformative action related to sustainable development priorities at the national level.
- Track progress, impacts and results – including through the 2020 Yearbook for Global Climate Action, which presents the current range and state of global climate action by non-party stakeholders.

⁴⁹ Climate Action Tracker (2021), *Global Update September 2021: Climate targets slow as science ramps up need for action*.

⁵⁰ Ibid.

⁵¹ Dyke, J., Watson, R. and Knorr, W. (2021), 'Climate scientists: concept of net zero is a dangerous trap', *The Conversation*, 22 April 2021, <https://theconversation.com/climate-scientists-concept-of-net-zero-is-a-dangerous-trap-157368>.

⁵² UNFCCC (2021), 'Marrakech Partnership for Global Climate Action', <https://unfccc.int/climate-action/marrakech-partnership-for-global-climate-action>.

The challenge of closing the gap

Bridging the gap between current NDCs and targets that would keep warming to 1.5°C is a defining challenge for governments ahead of COP26. As mentioned, UNEP estimates that the ambition of 2030 targets would need to be enhanced fivefold *vis-à-vis* pledges made in 2015 to align with a 1.5°C pathway.⁵³ Several large emitters – including the US and the EU – have now submitted their new or updated NDCs. According to Climate Action Tracker, the UK’s target is considered to be compatible with a 1.5°C pathway, while those of the US, EU, Japan and Canada are classified as ‘almost sufficient’.⁵⁴

It is critical that all countries that have not yet submitted a new or updated NDC do so, and that these pledges are aligned with 1.5°C. It is equally important that countries that have submitted unambitious NDCs revisit their targets. The Paris Agreement states that parties may revise existing NDCs at any time, if the purpose is to enhance ambition.⁵⁵ The G20 countries have a particularly important role to play. In July 2021, the Italian G20 presidency hosted the first ever G20 Climate and Energy Ministerial meeting. In the final communique the countries in the G20 stated that they ‘intend to update or communicate ambitious NDCs by COP26’.⁵⁶ The importance of action from all members of the G20 is clear, as they collectively account for 80 per cent of global emissions and as UN Secretary-General António Guterres said, ‘there is no pathway to this [1.5°C] goal without the leadership of the G20’.⁵⁷

With only a few weeks to go it is, however, unlikely that the 20–23 GtCO₂e gap in targets will be closed by COP26. At the UK-hosted COP26 ministerial in July, a number of ministers stressed that parties would need to respond to any gap remaining by the Glasgow conference. Some suggested that such a response could include a ‘clear political commitment’ to keep 1.5°C within reach, a recognition of the gap, and a plan to bridge it. More specific proposals of actions that could be taken, as part of the response, to keep the 1.5°C pathway alive were also discussed. Suggestions included, but were not limited to, encouraging countries whose NDCs are not consistent with 1.5°C to bring their 2030 targets in line before 2025 (when the third round of NDCs are due); calling for parties to submit concrete long-term strategies for reaching net zero; and/or sending clear signals to markets through actions like phasing out unabated coal, carbon pricing, fossil fuel subsidy reform, nature-based solutions, and decarbonizing transport.⁵⁸

⁵³ UNEP (2020), *Emissions Gap Report 2020*.

⁵⁴ Climate Action Tracker (2021), *Global Update September 2021: Climate targets slow as science ramps up need for action*.

⁵⁵ UN (2015), *Paris Agreement*.

⁵⁶ G20 (2021), ‘Joint G20 Energy-Climate Ministerial Communique’, 23 July 2021, https://www.g20.org/wp-content/uploads/2021/07/2021_G20-Energy-Climate-joint-Ministerial-Communique.pdf.

⁵⁷ UN (2021), ‘No pathway to reach the Paris Agreement’s 1.5°C goal without the G20: UN chief’, 25 July 2021, <https://news.un.org/en/story/2021/07/1096372>.

⁵⁸ UK Government (2021), *July Ministerial Chair’s Summary*, <https://www.gov.uk/government/news/july-ministerial-chairs-summary>.

Achieving a positive COP26 outcome

The ultimate benchmark for a high ambition outcome at COP26 is whether the new or updated NDCs are ambitious enough to align with a 1.5°C pathway. For many communities and ecosystems, the threat of different climate impacts between 1.5°C and 2°C – not to mention 3°C, 4°C or 5°C – is existential. Each increment of warming is anticipated to drive increasingly devastating and costly impacts, including extreme heatwaves, rising sea levels, biodiversity loss, reductions in crop yields, and widespread ecosystems damage including to coral reefs and fisheries.⁵⁹

Keeping the goal of 1.5°C within reach will require substantial action this decade. Long-term targets to achieve net zero emissions or carbon neutrality have the potential to be powerful drivers of decarbonization but need to be supported by ambitious NDCs as well as concrete policies and sufficient investment.

Should we reach COP26 without sufficient ambition on NDCs, parties would need to present a plan for how ambition will be raised in the early 2020s. This could include a COP decision or a political statement underscoring the need to keep warming to 1.5°C and inviting parties to revisit their NDCs earlier than the Paris timetable dictates (for instance in 2023 instead of 2025).⁶⁰ To support more ambitious action, countries should look to expand international collaboration and accelerate decarbonization in key sectors. At COP26, parties can help boost the credibility of their pledges by showcasing policies, measures and sector initiatives that will accelerate decarbonization, including on the phase out of unabated coal and the increased use of electric vehicles (see Box 3).

Box 2. Falling costs of renewable energy provide positive impetus for climate action

Since the signing of the Paris Agreement remarkable progress has been made in the manufacturing and deployment of many low-carbon technologies. According to the International Energy Agency (IEA), the cost of building new solar utility-scale projects is less than running existing coal plants in, for instance, India and China.⁶¹ In 2021, contracts were agreed for the commissioning of a new solar plant in Saudi Arabia at a world record low of \$10 per megawatt hour (MWh).⁶² As Figure 3 shows, the global average 'levelized cost of electricity' from solar has fallen from around \$350/MWh to \$50/MWh in the last decade, while the cost of wind power has more than halved over the same time period. Furthermore, the contribution of these technologies to energy supply is rapidly increasing and the mechanism for their management and

⁵⁹ Buis, A. (2019), 'A Degree of Concern: Why Global Temperatures Matter', NASA, <https://climate.nasa.gov/news/2865/a-degree-of-concern-why-global-temperatures-matter>; Levin, K. (2018), 'Half a degree and a world apart: The difference in climate impacts between 1.5C and 2C of warming', *World Resources Institute*, <https://www.wri.org/insights/half-degree-and-world-apart-difference-climate-impacts-between-15c-and-2c-warming>.

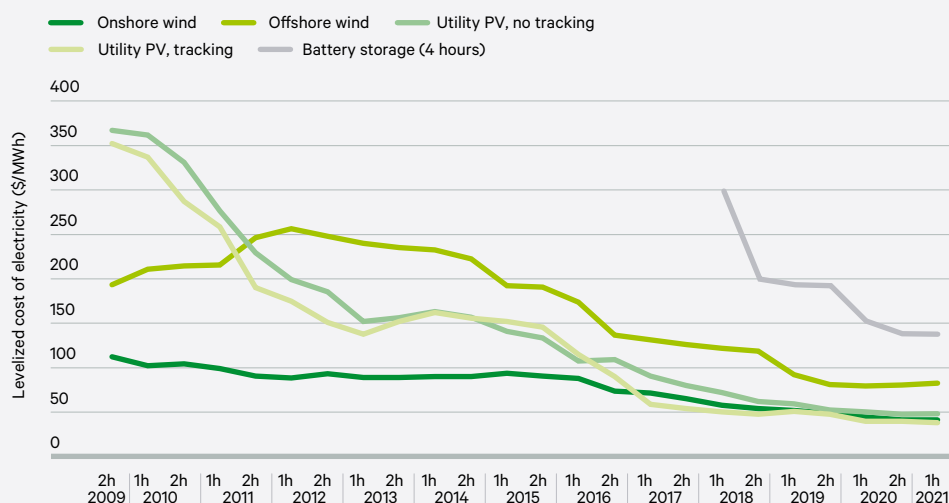
⁶⁰ Scott, A. and Evans, T. (2021), 'A Glasgow Package' to Keep 1.5C Alive', E3G blog, 12 July, <https://www.e3g.org/news/a-glasgow-package-to-keep-1-5-c-alive-at-cop26>.

⁶¹ Guterres, A. (2021), 'Secretary-General's video message to Powering Past Coal Alliance Summit', 2 March 2021 <https://www.un.org/sg/en/content/sg/statement/2021-03-02/secretary-generals-video-message-powering-past-coal-alliance-summit>.

⁶² Bellini, E. (2021), 'Saudi Arabia's second PV tender draws world record low bid of \$0.0104/kWh', PV Magazine, 8 April 2021, <https://www.pv-magazine.com/2021/04/08/saudi-arabias-second-pv-tender-draws-world-record-low-bid-of-0104-kwh>.

storage is becoming cheaper and more efficient. In 2020, renewables became the EU's main source of energy, providing 38 per cent of Europe's electricity.⁶³ In Uruguay, wind now provides nearly one-third of its power while solar provides 10.7 per cent of total generation in Honduras and over 8 per cent in Chile.⁶⁴

Figure 3. Falling costs of renewable energy and battery storage



Source: BNEF (2021), 'Levelised Cost of Electricity Data', <https://about.bnef.com/product>.

In the run-up to COP26, the UK government is mobilizing its counterparts and non-state actors to drive accelerated action on phasing out the use of unabated coal,⁶⁵ accelerating the deployment of electric vehicles,⁶⁶ protecting and restoring nature (nature-based solutions⁶⁷), and aligning financial flows with the goals of the Paris Agreement.⁶⁸ The role of the private sector is crucial in the transition to net zero economies and is recognized within the framework of the UNFCCC, as they can deliver funding, innovation and technology deployment at a pace and scale beyond that of most governments (see Box 1). It is hoped that some of these initiatives will lead to plurilateral agreements at or ahead of COP26, which could enhance the credibility of mitigation pledges and help keep the 1.5°C target within reach. Being able to showcase a package consisting of ambitious NDCs, plurilateral deals, and national policies at COP26 could generate positive momentum and create a sense of inevitability around the transition to net zero societies.

⁶³ Redl, C., Hein, F., Buck, M., Graichen, P. and Jones, D. (2020), *The European Power Sector in 2020*, https://static.agora-energiawende.de/fileadmin/Projekte/2021/2020_01_EU-Annual-Review_2020/A-EW_202_Report_European-Power-Sector-2020.pdf.

⁶⁴ REN21 (2020), *Renewables 2020 Global Status Report*, Paris: REN21 Secretariat, https://www.ren21.net/wp-content/uploads/2019/05/gsr_2020_full_report_en.pdf.

⁶⁵ UK Government (2021), 'Energy', <https://ukcop26.org/energy>.

⁶⁶ UK Government (2021), 'Transport', <https://ukcop26.org/transport>.

⁶⁷ UK Government (2021), 'Nature', <https://ukcop26.org/nature>.

⁶⁸ UK Government (2021), *COP26 Explained*, <https://2nsbq1gn1rl23zol93eyrcj-wpengine.netdna-ssl.com/wp-content/uploads/2021/07/COP26-Explained.pdf>.

Box 3. Sector initiatives

As the energy sector accounts for over two-thirds of global GHG emissions,⁶⁹ action in this area will be key to meeting Paris Agreement targets. The burning of coal for electricity accounts for 30 per cent of global CO₂ emissions, while providing 36 per cent of global electricity and a quarter of commercial energy. According to the IEA's 2021 report, meeting the targets of the Paris Agreement will be impossible unless the use of coal is radically reduced.

There is growing international pressure to rapidly reduce and phase out coal use and production. UN Secretary-General António Guterres has, for instance, called for, 'A decline in global coal use in electricity generation by 80 percent below 2010 levels by 2030. A commitment from all OECD countries to phase out coal by 2030, and a commitment from non-OECD countries to do so by 2040'.⁷⁰ Momentum is growing. Since 2015, 44 countries have committed to not constructing new coal power plants, and an additional 40 do not have such projects in the development pipeline.⁷¹ The UK government has made it clear that COP26 must be the COP that 'consigns coal power to history'.⁷²

The G7 Summit in 2021 created mixed messages on coal as members agreed to stop financing coal plants and mines outside of their borders by the end of the year.⁷³ The global shift away from coal does in some cases seem to effectively influence China's actions; its largest bank, Industrial and Commercial Bank of China (ICBC), has withdrawn financing for a \$3 billion, 2.8 GW, coal power project in Zimbabwe⁷⁴ and importantly President Xi announced at UNGA in September 2021 that China would 'not build new coal-fired power projects abroad', which is hugely significant given the scale of their global financing.⁷⁵ However, although G7 states agreed to end new direct support for international investments in unabated coal, they have failed to agree on a clear timeline to phase out domestic coal, only committing to 'accelerate the transition away from unabated coal capacity' and to 'overwhelmingly' decarbonize power systems in the 2030s.⁷⁶ Furthermore, China has yet to pledge a domestic coal cessation target. The G20 meeting in July also failed to agree common language on the use of coal⁷⁷ and it was consequently not mentioned in the final communique. At the 76th UNGA, seven governments signed the UN-initiated 'No new coal agreement'. The aim is to grow the alliance ahead of COP26.⁷⁸

⁶⁹ Lee, H. and Birol, F. (2020), 'Energy is at the heart of the solution to climate change', IPCC Post, 31 July 2020, <https://www.ipcc.ch/2020/07/31/energy-climatechallenge>.

⁷⁰ Guterres, A. (2021), 'Secretary-General's video message to Powering Past Coal Alliance Summit'.

⁷¹ Littlecott, C., Roberts, L., Senlen, Ö., Burton, J., Joshi, M., Shearer, C., and Ewen, M. (2021), *No new coal by 2021: the collapse of the global coal pipeline*, E3G report, <https://www.e3g.org/publications/no-new-coal>.

⁷² Sharma, A. (2021), 'Pick the Planet', speech, 14 May 2021, <https://www.gov.uk/government/speeches/pick-the-planet>.

⁷³ Mathiesen, K. (2021), 'US and Japan leave G7 stuck on coal', Politico, <https://www.politico.eu/article/us-and-japan-g7-block-deal-on-coal>.

⁷⁴ Lo, J. (2021), 'China's biggest bank is ditching Zimbabwe coal plant, campaigners say', Climate Home News, <https://www.climatechangenews.com/2021/07/01/chinas-biggest-bank-ditching-zimbabwe-coal-plant-campaigners-say>.

⁷⁵ UN (2021), 'China headed towards carbon neutrality by 2060; President Xi Jinping vows to halt new coal plants abroad'.

⁷⁶ G7 (2021), *Carbis Bay G7 Summit Communique*.

⁷⁷ UN (2021), 'No pathway to reach the Paris Agreement's 1.5°C goal without the G20: UN chief'.

⁷⁸ Akshat, R. (2021), 'These countries plan to stop building new coal power plants', Bloomberg, 24 September 2021, <https://www.bloomberg.com/news/articles/2021-09-24/these-countries-plan-to-stop-building-new-coal-power-plants>.

The 2021 IEA report also suggested that no new oil and gas fields should be approved for development if the world is to be compatible with the 1.5°C target.⁷⁹ Consequently, additional action could demonstrate that further exploration of fossil fuels is not compatible with the 1.5°C target of the Paris Agreement. Specific policy targets to reduce their use, such as deploying electric vehicles, insulating buildings and ending the sale of internal combustion engines and gas boilers are needed in national commitments at COP26.

While addressing coal, oil and gas consumption and production is central to efforts to drive down carbon emissions, additional emissions from agriculture, forestry and other land use (AFOLU) are also a key component to address. Non-CO₂ emissions (particularly methane) are increasingly coming under the spotlight and short and long-term targets will not be met without substantial changes in food production, farming and land use. Competition for land will play an increasingly important role in shaping climate plans. Land-based mitigation measures such as restoring lost carbon sinks through ecosystem restoration, together with less intensive food production techniques and biofuels will each require large land areas and careful consideration from a practical implementation perspective. The UK COP presidency has identified ‘protecting and restoring nature for the benefit of people and climate’ as a theme to advance at COP26 and this includes the protection and restoration of ecosystems as well as the curtailment of deforestation. Hence, COP26 is an opportunity to bring land use into climate plans as a central, cross cutting component.

⁷⁹ IEA (2021), ‘Net Zero by 2050’, May 2021, <https://www.iea.org/reports/net-zero-by-2050>.

03 Support to climate-vulnerable developing countries

Increased action on climate finance, adaptation, and loss and damage is critical for supporting climate-vulnerable developing countries, strengthening trust and raising ambition on mitigation.

The year 2020 was one of the warmest on record.⁸⁰ As COVID-19 ravaged the world, extreme weather events continued to cause severe devastation. In Bangladesh, torrential rains submerged a quarter of the country,⁸¹ resulting in hundreds of deaths, mass displacement and damage to more than a million homes.⁸² Record-breaking floods in Sudan⁸³ and Uganda⁸⁴ also displaced hundreds of thousands, while super cyclone Amphan raged across South Asia.⁸⁵ Extreme weather events were also a defining feature of the summer of 2021.

⁸⁰ NASA (2021), '2020 Tied for Warmest Year on Record, NASA Analysis Shows', 14 January 2021, <https://climate.nasa.gov/news/3061/2020-tied-for-warmest-year-on-record-nasa-analysis-shows>.

⁸¹ Sengupta, S. and Manik, J. A. (2020), 'A quarter of Bangladesh is flooded. Millions have lost everything', *New York Times*, 30 July 2020, https://www.nytimes.com/2020/07/30/climate/bangladesh-floods.html?campaign_id=51&emc=edit_MBE_p_20200731&instance_id=20859&nl=morning-briefing®i_id=86073403§ion=longRead&segment_id=34857&te=1&user_id=1d08aa1fc6ccc858dae33d431f1bd8f2.

⁸² Relief web (2020), 'HCTT Monsoon Flood Humanitarian Response Plan: Monitoring Dashboard (30 November 2020) – Bangladesh', 2 December 2020, <https://reliefweb.int/report/bangladesh/hctt-monsoon-flood-humanitarian-response-plan-monitoring-dashboard-30-november>.

⁸³ Najjar, F. (2020), 'We lost everything: Thousands homeless as Sudan battles floods', *Al Jazeera*, 9 September 2020, <https://www.aljazeera.com/news/2020/9/9/we-lost-everything-thousands-homeless-as-sudan-battles-floods>.

⁸⁴ Taylor, L. (2020), 'Uganda wants people to leave flooded wetlands – and not to come back', *Reuters*, 11 June 2020, <https://news.trust.org/item/20200611041603-ibe9r>.

⁸⁵ BBC (2020), 'Amphan: Cyclone wreaks deadly havoc in India and Bangladesh', 20 May 2020, <https://www.bbc.co.uk/news/world-asia-52734259>.

An unprecedented heatwave may have killed almost 500 people in British Columbia,⁸⁶ as well as a billion marine animals along the Canadian coastline.⁸⁷ In the Chinese province of Henan people drowned in the subway after a year's worth of rain fell in just three days.⁸⁸ Germany and Belgium also experienced death and destruction as a result of severe flooding,⁸⁹ while villages in Greece burned.⁹⁰

Limiting global warming to 1.5°C is key to avoiding the most catastrophic events, but substantial measures must also be undertaken to adapt to climate change impacts and build resilience.

The impacts of climate change are striking even harder than many anticipated,⁹¹ and as temperatures continue to rise extreme weather events are increasing in both frequency and intensity. Limiting global warming to 1.5°C is key to avoiding the most catastrophic events, but substantial measures must also be undertaken to adapt to climate change impacts and build resilience. As the summer of 2021 shows, no country is spared. It is, however, those who have emitted the least that are most at risk,⁹² and in many countries that are disproportionately affected by climate change – such as the least developed countries (LDCs)⁹³ – financial constraints impede their ability to invest in adaptation, build resilience and deal with loss and damage.⁹⁴ COVID-19 has aggravated this challenge: while industrialized countries have implemented unprecedented stimulus measures to support their economies – and vaccinated large parts of their populations – many developing countries remain in the midst of a health and economic catastrophe.

Scaled up action on climate finance, adaptation and loss and damage are – in addition to increased ambition on mitigation – key priorities for climate-vulnerable nations ahead of COP26. Raised ambition and concrete delivery in these areas are critical for supporting those at the frontline of climate

⁸⁶ Cecco, L. (2021), 'Record heatwave may have killed 500 people in western Canada', *Guardian*, 3 July 2021, <https://www.theguardian.com/world/2021/jul/02/canada-heatwave-500-deaths>.

⁸⁷ Cecco, L. (2021), 'Heat dome' probably killed 1bn marine animals on Canada coast, experts say', *Guardian*, 8 July 2021, <https://www.theguardian.com/environment/2021/jul/08/heat-dome-canada-pacific-northwest-animal-deaths>.

⁸⁸ Ni, V. and Davidson, H. (2021), 'Death toll rises and thousands flee homes as floods hit China', *Guardian*, 12 July 2021, <https://www.theguardian.com/world/2021/jul/20/heavy-flooding-hits-central-china-affecting-tens-of-millions>.

⁸⁹ Fitzgerald, M., Angerer, C. and Smith, P. (2021), 'Almost 200 dead, many still missing after floods as Germany counts devastating cost', *NBC news*, 19 July 2021, <https://www.nbcnews.com/news/world/almost-200-dead-many-still-missing-after-floods-germany-counts-n1274330>.

⁹⁰ BBC (2021), 'Greece wildfires: Hundreds more evacuated as uncontrolled fires rage', 8 August 2021, <https://www.bbc.co.uk/news/world-europe-58138614>.

⁹¹ World Economic Forum (2020), 'The Global Risks Report 2020', http://www3.weforum.org/docs/WEF_Global_Risk_Report_2020.pdf.

⁹² Althor, G., Watson, J. E. M. and Fuller, R. A. (2016), 'Global mismatch between greenhouse gas emissions and the burden of climate change', *Scientific Reports*, 6, 20281 (2016), <https://doi.org/10.1038/srep20281>.

⁹³ IPCC (2018), *Summary for Policymakers*, in *Global Warming of 1.5°C*, Special Report, <https://www.ipcc.ch/sr15/chapter/spm>.

⁹⁴ Loss and damage refers to economic and non-economic harms caused by climate change impacts that cannot be avoided through adaptation and mitigation.

change, key to building trust, and could encourage some parties to raise the ambition of their NDC pledges. The implementation of many NDCs is, in addition, at least partly conditional upon receiving increased levels of finance, as well as other types of support.⁹⁵

Honouring the \$100 billion goal

In 2009, developed countries committed to mobilizing \$100 billion per year by 2020 for climate mitigation and adaptation in developing countries.⁹⁶ This pledge was subsequently formalized in the Cancun Agreements in 2010⁹⁷ and reaffirmed in the Paris Agreement in 2015. The resources provided were to be ‘new and additional’⁹⁸ and come from a variety of public and private sources.⁹⁹ The \$100 billion goal is a core element of the bargain underpinning the Paris Agreement.¹⁰⁰ While achieving the mitigation and adaptation goals of the agreement will require trillions of dollars in investment – of which most will need to come from the private sector – the delivery of the \$100 billion is critical to building trust between developed and developing countries,¹⁰¹ and is important for raising ambition on mitigation.¹⁰²

The OECD estimates that \$79.6 billion was mobilized in 2019, which is the most recent year for which official figures are available.¹⁰³ In 2018, the figure was \$78.9 billion, and in 2017 it was \$71.2 billion.¹⁰⁴ Though the verified figures for 2020 will not be available until 2022, it is clear the target was missed.¹⁰⁵

⁹⁵ UNFCCC (2021), *National determined contributions under the Paris Agreement: Synthesis report by the secretariat*.

⁹⁶ UNFCCC (2010), *Report of the Conference of the Parties on its fifteenth session, held in Copenhagen from 7 to 19 December 2009*, p. 7, <https://unfccc.int/resource/docs/2009/cop15/eng/11a01.pdf#page=7>.

⁹⁷ UNFCCC (2011), *Report of the Conference of the Parties on its sixteenth session, held in Cancun from 29 November to 10 December 2010*, p. 3, <https://unfccc.int/resource/docs/2010/cop16/eng/07a01.pdf#page=3>.

⁹⁸ Mitchell, I., Ritchie, E. and Tahmasebi, A. (2020), *Is climate finance towards the \$100 billion new and additional?*, Center for Global Development Policy Paper, <https://www.cgdev.org/publication/climate-finance-towards-100-billion-new-and-additional>.

⁹⁹ UNFCCC (2010), *Report of the Conference of the Parties on its fifteenth session, held in Copenhagen from 7 to 19 December 2009*, p. 7.

¹⁰⁰ Thwaites, J. and Amerasinghe, N. M. (2018), ‘New UN Assessment Delivers Good News on Climate Finance, But No Time for Complacency’, World Resources Institute, <https://www.wri.org/insights/new-un-assessment-delivers-good-news-climate-finance-no-time-complacency#:~:text=The%20%24100%20billion%20commitment%20is,that%20underpins%20the%20Paris%20Agreement>.

¹⁰¹ Bhattacharya, A., Calland, H., Averchenkova, A., Gonzalez, L., Martinez-Diaz, L. and Van Rooij, J. (2020), *Delivering the \$100 billion Climate Finance Commitment and Transforming Climate Finance*, Independent Expert Group on Climate Finance, https://www.un.org/sites/un2.un.org/files/100_billion_climate_finance_report.pdf; Sharma, A. (2021), ‘Pick the Planet’, speech, 14 May 2021, <https://www.gov.uk/government/speeches/pick-the-planet>.

¹⁰² Scott, A. and Vernoit, I. E. (2021), *Surpassing the \$100 billion: Achieving a climate finance plan at scale to rebuild trust*, Briefing Paper, London: E3G, <https://9tj40250l53byww26jdkao0x-wpengine.netdna-ssl.com/wp-content/uploads/E3G-Briefing-Surpassing-the-100bn.pdf>.

¹⁰³ OECD (2021), *Climate Finance Provided and Mobilised by Developed Countries: Aggregate Trends Updated with 2019 Data, Climate Finance and the USD 100 Billion Goal*, OECD Publishing, Paris, <https://doi.org/10.1787/03590fb7-en>.

¹⁰⁴ OECD (2020), *Climate Finance Provided and Mobilised by Developed Countries in 2013-18*, OECD Publishing, Paris, <https://doi.org/10.1787/f0773d55-en>.

¹⁰⁵ OECD (2021), ‘Statement from OECD Secretary-General Mathias Cormann on climate finance in 2019’, 17 September 2021, <https://www.oecd.org/newsroom/statement-from-oecd-secretary-general-mathias-cormann-on-climate-finance-in-2019.htm>.

Developed countries have, moreover, not yet been able to show that the pledge will be honoured in 2021, nor demonstrate conclusively how it will be met in the 2022–24 period.¹⁰⁶

The pledge by developed nations to mobilize \$100 billion to developing nations by 2020 is a commitment made in the UNFCCC process more than a decade ago. It's time to deliver. How can we expect nations to make more ambitious climate commitments for tomorrow if today's have not yet been met?¹⁰⁷

Patricia Espinosa, 23 July 2021

How the goal is achieved matters. Only around one-fifth of bilateral climate finance is allocated to the LDCs,¹⁰⁸ and locally led projects receive low priority.¹⁰⁹ There are also concerns related to overreporting and lack of additionality. Oxfam estimates, for instance, that 80 per cent of public climate finance provided over the 2017–18 period took the form of loans or other non-grant instruments, and that the actual grant equivalent only accounted for around half of the total amount of finance reported.¹¹⁰ Furthermore, the Center for Global Development has found that almost half of the climate finance reported between 2009 and 2019 cannot be considered 'new and additional'.¹¹¹ There is, finally, an urgent need to close the adaptation finance gap (see next section),¹¹² and facilitate access to finance.¹¹³

It is widely recognized that honouring the \$100 billion goal is a prerequisite for success at COP26.¹¹⁴ The hitherto failure of developed countries to provide clarity on the issue is creating mistrust between countries,¹¹⁵ with the director of the

¹⁰⁶ Hook, L. (2021), 'UN climate talks hit a wall over tensions about finance', *Financial Times*, 18 June 2021, <https://www.ft.com/content/5072b2be-17ed-4c20-a0e5-e631f17a8d5b>; Sharma, A. (2021), 'Keeping 1.5°C Alive', Speech, 2 July 2021, <https://www.gov.uk/government/speeches/cop26-president-speaks-at-closing-event-of-london-climate-action-week>; Evans, S. and Gabbatiss, J. (2021), 'UN climate talks: Key outcomes from the June 2021 virtual conference', Carbon Brief, 18 June 2021, <https://www.carbonbrief.org/un-climate-talks-key-outcomes-from-the-june-2021-virtual-conference>; Levai, D. (2021), 'What does G7 leadership on climate look like?', *UN Foundation Blog*, 9 June 2021, <https://unfoundation.org/blog/post/what-does-g7-leadership-on-climate-look-like>; Guterres (2021), 'Remarks to the Third G20 Meeting of Finance Ministers and Central Bank Governors', Speech, 9 July 2021, <https://www.un.org/sg/en/content/sg/speeches/2021-07-09/remarks-third-g20-meeting-of-finance-ministers-and-central-bank-governors>; Scott, A. and Vernoit, I. E. (2021), *Surpassing the 100 billion: achieving a climate finance plan at scale to rebuild trust*, Briefing, London: E3G, <https://9tj4025ol53byww26jdkao0x-wpengine.netdna-ssl.com/wp-content/uploads/E3G-Briefing-Surpassing-the-100bn.pdf>; Harvey, F. (2021), 'Climate funding target for poorer countries 'likely to be met' by 2022', *Guardian*, 24 September 2021, <https://www.theguardian.com/environment/2021/sep/24/climate-funding-target-for-poorer-countries-likely-to-be-met-by-2022>.

¹⁰⁷ UN (2021), 'Patricia Espinosa: "There is no path to 1.5°C without the G20"', 23 July 2021, <https://unfccc.int/news/patricia-espinosa-there-is-no-path-to-15degc-without-the-g20>.

¹⁰⁸ Oxfam (2020), *Climate Finance Shadow Report 2020: Assessing Progress Towards the \$100 Billion Commitment*, <https://oxfamilibrary.openrepository.com/bitstream/handle/10546/621066/bp-climate-finance-shadow-report-2020-201020-en.pdf>.

¹⁰⁹ Soanes, M., Shakya, C., Neha, R., Steele, P. and MacGregor, J. (2017), *Delivering real change: Getting international climate finance to the local level*, Working Paper, London: International Institute for Environment and Development, <https://pubs.iied.org/sites/default/files/pdfs/migrate/10178IIED.pdf>.

¹¹⁰ Oxfam (2020), *Climate Finance Shadow Report 2020: Assessing Progress Towards the \$100 Billion Commitment*.

¹¹¹ Mitchell, Ritchie and Tahmasebi (2020), *Is climate finance towards the \$100 billion new and additional?*

¹¹² Global Centre on Adaptation (2020), *State and Trends in Adaptation Report 2020*, Rotterdam: The Global Centre on Adaptation, <https://gca.org/wp-content/uploads/2021/03/GCA-State-and-Trends-Report-2020-Online-3.pdf>.

¹¹³ UK Government (2021), *Climate & Development Ministerial: Chair's summary*, <https://ukcop26.org/climate-development-ministerial-chairs-summary>.

¹¹⁴ Espinosa, P. (2021), 'Patricia Espinosa outlines the four keys to success at COP26', UNFCCC article, 3 February 2021, [https://news.trust.org/item/20210708090413-r7w5b](https://unfccc.int/news/patricia-espinosa-outlines-the-four-keys-to-success-at-cop26#:~:text=%20The%20four%20elements%20that%20will%20constitute%20a,behind%2C%20through%20re-engaging%20with%20observers%20and...%20More%20; Sharma, A. (2021), 'Opinion: Before COP26, rich nations must meet climate finance promise', Reuters Opinion, 8 July, <a href=).

¹¹⁵ Hook (2021), 'UN climate talks hit a wall over tensions about finance'; Early, C. (2021), 'As COP26 draws closer, climate negotiators are still stuck on finance', *China Dialogue*, 1 July 2021, <https://chinadialogue.net/en/climate/cop26-climate-negotiations-still-stuck-on-finance>; Evans and Gabbatiss (2021), 'UN climate talks: Key outcomes from the June 2021 virtual conference'.

International Centre for Climate Change and Development (who is also an adviser to the climate-vulnerable countries) conveying that, ‘if the money is not delivered before November, then there is little point in climate-vulnerable nations showing up in Glasgow to do business with governments that break their promises’.¹¹⁶ The chair of the LDC Group has also made it clear that, ‘[t]here will be no COP26 deal without a finance deal’.¹¹⁷

It is widely recognized that honouring the \$100 billion goal is a prerequisite for success at COP26.

The G7 countries play a critical role in mobilizing the \$100 billion,¹¹⁸ and there was a hope that G7 leaders would increase their bilateral commitments substantially – and provide clarity on the \$100 billion¹¹⁹ – when they convened in Cornwall in June 2021. Some new pledges were made. Canada, for instance, committed to doubling its climate finance through to 2025 (to CAD \$5.3 billion), and Germany pledged to increase its annual commitments from €4 billion to €6 billion by 2025 at the latest.¹²⁰ The G7 members collectively also committed to ‘each increase and improve’ their public climate finance contributions, and announced they would develop a new international initiative – ‘Build Back Better for the World’¹²¹ – the details of which have yet to be fleshed out. However, many developing country officials – and many observers worldwide – expressed disappointment with the summit outcome, with the climate minister of Pakistan describing the G7 commitments as ‘peanuts’.¹²²

Several announcements on climate finance were also made during the 76th Session of the UNGA in September 2021. Most importantly, President Joe Biden pledged to double US climate finance (again) from the previously committed \$5.7 billion to \$11.4 billion per year by 2024. Actual delivery is, however, contingent on congressional approval.¹²³ The EU – which already

¹¹⁶ Huq, S. (2021), ‘If totemic climate finance pledge is missed, developing nations should skip COP26’, Reuters Opinion, 16 June 2021, <https://news.trust.org/item/20210616122609-wicrj>.

¹¹⁷ Wangdi, S. P. (2021), ‘World’s most vulnerable nations call on G7 to step up: “we cannot survive climate change without finance and stronger 2030 targets”’, LDC Climate Change Blog, 11 June 2021, <https://www ldc-climate.org/worlds-most-vulnerable-nations-call-on-g7-to-step-up-we-cannot-survive-climate-change-without-finance-and-stronger-2030-targets>.

¹¹⁸ Sharma, A. (2021), ‘Before COP26, rich nations must meet climate finance promise’.

¹¹⁹ Helm, T. and McKie, R. (2021), ‘UN blasts world leaders for failing to seal a £72bn-a-year deal on climate’, *Guardian*, 20 June 2021, <https://www.theguardian.com/environment/2021/jun/20/un-blasts-world-leaders-for-failing-to-seal-72bn-a-year-deal-on-climate>.

¹²⁰ UK Government (2021), ‘The Road to COP: Statement by the UK Presidency of the G7’, https://www.g7uk.org/wp-content/uploads/2021/06/The-Road-to-COP_-Statement-by-the-UK-Presidency-of-the-G7-PDF-418KB-8-pages-.pdf.

¹²¹ G7 (2021), *Carbis Bay G7 Summit Communique*.

¹²² Harvey, F. (2021), ‘G7 affirmed goals but failed to provide funds needed to reach them, experts say’, *Guardian*, 13 June 2021, <https://www.theguardian.com/world/2021/jun/13/g7-reaffirmed-goals-but-failed-to-provide-funds-needed-to-reach-them-experts-say>; McGrath, M. (2021), ‘Climate change: ‘No more excuses’ at COP26 climate summit – poor nations’, BBC, 15 July, <https://www.bbc.co.uk/news/science-environment-57839368>; Dagnet, Y., Cogswell, N., Gonzalez, L., Mendoza, M., Warszawshi, N. and Chakrabarty, S. (2021), ‘Challenging Negotiations Deliver Limited Progress Toward COP26’, World Resources Institute ‘Technical Perspective’, 21 June 2021, <https://www.wri.org/insights/challenging-climate-negotiations-deliver-limited-progress-toward-cop26>.

¹²³ Biden, J. (2021), ‘Remarks by President Biden Before the 76th Session of the United Nations General Assembly’, Speech, 21 September 2021, <https://www.whitehouse.gov/briefing-room/speeches-remarks/2021/09/21/remarks-by-president-biden-before-the-76th-session-of-the-united-nations-general-assembly>; Gerretsen, I. (2021), ‘US to double climate finance again, but gap remains to \$100 bn’, *Climate Home News*, 21 September 2021, <https://www.climatechangenews.com/2021/09/21/us-double-climate-finance-gap-remains-100bn>.

contributes around \$25 billion in climate finance per year – also stepped up, announcing an additional €4 billion until 2027,¹²⁴ while Italian Prime Minister Mario Draghi conveyed that Italy would shortly be announcing a new climate finance commitment.¹²⁵ Though the US pledge in particular has been described as a critical step forward that ‘puts the \$100 billion within reach’,¹²⁶ more will need to be done.¹²⁷

\$100 billion is a bare minimum. But the agreement has not been kept. A clear plan to fulfil this pledge is not just about the economics of climate change; it is about establishing trust in the multilateral system.¹²⁸

António Guterres, 9 July 2021

The multilateral development banks (MDBs) play key roles in mobilizing the annual \$100 billion. At the G20 Finance and Central Bank Governors Meeting on 9–10 July, participants agreed to launch an independent review of the capital adequacy frameworks of these institutions,¹²⁹ which is to be concluded by the Annual Meetings of the IMF and World Bank Group in 2022.¹³⁰ Changes in the MDBs’ capital adequacy frameworks could, along with other efforts to optimize their balance sheets and align their portfolios with the goals of the Paris Agreement, enable these organizations to play a larger role in funding the green transition and building resilience in developing countries, including by leveraging much-needed private-sector finance. Ambitious capital increases in the MDBs and multilateral climate funds over the next few years would also help increase the financial firepower of these organizations.

To build trust and provide further clarity on the delivery of the \$100 billion, the COP26 president-designate, Alok Sharma, announced in early July 2021 that developed countries would publish a ‘clear plan’ for how the funds will be mobilized in the period up to 2025. The production of such a roadmap has been called for by climate-vulnerable developing countries, which are demanding \$500 billion over five years,¹³¹ as well as the UN secretary-general.¹³²

¹²⁴ Abnett, K. (2021), ‘The EU pledges 4 billion euros more in climate funds for poorer countries’, Reuters, 15 September 2021, <https://www.reuters.com/business/finance/eu-pledges-extra-4-billion-euros-international-climate-finance-2021-09-15>.

¹²⁵ Draghi, M. (2021), ‘76ma UNGA – Intervento del Presidente Draghi alla tavola rotonda sul climate Climate Moment [76th UNGA – Remarks by President Draghi at the UN roundtable “Climate Moment”]’, Speech, 20 September 2021, https://italyun.esteri.it/rappresentanza_onu/it/comunicazione/archivio-news/2021/09/76ma-unga-intervento-del-presidente.html.

¹²⁶ E3G (2021), ‘New US pledge doubles core climate finance: E3G responds’, 21 September 2021, <https://www.e3g.org/news/new-us-pledge-doubles-core-climate-finance-e3g-responds>.

¹²⁷ Harvey, F. (2021), ‘Developing nations welcome US climate finance but warn more is needed’, *Guardian*, 22 September 2021, <https://www.theguardian.com/environment/2021/sep/22/developing-nations-welcome-us-climate-finance-pledge-but-warn-more-is-needed>.

¹²⁸ Guterres (2021), ‘Remarks to Third G20 Meeting of Finance Ministers and Central Bank Governors’.

¹²⁹ Finance Ministers and Central Bank Governors of the G20 (2021), ‘Italian G20 Presidency: Third Finance Ministers and Central Bank Governors Meeting’, Communique, <https://www.g20.org/wp-content/uploads/2021/07/Communique-Third-G20-FM-CBG-meeting-9-10-July-2021.pdf>.

¹³⁰ Italian G20 Presidency: Third Finance Ministers and Central Bank Governors Meeting (2021), ‘Annex I: An Independent Review of the Multilateral Development Banks’ Capital Adequacy Frameworks – Terms of reference’, <https://www.g20.org/wp-content/uploads/2021/07/Annex-I-An-Independent-Review-of-MDBs-Capital-Adequacy-Frameworks-ToR.pdf>.

¹³¹ Finance Ministers of the Vulnerable 20 (2021), ‘1st Climate Vulnerables Finance Summit’, Communique, <https://www.v-20.org/activities/ministerial/1st-climate-vulnerables-finance-summit-communique>.

¹³² Scott and Veroit (2021), *Surpassing the \$100 billion: Achieving a climate finance plan at scale to rebuild trust*.

At the UK-convened COP26 ministerial in late July, Germany and Canada were tasked with leading the work on developing the plan.¹³³ The publication date of the roadmap is yet to be announced.

The \$100 billion finance goal will play an important role ahead of – and at – COP26, potentially impacting the negotiations in a range of areas,¹³⁴ the ambition of developing country mitigation pledges,¹³⁵ and trust between partners.¹³⁶ The current goal covers the 2020–24 period, but at COP26 the deliberations on a new, post-2025, climate finance goal are due to be initiated. The signatories of the Paris Agreement have agreed that the new goal shall be quantifiable, that the \$100 billion shall serve as a floor, and that the needs and priorities of developing countries shall be taken into account.¹³⁷ At the UK-convened ministerial in July, participants expressed their support for formulating a plan for the negotiations.¹³⁸

Scaling up adaptation

Strengthening the ability to adapt to climate change impacts and build resilience are key priorities for climate-vulnerable developing countries.¹³⁹ Often the discussions on adaptation are closely tied to those around finance.¹⁴⁰ In 2017–18, around \$30 billion per year was invested in adaptation.¹⁴¹ Though this represents an increase of 36 per cent¹⁴² compared to 2015–16, the adaptation finance gap remains large¹⁴³ and by 2030 adaptation financing needs in developing countries alone could reach up to \$300 billion per year.¹⁴⁴ The Paris Agreement states that, ‘[t]he provision of scaled-up financial resources should aim to achieve a balance between adaptation and mitigation’,¹⁴⁵ and attaining a 50:50 split has long been an important priority for climate-vulnerable developing countries. Despite this, the OECD estimates that mitigation finance still accounted for around two-thirds of the finance contributing to efforts towards the \$100 billion goal in 2019.¹⁴⁶

¹³³ Sharma, A. (2021), ‘Alok Sharma welcomes constructive discussions after more than 50 countries came together ahead of COP26’, speech, 26 July 2021, <https://www.gov.uk/government/speeches/alok-sharma-welcomes-constructive-discussions-after-more-than-50-countries-came-together-ahead-of-cop26>.

¹³⁴ Early (2021), ‘As COP26 draws closer, climate negotiators are still stuck on finance’.

¹³⁵ Scott and Vernoit (2021), *Surpassing the \$100 billion: Achieving a climate finance plan at scale to rebuild trust*; Mayank, B. (2021), ‘India says to exceed emission cut targets, further reduction hinges on climate fund’,

Reuters, 20 August 2021, <https://www.reuters.com/world/india/india-says-exceed-emission-cut-targets-further-reduction-hinges-climate-fund-2021-08-20>; Environment ministers of the BASIC countries (2021), ‘Joint statement issued at the conclusion of the 30th Ministerial Meeting on Climate Change hosted by India on the 8th April 2021’, 8 April 2021, https://www.environment.gov.za/mediarelease/basic_ministerialmeeting_climatechange_india.

¹³⁶ Bhattacharya, Calland, Averchenkova, Gonzalez, Martinez-Diaz, and Van Rooij (2020), *Delivering the \$100 billion Climate Finance Commitment and Transforming Climate Finance*; Sharma (2021), ‘Pick the Planet’.

¹³⁷ UNFCCC (2016), *Report of the Conference of the Parties on its twenty-first session, held in Paris from 30 November to 13 December 2015*, p. 2, <https://unfccc.int/resource/docs/2015/cop21/eng/10a01.pdf#page=2>.

¹³⁸ UK Government (2021), *July Ministerial Chair’s Summary*.

¹³⁹ Chatham House (2021), ‘Managing the Impacts of Climate Change’, The Climate Briefing Podcast, 27 April 2021, <https://www.chathamhouse.org/2021/04/climate-briefing-managing-impacts-climate-change>.

¹⁴⁰ Evans and Gabbatiss (2021), ‘UN climate talks: Key outcomes from the June 2021 virtual conference’.

¹⁴¹ Only parts of this finance count towards the \$100 billion goal; Buchner, B., Clark, A., Falconer, A., Macquarie, R., Meattle, C., Tolentino, R. and C. Wetherbee (2019), ‘Global Landscape of Climate Finance 2019’, Climate Policy Initiative, <https://www.climatepolicyinitiative.org/publication/global-landscape-of-climate-finance-2019>.

¹⁴² Ibid.

¹⁴³ Global Centre on Adaptation (2020), *State and Trends in Adaptation Report 2020*, Rotterdam: The Global Centre on Adaptation.

¹⁴⁴ Ibid.

¹⁴⁵ UN (2015), *Paris Agreement*.

¹⁴⁶ OECD (2021), *Climate Finance Provided and Mobilised by Developed Countries: Aggregate Trends Updated with 2019 Data*.

Ahead of COP26, climate-vulnerable nations are calling on developed countries in the \$100 billion delivery plan to clarify how the 50:50 adaptation–mitigation balance will be achieved.¹⁴⁷ They are also demanding that at least 5 per cent of proceeds generated by carbon trading under Article 6 of the Paris Agreement be allocated to adaptation efforts.¹⁴⁸

Article 7 of the Paris Agreement established the ‘global goal on adaptation’ with the aim of driving collective action on adaptation, but does not specify how it should be operationalized. Since COP21, there have been discussions around how to further define the goal, but progress has been slow.¹⁴⁹ At the UK-convened July Ministerial on COP26, participants expressed their support for the development of a roadmap or work programme for assessing progress on the global goal on adaptation, and the incoming COP president conveyed they would explore the proposal.¹⁵⁰

Political space and support for loss and damage

Loss and damage (i.e. economic and non-economic harms caused by climate change impacts that cannot be avoided through adaptation and mitigation) is a core priority of many developing countries ahead of COP26.¹⁵¹ At COP25 in Madrid, parties agreed to establish the ‘Santiago Network’ on loss and damage, which aims to catalyse technical assistance for addressing loss and damage to governments and organizations in developing countries.¹⁵² Since the Madrid summit, a website for the Santiago Network has been set up, but climate vulnerable nations have been adamant that an online presence alone will not suffice. The COP25 and COP26 presidencies are conducting consultations on how to further operationalize the Santiago Network, and making substantial progress in these discussions ahead of COP26 would be an important loss and damage deliverable.

Developing countries are, however, calling for action on loss and damage in the run-up to and during COP26 that goes beyond the operationalization of the Santiago Network. Key requests include establishing loss and damage as a stand-alone agenda item under the subsidiary bodies; clarifying the governance of the Warsaw International Mechanism for Loss and Damage (WIM); appointing a loss and damage special envoy; and enhancing the provision of loss and damage

¹⁴⁷ Finance Ministers of the Vulnerable 20 (2021), ‘1st Climate Vulnerables Finance Summit’.

¹⁴⁸ Ibid.

¹⁴⁹ Farand, C. (2021), ‘South Africa proposes global goal for adaptation at pre-COP26 ministerial’, Climate Home News, 27 July 2021, <https://www.climatechangenews.com/2021/07/27/south-africa-proposes-global-goal-adaptation-pre-cop26-ministerial>; Power Shift Africa (2021), ‘COP26: Delivering the Paris Agreement. A five-point plan for solidarity, fairness and prosperity’, <https://powershiftafrica.org/cop-26-a-five-point-plan-for-solidarity-prosperity-and-fairness>; Beauchamp, E., da Silva Bernardo, C. and del Pilar Bueno, M. (2021), *Progressing the Global Goal on Adaptation – Key issues*, IIED Briefing, <https://pubs.iied.org/sites/default/files/pdfs/2021-01/17773IIED.pdf>.

¹⁵⁰ UK Government (2021), *July Ministerial Chair’s Summary*.

¹⁵¹ Kreienkamp, J. and Vanhala, L. (2017), ‘Climate change loss and damage’, Policy brief, Global Governance Institute, University College London, <https://www.ucl.ac.uk/global-governance/sites/global-governance/files/policy-brief-loss-and-damage.pdf>; Huq, S. (2021), ‘Dealing with loss and damage in COP26’, Column, the Daily Star, <https://www.thedailystar.net/opinion/politics-climate-change/news/dealing-loss-and-damage-cop26-2041965>; Power Shift Africa (2021), ‘COP26: Delivering the Paris Agreement. A five-point plan for solidarity, fairness and prosperity’; Climate Vulnerable Forum (2021), ‘Climate Vulnerables’ Manifesto for COP26 – CVF’, <https://thecvf.org/activities/program/cvfmanifestocop26>.

¹⁵² UNFCCC (2021), ‘About the Santiago Network’, <https://unfccc.int/santiago-network/about>.

finance (as separate from and additional to mitigation and adaptation finance).¹⁵³ Some nations are also calling for the establishment of a dedicated loss and damage funding stream.¹⁵⁴

Box 4. The importance of supporting a green recovery in developing countries

As of September 2021, only 2.2 per cent of people in low-income countries had received at least one COVID-19 vaccine dose.¹⁵⁵ The UN estimates, moreover, that COVID-19 has pushed between 119 million and 124 million people back into poverty and chronic hunger, and that an equivalent of 255 million full-time jobs have been lost as a result of the pandemic.¹⁵⁶ Half of all low-income countries are assessed to be in debt distress or at high risk of debt distress, according to the IMF.¹⁵⁷

Accelerating climate action in developing countries is closely linked to vaccine roll-out and economic recovery,¹⁵⁸ and the stark inequity in the global distribution of vaccines is strengthening North–South division, which is spilling over into the climate talks.¹⁵⁹ While not being pure climate policy instruments, measures that aim to boost global vaccine distribution and enhance fiscal space in developing countries are likely to have significant implications for the possibilities of achieving a high-ambition outcome at COP26, and for the implementation of climate pledges. Indeed, a report endorsed by almost 100 developing countries states that ‘a failure to deliver adequate support ... in the form of vaccinations and debt relief will send a signal to poorer countries that they are and will be alone when climate impacts bite harder’.¹⁶⁰

Since the pandemic emerged, important steps have been taken to improve fiscal space in developing countries. These include the ‘G20 Debt Service Suspension Initiative’ (DSSI), which enables the world’s poorest countries to request a temporary suspension of their debt payments,¹⁶¹ and the ‘G20 Common Framework on Debt Treatment Beyond the DSSI’ (the Common Framework), which brings together G20 and Paris Club creditors to consider requests for debt treatment (including debt

¹⁵³ Power Shift Africa (2021), ‘COP26: Delivering the Paris Agreement. A five-point plan for solidarity, fairness and prosperity’; Climate Vulnerable Forum (2021), ‘Climate Vulnerables’ Manifesto for COP26 – CVF’, <https://thecvf.org/activities/program/cvfmanifestocop26>.

¹⁵⁴ UK Government (2021), *July Ministerial Chair’s Summary*.

¹⁵⁵ Our World in Data (2021), ‘Coronavirus (COVID-19) Vaccinations’, <https://ourworldindata.org/covid-vaccinations>.

¹⁵⁶ UN (2021), *The Sustainable Development Goals Report 2021*, New York: United Nations, <https://reliefweb.int/report/world/sustainable-development-goals-report-2021>.

¹⁵⁷ IMF (2021), ‘List of LIC DSAs for PRGT-eligible countries – As of June 30, 2021’, <https://www.imf.org/external/pubs/ft/dsa/dsalist.pdf>.

¹⁵⁸ Banerjee, A. and Duflo, E. (2021), ‘If we can vaccinate the world, we can beat the climate crisis’, *Guardian*, 5 June 2021, <https://www.theguardian.com/commentisfree/2021/jun/05/poorer-nations-climate-promises-vaccines-vaccinating-covid>.

¹⁵⁹ Early (2021), ‘As COP26 draws closer, climate negotiators are still stuck on finance’; Banerjee and Duflo (2021), ‘If we can vaccinate the world, we can beat the climate crisis’; Vaisse, J. (2021), ‘The Vaccination Gap is Jeopardizing Climate Action’, Project Syndicate, 24 March 2021, <https://www.project-syndicate.org/commentary/covid19-vaccines-climate-global-solidarity-package-by-justin-vaissse-2021-03>.

¹⁶⁰ Power Shift Africa (2021), ‘COP26: Delivering the Paris Agreement. A five-point plan for solidarity, fairness and prosperity’.

¹⁶¹ World Bank (2021), ‘Debt Suspension Initiative’, <https://www.worldbank.org/en/topic/debt/brief/covid-19-debt-service-suspension-initiative>.

restructuring) by eligible countries.¹⁶² In August 2021, the Board of Governors of the International Monetary Fund (IMF) also approved the largest allocation of special drawing rights (SDRs) in the fund's history, with the aim of boosting global liquidity.¹⁶³ At the G7 Summit in Carbis Bay, leaders pledged 870 vaccine doses to the poorest countries, bringing the total number of doses committed by the group at the time to 2 billion.¹⁶⁴ Further doses were pledged at the 'Global COVID-19 Summit', hosted by President Biden at the sidelines of the 76th Session of the UNGA.¹⁶⁵

More will, however, be needed to help developing countries emerge from the health and economic devastation brought about by COVID-19. Important steps that can be taken ahead of COP26 include:

- further pledges to provide vaccines to the poorest countries, and accelerate actual vaccine delivery, to meet the World Health Organization's goal of vaccinating 40 per cent of the population of all countries by the end of 2021, and 70 per cent by mid-2022.¹⁶⁶
- commitments by developed countries to reallocate a substantial proportion of their SDRs in favour of developing countries, through donations to the IMF's proposed 'Resilience and Sustainability Trust' or the fund's 'Poverty Reduction and Growth Facility'; and
- commitments by developed countries to increase the provision of climate finance in the form of grants, rather than loans, to the poorest nations.

At COP26, parties could pass a resolution encouraging developed country governments to undertake additional measures to enhance fiscal space in developing countries.¹⁶⁷

¹⁶² Italian Ministry of Economy and Finance (2021), 'The Common Framework for debt treatment beyond the DSSI', <https://www.mef.gov.it/en/G20-Italy/common-framework.html>.

¹⁶³ IMF (2021), 'IMF Governors Approve a Historic US\$ 650 Billion SDR Allocation of Special Drawing Rights', press release, 2 August 2021, <https://www.imf.org/en/News/Articles/2021/07/30/pr21235-imf-governors-approve-a-historic-us-650-billion-sdr-allocation-of-special-drawing-rights#:~:text=IMF%20Governors%20Approve%20a%20Historic%20US%24650%20Billion%20SDR,on%20August%20%2C%202021%2C%20to%20boost%20global%20liquidity>.

¹⁶⁴ G7 (2021), *Carbis Bay G7 Summit Communique*; WHO (2021), 'G7 announces pledges of 870 million COVID-19 vaccine doses, of which at least half will be delivered by the end of 2021', joint news release, 13 June 2021, <https://www.who.int/news/item/13-06-2021-g7-announces-pledges-of-870-million-covid-19-vaccine-doses-of-which-at-least-half-to-be-delivered-by-the-end-of-2021>.

¹⁶⁵ The White House (2021), 'Global COVID-19 Summit: Ending the pandemic and building back better', Briefing room, statements and releases, 24 September 2021, <https://www.whitehouse.gov/briefing-room/statements-releases/2021/09/24/global-covid-19-summit-ending-the-pandemic-and-building-back-better>.

¹⁶⁶ Ghebreyesus, T. A. (2021), 'Global commitments on COVID-19 offer way forward but success depends on action being taken now', statement, 24 September 2021, <https://www.who.int/news/item/24-09-2021-global-commitments-on-covid-19-offer-way-forward-but-success-depends-on-action-being-taken-now>.

¹⁶⁷ Power Shift Africa (2021), 'COP26: Delivering the Paris Agreement. A five-point plan for solidarity, fairness and prosperity'.

Achieving a positive COP26 outcome

Scaling up action on climate finance, adaptation, and loss and damage is critical for supporting climate-vulnerable nations, restoring trust among parties and raising ambition. These issues are core components of an ambitious, balanced and equitable outcome at COP26.

Developed countries need to do more to honour the \$100 billion goal. The new US pledge is a critical step in the right direction, but even if the new funds are approved by Congress – which is by no means certain – the increase may only materialize in 2024.¹⁶⁸ Given the 2020 shortfall, and a possible shortfall in 2021,¹⁶⁹ developed countries should mobilize more than \$100 billion per year in 2022–24, so that the total over the five-year period reaches at least \$500 billion. The roadmap Canada and Germany are developing is critical for restoring trust and credibility, but the plan must be published ahead of COP26 to inject positive political dynamism in the climate talks. It is, furthermore, important that the plan is as concrete and detailed as possible. In addition to showing ‘who will do what’, it should ideally clarify how key concerns related to the quality and composition of finance will be addressed¹⁷⁰ and lay out a credible pathway for scaling up adaptation finance, the mobilization of which should rise to at least \$50 billion per year as soon as possible.

It is, moreover, important that substantial progress is made in the negotiations on a post-2025 finance goal. Given that the process needs to be concluded before the end of 2024, and that the negotiations are likely to be tricky, it is crucial that parties agree on a roadmap for the process, which would include a timeline and concrete milestones. The Paris Agreement’s ‘global goal on adaptation’ is unacceptably vague and further operationalizing it may help elevate the profile of adaptation in the UNFCCC discussions, accelerate action on adaptation, facilitate the review of adaptation activities in the global stocktake, and build trust among countries. All will not be finalized during COP26, but parties can and should aim to agree on a roadmap or work programme to guide the future process.

It is essential that the Glasgow summit – and upcoming COPs – provide a platform for meaningful discussions on loss and damage, including finance.

With climate impacts causing increasingly severe destruction, it is essential that the Glasgow summit – and upcoming COPs – provide a platform for meaningful discussions on loss and damage, including finance. At COP26, developing and developed country governments can advance the discussion at the political level through statements and declarations, and by holding informal meetings, workshops, and events, for instance, during the ‘Adaptation and Resilience, Loss and Damage Day’ organized by the COP presidency. An important aim

¹⁶⁸ McGrath, M. and Harrabin R. (2021), ‘Climate change: whisper it cautiously... there’s been progress in the run up to COP26’, BBC News, 25 September 2021, https://www.bbc.co.uk/news/science-environment-58678937?at_medium=RSS&at_campaign=KARANGA; Harvey (2021), ‘Developing nations welcome US climate finance pledge but warn more is needed’.

¹⁶⁹ Harvey (2021), ‘Climate funding target for poorer countries ‘likely to be met’ by 2022’.

¹⁷⁰ Scott and Vernoit (2021), *Surpassing the 100 billion: achieving a climate finance plan at scale to rebuild trust*.

for the Glasgow COP could be to lay the groundwork for COP27, where more tangible outcomes should be achieved. Ahead of COP26, the UK government could appoint a loss and damage special envoy, who would build political bridges between parties, identify workable ways forward, liaise with the incoming COP27 presidency, and raise the profile of loss and damage in the UNFCCC process. Parties could also decide to establish a permanent loss and damage agenda item under the subsidiary bodies.

Making substantial progress on operationalizing the Santiago Network ahead of COP26 would, finally, be an important loss and damage deliverable. To effectively respond to the needs of developing countries, it is important that the network – at the very least – is hosted by a well-resourced secretariat. Developed countries can demonstrate good faith and build trust by pledging to contribute to the Santiago Network secretariat. To make progress on scaling up loss and damage finance more broadly it will likely be necessary to move away from narratives that emphasize liability and compensation towards one that frames the provision of such finance as a matter of solidarity with affected people and communities.¹⁷¹

¹⁷¹ Huq, S. (2021), 'Now is the time to focus on loss and damage from climate change', *The Daily Star*, 19 May 2021, <https://www.thedailystar.net/opinion/politics-climate-change/news/now-the-time-focus-loss-and-damage-climate-change-2094505>.

04 Advancing the Paris Rulebook

Advancing the Paris Rulebook, which provides the guidelines for parties to communicate their NDCs and to review progress individually and collectively, is vital to meeting Paris Agreement targets.

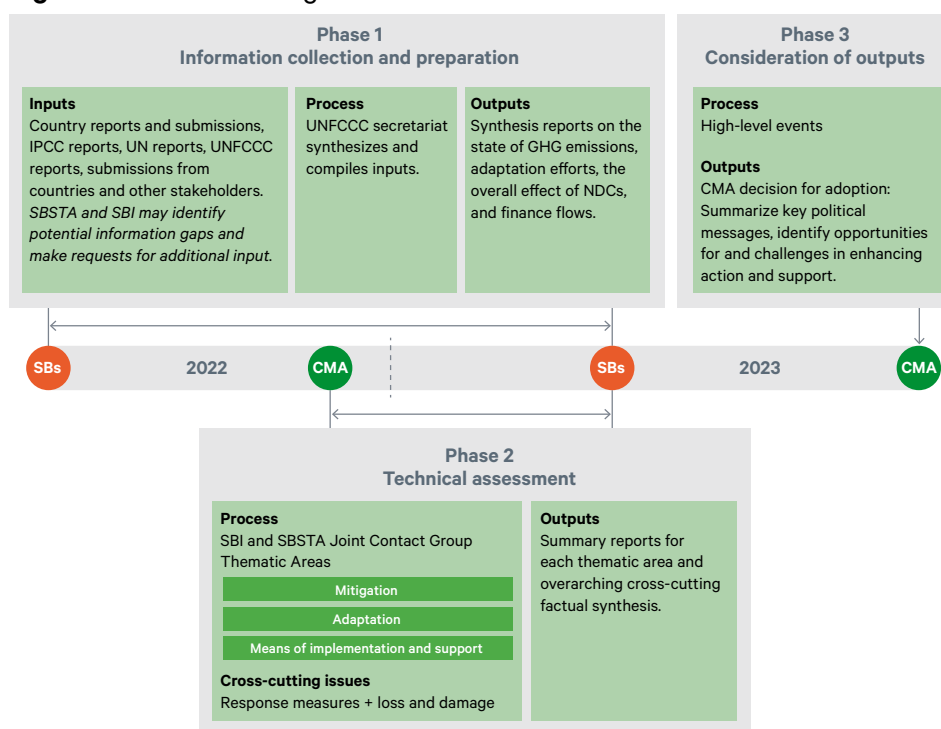
COP21 in Paris was a landmark achievement in international efforts to coordinate responses to climate change. Importantly, parties gave themselves three years until COP24 in 2018 to agree on guidelines – known as the Paris Rulebook – to implement the Paris Agreement. The Paris Agreement built a framework for action, while the rulebook outlines the processes and tools for implementation. Advancing the rulebook would provide valuable guidelines for how countries should communicate their NDCs and review progress, individually and collectively. Yet, disagreements between parties have resulted in delays to finalizing the rulebook. In 2018, parties at COP24 in Katowice, Poland, agreed on most of the content of the rulebook in what is known as the Katowice climate package, with important exceptions:¹⁷² refining the global stocktake; resolving disputes over Article 6; operationalizing an updated share of proceeds from carbon trading; agreeing on rules to avoid double counting; advancing transparency and governance; and establishing common time frames for NDCs.

¹⁷² UNFCCC (undated), 'The Katowice climate package: Making the Paris agreement work for all', <https://unfccc.int/process-and-meetings/the-paris-agreement/katowice-climate-package>.

Refining the global stocktake process

The global stocktake plays a ‘central role within the architecture of the Paris Agreement’ by providing a mechanism for increased ambition.¹⁷³ The stocktake is intended to inform future rounds of NDCs to increase the level of ambition, based on the collective global level of achievement towards carbon reduction goals. The first global stocktake will be completed in 2023. Parties agreed on the process for the global stocktake at COP24 (shown in Figure 4). However, several key issues remain undecided ahead of COP26. For instance, parties wish to refine the procedural elements of the stocktake as presently no timeline is established and the third phase, ‘consideration of outputs’, must be completed to effectively influence the national political agendas shaping the NDCs. While countries further agreed to consider ways to minimize the impacts of loss and damage, there is no pathway established to incorporate these efforts in the global stocktake.¹⁷⁴ Though the rulebook specifies the inputs for the global stocktake, scrutiny of the sources of information included in the stocktake will likely feature at COP26. Furthermore, despite a push for efforts to be assessed on the basis of equity, there is currently no agreement on how to evaluate equity outcomes in the stocktake process.

Figure 4. Phases of the global stocktake



Source: Adapted from World Resources Institute (undated), ‘Navigating the Paris Agreement Rulebook: Global Stocktake’, <https://www.wri.org/paris-rulebook>.

Note: SBs = subsidiary bodies; CMA = Conference of the Parties serving as the meeting of the Parties to the Paris Agreement; SBSTA = Subsidiary Body for Scientific and Technological Advice; SBI = Subsidiary Body for Implementation.

¹⁷³ Hermwille, L., Siemons, A., Forster, H. and Jeffrey, L. (2019), ‘Catalyzing mitigation ambition under the Paris Agreement: elements for an effective Global Stocktake’, *Climate Policy*, 19(8): pp. 988–1001. <https://doi.org/10.1080/14693062.2019.1624494>; Dagnet, Y. and Anderson, J. (2019), ‘How will the Paris Agreement’s global stocktake work?’, *World Resources Institute*, <https://www.wri.org/insights/how-will-paris-agreements-global-stocktake-work>.
¹⁷⁴ Winkler, H. (2019), ‘Putting equity into practice in the global stocktake under the Paris Agreement’, *Climate Policy*, 20(1): pp. 124–132, <https://www.tandfonline.com/doi/full/10.1080/14693062.2019.1680337>.

Resolving Article 6

Article 6 covers thorny issues around carbon markets and emissions trading; it is widely regarded as one of the most complex and least accessible concepts of the Paris Agreement.¹⁷⁵ Subsequently at the COP25 talks in Madrid in 2019, Article 6 became ‘one of the highest profile casualties of the negotiations’.¹⁷⁶ Varying disagreements on issues related to Article 6 since COP24 have led to retrenched negotiating positions, threatening potential progress at COP26. The president-designate of COP26, Alok Sharma, has reiterated the ‘UK’s objective of resolving long-standing divisions around Paris’ markets-governing Article 6 and agreeing a post-2020 rulebook for international emissions trading.’¹⁷⁷

Article 6 covers thorny issues around carbon markets and emissions trading; it is widely regarded as one of the most complex and least accessible concepts of the Paris Agreement.

Resolving disagreement on Article 6 at COP26 is important because it establishes the basis for the rules governing international carbon markets. Proponents argue that ‘linking’ international carbon markets – directly or indirectly connecting two or more carbon markets to create a larger market, ideally leading to efficiency gains – would allow countries seeking less expensive pathways to cut emissions, or countries that are unable to meet their NDC targets to purchase emissions reductions from other countries that have already cut emissions by more than their committed amounts.¹⁷⁸ The creation of carbon pricing systems and opportunities to transfer units of reduction may mobilize large-scale financing towards effective mitigation techniques, both at the sector and project level.¹⁷⁹ While some view Article 6 as a ‘make or break’ issue¹⁸⁰ or essential for the future of carbon markets,¹⁸¹ others suggest that a lack of UN agreement on carbon markets to date has not hindered the development of existing approaches using bilateral agreements to trade carbon.

¹⁷⁵ Kizzier, K., Levin, K. and Rambharos, M. (2019), ‘What you need to know about Article 6 of the Paris Agreement’, *World Resources Institute*, <https://www.wri.org/insights/what-you-need-know-about-article-6-paris-agreement>.

¹⁷⁶ Evans, S. and Gabbatiss, J. (2019), ‘COP25: Key outcomes agreed at the UN climate talks in Madrid’, *Carbon Brief*, <https://www.carbonbrief.org/cop25-key-outcomes-agreed-at-the-un-climate-talks-in-madrid>.

¹⁷⁷ Frank, S. (2021), ‘The Lengthened and Stony Road to Glasgow’, *Carbon Market Watch*, <https://carbonmarketwatch.org/2021/01/28/the-lengthened-and-stony-road-to-glasgow>; ministers from Norway and Singapore have agreed to continue consulting informally on Article 6 with other ministers.

¹⁷⁸ Schneider, L. and La Hoz Theuer, S. (2018), ‘Environmental integrity of international carbon market mechanisms under the Paris Agreement’, *Climate Policy*, 19(3): pp. 386–400, <https://www.tandfonline.com/doi/full/10.1080/14693062.2018.1521332>.

¹⁷⁹ Green, J. (2017), ‘Don’t link carbon markets’, *Nature*, 543: pp. 484–468, <https://www.nature.com/articles/543484a>.

¹⁸⁰ Evans, S. and Gabbatiss, J. (2019), ‘In-depth Q&A: How Article 6 Carbon Markets could ‘make or break’ the Paris Agreement’, *Carbon Brief*, <https://www.carbonbrief.org/in-depth-q-and-a-how-article-6-carbon-markets-could-make-or-break-the-paris-agreement>.

¹⁸¹ Climate Finance Innovators (2020), *Article 6 Piloting: State of Play and Stakeholder Experiences*, https://www.climatefocus.com/sites/default/files/Climate-Finance-Innovators_Article-6-piloting_State-of-play-and-stakeholder-experiences_December-2020.pdf.

Currently, some 40 countries and 20 cities or states use carbon pricing mechanisms, covering around 13 per cent of global annual GHG emissions.¹⁸² There are two main types of carbon pricing: emissions trading systems (ETS) and carbon taxes.¹⁸³ While emissions trading systems have proved popular, new and complementary forms of standards and regulations are also emerging.¹⁸⁴ For instance, the EU intends to implement a carbon border adjustment mechanism (CBAM) – a cornerstone of the European Green Deal – which seeks to address ‘carbon leakage’ whereby companies relocate production to countries with less strict emissions standards.¹⁸⁵ Policymakers in some countries are reluctant to adopt carbon taxes, preferring alternative approaches such as low-carbon subsidies or fee rebates for low-carbon practices.¹⁸⁶ Compared with mandatory carbon markets covering specific industry sectors and GHGs, voluntary carbon markets may be accessed by any sector of the economy to offset emissions by purchasing credits, which has led to a boom in demand.¹⁸⁷

Article 6 has three operative paragraphs, two of which are about carbon markets and one is about non-market approaches to NDC implementation. These paragraphs broadly establish key concepts but have yet to be agreed upon. Article 6 instituted two international carbon markets through cooperative approaches (Articles 6.2 to 6.3) and the sustainable development mechanism, or SDM (Articles 6.4 to 6.7).¹⁸⁸ Cooperation under Article 6 may help parties achieve their NDCs and enhance the ambition of their mitigation targets. Around 50 per cent of parties have indicated they intend to use international carbon markets in the post-2020 period.¹⁸⁹

The exchange of carbon units is a feature that underpins the internationally transferred mitigation outcomes (ITMOs) – a proxy term for transferred emissions reduction units for international emissions trading between parties to the Paris Agreement – to ensure appropriate accounting.¹⁹⁰ To outline the concept, the Kyoto Protocol established two commitment periods for developed country participants – the first from 2008 to 2012, and the second from 2013 to 2020. During these periods, parties commit to specific reductions of GHG emissions. Parties with commitments under the Kyoto Protocol accepted targets to limit or reduce national emissions, expressed as levels of allowed emissions divided into ‘assigned amount

¹⁸² World Bank (2020), *State and Trends of Carbon Pricing 2020*, Washington, DC: World Bank, <https://openknowledge.worldbank.org/handle/10986/33809>.

¹⁸³ Carattini, S., Carvalho, M. and Fankhauser, S. (2018), ‘Overcoming public resistance to carbon taxes’, *WIREs Climate Change*, 9(5), <https://onlinelibrary.wiley.com/doi/full/10.1002/wcc.531>.

¹⁸⁴ Keating, D. (2020), *On carbon pricing, policymakers are now thinking beyond emissions trading*, Euractiv, <https://www.euractiv.com/section/energy/news/on-carbon-pricing-policymakers-are-now-thinking-beyond-emissions-trading>.

¹⁸⁵ Bausch, C. (2021), ‘Green Deal Reloaded – Bridging Divides over the Carbon Border Adjustment Mechanism’, *Institut Montaigne*, <https://www.institutmontaigne.org/en/blog/green-deal-reloaded-bridging-divides-over-carbon-border-adjustment-mechanism>.

¹⁸⁶ Carattini, S., Carvalho, M. and Fankhauser, S. (2017), *How to make carbon taxes more acceptable*, London School of Economics, Grantham Research Institute on Climate Change and the Environment, <https://www.lse.ac.uk/GranthamInstitute/wp-content/uploads/2017/12/How-to-make-carbon-taxes-more-acceptable.pdf>.

¹⁸⁷ Streck, C. (2020), ‘The mirage of Madrid: elusive ambition on the horizon’, *Climate Policy*, 20(2): pp. 143–148, <https://www.tandfonline.com/doi/full/10.1080/14693062.2020.1726564>.

¹⁸⁸ UNFCCC (2015), *Paris Agreement*.

¹⁸⁹ Chen, Y. D., Cai, W. J. and Wang, C. (2018), ‘The characteristics of intended nationally determined contributions’ (Chinese), *Climate Change Res.*, 14 (3): pp. 79–86, <http://www.climatechange.cn/EN/10.12006/j.issn.1673-1719.2017.124>.

¹⁹⁰ Streck (2020), ‘The mirage of Madrid: Elusive ambition on the horizon’.

units' (AAUs).¹⁹¹ The protocol also established certified emissions reductions (CERs) as an emissions unit under the clean development mechanism (CDM) to help developing countries achieve sustainable development.

Currently, there is no legal basis to 'carry over' or transfer pre-2021 units from the Kyoto Protocol to count towards Paris Agreement targets, as the protocol and agreement are separate treaties.¹⁹² Within the protocol's legal framework, underlying reductions or carryover of units beyond the 2013–20 commitment period are not permitted. Nor may AAUs or CERs be carried over into other commitment periods. Because the supply of CERs vastly exceeds demand, prices under Article 6 would be very low if CERs were allowed to transfer. Additionally, the combined quantity of existing CERs and AAUs is so great that it could undermine the current level of ambition under Paris, which is already failing to meet the agreement's goals of holding warming below 1.5°C. In other words, if previous credits could be carried over, markets would be awash with them, which would drive down the impetus to undertake mitigation action.

Some countries are reluctant to 'lose' previous offsets, because to do so would mean reducing their commitments and potentially diluting the effectiveness of future mechanisms.

Yet some countries are reluctant to 'lose' previous offsets, because to do so would mean reducing their commitments and potentially diluting the effectiveness of future mechanisms. At COP25 in Madrid, China, India and Brazil pushed for Kyoto-era carbon credits to be allowed to transition under the Article 6.4 mechanism due to their large volume of issued and available CERs. Both the EU and climate-vulnerable countries have resisted the transition of Kyoto units, arguing that CERs would undermine ambition. According to an assessment by think-tank Climate Analytics, if Australia uses its surplus AAUs and China and Brazil use their CERs to meet domestic NDCs, this would reduce global ambition by 25 per cent.¹⁹³ As a result, the projects issuing CERs would no longer be compliant with a core principle of voluntary markets: additionality, which requires any mitigation activity considered for a market-based mechanism to show that the corresponding emissions reductions would not have happened in the absence of the mechanism.¹⁹⁴ For this reason, transferring units presents a problem as it may not represent actual emissions reductions and could compromise the global carbon market.

¹⁹¹ UNFCCC (2021), 'Registry Functions', <https://unfccc.int/process/the-kyoto-protocol/registry-systems/registry-functions>.

¹⁹² Climate Analytics Australia (2019), *Australia's proposed 'Kyoto carryover' – nature, scale, implications, legal issues and environmental integrity of the Paris Agreement*, https://climateanalytics.org/media/report_australia_kyoto_carryover_dec2019.pdf.

¹⁹³ Fernyhough, J. and Fowler, E. (2019), 'The countries with the biggest hoard of Kyoto credits', *Financial Review*, <https://www.afr.com/policy/energy-and-climate/the-countries-with-the-biggest-hoard-of-kyoto-credits-20191216-p53kay>.

¹⁹⁴ Michaelowa, A., Hermwille, L., Obergassel, W. and Butzengeiger, S. (2019), 'Additionality revisited: guarding the integrity of market mechanisms under the Paris Agreement', *Climate Policy*, 19(10): pp. 1211–1224, <https://www.tandfonline.com/doi/full/10.1080/14693062.2019.1628695>.

Related to the question of unit transfers is that of credits from the CDM transition. Importantly, Article 6.4 establishes the SDM that builds on and shares features with Kyoto mechanisms, particularly the CDM and joint implementation.¹⁹⁵ The CDM operated under the Kyoto Protocol, which created legally binding emissions targets for six of the main GHGs in developed countries from 2008 to 2012.¹⁹⁶ Now, however, all states have binding emissions targets, not just industrialized countries. This presents an issue as developing countries will have fewer credits to sell and should not be deprived of this less expensive mechanism for emissions reductions.¹⁹⁷ Therefore, the SDM must both deliver an overall reduction in emissions and advance sustainable development within the broader 2030 sustainable development agenda, particularly the SDGs.

Operationalizing the share of proceeds

Another unresolved issue is around ‘share of proceeds’ (SOP) as defined by Article 6.6, which are taxes on carbon market mechanism activities. Operationalizing SOP would allocate a portion of proceeds from the trade of voluntary carbon credits to help developing countries in their adaptation and mitigation efforts. Under the CDM of the Kyoto Protocol, a monetary SOP was levied on credit issuance (an ‘administrative SOP’) and an in-kind SOP of 2 per cent on issued carbon credits was allocated to the Adaptation Fund (an ‘adaptation SOP’).¹⁹⁸

Now that the CDM will be replaced by the SDM, the question for COP26 negotiators is whether the SOP will be applied to the centralized SDM market or to all trading, including bilateral agreements.¹⁹⁹ The Paris Agreement establishes SOP in Article 6.6 to be generated from activities undertaken through mechanisms in Article 6.4, the central UN mechanism to trade credits from emissions reductions generated by designated projects;²⁰⁰ it is silent regarding SOP for Article 6.2, which establishes a framework for cooperative market approaches. At Katowice, negotiations reached a stalemate between party alliances seeking to extend the SOP to Article 6.2 (including the Africa Group, the Arab Group, LDCs and like-minded developing countries), with other party alliances including the Umbrella Group and the EU opposing.²⁰¹ Though parties agree on levying a monetary and in-kind SOP for Article 6.4, other issues remain, including: how to levy the SOP; the percentage of the tax; how to convert credits into revenues; how to utilize the proceeds; and

¹⁹⁵ Carbon Market Watch (2017), ‘Building blocks for a robust Sustainable Development Mechanism’, Carbon Market Watch Policy Brief, https://carbonmarketwatch.org/wp-content/uploads/2017/05/BUILDING-BLOCKS-FOR-A-ROBUST-SUSTAINABLE-DEVELOPMENT-MECHANISM_WEB-SINGLE_FINAL.pdf.

¹⁹⁶ UNFCCC (undated), ‘Kyoto Protocol: Targets for the first commitment period’, <https://unfccc.int/process-and-meetings/the-kyoto-protocol/what-is-the-kyoto-protocol/kyoto-protocol-targets-for-the-first-commitment-period>.

¹⁹⁷ Frank (2021), ‘The Lengthened and Stony Road to Glasgow’.

¹⁹⁸ Michaelowa, A., Greiner, S., Espelage, A., Hoch, S. and Kramer, N. (2019), *Operationalizing the share of proceeds for Article 6*, Climate Finance Innovators, https://www.climatefinanceinnovators.com/wp-content/uploads/2019/06/Operationalizing-the-SoP_web.pdf.

¹⁹⁹ Farand, C. (2019), ‘What is Article 6? The issue climate negotiators cannot agree’, Climate Home News, <https://www.climatechangenews.com/2019/12/02/article-6-issue-climate-negotiators-cannot-agree>.

²⁰⁰ Kizzier, Levin and Rambharos (2019), ‘What you need to know about Article 6 of the Paris Agreement’.

²⁰¹ For list of countries included in each of these groupings under the UNFCCC please see, UNFCCC (2021), ‘Party Groupings’, <https://unfccc.int/process-and-meetings/parties-non-party-stakeholders/parties-party-groupings>.

the relative size of monetary versus in-kind SOP.²⁰² These different options carry technical implications, some of which are best resolved at the UN level to avoid protracted and fragmented bilateral negotiations.

Resolving the ‘double counting’ issue

Accounting rules present a technical challenge considering the varied character of NDCs, which cover different time frames and may cover different sectors and GHGs across countries. Two Articles – 6.2 and 6.4 – pose immediate political roadblocks. The core question up for debate at COP26 is how to account for trade between countries that have different types of NDCs that vary in their emissions budget time frames. As countries exchange reductions, a single tonne of CO₂ could be ‘double counted’ by multiple entities, complicating target setting and reporting. Trading under Article 6.2 could then allow countries to meet a single-year target without actually cutting emissions, if the accounting is not conducted adequately. Additionally, tensions around double counting are focused on international carbon trading in Article 6.4 related to ‘corresponding adjustments’. However, increasing the volume of trade with private capital without reciprocal improvements in public policy risks undermining the negotiations. High-profile efforts, such as the Taskforce on Scaling Voluntary Carbon Markets, may ‘miss the mark’ by failing to deliver what carbon credits are meant to: reduce or remove CO₂ from the atmosphere.²⁰³ The current text includes several approaches for parties to choose from for their accounting mechanisms, and allows for further approaches to be put forward in the future.

Securing transparency

Closely tied to the issue of double counting is the question of transparency. Since the Paris Agreement does not have compliance and enforcement measures, transparency is a critical component for enabling accountability and trust, as established in Article 13. The language of transparency is also embedded in Article 6, which requires that parties ‘ensure environmental integrity and transparency, including in governance’. Now, the role of the COP process is to define what constitutes an acceptable way to show ‘robust accounting’ particularly to avoid double counting and to ensure accuracy in reporting on mitigation outcomes.

NDCs represent the fundamental basis of Paris Agreement commitments and NDC accounting is foundational for conducting the global stocktake. Therefore, the headline dispute to resolve at COP26 is regarding paragraph 77(d) under

²⁰² S&P Global (2021), ‘Uncertainty around Article 6 of Paris Agreement holds back new carbon markets’, <https://www.spglobal.com/platts/en/market-insights/latest-news/electric-power/061421-uncertainty-around-article-6-of-paris-agreements-holds-back-new-carbon-projects>; Michaelowa, Greiner, Espelage, Hoch and Kramer (2019), *Operationalizing the share of proceeds for Article 6*.

²⁰³ Mitchell-Larson, E. (2020), ‘Right topics, wrong emphasis: the Carney Taskforce on carbon offsetting misses the mark’, Smith School, University of Oxford, <https://www.smithschool.ox.ac.uk/news/articles/201211-right-topics-wrong-emphasis.html>; Voluntary Carbon Markets Integrity Initiative (undated), ‘Accelerating credible net-zero climate action’, <https://vcmintegrity.org>.

the transparency framework, which outlines an approach to avoid double counting under Article 6.2, referring to emissions but not to NDC accounting. This issue resulted in a deadlock at COP24, with some countries rejecting the idea that NDCs must be expressed as a 'CO₂e', or carbon dioxide equivalent, which they perceived as violating the bottom-up nature of the Paris Agreement that allows countries to choose their own NDC metrics.²⁰⁴ The way CO₂e is calculated is contested and has significant implications for certain sectors; without transparent guidelines, there is a risk of a carbon accounting system that does not lead to emissions reductions. Though parties agreed in the rulebook to adopt global warming potentials (GWP100)²⁰⁵ as the common metric to report CO₂e emissions, under the UNFCCC, developed and developing countries are treated differently in how methane is calculated: developed countries report emissions using GWP100 values from the IPCC's Fourth Assessment Report (25 times the impact) while developing countries use values from the Second Assessment Report (21 times the impact).²⁰⁶ The assessments (21 times versus 25 times the impact) differ because GWP values are updated with new scientific estimates of the lifetime of the gas or changing atmospheric concentrations that influence the energy absorption of 1 additional tonne of gas relative to another.²⁰⁷ Consequently, there is a discrepancy in the metrics used for Paris reporting and for reporting under the UNFCCC.²⁰⁸ However, without a common unit of reporting, comparative assessments of ambition are more difficult to gauge. In the absence of comparable and complete information, assessing the adequacy of action and holding parties accountable under the current transparency framework is made more challenging.²⁰⁹

Establishing common time frames

Establishing common time frames is considered by some as the 'most underrated and misunderstood' issue in climate talks as it has significant bearing on the underlying discussion on raising ambition and enhancing pledges.²¹⁰ While climate action is continuous, time frames serve as checkpoints for when ambition may be increased; therefore, the absence of a common time frame for reporting and

²⁰⁴ Asian Development Bank (2020), 'Decoding Article 6 of the Paris Agreement', <https://www.adb.org/sites/default/files/publication/664051/article6-paris-agreement-v2.pdf>.

²⁰⁵ Global Warming Potential (GWP) is a measure of how much energy the emissions of 1 tonne of a gas will absorb over a defined period of time, relative to the emission of 1 tonne of carbon dioxide. This measure is intended to allow comparisons of the global warming impacts of different GHGs, see US Environmental Protection Agency (2020), 'Understanding global warming potential', <https://www.epa.gov/ghgemissions/understanding-global-warming-potentials>. GWP100 sets the time frame at 100 years; with carbon dioxide set at a score of 1 and methane at 28, this means that methane is 28 times more potent than 1 kilogram of carbon dioxide over 100 years, see CLEAR Center (2020), 'For methane, GWP100 not measuring up', <https://clear.ucdavis.edu/blog/methane-gwp100-not-measuring>.

²⁰⁶ UNFCCC (1995), 'Global Warming Potentials – IPCC Second Assessment Report', <https://unfccc.int/process/transparency-and-reporting/greenhouse-gas-data/greenhouse-gas-data-unfccc/global-warming-potentials>.

²⁰⁷ US Environmental Protection Agency (2020), 'Understanding global warming potential'.

²⁰⁸ Evans and Gabbatiss (2019), 'COP25: Key outcomes agreed at the UN climate talks in Madrid'.

²⁰⁹ Weikmans, R., Asselt, H. van and Roberts, J. T. (2019), 'Transparency requirements under the Paris Agreement and their (un)likely impact on strengthening the ambition of nationally determined contributions (ndcs)', *Climate Policy*, 4: pp. 511–526, <https://unfccc.int/sites/default/files/resource/Weikmans%20van%20Asselt%20%20Roberts%20%282019%29%20Transparency.pdf>.

²¹⁰ Lutes, M. (2021), 'View: Common sense about common time frames in climate negotiations', *Economic Times*, <https://economictimes.indiatimes.com/news/international/world-news/view-common-sense-about-common-time-frames-in-climate-negotiations/articleshow/83428390.cms>.

action could create an imbalance in pressure across parties.²¹¹ COP24 established that from 2031, NDCs should cover a ‘common time frame’ with the length of the time frame to be decided later.²¹² However, COP25 discussions did not result in agreement on time frames, failing to select a five-year, 10-year, or hybrid choice.²¹³ The nature of the disagreement stems from some parties, including Russia and Japan, arguing that because NDCs are ‘nationally determined’, the time frame should be as well.²¹⁴ Other parties, predominately vulnerable and low-income countries including Brazil, are concerned that the longer 10-year period risks locking in weak ambition by failing to respond more frequently to the availability of new green tech and the results of the global stocktake.²¹⁵ More frequent reporting could also avoid a situation in which a country submits a one-time NDC pledging to meet net zero by 2050 but does not produce any implementation plan, including interim targets. Without common time frames, NDCs will remain difficult to compare and analyse as they will differ in scope, length and type of contribution.²¹⁶ Common time frames would also improve the comparability and transparency of efforts for the global stocktake. The ministers from Switzerland and Rwanda are leading consultations in this area ahead of COP26.²¹⁷

Achieving a positive COP26 outcome

What can be achieved in Glasgow to advance the Paris Rulebook on the global stocktake, Article 6, common time frames, SOP from carbon trading, double counting, and transparency? COP26 can offer clarification on the global stocktake process, set to run from 2022–23, and on how and when the information is to be prepared and shared between countries. Agreement that the third phase of the stocktake will be completed in a timely manner to influence the 2025 NDCs, and a consensus on how the stocktake will be reported, are benchmarks for COP26.

Standout issues on Article 6 are critical, but it will be challenging to reach agreement. For negotiators at COP, achieving rapid decarbonization will demand broader policy action than carbon pricing and initiatives for international markets.²¹⁸ Such policy considerations may include progressive emissions reductions from heavily emitting sectors in industry and transportation, as well as direct government regulation including performance standards, technology

²¹¹ Vaidyula, M. (2018), ‘Common timeframes: Summary of discussions at the March 2018 Climate Change Expert Group Global Forum’, OECD, <https://www.oecd.org/env/cc/Common-time-frames-summary.pdf>.

²¹² Evans, S. and Gabbatiss, J. (2021), ‘UN Climate Talks Key Outcomes from the June 2021 Virtual Conference’, Carbon Brief, <https://www.carbonbrief.org/un-climate-talks-key-outcomes-from-the-june-2021-virtual-conference>.

²¹³ UNFCCC (undated), ‘Common time frames for nationally determined contributions referred to in Article 4, paragraph 10, of the Paris Agreement’, <https://unfccc.int/sites/default/files/resource/IN.SBI51.i5.pdf>.

²¹⁴ Timperley, J. (2019), ‘Common timeframes: How they could speed or slow climate action’, Climate Home News, <https://www.climatechangenews.com/2019/12/04/common-time-frames-speed-slow-climate-action>.

²¹⁵ Evans and Gabbatiss (2019), ‘COP25: Key outcomes agreed at the UN climate talks in Madrid’.

²¹⁶ Pauw, W. P., Klein, R. J. T., Mbeva, K., Dzebo, A., Cassanmagnago, D. and Rudloff, A. (2018), ‘Beyond headline mitigation numbers: we need more transparent and comparable ndcs to achieve the Paris Agreement on climate change’, *Climatic Change*, 147(1): pp. 23–29, <https://link.springer.com/article/10.1007/s10584-017-2122-x>.

²¹⁷ UK Government (2021), ‘Ministers have renewed common mission for climate action, but more work to do says COP26 President’, press release, <https://www.gov.uk/government/news/ministers-have-renewed-common-mission-for-climate-action-but-more-work-to-do-says-cop26-president>.

²¹⁸ ICAP (2020), *Emissions Trading Worldwide: Status Report 2020*, Berlin International Carbon Action Partnership, https://www.adelphi.de/en/system/files/mediathek/bilder/200323_ICAP_Report_Web.pdf.

phase outs, and building codes. While advancing agreement on Article 6 provisions during intersessional meetings leading up to and at COP26 itself are crucial, wider support for complementary market and policy pathways to reduce emissions must also be developed simultaneously.

COP26 can offer clarification on the global stocktake process, set to run from 2022–23, and on how and when the information is to be prepared and shared between countries.

Yet, no deal on the rulebook could potentially be better than a bad deal, as pressure to reach consensus on a low-ambition deal would negatively impact the Paris Agreement. Not reaching an agreement on core issues would undermine the solidarity of the agreement, but not preclude domestic ambition. Failure to agree may also result in an accelerated role of ‘carbon clubs’ and market measures.²¹⁹ Regardless of the outcome of COP26, carbon markets are already here. As the EU CBAM prepares to go into effect and other countries weigh similar policy measures, COP26 could usefully identify related opportunities that may incentivize alignment between production-based accounting and consumption-based accounting and avoid the current race to the bottom.

Charting a clear path forward to operationalize SOP could be an opportunity for COP26 to address gaps in ambition and significantly strengthen support for climate vulnerable countries, which otherwise may be excluded from the benefits of carbon markets due to their already low emissions. Levying both an ‘administrative’ SOP and ‘adaptation’ SOP with a mix of monetary fees and in-kind payment for Article 6.4, as proposed in the Katowice draft text, is a good option for negotiators at COP26 as it would reduce transaction costs, limit burdens on project developers, and create an option to benefit from higher market prices.²²⁰

For common time frames, negotiators at COP26 should seek to agree upon a maximum five-year horizon for reporting in the post-2031 period. The discussion on time frames may also influence the course of debate on how to resolve the issue of double counting. Furthermore, common time frames would improve the transparency and comparability needed to conduct the collective global stocktake. If countries are allowed to choose their own time periods for reporting, essential functions of the multilateral climate regime will become extremely difficult.²²¹

²¹⁹ Carbon clubs are groups of nations that coordinate climate policies. As a climate diplomacy strategy, membership may entail ‘perks’ such as trade preferences. Proponents suggest that this small group approach to climate deals may allow for more flexibility and reduce the complexity of achieving consensus in major multilateral deal making. Compared with the ‘universal, voluntary, and pledge-and-review’ approach of the Paris Agreement, carbon clubs may encourage policy adoption (Victor, 2015). Opponents argue that such clubs are counterproductive, and current proposals such as the EU CBAM risk eroding trust by appearing too protectionist (Lee and Baron, 2021). See, Victor, D. (2015), *The Case for Climate Clubs*, The E15 Initiative, <https://e15initiative.org/publications/the-case-for-climate-clubs>; Lee, B. and Baron, R. (2021), ‘Why the EU’s proposed carbon border must not be used to launch a carbon club’, World Economic Forum, <https://www.weforum.org/agenda/2021/06/eu-carbon-border-clubs-climate>.

²²⁰ Michaelowa, Greiner, Espelage, Hoch and Kramer (2019), ‘Operationalizing the share of proceeds for Article 6’.

²²¹ Streck, C., von Unger, M. and Greiner, S. (2020), ‘COP25: Losing Sight of (Raising) Ambition’, *Journal for European Environmental & Planning Law*, 17(2): pp. 136–160, https://brill.com/view/journals/jeep/17/2/article-p136_136.xml?language=en.

To address issues related to double counting, the San José Principles for High Ambition and Integrity in International Carbon Markets – a coalition formed in the run-up to COP25 supported by the EU and some Latin American and small nation and island states – may provide a starting point.²²²

Progress on the transparency framework regarding NDC accounting is essential to allow meaningful assessments of ambition. A common reporting framework to assist transparency and generate an atmosphere of cooperation is a critical outcome for COP26 to achieve. A narrowed menu of options for accounting would constitute progress in this area.

²²² Additionally, negotiators may learn from other sectors that have addressed this issue in similar areas. The UN aviation agency, ICAO, subjects carbon offsets to a corresponding adjustment. Similar regulations could be adopted for Article 6 to guide the use of voluntary offsets, Frank (2021), 'The Lengthened and Stony Road to Glasgow'.

Conclusion and recommendations

A positive outcome at COP26 requires substantial progress on raising the ambition of NDCs, enhancing support to climate-vulnerable nations, and advancing the Paris Rulebook.

Over the past decade, climate change has moved from being a peripheral issue to an urgent political priority. But current efforts to tackle the crisis remain perilously off-track. COP26 is a historic opportunity to accelerate international climate action. The stakes could not be higher, and support for the Paris Agreement hangs in the balance. What would a positive outcome at COP26 look like? We argue that substantial progress must be made in three areas:

- **Raising the ambition of the NDCs.** The headline requirement at COP26 is whether new 2030 targets are ambitious enough to be consistent with a 1.5°C pathway. The falling costs of renewable fuels and technologies, such as solar and wind power, are making decarbonization more affordable and in some cases the cheapest energy generation option. This should facilitate higher emitting countries particularly those from the G20, such as China, to further reduce their emissions. If countries fail to raise the ambition of their NDCs by COP26, parties will need to respond in the early 2020s with a strategy that will put the world on track for 1.5°C. Such a strategy should include revisiting unambitious NDCs earlier than the Paris timetable dictates (in 2023 instead of 2025) and accelerating decarbonization through sector initiatives. While national governments are the official parties to the UNFCCC, sub-national governments and other non-state actors – such as financial institutions, private-sector businesses and civil society – are all crucial to ensuring that mitigation targets are met and more ambitious carbon reduction practices and technologies are put in place.
- **Enhancing support to and addressing concerns of climate-vulnerable developing countries.** Climate change impacts are already causing severe destruction, and while all nations are affected, countries that have emitted the least are often the hardest hit. To support those on the frontline of the climate crisis and build trust, more ambition and action is needed on climate finance, adaptation, and loss and damage. In terms of a positive COP26 outcome, this includes accelerating efforts to honour the meeting the \$100 billion

goal; scaling up finance for adaptation; making progress in the negotiations on a post-2025 finance goal; defining the global goal on adaptation; further operationalizing the Santiago Network; and advancing the loss and damage agenda more broadly.

- **Advancing the Paris Rulebook.** The rulebook is the basis for implementing the Paris Agreement and it outlines key reporting processes, transparency mechanisms and technical tools. Important benchmarks for the rulebook at COP26 include refining the global stocktake, resolving disagreements over Article 6, avoiding double counting of carbon units, operationalizing the share of proceeds, agreeing on transparency and governance processes, and establishing common time frames. Agreement on common time frames is critical to enable monitoring and review of the effectiveness of NDCs – for example, to assess the global reduction in GHGs resulting from all NDCs combined.

Making substantial progress in these three areas is critical for preserving the health of people and the planet. Over the past year, governments have taken important steps to accelerate climate action. President Xi Jinping’s announcement that China would achieve carbon neutrality by 2060 is one such example. The revision of the EU and US NDCs and the climate summit hosted by President Biden further built momentum. Other international meetings – like those of the G7 and G20 – have yielded positive, if at times insufficient, results. With weeks remaining until COP26, however, it is clear that much more needs to be done.

Should parties fail to take sufficiently strong action by COP26, it is important that despair and hopelessness do not prevail. Instead, progressive governments, companies, NGOs, and citizens need to increase pressure on those who do not deliver. As the most recent IPCC report underscored, it is not too late to keep warming to 1.5°C, but unprecedented action must be taken now.

While not everything will be agreed under the joint COP stewardship of the UK and Italy, it is critical that the COP presidency baton is handed to an African nation – probably Egypt – with a clear pathway set out for keeping the 1.5°C target within reach, and for supporting climate-vulnerable nations in dealing with climate change impacts.

The best hope to effectively address the threats posed by climate change is an ambitious outcome from COP26 that sustains momentum and translates into national-level implementation. The curbed CO₂ emissions resulting from pandemic-induced impacts on economies and societies were less than expected,²²³ and emissions have already rebounded to exceed pre-2020 levels.²²⁴ This serves as a reminder that simply ‘turning off’ sources of emissions is insufficient. What is fundamentally needed is a rapid and just transformation from carbon-based economic systems to net zero societies.

²²³ Tollefson, J. (2021), ‘COVID curbed carbon emissions in 2020 – but not by much’, *Nature*, <https://www.nature.com/articles/d41586-021-00090-3>.

²²⁴ IEA (2021), ‘After steep drop in early 2020, global carbon dioxide emissions have rebounded strongly’, press release, <https://www.iea.org/news/after-steep-drop-in-early-2020-global-carbon-dioxide-emissions-have-rebounded-strongly>.

About the authors

Anna Åberg is a research analyst in the Environment and Society Programme of Chatham House. Her work focuses on international climate politics, the UN climate negotiations, climate finance, and the energy transition. Anna previously served as desk officer at the Swedish Ministry for Foreign Affairs, working on global ocean issues (2018–19), humanitarian policy (2015–16), and Sweden’s relations with the World Bank Group (2018). She holds an MSc in Development Studies from the London School of Economics and Political Science as well as a BSc in Business and Economics and a BSc in Politics and Economics from Lund University.

Antony Froggatt joined Chatham House in 2007 and is deputy director and a senior research fellow in the Environment and Society Programme. He has worked as an independent consultant for 20 years with environmental groups, academics and public bodies in Europe and Asia. At Chatham House, he specializes on global electricity policy and the public understanding of climate change. His most recent research projects cover the energy and climate policy implications of Brexit, the technological and policy transformation of the power sector, and the COP26 summit.

Rebecca Peters is a Queen Elizabeth II Academy Fellow at Chatham House with the Environment and Society Programme. She is also a doctoral candidate at the University of Oxford with the UK Foreign, Commonwealth and Development Office REACH Water Security programme. Over the last decade, she has led environmental projects with multilateral development banks, universities and international NGOs including serving as a researcher at the Asian International Rivers Centre (AIRC) at Yunnan University in China. She earned an MSc in Development Economics and an MSc in Water Science and Policy, both as a Marshall Scholar. Her writing on climate change has featured in *Foreign Affairs*, *Scientific American*, *The World Today*, and *The Hill*.

Acknowledgments

We are very grateful to the Foreign, Commonwealth and Development Office for funding the research that has informed this paper, through its prosperity programming as well as the European Climate Foundation for supporting accompanying activities. The authors would also like to thank Professor Tim Benton, Peter Betts, Jill Duggan, Dr Helen Harwatt, Ruth Townend, Ian Mitchell and Farhana Yamin from Chatham House; Professor Saleemul Huq and Professor Mizan Khan from the International Centre for Climate Change and Development (ICCAD); Alex Scott and Shane Tomlinson from E3G; Professor Lisa Vanhala from University College London (UCL); Doree Marentette from the European Climate Foundation; and the anonymous peer reviewers and interviewees.

All rights reserved. No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical including photocopying, recording or any information storage or retrieval system, without the prior written permission of the copyright holder. Please direct all enquiries to the publishers.

Chatham House does not express opinions of its own. The opinions expressed in this publication are the responsibility of the author(s).

Copyright © The Royal Institute of International Affairs, 2021

Cover image: Ice sculptures of 26 children installed on New Brighton Beach in the UK to highlight global warming at the forthcoming COP26 global climate conference, May 2021.

Photo credit: Copyright © Christopher Furlong/Getty Images

ISBN 978 1 78413 498 3

This publication is printed on FSC-certified paper.
designbysoapbox.com



Independent thinking since 1920



**The Royal Institute of International Affairs
Chatham House**

10 St James's Square, London SW1Y 4LE

T +44 (0)20 7957 5700

contact@chathamhouse.org | chathamhouse.org

Charity Registration Number: 208223