

Global Climate Change Policy Framework

OCTOBER 19, 2022

Climate Change Policy Response

The climate is a global public good, requiring inter-governmental collaboration and action. This led to designing gradually more stringent responses over the past 30 years at the global, sub-regional, national, sub-national levels.

- At the June 1992 Earth Summit in Rio — the United Framework Convention on Climate Change (UNFCCC) was adopted
- In its preamble, parties to the Convention
 - Acknowled[ge] that change in the Earth's climate and its adverse effects are a common concern of humankind,
 - [are] concerned that human activities have been substantially increasing the atmospheric concentrations of greenhouse gases [...] and may adversely affect natural ecosystems and humankind.
- In March 1994 the UNFCCC entered into force with 197 parties
- Since 1995 summits (Conference of the Parties to the Convention) are organised annually in different world regions with participation from the 197 parties. They provide great political visibility to the host country.

What Does It Mean?

The intergovernmental climate crisis response process— albeit moving at a slow pace, as it requires consensus among all parties — has already

- *Led to* the formulation of numerous regional, sub-regional, national public policies since the convention's adoption — in fact half the world's emissions are now covered by climate laws and policies¹
- *Shaped* public opinion leading to necessary behavioural change
- *Mobilised* corporations to mainstream climate change in their business models and responded to evolving consumer demands for transparency on their greenhouse (GHGs) gases footprint

¹ IPCC 6th Assessment report (2022)

→ *Fostered* frameworks for:

- clean technology innovation and deployment at scale, reflected by massively falling costs of renewable energy (decreasing 85% for solar energy and batteries since 2010, decreasing 55% for wind power)²
- enhanced energy efficiency efforts and materials use.

Major global policy and market developments included:

1. In December 1997, adoption of the *Kyoto Protocol* (KP)– coming into force in 2005 with 192 parties.
 - in light of historical “responsibilities” for the accumulation of GHGs since the industrial revolution — the KP committed industrialised countries and economies in transition to quantified reduction targets (Annex B countries) — meaning that major emitting developing countries were not called upon to reduce emissions (e.g., China)
 - introduced flexible market mechanisms to encourage abatement *where* it is most cost effective — as it is irrelevant where emissions are removed as long as they are removed. The KP’s *Clean Development Mechanism* (CDM) allows an Annex B country to implement emissions reduction projects in developing countries — earning saleable certified emissions reduction credits (CERs).
2. In 2012 the *Doha Amendment* established the second commitment period under the KP (from 2013 to 2015).
 - The CDM led to the cumulative issuance of 1.2bn tonnes since its start, but in 2012, carbon markets crashed due to:
 - Provisions to limit CER access to the world’s largest emissions trading scheme, the EU-Emissions Trading Scheme (EU-ETS)
 - Japan’s retreat from commitment to its targets (from 2012 to 2020) following the Fukushima accident
3. In December 2015, the 21st Conference of the Parties (COP-21) adopted the *Paris Agreement* — entering into force in November 2016 with more than 190 countries having ratified it. The *Paris Agreement*:
 - Aims at:
 - (a) limiting temperature increase to “well below 2C above pre-industrial levels and pursuing efforts to limit it to 1.5C”
 - (b) improving parties’ ability to adapt to the adverse effects of climate change
 - aligning financial flows consistent with (a) and (b)
 - Requests parties to:
 - Communicate every five years increasingly ambitious Nationally Determined Contributions (NDCs)

² IPCC 6th Assessment report (2022)

- Also includes:
 - A transparency framework (*Global Stocktake*)³
 - Further provisions on:
 - Adaptation
 - Loss and damage
 - Finance
 - Technology transfer for developing countries
 - Compliance
 - Launches the *Paris Agreement Work Programme* (PAWP) to operationalise the agreement
 - Calls for the mobilisation of non-party stakeholders (e.g., business, NGOs, sub-national, municipal entities, etc)
- 4. At the *Marrakech* Conference in 2016 (COP-22) parties proceeded with the operationalisation of the PAWP, in:
 - Developing the framework for reporting financial commitments from developed countries
 - Designing the terms of reference for the *Paris Committee on Capacity Building*
 - Approving the five-year work plan on *loss and damage*
 - Enhancing the *Technology Mechanism*
- 5. Under the Presidency of *Fiji*, COP-23 was held in *Bonn* in November 2017. This was the first meeting after US President Trump's announcing his country's withdrawal from the *Paris Agreement* — the US had helped to shape. Developments at COP23 included:
 - Launching the *Talanoa Dialogue* — a facilitation mechanism to take stock of collective progress towards the achievement of the *Paris Agreement* goals
 - Deciding that the *Adaptation Fund* would be serving the *Paris Agreement*
 - Adopting the *Koronivia joint work on agriculture* (KJWA) — to address vulnerabilities of agriculture to climate change and food security through domestic action and international co-operation.
- 6. COP-24 was held in *Katowice* in 2018 — where
 - Parties adopted the *Katowice Climate Package* reflecting progress on the PAWP
 - Still reeling from US withdrawal from the *Paris Agreement*:
 - Work on *Co-operative Approaches* (Article-6) could not be concluded.
 - the COP Presidency was unable to reach agreement on whether to “welcome” or “note” the *Intergovernmental Panel on Climate Change* (IPCC) report on the 1.5C of global warming trajectory.
- 7. COP-25 was held in *Madrid* — under *Chilean* Presidency in 2019.

³ from 2023 onwards Parties will convene this process every five years

- Parties established the *Santiago Network* to catalyse technical assistance on *loss and damage*
 - Parties could still neither reach agreement on Article 6 nor did they progress on long-term finance objectives
8. As a result of the covid-19 pandemic COP-26 was held in *Glasgow* only in 2021. In January of that year — on his first day in office, US President Biden signed the instrument to bring the US back into the *Paris Agreement*. This development together with strong UK-leadership and the publication of an alarming IPCC report⁴ produced a dynamic for a number of advances including:
- Taking decisions on:
 - Phasing *down* unabated coal power⁵
 - Phasing *out* inefficient fuel subsidies
 - Doubling adaptation finance by 2025 [to USD40bn p. a]
 - Communicating updated NDCs according to a regular timeframe, with:
 - New NDCs to be submitted in 2025 with end date 2035
 - New NDCs to be submitted in 2030 with end date 2040
 - Operationalising the PAWP Rulebook, particularly on co-operative approaches:
 - Article 6.2 on *Internationally Transferable Mitigation Options* (ITMOs) — requiring corresponding adjustments
 - Article 6.4 on the use of carbon credits in NDCs (a.k.a. CDM)
 - Completing the Enhanced Transparency Framework
 - Parties to submit first *biennial transparency reports* by 2024
 - Establishing new processes:
 - Annual high-level ministerial round table on pre-2030 ambition
 - Glasgow Dialogue on Loss and Damage (during the 2022-2024 period)
 - Annual Dialogue on Oceans Based Action

Why Does It Matter?

1. Decarbonisation cannot be had for free

1.1. Cost of mitigation will have to be borne by G20 economies

- In order to remain on a *Paris Agreement* compliant trajectory, G20 economies which account for more than 75% of all emissions will have to step up their decarbonisation efforts.

⁴ Sixth Assessment Report of the IPCC Working Group I / showing that the planet had already reached an average global warming of 1.1C above pre-industrial levels and that the window of opportunities for action is closing rapidly. It reinforced the need to stabilise emissions by 2025 and halve them by 2030 and reach net-zero by 2050.

⁵ “Phasing *out*” was at the last minute substituted by “Phasing *down*” at the request of China and India.

- The path to net zero will be costly — in the EU alone it is likely to account for 5.3% of annual European GDP⁶ under current scenarios and politicians will have to become more transparent on the cost of transition at a time when inflation hits households (see below)
- Developing countries will have to be brought along in decarbonisation efforts (and financially supported therein) since close to 90% of increase in emissions in the mid term will originate there.

1.2. Energy decarbonisation is to play a major role...

- Energy-related emissions account for about three-quarters of total GHG emissions,
- Strong, credible and coherent policy actions from governments are needed to simultaneously:
 - decarbonise energy production,
 - ensure energy security, grid stability and affordability
 - support energy and materials efficiency
 - foster and reprioritise an innovations framework to further lower the price of green and transition technologies taking into account that
 - decarbonisation between now and 2030 will mainly rely on existing technologies
 - in 2050, almost half the reductions are likely to come from technologies that are currently only at the demonstration or prototype phase⁷.
- An efficient carbon pricing signal transmission mechanism is necessary. It ought to ensure technological neutrality to pursue a range of options. This will allow electricity generation via the marginal power plant at a cost taking into account
 - The capital cost of electricity generation plants
 - Variable maintenance and operating costs including the price of fuels and carbon.
- Energy transition investment by encouraging the flow of capital towards *those* areas where the highest volume of abatement over time can be achieved at the least cost are always to be considered. At times this might be a better use of resources than directly investing in renewables.

⁶ Source: McKinsey (2022)

⁷ Source IEA (2021)

1.3. ...while addressing emissions from agriculture, land use, land use change and forestry will have a major impact on numerous global supply chains...

- Population growth, increased urbanisation, the emergence of new middle classes in developing countries and associated evolving consumption patterns have led to increased demand for dairy and meat. This exerts strong pressures on land conversion driving deforestation in those areas where the planet cannot afford to lose irrecoverable carbon.
- Agriculture, forestry and other land-use now contribute to over 1/5th of GHG emissions. This sector therefore not only provides large-scale emissions reductions potential but can also remove and sequester CO₂ on land and in oceans⁸. It will need:
 - Restoration, protection and sustainable management of carbon rich ecosystems — further calling for convergence between the UNFCCC, the *United Nations Convention on Biological Diversity* (UNCBD), the *United Nations Convention to Combat Desertification* (UNCCD) processes
 - Reducing the GHG intensity of food systems
 - Raising awareness that behavioural changes are required to curb food waste, food loss and shift to more sustainable and healthier diets
- Removals can be particularly helpful to counterbalance hard to abate emissions from aviation and industrial processes
- These emissions are also being addressed by the *Global Methane Pledge* as well as via frameworks such as the EU Commission's:
 - *Proposal to limit the consumption of products contributing to deforestation or forest degradation* (approved by the EU Council) — which requests mandatory due diligence rules for all operators and traders who place, make available or export: palm oil, beef, timber, coffee, cocoa and soy. Rules also apply to derived products such as leather, chocolate and furniture
 - *Corporate Sustainability Reporting Directive* (to come into effect in 2023 following EU Parliament approval)

1.4. ... but industrial processes will also have to improve

- Emissions from the industrial sector have been increasing faster than any other sector since 2000 and now accounts for ¼ of global emissions — in fact accounting for 34% of emissions if indirect generation of electricity and heat related emissions are included⁹.
- Technologies already exist to bring industrial sectors to zero emission. Disconnecting global industrial production from growth in GHG emissions will require:
 - new production processes
 - using low GHG electricity, hydrogen and where necessary carbon capture and storage

⁸ IPCC 6th Assessment report (2022)

⁹ IPCC 6th Assessment report (2022)

- energy efficiency
- more efficient materials use

2. Climate change and inequality: sharing the benefits and the burden of the transition

- Understanding the implication of climate policies for people at various points on the income distribution spectrum is important for business¹⁰
- Some are more responsible than others...and may have to change lifestyles
 - 10% of the richest people are responsible for 40% of global emissions¹¹.
 - Cities and urban areas where now close to half of the world's population live are responsible for more than 2/3 of global GHG emissions.
- A combination of effective policies, availability of technologies and adequate infrastructure will drive behavioural change. The latter is key to avoid locking in GHG-intensive infrastructure for many years to come.

3. Vast resources are required to make infrastructure and food systems more resilient

- 3.1. Adaptation efforts will over-proportionately fall on less developed countries in the global South but will also hit OECD countries**
- 10% of the currently suitable area for major crops and livestock is projected to be climatically unsuitable by mid-century under high emission scenarios;
 - the frequency of climate extremes will further lead to simultaneous losses in major food-producing regions — including in the Northern hemisphere, resulting in price rises and food insecurity¹².
 - High-yielding, resilient and adaptative practices are therefore to be pursued, in:
 - Soil systems: with the adoption of soil carbon positive mechanisms (adopting low till/no-till practices) and the deployment of (solar-powered) irrigation systems, etc.
 - Cropping systems: as rotating crops improves soil quality, manages pests/diseases, improves crop performance — while inter-cropping also contributes to improving biodiversity
 - The deployment of drought/heat-resistant crops.

¹⁰ INSEAD (2021)

¹¹ IPCC 6th Assessment report (2022)

¹² IPCC 6th Assessment report (2022)

Where Is It Going?

1. The UNFCCC process is irreplaceable

The UNFCCC process often appears to be cumbersome:

- Comprising an alphabet soup of compulsory sub-processes which are difficult to navigate, including the:
 - Meeting of Parties to the Kyoto Protocol (CMP)
 - Meeting of Parties to the Paris Agreement (CMA)
 - Subsidiary Body for Scientific and Technological Advice (SBSTA)
 - Subsidiary Body on Implementation (SBI)
- Requiring global consensus

But it is the *only* existing inter-governmental framework to address both climate change mitigation and adaptation — and is hence invaluable.

2. The COP framework increasingly allows for more flexibility than it seems

Similarly to negotiations at WTO — which also require unanimous decisions — where progress was made through building coalitions in the form of plurilaterals to allow like-minded parties work on a number of issues of common concern, while leaving the door open for others to join when they are ready to do so.

COP 26 catalysed the launching of a number of partnerships for joint action — sometimes calling for the involvement of business actors.

- *Glasgow Leaders Declaration on Forest and Land Use* [signed by 120 countries to halt forest loss and land degradation by 2030, backed by public funds for forest conservation and a global roadmap to make 75% of forest commodity supply chains sustainable]
- *Global Methane Pledge* [signed by 100 countries to commit to collectively reduce methane emissions by 30% by 2030]
- *Glasgow Financial Alliance for Net Zero* [counting 450 financial institutions committing to achieving net zero by 2050]

3. The UNFCCC process does not occur in a vacuum

The world is affected by an unprecedented number of ongoing and interconnected crises which will influence the level of response to the ongoing climate crisis.

The geopolitical crisis in Europe, with the “weaponisation” of energy supplies and food crop exports has been a key driver of the current energy and agricultural crises with resulting strong inflationary pressures

This situation was further exacerbated by prolonged drought phases affecting agricultural yields, energy generation, river transport and fuelling wildfires affecting natural habitats.

The resulting strains on energy, agriculture and public finances are likely to lead to political decisions that will provide mixed signals — some of them in contradiction with the goals of the *Paris Agreement*.

Tensions around Taiwan have led to the suspension of US-China climate co-operation — making climate co-operation within the G20 framework even more complicated

a) Strains on energy systems and conflicting pricing signals

- Past political choices, current geopolitical circumstances, the pandemic, heatwaves and prolonged drought led to major stresses affecting energy systems while simultaneously driving emissions:
 - Unprecedented rise in gas prices due to reduced Russian gas flows
 - Limited availability of nuclear energy due to post-covid 19 maintenance work and high water temperature limiting cooling (e.g., France)
 - Low performance of hydropower plants due to low water levels (China, Norway, Switzerland)
 - Environmentally and climate harmful re-opening of coal power plants — some affected by reduced river shipping capacity due to low river flows (e.g., on the Rhine)
 - Increased dependence on liquid natural gas from Algeria, Qatar, Canada and the US — the latter often supplied through fracking.
- Carbon prices in the EU-ETS are correlated with gas prices¹³. The price to abate one tonne of CO₂ reached a record of close to EUR100 in the third week of August 2022, reflecting soaring gas prices. This would in theory provide a positive price signal for energy transition and energy efficiency.
- Energy price increases are, however, major drivers of inflation and have therefore led governments to focus on energy security and affordability by subsidising fossil fuels. Support for fossil fuels almost doubled in 2021¹⁴ therefore providing a *negative price signal*.

b) Strains on food systems

The ongoing geopolitical crisis has a severe impact on both trade in agricultural commodities and on the supply of fertilisers, further affecting crop yields, already impacted by rising temperatures and drought resulting from climate change. More than 800m people in developing countries face hunger every year — a situation that is likely to worsen as a consequence of climate change¹⁵

¹³ It is assumed that a higher gas price makes it more attractive to switch to carbon — driving demand for carbon credits

¹⁴ IEA/OECD (2022)

¹⁵ FAO (2021)

c) Inflationary pressures

We have seen that most of these crises exert inflationary pressures — resulting primarily from energy and food price increases, but which are also transmitted into other sectors of the economy. Inflation — absent in OECD countries for more than two decades — shocked governments to soften its impact, often through interventions that run counter the necessary signals for an orderly energy transition. This together with the widespread perception that the less well-to-do in society bear the highest costs of a green transition and the failure of politicians to be transparent about the real costs of moving towards a trajectory that is more greenhouse gas and resources efficient are likely to reduce the willingness of vast section of the electorate to support climate change related efforts.

4. Road towards COP 27

A number of meetings and consultations are taking place — that are feeding into and prepare for the November meeting in Sharm-el-Sheik.

a) Copenhagen Ministerial Meeting on Implementation (May 2022)

Four tracks were highlighted by Ministers — which provide an agenda for progress at COP27

- Adapting to climate change impacts by aiming to:
 - Focus on gaps across policies, planning, implementation and finance
 - Improve effective adaptation planning and additional National Adaptation Plans
 - Enhance the transparency of and the doubling of adaptation finance
- Averting, minimising and addressing *loss and damage* through:
 - Operationalisation and funding of the *Santiago Network* on capacity building
 - Delivering and scaling financial resources
- Reducing emissions and keeping the 1.5C target alive:
 - While tackling the current energy crisis alongside the climate crisis
 - By expecting all parties to strengthen the 2030 emissions reduction targets in their NDCs — and communicating ambition by 23rd September 2022
 - Communicating *long-term low greenhouse gas emission development strategies* (LT-LEDS), highlighting the importance of mobilising the private sector therein
- Mobilising finance through
 - Developed countries delivering as soon as possible and no later than 2023 on the USD100bn p.a. goal
 - Including the doubling of adaptation finance by 2025
 - The establishment of an *Independent High Level Expert Group on scaling up investment and finance to deliver on climate ambition and development goals* co-chaired by Lord Stern

b) Bonn climate change conference (June 2022)

Further discussions on operationalising article 6 and article 13 (adaptation) took place

Operationalising the *Santiago Network* on capacity building for loss and damage remained inconclusive

No progress made on agriculture discussions

c) Petersberg Dialogue (July 2022) ¹⁶

Against the backdrop of the current multiple global crises, the dialogue sought to “strengthen” trust in multilateral climate negotiations to be pursued at COP27 and stressed:

- Doubling collective adaptation finance to USD40bn p. a. to enable the delivery of USD100bn goal in annual climate finance by 2023
- Mandating the IPCC to develop a special report on loss and damage

d) Appointment of new UNFCCC Executive Secretary (August 2022)

Simon Stiell (Grenada). Together with the Egyptian Presidency the Executive Secretary is likely to particularly encourage parties to achieve progress on adaptation and *loss and damage* finance.

e) Heads of Delegations consultations on Loss and Damage (Egypt, 10-11 September 2022)

f) Outreach event on IPCC Six Assessment Report Key Findings and their Relevance to Africa (Dakar, 13-15 September 2022)

g) 77th Session of the UN General Assembly (New York, 13-27 September 2022)

h) Deadline for NDC revisiting and strengthening (23rd September 2022)

i) Heads of Delegations consultations on mitigation and finance (Egypt, 13-15 October 2022)

5. COP 27 outlook

a) Positive signals

Sense of urgency

- The latest IPCC report showed that the planet had already reached an average global warming of 1.1C above pre-industrial levels and that the window of opportunities for action is closing rapidly. It reinforces the need to stabilise emissions by 2025 and halve them by 2030 and reach net-zero by 2050.

¹⁶ Launched in 2010 by former German Chancellor Angela Merkel / annually co-hosted by the German Government and the country that takes over the chair of the next COP — objective is to prepare for the next COP

- In 2021 — emissions of CO₂, methane and nitrous oxide each reached record levels — with levels 50% higher than in pre-industrial times¹⁷
- The multiplication of heatwaves, drought and wildfires in the Northern hemisphere have had a direct impact on both GDP growth, prices and life expectancy raising awareness of climate change among the public at large for a need to act — particularly on adaptation. It may in particular increase the focus on the role of agriculture in mitigation and the need for it to adapt to the consequences of climate change.

US policy developments

- The Adoption of the *Climate Tax and Spending Law/Inflation Reduction Act* gives a strong signal for renewed US leadership at COP27

Australia policy developments

- The new Government under Labor leader Anthony Albanese communicated an updated NDC to the UNFCCC in June 2022, increasing its ambition and committing to reducing GHG emissions 43% (up from a previous 26%-28% target) below 2005 levels by 2030, putting the country on track to achieve net zero emissions by 2050

b) Negative signals

Egypt leadership

- Egyptian COP Presidency is likely to champion moving from pledges to implementation — rather than pushing for more ambitious emissions reductions, and therefore falling short of needed ambition
- Egypt's own NDC does not include an economy-wide GHG emissions reduction target
- Egypt did not join any of the voluntary sectoral coalitions at COP-26
- Egypt supports other African countries in extracting and deploying more gas and oil resources

Distraction

- The existence of multiple, simultaneous and connected crises risks further pushing the climate change mitigation agenda to the backburner and does not bode well for the November 2022 COP27 climate negotiations. This is particularly due to:
 - Government short term actions to manage the impact of inflation on consumers
 - Strained public balance sheets possibly affecting aid and climate budgets making it difficult to implement the Glasgow Pact including:
 - For developed countries:
 - to meet the overall USD100bn p.a. climate finance target
 - mobilise new loss and damage funding

¹⁷ US National Oceanic and Atmospheric Administration — August 2022

- In response to the energy crisis:
 - It is estimated that at least EUR50bn are being invested by EU governments into infrastructure that will lock-in fossil fuel dependencies.
 - Moves to boost gas exploration in the UK — including newly authorising shale gas — will derail the UK from its net-zero trajectory. It's also affecting co-leadership with the Egyptian Presidency in the run-up to COP27

EU may have lost some goodwill among developing countries due to its proposal to invalidate *Certified Emissions Reductions* (CERs) from the CDM all at once on “environmental integrity” grounds as developing countries have become major actors in this market.

G7 developments

- While in June 2022 G7 leaders committed to reducing emissions by at least 50% by 2030 — a new study by CDP revealed that G7 businesses were found to be on track for a 2.7C increase by 2100

China developments

- Carbon emissions falling by 8% due to economic slowdown, may lead to complacency.

Multilateral development banks development

- World Bank leadership weakened by debates on its President's apparent reluctance to accept the reality of human-caused global warming and feet dragging on common development bank ambition ahead of COP27.
- Calls for reform and adjustment of the Bretton-Woods institutions will become more pressing with ongoing reflections on how the IMF could support mechanisms responding to *loss and damage* requests from developing countries.

c) What might be achieved at COP 27 under the UNFCCC process

i. Maintain the 1.5C objective alive

- Background: at COP26 153 countries accounting for 49% of GHG emissions had updated their NDCs...revealing a non-Paris Agreement compatible trajectory of +2.7C temperature increase by 2100
- What would success look like? NDCs — representing ¾ of world emissions updated by 23rd September 2022 deadline and aligned with 1.5c pathway

ii. Preparation for the first Global Stocktake

- Background: Early 2023 — parties will have to convene the transparency framework (Global Stocktake) to assess progress towards achieving the objectives of the Paris Agreement. At five-year intervals collective progress on mitigation, adaptation and means of implementation will have to be reviewed.
- What would success look like? Framework is agreed upon and meaningful assessment is carried out to identify gaps.

iii. Further operationalisation of the PAWP on international co-operation

- Background: co-operation under Article 6 — would lead to cheaper abatement options through international carbon trading A Supervisory Body was launched for the implementation of article 6.4 to establish rules and regulations to govern the use of carbon credits to contribute to NDCs, to the ICAO¹⁸ CORSIA¹⁹ scheme as well as within voluntary markets.
- What would success look like? A governance framework for Article 6.2 on *Internationally Transferable Mitigation Outcomes* (ITMOs) collaborations — including clarification on the treatment of corresponding adjustments — to be launched.

iv. Progress on overall climate finance predictability

- Background: in 2009 at COP15 in Copenhagen, developed economies committed to transfer USD100 bn p.a. to developing economies to support response to climate impacts.
- What would success look like?
 - This is a recurring COP issue, USD100bn p.a. in climate finance finally secured from 2023 onwards

v. Conclude on availability of resources for adaptation:

- What would success look like? Doubling adaptation finance flows by 2030²⁰ [vs 2019] to USD40bn p.a. as an effort to contribute to the attainment of the USD100bn per year target in climate finance (see above)

vi. Foster more direct climate action in agriculture

- Background: socioeconomic and food security dimensions are critical when dealing with climate change in agriculture and food systems. Methane generated via agricultural production and land use change has a strong warming impact (including through rice paddies, wetlands, raising cattle...)
- What would success look like? Advancing the operationalisation of the KJWA with process defining scope of work (mandate, purpose and principles); institutional arrangements, including new topics

¹⁸ International Civil Aviation Organisation

¹⁹ Carbon Offsetting and Reduction Scheme for International Aviation

²⁰ Brought forward to 2025 at *Petersberg Dialogues* (July 2022) by German Government

d) What might be achieved at COP 27 under collaborative initiatives and outside core negotiations

i. Global Methane Pledge

- Background: of the 1.1C increase in global temperatures since pre-industrial times, about one third can be attributed to methane. More than 100 countries pledged to collectively cut emissions by 30% by 2030 — they represent 50% of global anthropogenic methane emissions.
- Likely developments:
 - Increase coverage of signatory nations from 50 %²¹. China recently stated that it would announce its own ambitious methane reduction plan.
 - Ministerial meeting to be convened to report on progress to prevent 8 gigatons of carbon dioxide equivalent emissions from reaching the atmosphere annually by 2030.

ii. Eliminating Agricultural Commodity-driven Deforestation

- Background: more than 30 financial institutions committed to use “[their] best efforts to eliminate forest-risk agricultural commodity-driven deforestation activities at the companies in [their] investment portfolio and in [their] financing activities by 2025”.
- Likely developments:
 - Establish linkages with Finance for Biodiversity Pledge
 - Align with the EU’s Proposal to limit the consumption of products contributing to deforestation or forest degradation

iii. International Sustainability Standards Board (ISSB)

- Background: established at COP26 under the *International Financial Reporting Standards* (IFRS) framework to “develop a comprehensive global baseline of sustainability disclosures for the capital markets”
- Likely developments: completion of the IFRS S2 Climate-related Disclosures framework.

e) What needs to be watched

i. Glasgow Financial Alliance for Net Zero — at risk

- Background: Mark Carney — led platform for financial institutions to accelerate the transition to a net-zero economy by deepening ambitions across the financial system. The UN-led Race-to-zero standard setting body is meant to accredit pledges under the alliance. It was expected that more stringent criteria might be adopted to end coal financing and phasing out fossil fuels from portfolios, however, recent developments indicate that commitments and enthusiasm might be waning.

²¹ China and Russia — the world’s biggest methane emitters have not signed the pledge

→ Likely developments:

- Non-compliance may lead to some financial institutions being kicked out of the alliance
- Tough new targets on coal financing are likely to be rolled back
- A number of US banks²² are already considering leaving the alliance due to:
 - litigation fears over increasingly stringent decarbonisation commitments
 - additional worries related to proposed SEC²³ rules on ESG and emissions reporting
 - hostility from some US States²⁴ to the ESG sector
- Two pension funds quite the alliance — arguing that it drew too heavily on internal resources²⁵

ii. *International Court of Justice* — involvement discussed under *loss-and-damage*

- Background: Vanuatu seeks support at the UN General Assembly for legal clarity on obligations of all nations to increase climate ambition to protect countries most exposed to the consequences of climate change. The initiative would seek recognition from the ICJ that human rights are being violated by lack of action. A consequence could be a surge in climate — related litigation.
- Likely developments
- The initiative is currently supported by more than 83 countries (including Australia and New Zealand) — this is close to a simple majority in the UN General Assembly to consider the initiative.
 - It is, however, far from certain that a ruling by the ICJ — should it take place — would be recognised by most developing countries.

6. What does it mean for business?

Global competition to secure the best market position in the transition to a climate neutral economy has already started.

a) Internalising externalities

In 2021 more than 1/5th of global GHG emissions were covered by carbon pricing²⁶. As levels are insufficient to cause meaningful compliance driven changes — the translation of more ambitious NDCs and targets by governments during the COP processes are likely to drive the price for the carbon externality. If not covered by regulation, externalities (beyond carbon therefore also water and the use of natural resources in value chains) ought to be factored in on a voluntary base.

²² Including JP Morgan, Morgan Stanley and BoA

²³ US Securities and Exchange Commission

²⁴ Including Texas, West Virginia

²⁵ Cbus (US) and Bundespensionskasse (Austria)

²⁶ Economist 23.07.2022

Watch for more stringent carbon market regulations/introduction of carbon taxes and levies/border tax adjustment mechanisms

b) Purpose

By aligning their operations and commitments around a climate purpose — including a willingness to disrupt their business models — companies will be able to:

- future-proof themselves, building more efficiencies across their supply chains
- generate consumer goodwill and create value in their markets
- attract and retain talent

Watch for due diligence regulations along value chains and opportunities from technological development

c) Disclosure and reporting

Businesses are advised to:

- consider their operations under a long-term climate lens, i.e., to what extent their activities are contributing positively to solving the climate crisis and negatively by increasing it
- disclose their performance according to different regulatory scenarios
- realistically take into account emissions along their value chains (scope 3)

Watch for capital markets increasingly taking into account valuing emissions decrease pathways and climate reporting, particularly under the draft IFRS S2 Climate-related Disclosures

d) Efficiency

Rising costs in energy, carbon, materials will drive operational and energy efficiency increases. Materials also have a high embedded emissions potential and end-of-life products need to be taken into account. Technological innovation ought to drive substitution, extended life cycles, reduced waste and recycling.

Watch for energy efficiency requirements, developments to create a cross-border circular economy at WTO.

e) Markets

Businesses will have to avoid becoming obsolete in a carbon neutral world, affected by regulatory, reputational and transition risks²⁷.

Watch out for opportunities to disrupt markets with new climate positive offerings. Participate in development of LT-LEDS to shape markets.

²⁷ Business Schools for Climate Leadership — Toolkit (2021)