ESG Central

The Latest ESG News and Analysis

Issue 2 • October 2021

The road to COP26

Will the crucial conference deliver?

Social values take centre stage in SFI survey

Moonshots wanted

NEWS | TALKING POINTS | ANALYSIS

The fierce urgency of now

Welcome to the COP26 issue of ESG Central. This month's magazine has an ambitious agenda: we aim to distil the torrent of of climate content hitting your inbox ahead of Glasgow, helping you to make sense of this pivotal conference.

Getting to the heart of a month's worth of ESG news and analysis is a tall order at any time these days, but it is especially challenging in the run-up to COP26. Political, business and even religious leaders have been ramping up the rhetoric for months, in the hope of achieving meaningful results when the delegates meet at the end of October.

Everyone stresses the need for action, but what outcomes can we realistically expect to emerge from what are being billed as the most significant climate talks ever? Our lead story on COP26 zooms in on the points of difference around Article 6 of the Paris Agreement, including the establishment of a global carbon pricing policy, as well as the need to allocate about US$100bn to help poorer countries adapt to a warming planet. As Alok Sharma, the UK minister and President of COP26, put it earlier in October: "Paris, promised. Glasgow, must deliver."

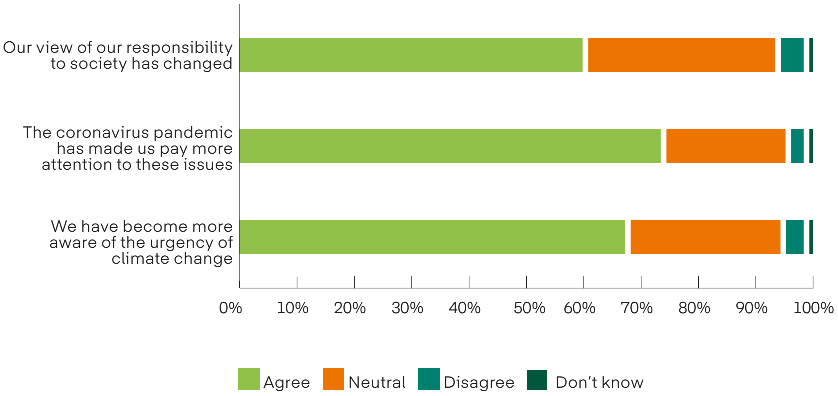
Reaching a global consensus on these contentious questions will not be easy, but there appears to be a growing realisation that we have no chance of keeping climate change to less than 2C without policies that put into action the commitments made in Paris six years ago. Growing evidence that the climate crisis is already impacting us makes it clear that deferring these questions is not an option.

Although he was talking about war in 1967, rather than climate change in 2021, the prophetic voice of the Rev. Martin Luther King resonates today: "We are confronted with the fierce urgency of now. In this unfolding conundrum of life and history there is such a thing as being too late."

This month's issue also highlights the critical importance of biodiversity and looks at new developments that are tackling transport emissions – one of the most challenging sectors for decarbonisation in the push towards net zero emissions.

Covid-19 has been an ESG tipping point for issuers and investors globally

Do you agree or disagree with the following statements?



Source: HSBC Sustainable Financing and Investing Survey 2021

We also explore the scarcity of sustainability expertise in the workforce and present the key findings of HSBC's annual Sustainable Financing and Investing Survey, which confirms a growing awareness of social responsibility among capital markets participants.

All these themes will be discussed in Glasgow as the world faces its moment of truth on sustainability. We hope that world leaders will rise to the challenge, but it's equally important that businesses and investors are ready to adapt to more ambitious climate policy goals: our ambition is that ESG Central will help to inform that process.

"Growing evidence that the climate crisis is already impacting us makes it clear that deferring these questions is not an option"

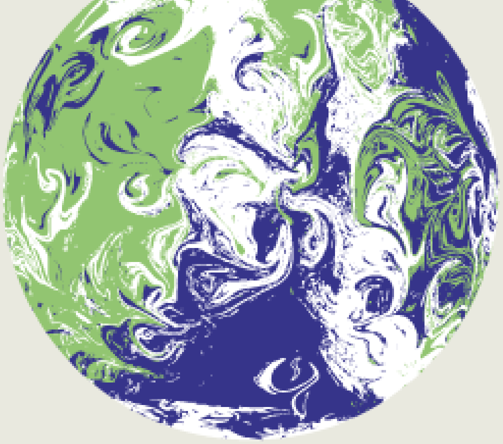
Steve Garton
sgarton@ashburycommunications.com

CONTENTS

12

06

Managing Editor **Adam Harper**
Editor **Steve Garton**
Contributors **Jane Cooper, Victoria Coplans Hope, Jeremy Hughes, Elissa Mironenko**
Design **Lamma Studio Design**



The road to **COP26**

The world is running out of time to keep global warming below 1.5°C. Can the climate conference rise to the challenge?

After a year's delay due to the Covid-19 pandemic, the 26th session of the Conference of the Parties to the United Nations Framework Convention on Climate Change (UNFCCC) will take place between 31 October and 12 November 2021. With less than a decade until the 2030 deadline for emissions cuts that will keep global warming below 1.5°C, much remains to be decided at COP26.

The UN's latest synthesis report on the status of climate pledges shows that current commitments are only sufficient to limit temperature increases to 2.7 degrees. For the COP26 conference to be a success, that will need to change.

"The report shows a mere 2.8% improvement in emissions reductions since NDCs (Nationally-Defined Contributions) were introduced in 2015," said Wai-Shin Chan, Head of HSBC's Climate Change Centre. "At this point, we should be on track for a 45% decline if we're to achieve our 2030 goals."

On the plus side, seven of the top ten largest greenhouse gas-emitting countries in the world (China, US, Brazil, Japan, Germany, Indonesia and Canada) have now announced net-zero goals, setting an example for those still to commit.

The last two COP rounds (in December 2019 and December 2018) left numerous loose ends that will be on the agenda again in Glasgow. Without concrete progress to end the current uncertainty, climate risks will continue to increase.

"Action sooner would be more effective and cost less than actions later," said Chan. "For investors and businesses facing growing pressure to act on their decarbonisation ambitions, greater clarity of policy and timeframes cannot be postponed much longer."

> "Action sooner would be more effective and cost less than actions later"

Resolving Article 6

A critical measure of success will be the resolution of a major impasse around Article 6 of the Paris Agreement, which enables cooperation between countries. Doing this would crystallise a basis for countries to swap or trade emissions, either bilaterally or through an established market mechanism.

Offsetting in this way can be achieved through a system of carbon credits, dubbed Internationally Transferred Mitigation Outcomes (ITMOs). But any exchange or trading system requires an accounting methodology that prevents double counting, where credit for emissions saved or avoided is claimed by both parties to the trade. The fundamentals of such a methodology are due to be hammered out in Glasgow.

Finalising Article 6 also requires agreement on many of the system's finer points, including a precise definition of ITMOs, how the system will be governed, how transfers and trades will be tracked, the permitted timeframes for transfers, and the extent and

Article 6: Sticking points

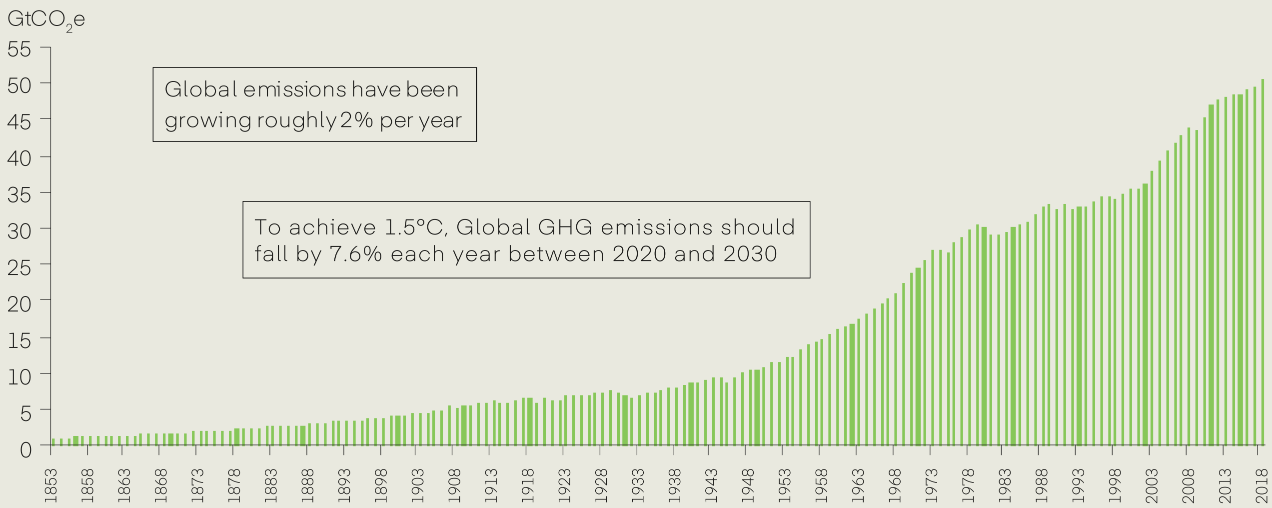
Article 6.2: Cooperative approaches
The bilateral trading of carbon credits for ITMOs, internationally transferred mitigation options) between Parties for use in climate pledges.

Article 6.4: The mechanism
A global carbon market that supports emissions reduction and sustainable development. Often referred to as a "Sustainable Development Mechanism", it is supposed to replace the ill-fated "Clean Development Mechanism".

Article 6.8: Non-market approaches
A framework across institutional arrangements that promotes emissions reduction and resilience for both the public and private sectors.

Source: HSBC (based on UNFCCC)

Global historical annual greenhouse gas emissions (1854-2018)



Source: PRIMAP Dataset

frequency of reviews to the process.

"This has been a contentious issue in previous discussions," said Chan. "Those with a lot of emissions – such as emerging economies – would like to sell them to other countries to help them meet their NDCs."

Committing capital

A second key item involves finalising the details of financial commitments to fund mitigation and resilience measures. An important principle is at stake: in 2009, developed economies pledged to contribute US$100 billion a year to help developing countries cope with a warmer climate, starting in 2020.

"This failed to occur, and developing economies may be forgiven for questioning whether they should be bound by their pledges when this critical promise has been broken," said Chan at HSBC. "Yet at COP26, discussions will start to set a new collective finance goal that will be implemented in 2025."

A major sticking point concerns the reporting of how much of the US$100 billion has been delivered – as required by the Paris Agreement. But only a few parties submitted formal communications in time for April's draft report, and COP26 negotiators are required to finalise this document in Glasgow. To meet its purpose, it must specify the amounts and formats of payments so far, define the use of proceeds and clarify how this funding goes beyond existing development projects.

> "At COP26, discussions will start to set a new collective finance goal that will be implemented in 2025"

Upgrading NDCs

Negotiators will also be seeking a consensus on the level of ambition for NDCs.

While the COP24 discussions achieved agreement on the period NDCs should cover, a common duration was not decided, making it difficult to aggregate and compare commitments globally. NDCs also raise the possibility of a bifurcation between developed and developing parties, with different options for each.

"A longer timeframe, such as ten years, gives a higher chance of success but less room for revision," said Chan. "A shorter duration – say five years – gives us a natural revision point but would be more difficult to implement from a political point of view."

While some flexibility will be necessary to cater for countries' specific circumstances, the key NDC components, from duration to reporting formats, should be uniform to promote accurate tracking and comparisons.

Ironing out the details

Finally, a plethora of additional details still need to be resolved, such as ensuring that decarbonisation measures do not ignore indigenous populations and are supportive of gender inclusion. Similarly, the protection of natural habitats and ecosystems will require consistent standards. Delegates will also try to agree a global adaptation goal that satisfies the more vulnerable nations, for which defences against increasingly extreme weather are as important as the longer-term decarbonisation agenda.

None of these tasks will be easy. Negotiators, however, have one important factor on their side that has changed since 2019.

"At previous COPs, climate science has been a point of much debate," said HSBC's Chan. "But the continued delivery of compelling evidence of climate change, including increasing natural disasters, means there is now more unanimity."

The impacts of climate change have become all too obvious in the run-up to COP26. That makes this round of talks more important than ever, but it also creates a sense of urgency that delegates cannot ignore.

Social values **take centre stage**

HSBC survey confirms sustainability now business as usual for issuers and investors

A majority of capital markets participants now see climate change and social responsibility as meaningful factors for their business, according to HSBC's annual Sustainable Financing and Investing Survey.

The survey of 2,000 capital markets issuers and institutional investors worldwide underlines the extent to which environmental, social and governance issues have permeated day-to-day business operations.

Over half of respondents (51%), the highest percentage in three years, say ESG issues are important because they can improve returns or reduce risk. The survey also found that 61% of issuers and investors globally believe that their responsibility to society has changed and they are more conscious and engaged than ever on making a positive impact.

"The Covid-19 pandemic has rightly focused attention on building a more resilient global economy, and a safer and more sustainable world," said Dr Celine Herweijer, Group Chief Sustainability Officer at HSBC. "We have noticed a profound change in the role and responsibilities of companies and investors – how they relate to society, to the environment, and how they support a more sustainable economy."

Now in its fifth year, HSBC's SFI survey presents a snapshot of commitment to social and environmental issues among corporates and financial institutions. This year's report points to a growing appreciation of the importance of ESG engagement – particularly among the issuer community.

Companies increasingly believe going green is good for business, with 70% of issuers considering ramping up activities that might benefit from climate change, or starting new ones. Some 94% of issuers say they expect to move away from environmentally and socially challenged business models over the next five years.

"That is a striking statistic. It indicates the extent to which companies realise they need to change, and their strong intentions to make it happen" said Herweijer.

Issuers engaging

Half of participating issuers believe climate change is one of the world's most serious problems and a further quarter cite it as the greatest threat to humanity. Moreover, half of issuers (51%) say climate change is affecting their business – sharply up from 37% in 2019 and 2020.

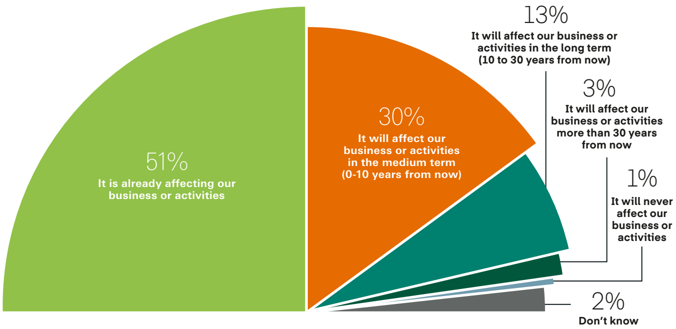
Those findings were particularly stark in the MENAT region (Middle East, North Africa and Turkey), where 45% of companies report that climate change is already impacting their business, up from just 7% in 2020.

The relationship between ESG and business outcomes is becoming clearer. This is especially the case for issuers in sectors such as transport, where 68% said ESG issues were important for financial reasons. Larger companies are also more likely to make the connection between ESG and financial benefits: 67% of the largest issuers focus on ESG for this reason compared with 34% of the smallest issuers.

"The attitudes of companies may be shifting because they are aware of how important ESG is becoming to providers of capital," said Jonathan Drew, Managing Director, ESG Solutions, Global Banking, at HSBC. "An emphatic 75% of our investor clients say they are

Climate change already impacting companies

Will climate change begin to affect your business or activities?



Source: HSBC Sustainable Financing and Investing Survey 2021

interested in investing in sustainable infrastructure projects, and of them 23% are already doing so."

Investors taking responsibility

More investors are applying an ESG lens to their decisions. Some 59% of investors say they have a firm-wide policy on responsible investing or ESG issues – up from 52% last year – while another 24% say they intend to develop one.

Just over a quarter of investors say they always look at ESG as a core part of their investment decision-making. One third – roughly in-line with 2020 and 2019's findings – consider the issuer's ESG credentials and performance when it is financially material. An additional 27% of investors do so only in funds that have an explicit ESG mandate, up from 23% last year and 18% in 2019.

Investors are becoming more concerned about greenwashing. Over two-thirds (69%) of investors said they were worried, and a quarter of those saw greenwashing as a serious problem. Respondents in the Americas and the largest asset managers were especially worried, reflecting the increased regulatory scrutiny from the US

Jonathan Drew, Managing Director, **ESG Solutions, HSBC**

Securities and Exchange Commission.

Mistrust of sustainability labels is a pervasive problem. While three quarters of investors expressed an interest in sustainable infrastructure projects, a lack of confidence is holding others back. About a quarter of the investors who had no interest in sustainable infrastructure said they find it difficult to assess whether these projects are truly sustainable.

HSBC is supporting the FAST-Infra initiative to create a global labelling system that will solve some of these issues, in partnership with the International Finance Corporation, the Organisation for Economic Co-operation and Development and others. Encouragingly, 50% of investors said they would be much more confident about investing in sustainable infrastructure should this system be implemented.

"Investors need to know that the way their funds are being used is aligned with their own objectives," said Drew. "As more investors commit to net zero targets, companies can expect their sustainability claims to come under more scrutiny."

Social values

Globally, the finance industry is better equipped to support the transition to a more sustainable world.

Contrary to the previous two years, a significant majority of respondents (63%) see nothing holding them back from pursuing ESG investing more comprehensively.

The Covid-19 pandemic has been widely credited as the spark for this shift in attitudes towards to sustainability. The HSBC survey supports that conclusion – about three-quarters of respondents agree that it has made them pay more attention – but it also paints a more complex picture.

More respondents from the Americas identified ESG issues as very important to their organization than any other region. Bigger organisations also placed more importance on ESG than smaller firms.

Covid-19 was the latest in a series of events that have created a tipping point in attitudes towards ESG issues over the past decade.

A deeper understanding of climate science and extreme weather events, together with social movements around gender and racial equality – all amplified by the power of social media – has accelerated this process.

Individuals are demanding action from governments, companies, and the financial sector to address social and environmental issues. And companies are responding.

"Corporate values appear to have become critical to the sustainability debate in a way they were not in previous years," said Alex Lupis, Global Head of Client Engagement and Global Co-Head of ESG Sales. "As ESG concerns become mainstream among the general public, companies have to think more carefully about their impact on the environment and society."

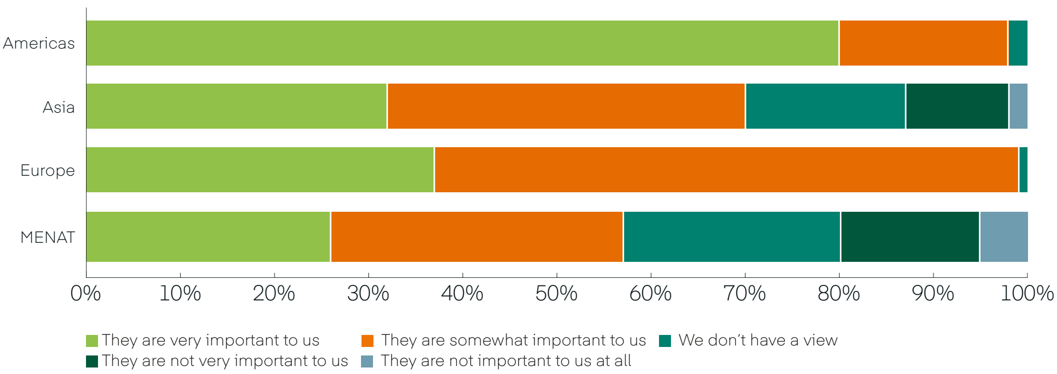
The SFI survey confirms that investors and issuers have made material progress in integrating ESG concerns into their daily activities, but there is more to be done.

Some investors (36%) said they still faced barriers to achieving sustainability targets. A shortage of expertise or qualified staff ranks as the number one impediment, especially among respondents in Asia, ASEAN and MENAT. Longstanding concerns around standards and access to data also ranked highly.

The COP26 climate conference is also likely to drive more commitments to net zero targets. Around 17% of respondents to the HSBC survey have already set net zero goals, leaving plenty of room for further action. Encouragingly, 63% of issuers say they are already working on a target.

Investors from the Americas lead the way

What is your organisation's attitude to environmental and social issues?



Source: HSBC Sustainable Financing and Investing Survey 2021

Sustainability **on the CV**

Employers need to think outside the box when it comes to recruiting sustainability expertise

Demand for sustainability expertise is rising in every industry, as more companies think seriously about their impact on society and the environment. This skills shortage is particularly acute in the financial sector, where the focus on ESG policies and disclosure has outstripped the supply of qualified personnel.

According to HSBC's annual Sustainable Financing and Investing survey, a lack of expertise is the leading reason holding investors back from pursuing ESG investing more fully. The problem may even be getting worse: 37% cited talent as a barrier, up from 30% last year.

"One of the perennial problems is a shortage of ESG expertise or qualified staff, which this year is the main issue investors face globally," said Dr Celine Herweijer, Group Chief Sustainability Officer at HSBC. "As financial institutions engage with their clients on sustainability and scrutinise decarbonisation plans, they are finding they need to develop a new set of capabilities."

The financial sector is also increasingly competing with listed companies, management consultancies and NGOs for talent. So where is all this talent coming from?

> "Unlike other functional and professional fields, there isn't a defined or prescribed pool of talent when it comes to sustainability roles"

"Unlike other functional and professional fields, there isn't a defined or prescribed pool of talent when it comes to sustainability roles," said Sarah Crawshaw, Managing Director, Asia Talent Advisory, AWPeople/Teneo. "This is an emerging field and function. As a result, companies must get creative about where they look for the talent that will bring the most value to this area. The most knowledgeable talent is often in the not-for-profit arena and scientific fields, not traditional pools for

An ESG skills shortage is a growing problem

What is holding back your organisation from pursuing ESG investing more fully and broadly?

Source: HSBC Sustainable Financing and Investing Survey 2021

most corporate entities to recruit from."

A 2020 survey by the CFA Institute backs this up. The CFA analysed the LinkedIn profiles of 1 million investment professionals and found that only 1% listed sustainability-related skills. Not only is the demand for sustainability experts growing, but the range of skills required is becoming more sophisticated. While early roles encompassed data collection and analysis and the ability to screen out undesirable stocks, top-tier sustainability positions are now more senior, requiring candidates to be comfortable across a number of disciplines. They may be formulating corporate sustainability strategies, structuring green finance products, or dealing with compliance, risk management and climate science.

"To have the most meaningful impact, sustainability needs to be embedded in all facets of a business and, to get the best results, businesses will need people with a wide range of qualifications and

> "To have the most meaningful impact, sustainability needs to be embedded in all facets of a business and, to get the best results, businesses will need people with a wide range of qualifications and background"

backgrounds," said Crawshaw. "Ultimately there should be representation from all areas of the business in a sustainability function or capability, in conjunction with the deep, relevant scientific expertise."

According to a recent Deloitte study, the role of Chief Sustainability Officer is becoming increasingly common, and 80% of people in this role have been recruited internally. The financial organisations surveyed all cited strategy, influencing and risk analysis and management as the top three skills needed by a CSO, over other technical skills.

Those who want to explore a career in sustainability can draw on a wealth of executive education options. Several top US universities, including Cornell and Yale, have launched sustainability-focused MBAs. In the UK, business schools at Cambridge and Oxford are now offering shorter courses in leading sustainable organisations. And for those who are focused on ESG investing, the CFA Institute has launched a specialised certificate that will educate practitioners on analysis and integration of ESG factors.

The HSBC survey found that talent constraints were more pronounced in Asia and the Middle East than in Europe and the Americas. In China, 44% of respondents cited a lack of expertise as a barrier to ESG investing, well above the global average.

In Asia, adding sustainability expertise often means recruiting from abroad – particularly at senior levels. But this will change, supported by initiatives like the Hong Kong government's Green and Sustainable Finance Cross-Agency Steering Group. This has released a strategic plan to strengthen Hong Kong's green and sustainable finance capabilities, particularly through nurturing local expertise.

With demand for sustainability expertise outpacing the supply of professional qualifications for now, companies are prioritising candidates who can understand their business and supporting them as they build their technical skills.

1 million

investment professionals analysed by the CFA Institute: only 1% listed sustainability-related skills

ESG NEWS ROUNDUP

China commits to ending new coal plants abroad

China has committed not to build any new coal power plants in other countries, as part of the country's push to reduce carbon emissions. The pledge, made by President Xi Jinping in a speech to the UN, affects China's plans for the Belt and Road Initiative.

"China will step up support for other developing countries in developing green and low-carbon energy and will not build new coal-fired projects abroad," Xi said.

Meanwhile, other countries have joined a UN pledge to stop building new coal plants. So far, Chile, Denmark, France, Germany, Montenegro, Sri Lanka and the UK have all signed the No New Coal agreement.

China's energy crisis pushes up solar panel prices

Emissions targets and a shortage of raw materials have contributed to an energy crisis in China that is pushing up the price of solar panels.

The price of silicon metal, which is used to create polysilicon – a critical component in solar panels – has soared 300% since the start of August, according to Bloomberg.

The disruption to the supply chain is set to slow new installations in the remainder of 2021 and reverse years of price declines for solar panels, potentially jeopardising global renewable energy projects.

Many regions in China have been rationing energy consumption to meet emissions targets set by the central government. Yunnan province, a key

production base, has slashed production of silicon metal by 90% since August.

However, the energy rationing has also been put down to a shortage of coal and the rising cost of coal imports. Tight conditions in the global energy market have pushed up fossil fuel prices globally.

HSBC and Temasek launch sustainable debt platform

HSBC and Singapore state investment fund Temasek have launched a debt financing platform to fund sustainable infrastructure projects that aim to reduce climate change. With an initial focus on Southeast Asia, the initiative aims to address a funding gap in the region by setting aside a portion of funds to target marginally bankable projects.

An initial US$150m of equity has been invested to fund the loans, with a view to scaling up to US$1bn of loans within five years. Technical assistance will come from the Asian Development Bank and Clifford Capital, a Singapore-based infrastructure finance platform that has pioneered the securitisation of project financings.

Over time, HSBC and Temasek hope to create a tradeable asset class for private and institutional investors.

"This innovative partnership aims to tackle some of the biggest barriers to financing sustainable infrastructure where it's needed the most," said Noel Quinn, Group Chief Executive of HSBC.

"Neither private nor public sector can close the financing gap alone – but by working with Temasek, the Asian Development Bank and Clifford Capital, we can deploy significant amounts of blended finance for projects in Southeast Asia that would otherwise go unfunded."

SEC asks companies for more climate disclosures

The Securities and Exchange Commission (SEC) has sent letters to dozens of listed companies asking for more disclosures related to climate change risks. In a sample letter, posted on the SEC website, the regulator's requests include information related to transition risks, physical risks and carbon offsets.

SEC Chair Gary Gensler

The SEC is expected to come up with further climate rules and SEC Chair Gary Gensler has said that his staff are developing proposals for climate risk disclosures, which are expected to be mandatory and could be released in 2022.

World Bank figures highlight disparity in Covid-19 vaccines

Around 66% of people in high-income countries have already received at least one dose of the vaccine, compared to only 2% in low-income countries, according to recent figures from the World Bank.

The World Bank puts this disparity down to lopsided competition for limited vaccine supplies between rich and poor countries.

While many high-income countries are reopening their borders and boosting economic growth, low-income countries are still struggling to vaccinate their critical workers and the most vulnerable citizens.

ESG-related bond sales reach bumper levels

Global ESG-related bond sales have reached US$750bn so far this year, according to figures from Bloomberg, compared to US$468bn for the full year in 2020. Banks have also earned approximately US$3.6bn of fees for green, social or sustainable bonds, almost twice what they were paid to arrange bond sales by fossil-fuel companies. Analysts expect the market to grow further.

World's wealthiest donate US$5bn to save land and sea

A group of the world's richest people have pledged billions to protect nature. The philanthropists, including Amazon founder Jeff Bezos, have committed US$5bn to covering the cost of conserving natural life in 30% of the earth's land and sea by the end of the decade.

"We can solve the crisis facing nature," said Swiss businessman Hansjörg Wyss, who pledged US$500m. "But it's going to take the wealthiest nations and the wealthiest individuals committing to reinvest our enormous bounties here on Earth, safeguarding nature and protecting our lands, waters and wildlife."

Mercedes-Benz invests in electric vehicle batteries

Mercedes-Benz has bought a 33% stake in Automotive Cells Company (ACC), which will put it on a path to being an electric-only carmaker. ACC is a joint venture between the carmaker, Stellantis and TotalEnergies, which was founded in August 2020 and created with the support of French, German and European authorities to develop a European battery champion for electric vehicles. As part of the agreement, ACC will supply batteries to the German carmaker from around 2025.

"Mercedes-Benz pursues a very ambitious transformation plan and this investment marks a strategic milestone on our path to CO_2 neutrality. Together with ACC, we will develop and efficiently produce battery cells and modules in Europe – tailor-made to the specific Mercedes-Benz requirements," says Ola Källenius, CEO of Daimler AG and Mercedes-Benz AG.

Supply chains key to corporate emissions –McKinsey

Approximately two-thirds of the average company's ESG footprint lies with suppliers, and procurement leaders are well placed to make a difference to a company's impact on society, according to McKinsey.

The consultancy argues that of the indirect emissions that occur across a company's value chain – such as embedded emissions in purchased goods and services, or employee travel and commuting – two-thirds can be found in a company's upstream supply chain. The research underlines the importance of purchasing decisions in meeting sustainability targets. In a survey of procurement officers at large European firms, McKinsey found that only 20% used sustainability criteria for making decisions on their sourcing and suppliers.

Long-term impact of Covid could slice 3% off GDP

The Covid-19 pandemic could have a lasting impact on global economic potential, with two economists estimating that the long-term effects could slice 3% off global GDP. Luke Bartholomew and Paul Diggle of Aberdeen Standard Investments identified areas that will cause lasting changes to the economy. These include shocks to the labour market and impaired skills acquisition in the workforce, as well as a general trend for businesses and consumers to take less risky decisions – the result of 'belief scarring' from the pandemic.

© Ben Shread

UK Prime Minister Boris Johnson

UK's Johnson urges nations to step up ahead of COP26

UK Prime Minister Boris Johnson has urged world leaders to do more to tackle climate change and said they need to be ambitious.

"This means bold commitments on coal, cars, cash and trees to limit temperature increase to 1.5 degrees and set the world on the path to net zero emissions," he wrote in a Tweet ahead of the COP26 talks, which the UK is hosting.

The summit is viewed as crucial to meeting the 2015 Paris Agreement target of limiting global warming to 1.5°C. After a series of pre-COP26 meetings, Alok Sharma, the COP26 President, said there was consensus among delegates to keep that target on track.

Not everyone is so optimistic, however. Climate activist Greta Thunberg issued her own mocking response.

"Net zero by 2050 blah blah blah net zero blah blah blah climate neutral blah blah blah. This is all that we hear from our so-called leaders. Words. Words that sound great, but so far has led to no action. Our hopes and dreams drown in their empty words and promises," she said at a youth climate summit.

Why is it so important **to protect our natural capital?**

This month, we look at the importance of biodiversity and the economic case for conservation

One of the advantages of being a multi-billionaire is that you can splurge on space travel and discover what planet Earth looks like from a distance. For Amazon founder Jeff Bezos, the new perspective on Earth's vulnerability was so moving that it spurred him to donate US$1bn to conservation projects.

"I'd heard that seeing the Earth from space changes one's point of view of the world. But I was not prepared for just how much that would be true," he said.

The September donation is part of the US$10bn he has already pledged to the Bezos Earth Fund, but this announcement is specifically focused on biodiversity hotspots. So, what exactly is biodiversity, and why is it important?

US$1bn

donated by Amazon founder Jeff Bezos for conservation projects

Simply put, biological diversity refers to the richness, the volume and the interactions of all forms of life on the planet, all of which are essential for life. Without biodiversity, humans cannot exist. Or, in Bezos's words: "Nature is our life support system."

The World Wide Fund for Nature describes biodiversity as all the animals, plants, fungi and micro-organisms in the natural world and how they work together in ecosystems. They support our survival: food, clean water, medicine and shelter.

But the life support system is fast being destroyed. The WWF's 2020 Living Planet report highlighted, for example, how the population sizes of mammals, birds, fish, amphibians and reptiles had on average dropped on average by 68% since 1970. Species are also becoming extinct at a dramatic rate.

The report came with a stark warning and a reminder that we destroy the planet at our peril: "As humanity's footprint expands into once-wild places, we're devastating species populations. But we're also exacerbating climate change and increasing the risk of zoonotic diseases like covid-19. We cannot shield humanity from the impacts of environmental destruction. It's time to restore our broken relationship with nature for the benefit of species and people alike."

Efforts to put a dollar value on biodiversity only underline the scale of this environmental crisis. Swiss Re Institute estimates that over half of global GDP – equal to US$41.7tr – is dependent on robust biodiversity and ecosystems. Despite this, however, a fifth of countries around the world face the risk of the ecosystems collapsing because of a decline in biodiversity.

The case for action is clear, and various initiatives are seeking to stem this decline.

At a multilateral level, the United Nations Convention on Biological Diversity will convene a 15th Conference of the Parties (COP15) in Kunming, China, in April 2022, following a virtual event this month. The Global Ocean Alliance's 30by30 initiative, a UK-led alliance to protect at least 30% of the world's oceans by 2030, has gained traction, winning the support of over 100 countries.

Financial institutions have also taken action through initiatives such as the Finance for Biodiversity Pledge, which so far has 75 signatories from 17 countries.

At an individual level, HSBC is working with Earth Security to help mobilise finance for the conservation of Australia's mangroves, which are critical to the country's coastal ecosystem and highly effective carbon sinks.

Companies may soon have to disclose their exposure to biodiversity risks under a framework being developed by the Taskforce for Nature-related Financial Disclosures, officially launched earlier this year. The TNFD's work is expected to mirror that of the climate-focused TCFD, in a bid to encourage more financial flows into projects that have a positive impact on nature.

"I'd heard that seeing the Earth from space changes one's point of view of the world. But I was not prepared for just how much that would be true"

A voice for **the vulnerable**

Andrea Meza-Murillo's ambitions in the battle against climate change go far beyond Costa Rica's borders

In the run-up to the COP26 climate conference, the loudest voices in the fight against climate change are not necessarily from the biggest countries.

Andrea Meza-Murillo, Costa Rica's Minister of Environment and Energy, has become a powerful advocate for the needs of smaller and vulnerable nations.

"We're proud to be a highly ambitious country in climate and biodiversity," said Meza. "We believe that this is the way to modernise and dynamise our economy."

Costa Rica is a case-study of sustainability in action. The small Central American country covers only 0.03% of the Earth's surface but supports 6% of the planet's biodiversity. Its reforestation initiatives have doubled forest coverage in two decades and in 2019 it was powered entirely by renewable energy for more than 300 consecutive days – for the third year in a row.

Costa Rica committed February 2019 to reach net zero emissions by 2050, based on a detailed plan covering transport, energy, land use and power generation.

These policies have helped make Costa Rica the happiest and most sustainable country in the world, according to the New Economics Foundation's Happy Planet Index.

Despite that progress, it remains one of the world's most vulnerable countries. Sandwiched between the Caribbean Sea and the Pacific Ocean, Costa Rica is susceptible to extreme weather events on both coasts, while its mountainous topography leaves its population concentrated in areas at high risk of flooding and landslides. Its numerous microclimates, home to exceptional levels of biodiversity, are also vulnerable to climate change, as is the country's eco-tourism sector – a major pillar of the economy.

Call to action

Meza heads to Glasgow with two requirements for COP26. The first is that delegates agree on tough standards for global carbon offsets in line with Article 6 of the Paris Agreement. Meza leads the San Jose Principles Coalition, an alliance of nations advocating minimum standards to ensure that carbon trading provides additionality – that its

1st

Costa Rica's ranking on the Happy Planet Index of the world's happiest and most sustainable countriess

benefits are measurable and cumulative. This builds on the San Jose principles, agreed by 32 countries ahead of COP25 in 2019.

"We will, as a group, determine the best way for [the principles] to evolve to help us develop actionable, high-ambition solutions for international carbon markets," said Meza.

An effective carbon-offset mechanism must be built to rigorous standards that ensure even the most polluting territories pay their way. Meza will draw on her negotiating skills to "to help us develop actionable, high-ambition solutions for international carbon markets".

Meza's second agenda item for Glasgow is to press for emergency action for the most vulnerable countries under the auspices of the Climate Vulnerable Forum (CVF), an international alliance of 48 countries most threatened by climate change. In September, the CVF's Climate Survival Leadership Group called on COP26 delegates to deliver a climate emergency pact "to rebuild confidence in international climate cooperation" following developed nations' failure to deliver the US$100bn promised in 2009 to fund decarbonisation and resilience measures in developing markets.

The emergency pact would include a delivery plan for the outstanding funds. As part of this process, economic damage from extreme weather events must be 'operationalised' to minimise long-term impacts as developing countries work towards improving the livelihoods of their populations.

In addition, the emergency pact would require all countries to raise their NDCs annually at each COP until 2025, ratcheting up ambitions. It also calls for carbon market mechanisms supporting the push for 1.5°C and suggests that 5% of carbon trading proceeds be earmarked for vulnerable communities.

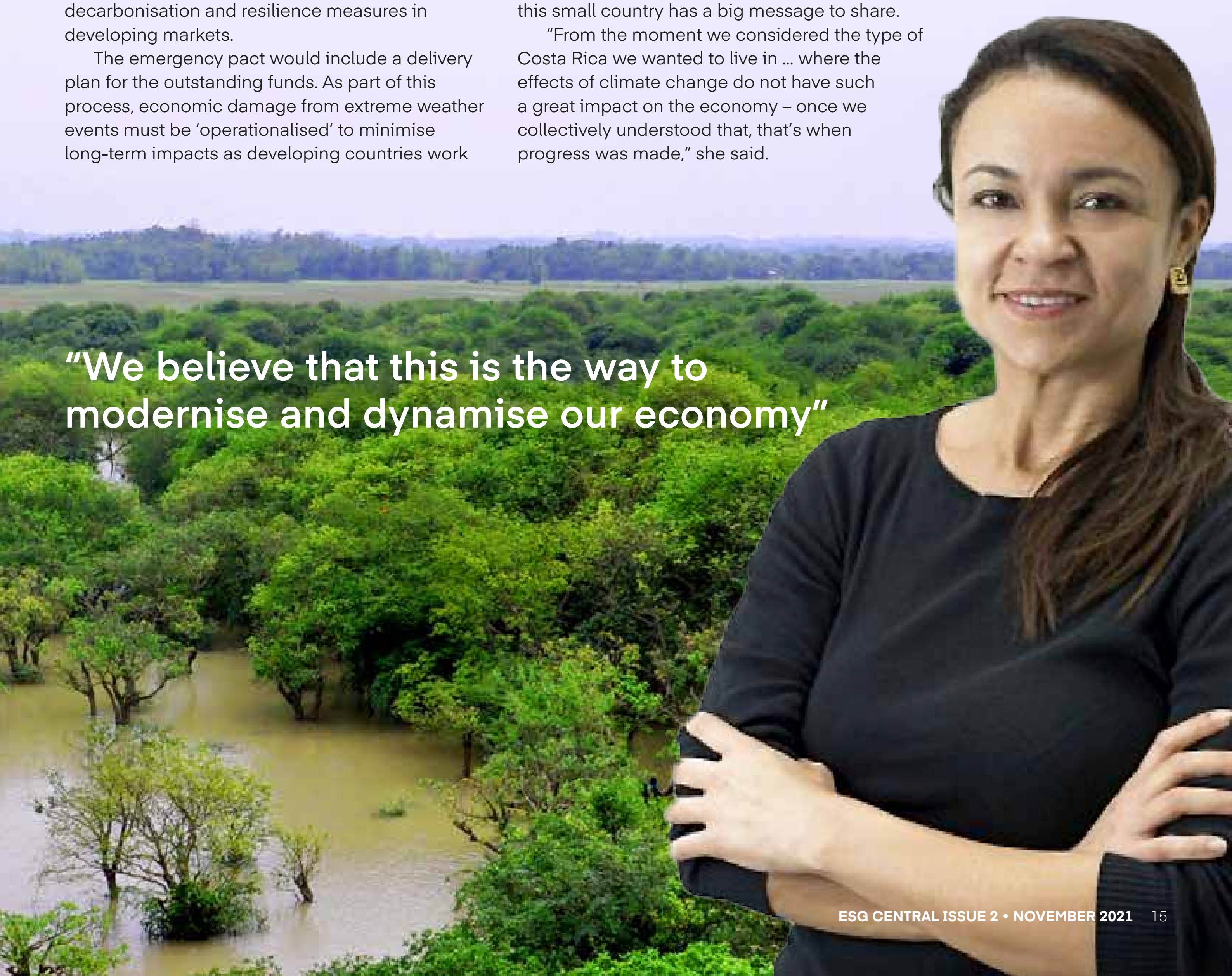
The CVF's statement concludes by calling on the international community to deliver seven "urgent and essential actions" from climate-resilient debt restructuring to the appointment of a United Nations Special Rapporteur for climate change. Taken together, these actions acknowledge the pressing issues facing vulnerable nations and promote pragmatic action to address them.

For Meza, 20 years at the frontline of conservation and sustainability in her country and on behalf of vulnerable nations have convinced her that sustainability and economic development are closely linked. As delegates prepare for the next round of crucial climate talks, the minister of this small country has a big message to share.

"From the moment we considered the type of Costa Rica we wanted to live in … where the effects of climate change do not have such a great impact on the economy – once we collectively understood that, that's when progress was made," she said.

US$100bn

Amount promised since 2009 to help developing countries combat climate change



"We believe that this is the way to modernise and dynamise our economy"

Moonshots **wanted**

This month's look at emerging ESG technologies focuses on two corners of the transportation sector where low-carbon alternatives are yet to take off

Tesla CEO Elon Musk has brought the concept of the moonshot into the mainstream, convincing investors to back highly ambitious goals over predictable profits. But for all the buzz around electric cars, large parts of the transportation sector remain heavily dependent on fossil fuel.

Aviation produces 2% of global CO_2 emissions each year, and shipping contributes a further 3%. To reduce emissions on a trajectory that will achieve net zero by 2050, these industries need to start adopting new, lower-carbon fuels now. But what can replace jet fuel and marine diesel?

Up in the air

The aviation sector is at the early stages of plotting a course to net zero.

"Various industry trade bodies have modelled the decarbonisation pathway for aviation to 2050," said Andrew Lobbenberg, Head of European transportation research at HSBC. "While airlines' carbon offsetting will play a significant role until 2030, by 2050 it will shrink to 8%."

The sector is investigating a number of options with a view to adopting a combination of clean fuels for various applications. For example, electric power is seen as a viable alternative for small regional aircraft and is likely to be available by 2035, but current battery technology lacks the capacity needed for long-range or wide-bodied aircraft.

Green hydrogen, while an attractive prospect, will take longer to deliver. According to HSBC Global Research, about 98% of current hydrogen generation involves carbon-intensive natural gas or coal feedstocks, producing 'grey' hydrogen.

"Green production relying on renewable energy currently costs three to four times as much as grey," said Lobbenberg. "Wholesale power costs will need to halve before hydrogen produced by electrolysis becomes a viable fuel for aircraft."

As a result, airlines are considering sustainable aviation fuel (SAF) to make inroads into their carbon tally.

SAF is a non-fossil fuel, low-carbon alternative to kerosene that can be made from feedstocks including plants, waste and green power. Potential raw materials include vegetable oils, used cooking oil, forest and agricultural waste, non-food crops, municipal waste and algae.

"IATA's air transport action group (ATAG) predicts that SAF will be responsible for 97% of aviation decarbonisation between 2030 and 2035," said Lobbenberg.

Today, only SAF based on used cooking oil and vegetable oils has reached industrial-scale production, and it costs two to three times more than kerosene, according to HSBC Global Research. This is where policy intervention can help.

"The EU Fit for 55 policy offers a live example," said Lobbenberg. "By adding taxes to kerosene and raising the price of carbon, it seeks to incentivise adoption of SAF."

Airlines have begun to raise funding for these changes and are finding investors supportive of the longer timeframes involved. Abu Dhabi-headquartered Etihad Airways last year achieved a world first with a US$600m sustainability-linked sukuk that financed the purchase of energy-efficient aircraft and research and development into sustainable aviation fuels. The deal features a commitment from the airline to pay a penalty in the form of carbon offsets if it fails to meet its short-term target to reduce the carbon intensity of its passenger fleet. British Airways also sold sustainability-linked notes in July.

Not all at sea

Shipping operators face similar challenges to their aviation counterparts. Maritime transport is responsible for 80% of global trade volume, but there are no quick fixes for diesel-powered vessels on long-haul routes and tight schedules. Replacing existing fleets will take decades and according to the UN will cost more than US$1.65 trillion; in addition, a global change of fuel will require land-based infrastructure to be entirely replaced, accounting for 87% of the cost.

The International Maritime Organisation has set a goal of cutting CO_2 emissions international shipping by at least 40% by 2030, with further efforts to achieve 70% by 2050, compared to 2008 levels. A substantial portion of these savings will come from replacing existing vessels with less carbon-intensive versions through more efficient hull designs; it will also realise emissions savings by cutting times in port and wasteful routing strategies.

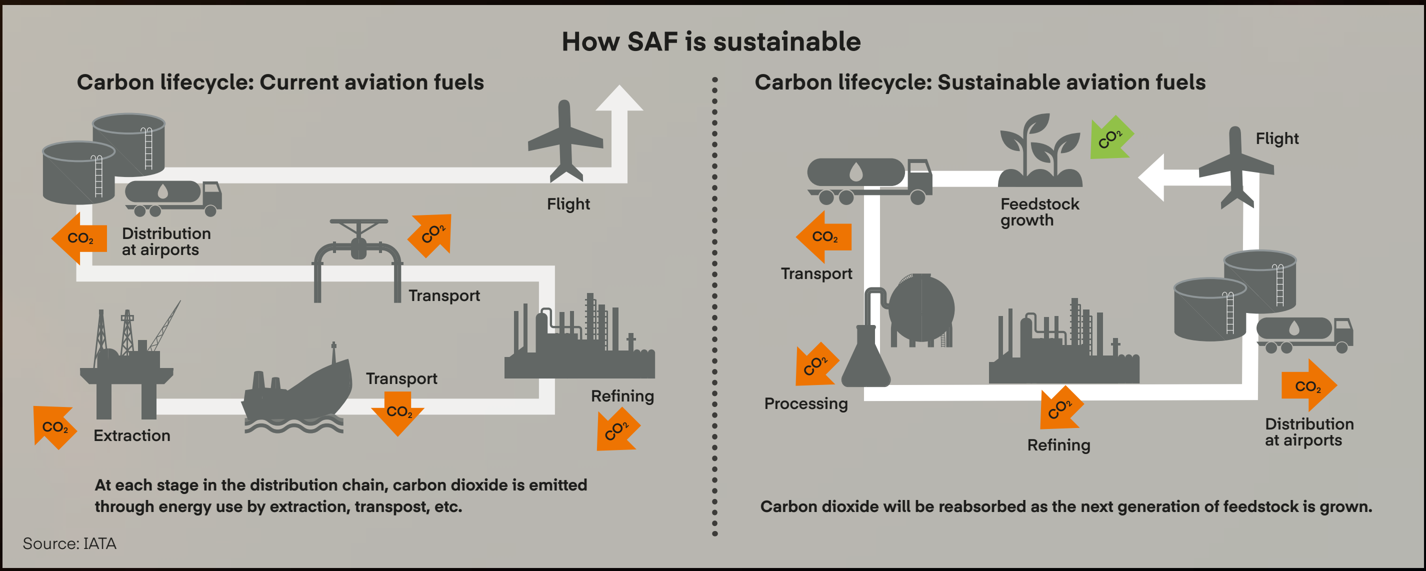
Ammonia and methanol are in the race to become fuel for the future for shipping – and both have advantages and disadvantages. Ultimately, experts believe it will boil down to the input price. Research from DNV has argued that, if sustainable electricity is less expensive, then e-ammonia (ammonia synthesized from nitrogen and hydrogen in an electrochemical process) makes the most sense; but if biomass is less expensive, then bio-methanol comes out ahead. Both products are liquid fuels and are already widely carried as cargoes, making them relatively suitable for retrofitting vessels, although ammonia has its own special handling considerations. More importantly, methanol can be burned in a suitably-adapted marine diesel engine.

Indeed, one of the world's largest container shipping companies announced in August that it will spend US$21.4bn on eight ships with a capacity to carry around 16,000 containers. At the same time, Japanese shipping lines are looking to build to build a global supply chain of cleaner marine energy using fuels such as hydrogen and ammonia as the world heads toward carbon neutrality by 2050. Transitioning air and sea transport to carbon neutral fuels is a global challenge that stretches even the original definition of a moonshot. While the process will take time, clean fuels are already under intensive development – and funding is available.

US$600m

Proceeds of Etihad Airways' landmark sustainability-linked bond, a first for the aviation sector

"The gradual, long-term approach required in the shipping sector means specialist transition financing arrangements are needed"



Seven questions: Dr Celine Herweijer


© HSBC

HSBC's newly appointed Group Chief Sustainability Officer explains her vision for a carbon-neutral future

1 What are your priorities for your new role at HSBC?

Put simply, my job will be to integrate sustainability and the transition to net zero into the DNA of the bank. Last year HSBC made a commitment to reach net zero by 2050, including across our financed emissions portfolio. The implications of transitioning that portfolio are huge. It means we need to start engaging with all our clients, big and small, on their transition plans. We need to be able to judge the validity of those plans, and we need to set the right incentives for decarbonisation through the right KPIs. It's a whole set of new capabilities we need to build into the bank.

2 Is sustainable development really part of a bank's mandate?

There has been a step change recently in climate commitments from the banking sector. Ahead of the COP26 meeting, 53 banks have set science-based net zero targets under the Glasgow Financial Alliance for Net Zero, covering a quarter of all banking assets globally. The fundamental thing for banks is to reduce their financed emissions, and that will mean a massive transformation for the whole banking sector.

The starting point for us is to work in partnership with our clients and help finance that massive industrial transition. That's why HSBC's sustainability commitment includes a pledge to unlock up to US$1tr of finance to reduce emissions. As a major bank, we can help to rapidly scale up technologies that we know will make a difference: bringing renewable energy to emerging economies, developing electric vehicles, alternative proteins and circular business models.

3 What about new and emerging technologies?

There is a big technology angle to this. From here until 2030, it is about scaling what we already have, but if we look ahead to 2050, many of the solutions we will need are still at the development stage. A key focus for the bank will be backing some of these deep decarbonisation technologies that will be critical to getting us to net zero. These include sustainable aviation fuels, long-term battery storage and green hydrogen, as well as many other technologies that need funding before they can start contributing towards the transition.

This will involve a completely different kind of financing, but the good news is that there's a lot of interest now in climate tech. It's the fastest growing investment theme within the venture capital community with about US$16bn of investment in the first half of this year. Our asset management business is working on new funds to help scale that opportunity, and we have invested in other partnerships, for example with the World Resources Institute and WWF to invest in early-stage climate solutions in Asia.

4 Do we have the tools we need to finance this transition?

The financing community should continue to come together on standards for climate data and disclosure. Without quality data and effective methodologies for comparisons, we can't track progress towards our goals, work out where extra investment is needed, or judge where interventions are working.

Data is not just about tracking overall emissions, but about how companies are incorporating sustainability targets into their businesses. To assess where clients are in terms of their transition, we need information across the whole portfolio, from privately owned and state-run companies, as well as the biggest listed issuers. This will mean standardisation across the industry: all financial institutions and asset managers will be asking for the same data as well.

5 Do you have a particular area of focus within ESG?

We need to be active in all these areas. We would love to finance more sustainable infrastructure, for example, and we are working with the International Finance Corp, Organisation for Economic Cooperation and Development (OECD) and others on a new label called Fast Infra to create a more liquid asset class of bankable projects, supported by a technology platform to deepen the market for project finance. We hope to get to a point where this common label can be applied to any sustainable infrastructure asset that meets a certain standard, giving more investors the confidence to come in and support it.

While climate change is a huge focus, we are also committed to nature-based solutions that will play such a critical role in the future. Making sure we protect and rebuild our biodiversity is imperative for the planet to support its population and will help us cope with extreme weather events – particularly for smaller and developing nations.

6 With COP26 about to happen, what is your advice to delegates?

This is a key moment in time where we have the opportunity to raise our ambitions and create a sense of urgency. The pandemic has shown us that all communities and economies are vulnerable to unforeseen threats, but it also showed that acting together, by pooling resources and pursuing a common goal, can produce amazing results – just look at how rapidly technology, investment and political will produced new vaccines in record time.

7 Do you believe the world can reach net zero by 2050?

We're all going to need to come together in a big way to make the net zero transition happen in time. At a policy level, we need to use all the levers that are available, starting with government commitments that flow down to policies in individual sectors. A higher carbon price will also be helpful.

There is no silver bullet, but we are starting to see real support for a managed transition. At COP, for example, there will be some interesting conversations around the energy mix in emerging countries and the global push for the early retirement of coal infrastructure. There is a variety of public and private ideas coming through there.

It's a big journey ahead, but we're ready for it and we look forward to working in partnership with our clients.

Research notes

Navigating COP26

The pressure is on global leaders to deliver real results at COP26, the 26th Conference of the Parties to the UN Framework Convention on Climate Change (UNFCCC), which kicks off at the end of October.

This negotiation is considered to be our last chance to put the world onto a net zero emissions trajectory by 2030. Recent extreme weather events around the world have provided further pressure.

HSBC Global Research outlined a number of key topics that will determine whether the meeting is a success. Top of the list are discussions on a system of trading carbon offsets between countries and the provision of climate funding for developing economies. There is no doubt that a successful COP26 will result in an acceleration of climate policies which will involve more disclosure, more regulation and more scrutiny of 'greenwashing'.

Wai-Shin Chan, global head of ESG research at HSBC, argues that the most important outcome for investors and businesses is clarity. (See this month's cover story for more.)

A greener bond framework

ESG investors in corporate bonds should pay more attention to climate ambitions than historical data, according to HSBC Global Research.

The growth of ESG investing strategies recognises that investors have an essential role to play in the transition to net zero. Many strategies, however, are based on an issuer's track record in reducing emissions, rather than their contribution to limiting future climate change.

HSBC analysts argue that a forward-looking framework would have a bigger impact on future emissions and allow investors to identify laggards in advance.

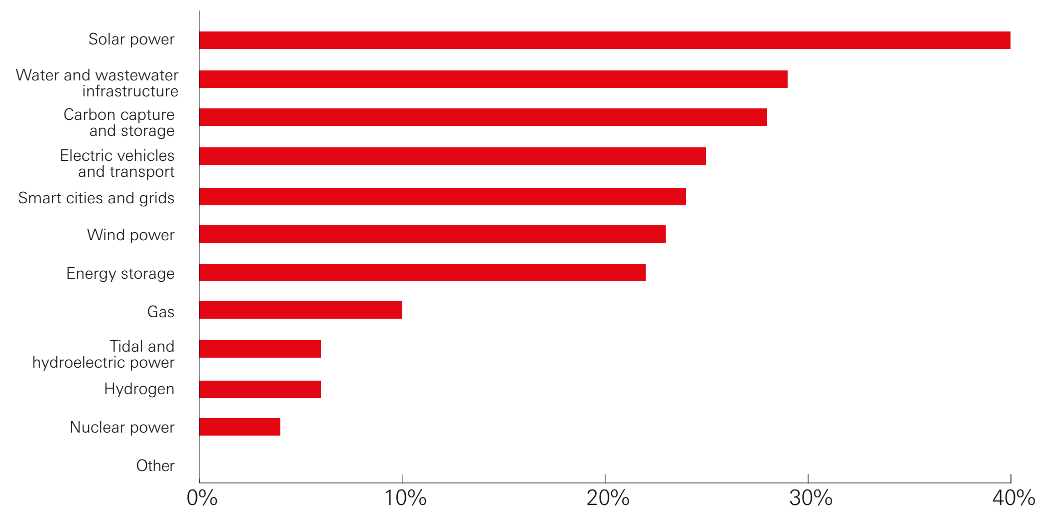
Climate ambition is also a focus for policymakers and standard-setters and the Taskforce on Climate-Related Financial Disclosures (TCFD) is currently developing forward-looking metrics.

While these metrics are still being worked through, this report proposes a new framework that differentiates between issuers based on their contribution to net zero.

This involves a Sectoral Decarbonisation Approach (SDA) for carbon-intensive sectors where an emissions benchmark is available and a Climate Ambition Indicator (CAI) framework for sectors without a benchmark.

Investor interest in solar power generation shines through

Which of the following types of sustainable infrastructure projects would you be most interested in investing in?



Source: HSBC Sustainable Financing and Investing Survey 2021

Prepare for a water crisis

Investors, companies and governments are not yet fully recognising the risks and opportunities from a looming water crisis, according to HSBC Global Research.

Climate change, demographics, and rapid rates of urbanisation are raising the risks of water shortages.

By 2050, one in five countries will be facing water shortages and as much as 50% of global grain production could be at risk, according to the UN.

In that scenario, the impact on food production, population displacement and health would be devastating.

Solving this crisis will require better management of the world's water resources, including greater use of technology to reduce waste and improve infrastructure. But it doesn't come cheap: according to the World Bank, it would cost US$21 billion a year (0.1% of global GDP) until 2030 to provide water and hygiene benefits to all who need it around the world.

Financing, according to HSBC analysts, is not where it should be. The market is only beginning to insist on data and disclosure related to water usage and water risks, and this trend is likely to rise as awareness grows.

Treating water as a commodity would improve resource allocation, but this is a complex topic. One initiative to trade water futures in California is, ironically, illiquid.

ABC of **ESG**

The world of ESG has its own sometimes dizzying array of acronyms and terms. Get to grips with some of the key concepts here

CARBON CAPTURE AND STORAGE (CCS)
A process whereby CO_2 is captured from industrial facilities and transported for storage, often in a geological formation such as an oil and gas reservoir. This process prevents the CO_2 from entering the atmosphere. The IPCC estimates that CCS has the capacity to reduce the costs of stabilising CO_2 in the atmosphere by 30% or more – but some critics believe it can discourage the transition to lower-carbon processes and technologies.

CARBON OFFSET
Allows companies or individuals to compensate for their CO_2 emissions by buying a corresponding reduction in emissions elsewhere. Companies can use carbon trading schemes or pay carbon taxes, while individuals can use offset schemes to neutralise their carbon footprint.

CARBON FOOTPRINT
The total CO_2 emissions caused by an organisation or individual over time.

CARBON TRADING
Enables companies to buy or sell permits that allow for the emission of a particular amount of CO_2. The European Union Emissions Trading Scheme (EU ETS) is the largest of these schemes and works on the cap-and-trade principle, where a cap is placed on the total amount of CO_2 that can be emitted within the trading zone and that limit is reduced over time. Pricing carbon in this way can also promote investment in low-carbon technologies.

CLIMATE CRISIS
Term used to describe the consequences of global warming and subsequent climate change. If the world fails to limit global warming below 2 degrees centigrade from pre-industrial levels through decarbonisation, there will be significant consequences for biodiversity, ecosystems, food and water security and infrastructure from extreme weather events. Some believe that the climate crisis has already begun.

CRYPTOCURRENCY
An encrypted digital token based on blockchain technology, such as Bitcoin. Some cryptocurrencies have been criticized for the energy-intensiveness of "mining," or updating the blockchain and creating new tokens.

DECARBONISATION
The process of reducing the carbon emissions of an organisation or economy. Techniques for decarbonisation include reducing the use of fossil fuels, increasing renewable energy use, switching to electric transport, agricultural change and CCS.

ESG
The acronym for Environmental, Social and Governance is used to refer to the non-financial policies and activities of an organisation and its commitment towards responsible behaviour and sustainable growth. Financing and investment in accordance with ESG principles are growing exponentially.

ELECTRIFICATION
Road transportation accounts for around 18% of total global emissions and will need to make significant CO_2 reductions for economies to meet net zero targets. Vehicles using electricity from renewable sources can make a key contribution to this goal.

GREEN HYDROGEN
Hydrogen does not generate greenhouse gases at point of use, but most current methods of producing hydrogen involve fossil fuels. Using renewable energy to power the electrolysis that produces hydrogen makes "green" hydrogen emissions-free.

GREEN TAXONOMY

A green taxonomy is a classification system that establishes a list of sustainable economic activities, providing a common basis for companies and investors to use.
The EU has recently created a green taxonomy that may well become the global standard.

GREENHOUSE GASES (GHG)

Gases in our atmosphere that include water vapour, carbon dioxide (CO_2), nitrous oxide and methane. These gases absorb infrared radiation and trap heat in our atmosphere, causing global warming.

GLOBAL WARMING

The increase in global surface air and sea temperatures over a 30-year period caused by human activities that emit greenhouse gases. Global warming is expressed relative to pre-industrial temperatures. New global commitments aim to keep global warming well below 2°C by the end of the century aim to avoid catastrophic climate change.

INTERGOVERNMENTAL PANEL ON CLIMATE CHANGE (IPCC)

The United Nations body for assessing climate change science. It provides regular reports on climate change impacts and risks as well as options for adaptation and mitigation. The IPCC is considered the most reliable and credible source of climate change science.

NET ZERO

Describes the situation in which no additional emissions are being added to the atmosphere. While emissions will continue to be released, an equivalent amount will be absorbed either through natural carbon sinks such as forests or through technology such as CCS.

PARIS AGREEMENT / COP21

The 21st Conference of the Parties (COP) to the United Nations Framework Convention on Climate Change was held in Paris in 2015 A legally binding international treaty was agreed at COP21, called the Paris Agreement. Adopted by 196 parties, the treaty sets out the goal to limit global warming to well below 2°C.

RENEWABLE ENERGY

Electricity that comes from a sustainable source such as solar power, wind or waves. These sources do not emit carbon dioxide or other greenhouse gases. Green hydrogen also has potential as a source of emissions-free energy.

SDGS

The United Nations' Sustainable Development Goals (SDGs) are a blueprint for a more sustainable future for people and the planet. There are 17 interlinked goals that recognise that ending poverty and deprivation can only be achieved through a range of goals including health, education, reducing inequality and tackling climate change.

TCFD

The Taskforce on Climate-Related Financial Disclosures was established in 2020. It provides recommendations on financial disclosures that are becoming accepted as the gold standard globally. These disclosures will aid understanding of exposure to climate risks and help investors better take these into account in their decision-making.

UNPRI

Launched in 2006, the United Nations Principles for Responsible Investment is a voluntary set of investment principles that provide a framework for incorporating ESG considerations into investment processes and decisions. There are now more than 3,000 signatories with collective assets under management of over US$1 trillion.

Redefining seed capital

HSBC's green financing is helping connect seedling producer PRT to its next branch of growth

PRT Growing Services grows trees. Lots of trees. Over its 30-year history, the company has delivered 4.5 billion seedlings to help governments and timber producers replant forested areas. It has branched out from its home on Vancouver Island to become the largest producer of container-grown forest seedlings in North America, operating a network of 21 growing and cold storage facilities in the US and Canada.

At a time when the world is ramping up reforestation efforts, companies like PRT are an essential link in the sustainability chain, serving on the front line in the fight against climate change.

They can also be attractive investment opportunities.

Enter Instar Asset Management, a Toronto-based private capital firm specialising in infrastructure investments that deliver essential services across North America. Instar spotted the value in PRT, acquiring the company earlier this year and investing in its future with enhanced operations and a plan for growth.

"Improving the resilience of our forests has never been more important," said Gregory J. Smith, President and Chief Executive Officer, Instar Asset Management.

"We are excited to partner with PRT as we expand the company's reach and bring a positive environmental impact to more communities."

Sustainable forestry is a core component of the global push to reduce carbon emissions and combat the effects of climate change. If deforestation continues at its current rate, the impact on the environment will soon become irreversible as temperatures rise and more forest land is degraded. Even the Amazon basin now emits more CO2 than it absorbs, a group of Brazilian scientists found this year.

Reforestation, on the other hand, can reverse some of the damage and improve the outlook for the forestry industry, by creating more opportunities for sustainable cultivation and safeguarding jobs.

Canada committed in 2020 to plant 2 billion trees over 10 years to lower emissions by up to 12 megatonnes a year by 2050, part of its scaled-up climate plan to reach net zero. This year the government allocated C$3.2 billion towards the programme, to be spent over the next decade.

Globally, the World Economic Forum is promoting a campaign to conserve, restore and grow 1 trillion trees by 2030 by emphasising the need to protect the world's natural ecosystems and the power of nature-based solutions in the fight against climate change.

Initiatives like these are raising awareness in the private sector of the need to invest in biodiversity, and the potential of nature-based investments.

"Protecting our ecosystems is not just a job for governments and the public sector. Companies like PRT prove that private stakeholders can also benefit from the transition to a more sustainable future," said Angie Hall, Head of Sustainable Finance, Commercial Banking, at HSBC Bank Canada.

HSBC stepped forward as Green Loan Coordinator on a C$90 million Green Loan to support Instar's acquisition and PRT's future growth, taking responsibility for ensuring that operations complied with global market standards.

"Green financing allows innovative companies to expand their decarbonization initiatives and help mitigate the effects of climate change," said Hall.

HSBC has committed to mobilize at least US$750 billion by 2030 to support businesses in the transition to a more climate-friendly, low-carbon future. Green loans, which fund projects with clear environmental benefits, are a key part of this target.

Let’s paint the town green