Human-centric globalization: Taking G20 to the Last Mile, leaving none behind

Vasudhaiva Kutumbakam – these two words capture a deep philosophy. It means 'the world is one family.' This is an all-embracing outlook that encourages us to progress as one universal family, transcending borders, languages and ideologies. During India's G20 presidency, this has translated into a call for human-centric progress. As One Earth, we are coming together to nurture our planet. As One Family, we support each other in the pursuit of growth. And we move together towards a shared future – One Future – which is an undeniable truth in these interconnected times.

The post-pandemic world order is very different from the world before it. There are three important changes, among others.

First, there is a growing realization that a shift away from a

GDP-centric view of the world to a human-centric view is needed.

Second, the world is recognizing the importance of resilience and reliability in global supply chains.

Third, there is a collective call for boosting multilateralism through the reform of global institutions.

Our G20 presidency has played the role of a catalyst in these shifts.

In December 2022, when we took over the presidency from Indonesia, I had written that a mindset shift must be catalyzed by the G20. This was especially needed in the context of mainstreaming the marginalized aspirations of developing countries, the Global South and Africa.

The Voice of Global South Summit in January 2023, which witnessed participation from 125 countries, was one of the foremost initiatives under our presidency. It was an important exercise to gather inputs and ideas from the Global South. Further, our presidency has not only seen the largest-ever participation from African countries but has also pushed for the inclusion of the African Union as a permanent member of the G20.

An interconnected world means our challenges across domains are interlinked. This is the midway year of the 2030 Agenda and many are noting with great concern that the progress on SDGs is off-track. The G20 2023 Action Plan on Accelerating Progress on SDGs will spearhead the future direction of the G20 towards implementing the SDGs.

In India, living in harmony with nature has been a norm since ancient times and we have been contributing our share towards climate action even in modern times.

Many countries of the Global South are at various stages of development and climate action must be a complementary pursuit. Ambitions for climate action must be matched with actions on climate finance and transfer of technology.

We believe there is a need to move away from a purely restrictive attitude of what should not be done, to a more constructive attitude focusing on what can be done to fight climate change.

The Chennai High-Level Principles for a Sustainable and Resilient Blue Economy focus on keeping our oceans healthy.

A global ecosystem for clean and green hydrogen will emerge from our presidency, along with a Green Hydrogen Innovation Center.

In 2015, we launched the International Solar Alliance. Now, through the Global Biofuels Alliance, we will support the world to enable energy transitions in tune with the benefits of a circular economy.

Democratizing climate action is the best way to impart momentum to the movement. Just as individuals make daily decisions based on their long-term health, they can make lifestyle decisions based on the impact on the planet's long-term health. Just like yoga became a global mass movement for wellness, we have also nudged the world with Lifestyles for Sustainable Environment (LiFE).

Due to the impact of climate change, ensuring food and nutritional security will be crucial. Millets, or Shree Anna, can help with this while also boosting climate-smart agriculture. In the International Year of Millets, we have taken millets to global palates. The Deccan High Level Principles on Food Security and Nutrition is also helpful in this direction.

Technology is transformative but it also needs to be made inclusive. In the past, the benefits of technological advancements have not benefited all sections of society equally. India, over the last few years, has shown how technology can be leveraged to narrow inequalities, rather than widen them.

For instance, the billions across the world that remain unbanked, or lack digital identities, can be financially included through digital public infrastructure (DPI). The solutions we have built using our DPI have now been recognized globally. Now, through the G20, we will help developing countries adapt, build and scale DPI to unlock the power of inclusive growth.

That India is the fastest-growing large economy is no accident. Our simple, scalable and sustainable solutions have empowered the vulnerable and the marginalized to lead our development story. From space to sports, economy to entrepreneurship, Indian women have taken the lead in various sectors. They have shifted the narrative from the development of women to women-led development. Our G20 presidency is working on bridging the gender digital divide, reducing labor force participation gaps and enabling a larger role for women in leadership and decision-making.

For India, the G20 presidency is not merely a high-level diplomatic endeavor. As the Mother of Democracy and a model of diversity, we opened the doors of this experience to the world.

Today, accomplishing things at scale is a quality that is associated with India. The G20 presidency is no exception. It has become a people-driven movement. Over 200 meetings will have been organized in 60 Indian cities across the length and breadth of our nation, hosting nearly 100,000 delegates from 125 countries by the end of our term. No presidency has ever encompassed such a vast and diverse geographical expanse.

It is one thing to hear about India’s demography, democracy, diversity and development from someone else. It is totally different to experience them first-hand. I am sure our G20 delegates would vouch for this.

Our G20 presidency strives to bridge divides, dismantle barriers and sow seeds of collaboration that nourish a world where unity prevails over discord, where shared destiny eclipses isolation. As the G20 president, we had pledged to make the global table larger, ensuring that every voice is heard and every country contributes. I am positive that we have matched our pledge with actions and outcomes.

ABU DHABI — Faced with mounting pressure over planet-heating pollution, Gulf Arab energy giants are turning to humble tech start-ups as they search for ways to remove emissions while keeping oil flowing.

Oil producers have for years touted capturing carbon before it goes into the atmosphere as a potential global warming solution, against criticism from climate experts who say it risks distracting from the urgent goal of slashing fossil fuel pollution.

With little investment and few projects in operation around the world so far, the technology is currently nowhere near the scale needed to make a difference to global emissions.

Now, major players from Saudi Aramco to the United Arab Emirates' state oil and gas firm Abu Dhabi National Oil Company (Adnoc) say that is about to change, as the UAE hosts climate negotiations this year with a message of cutting emissions rather than fossil fuels.

"For the industry and for countries as well to achieve net zero by 2050, I don't see us achieving this without embracing carbon capture," Mr Musabbeh Al Kaabi, Adnoc's executive director of low-carbon solutions, told Agence France-Presse.

"I would love to see more wind and solar energy, but to be practical and transparent, it's not going to solve the problem."

Carbon capture was a hot topic at a recent climate tech conference in Abu Dhabi, UAE's capital.

Start-ups displayed their advances in carbon capture and storage (CCS), which removes carbon dioxide (CO_2) as it is pumped from power plants and heavy industry.

There were also companies presenting their plans for direct air capture, a newer technology that extracts CO_2 directly from the atmosphere.

The United Nation's Intergovernmental Panel on Climate Change (IPCC) says the existing fossil fuel infrastructure – without the use of carbon capture – will push the world beyond the

Paris deal’s safer global warming limit of 1.5 deg C above pre-industrial levels.

Industrial smokestacks

The debate between whether to primarily target fossil fuels or emissions is shaping as a key battleground at the COP28 climate talks, which will be held in UAE financial hub Dubai.

Citing the IPCC, the COP28 president-designate, Sultan Ahmed Al Jaber – Adnoc’s chief executive and his country’s climate envoy – last week said it was time to “get serious about carbon capture”.

But environmentalists are sceptical about the central role that big energy companies are seeking in climate solutions, saying they have a vested interest in maintaining fossil fuel sales.

Greenpeace Mena (Middle East and North Africa) programme director Julien Jreissati labelled it a “distraction”.

Adnoc’s Mr Kaabi, however, argued that the oil giant’s engineering capabilities and deep pockets make them best placed to propel climate tech.

“The world has two options: We could leave it to the small players or have the big players accelerating this decarbonisation,” Mr Kaabi said.

In 2016, Adnoc launched the region’s first commercial-scale CCS project, Al Reyadah, which has the capacity to capture 800,000 tonnes of CO2 per year.

Globally, there are only around 35 commercial facilities using carbon capture utilisation and storage globally, according to the International Energy Agency, which says even those planned until 2030 would capture only a fraction of the emissions needed.

‘We need to move quicker’

The entrepreneurs at the UAE conference included Omani company 44.01, a winner of Britain’s Earthshot Prize for its technology that permanently removes CO_2 from the air by mineralising it in peridotite rock.

“Climate change is an urgent challenge and for us to be able to tackle that challenge we need to move quicker,” said 44.01 CEO Talal Hasan.

“The oil and gas partnerships help us move quickly,” he told AFP.

Mr Hasan’s 44.01 has partnered Adnoc to develop a carbon capture and mineralisation site in Fujairah, one of the UAE’s seven emirates – the first such project by an energy company in the Middle East.

“In one tonne of peridotite, you could probably mineralise 500 to 600 kilograms of CO_2… this means that with the rocks just in this region, you could potentially mineralise trillions of tons,” he said.

For Mr Hasan, energy companies are good partners because “we use a lot of the same equipment, infrastructure, people and resources”.

“That will help us accelerate scaling,” he said, arguing that the speed of execution is “very important”.

State-owned Saudi Aramco, one of the world’s richest companies, has invested in Carbon Clean, a British-based company that has developed compact technology that captures carbon from industrial smokestacks.

The company, which has 49 sites around the world, will deploy its latest technology in the UAE this year – its first project in the Middle East.

When asked about the logic of working with big oil, Carbon Clean CEO Aniruddha Sharma said: “If I were a fireman and there was a fire – a big fire and a small fire – where would I go first? Obviously, the big fire.” AFP

Climate crisis won’t solve on its own: need to walk the talk

We need all governments to step up and agree to phase out unabated fossil-fuel use. We need reforms to make our financial institutions and systems fit for purpose. And we need to take climate action seriously

Last year in Berlin, the great Kenyan long-distance runner

Eliud Kipchoge broke the world marathon record, clocking 02:01:09 and beating his previous time by 30 seconds. His success has made him a legend not only in Kenya but globally. It offers a useful lesson for everyone involved in the fight against climate change. Kipchoge’s winning strategy is rooted in the science of running (as well as 120 miles of hard work every week), and our own approach to the climate crisis must involve the same level of commitment and focus.

As temperatures keep rising and emissions soar, the planet, too, continues to break (dangerous) new records. But with determination and follow-through, we – together with institutional partners and other governments – can start to run faster to get ahead of the climate crisis. Success will depend on following the latest science and mobilising a joint, broad-based effort of governments and citizens.

In March, the world’s top climate experts and governments signed off on the latest Intergovernmental Panel on Climate Change synthesis report. Once again, the IPCC’s message was stark: Humans have permanently changed the planet, and global warming is already killing people, destroying nature, and making the world poorer. Though African countries have contributed the least to the problem, they are bearing the brunt of the damage.

According to the International Energy Agency (IEA), Africa accounts for less than 3% of the world’s energy-related carbon dioxide emissions, and 600mn Africans – an outrageous figure – still do not have access to electricity.

Climate change is a shared problem that the global community must solve by working together, especially given the disproportionate burden being placed on those who are least responsible. During his recent visit to Kenya, German Chancellor Olaf Scholz and I held talks on ways to address the climate crisis. Through the Germany-Kenya Climate and Development Partnership, our two countries have committed to deepen our collaboration on climate-resilient development and renewable energy, including by supporting green-hydrogen production and sustainable agriculture.

We are currently a long way from limiting global warming to 1.5C or even 2C, as envisaged by the Paris climate agreement. The climate crisis will not solve itself. On the contrary, we must ensure that global greenhouse-gas (GHG) emissions peak before 2025 at the latest, and then fall by at least 43% by 2030.

This is the year to drive that transformation. The United Nations Climate Change Conference this November-December (COP28) offers an opportunity to accelerate the energy transition, supercharge the growth of renewables, and commit to phase out all fossil fuels – starting with coal.

Kenya is on track to meet these goals. We already generate 92% of our power from clean sources and we have committed to achieving a 100% clean electricity network by 2030. Similarly, renewables generated 46% of Germany’s electricity in 2022 and the government has committed to increase that to 80% by 2030. Critically, these commitments will not only ensure clean power and a safer environment; they will also create jobs, attract investment, and make our economies more secure and resilient in the face of volatile oil and gas prices.

But it is important that we run this race as a team. According to the IEA, the global ratio of clean-energy investments to dirty-energy investments must increase sixfold by 2030 (from 1.5:1 to 9:1).

With a strong partnership between Africa, Europe, and the rest of the international community, Kenya, with its abundant resources, can make significant contributions to decarbonisation and the global transition to a net-zero economy. We must unlock climate finance and investment, so that we can harness our potential for green economic growth. But to do that, we will need to fix the current international financial system, which has proven inadequate for dealing fairly with multifaceted global crises, from the Covid-19 pandemic and the climate emergency to debt distress across the Global South.

Next month’s Summit for a New Global Financial Pact, in Paris, provides an opportunity for Europe to galvanise support for reforming the international financial system. The international community must recognise our potential to help solve global problems and take steps to ensure win-win outcomes. That means providing access to affordable, adequate, and sustainable financing that is delivered in a timely manner.

As we reduce emissions, we also need to prepare our people and our housing, agriculture, and food systems for rising temperatures and extreme weather events. Meeting the 2021 COP26 commitment to double global climate-adaptation financing by 2025 remains crucial for protecting people and nature. The latest IPCC report is clear: climate change and insufficient adaptation and mitigation efforts are reversing development gains and undermining economic stability.

But we also must remember that adaptation has limits, and that climate change is already threatening millions of peoples' lives today. As the IPCC shows, reducing GHG emissions by 43% this decade and stabilising global warming at or below 1.5C is still our best chance to keep the problem at a manageable scale. Kenya's climate summit in September will provide a key opportunity to showcase the continent's commitment, potential, and opportunities to deal with the climate crisis. We need all governments to step up and agree to phase out unabated fossil-fuel use. We need reforms to make our financial institutions and systems fit for purpose. And we need to take climate action seriously. In the words of Eliud Kipchoge, the key to success is to "walk your talk." – Project Syndicate

- *William Ruto is President of Kenya.*

The Climate Elephants in the Room

May 19, 2023PINELOPI KOUJIANOU GOLDBERG

As tempting as it is to rely on multilateralism to solve a shared global problem like climate change, the world simply does not have the time for such an approach. A far more pragmatic and effective strategy is to focus on the biggest polluters that contribute disproportionately to total greenhouse-gas emissions.

NEW HAVEN – Now that the falsehoods and obfuscation of climate denialism have finally been silenced, addressing climate change has become the world's top priority. But time is running out, and the International Monetary Fund warns that any further delays on implementing policies to mitigate global warming will only add to the economic cost of the transition to a low-emissions economy. Worse, we still lack a concrete, pragmatic strategy for tackling the problem. Although economists have made a robust case for why carbon taxes are the best solution, this option has proven politically infeasible, at least in those countries that account for some of the highest emissions (namely, the United States).

Commentators have also stressed that climate change is a shared problem involving important cross-border externalities that must be addressed through a multilateral approach to global coordination. But, as with carbon taxes, this argument has fallen on deaf ears. And, given the current geopolitical climate and the increasing fragmentation of the global economy, there is little hope that the message will get through anytime soon.

Having committed to assisting developing economies as they confront climate change, the World Bank finds itself limited by the country-based model underlying its financing operations. It is earnestly weighing its options and considering how it could coordinate climate-related financing across borders. But while such efforts are well meaning and consistent with the spirit of multilateralism, they inevitably will delay concrete action. World Bank financing would have to be completely restructured, and coordinating action across multiple countries that have limited financial resources and often conflicting interests seems an impossible task. For example, while some developing economies are rich in fossil fuels, others are starved for energy sources.

Given these limitations, pragmatism dictates focusing on the biggest polluters. Global carbon dioxide emissions are concentrated among only a handful of countries and regions. China, the US, the European Union, Japan, and Russia collectively account for 63% of the total, and none of these top polluters is a low-income country anymore. China, the poorest of the group, represents around 30% of all emissions, making it by far the world’s largest current polluter in absolute terms. But its government is taking steps to accelerate the transition to green energy – a winning strategy, given the country’s abundance of rare earth metals.

India, the third-largest emitter, currently accounts for approximately 7% of global CO_2 emissions, and its size and growth trajectory imply that it could easily surpass China as the leading polluter, barring stronger climate policies. In fact, when it comes to helping developing countries decarbonize, considerable progress could be made simply by targeting India alone. The big advantage of this strategy is that it would avoid the paralysis associated with attempts to adopt a multilateral approach in an increasingly fragmented world.

This does not mean that we should eschew projects aimed at climate mitigation or adaptation in other countries. But we would not need to wait until everyone is on board before doing anything. Those insisting on a multilateral approach should learn from the experience of the ultimate multilateral institution: the World Trade Organization. Its requirement that every single provision in every multilateral agreement gain unanimous support has left it increasingly paralyzed, prompting demands for institutional reform.

Of course, India is not low-hanging fruit. It is rich in coal and has little incentive (beyond the health of its citizens) to hasten the transition to green energy. In focusing on India, we would need to employ the carrot, not the stick.

Since the stick generally takes the form of pressure to implement carbon taxation, it is a non-starter. A tax would be ineffective, because it would incite massive domestic opposition (as has been the case in the US). It would also be morally objectionable, because it is unfair to ask a lower-middle-income country to bear the burden of reducing CO_2 emissions when rich countries (like the US) have failed to do the same. Moreover, even if China and India are now two of the world's biggest polluters, they bear little responsibility for the past, cumulative emissions that led to the current climate crisis.

That leaves the carrot, which would come in the form of tax incentives or subsidies to support green energy. When paired with other policies, these can ease firms into adapting to higher environmental standards (such as those associated with a cap-and-trade program). But such policies are expensive, which means that tackling climate change will require richer countries to help finance them. Whether or not India becomes the new China, it is still in our power to ensure that it does not become the new outsize polluter.

https://www.project-syndicate.org/commentary/climate-change-prioritize-top-emitters-over-multilateralism-by-pinelopi-koujianou-goldberg-2023-05

Sustainable food – not more of it – needed as global hunger soars

LONDON – As global hunger swiftly rises – by more than a third last year – curbing it will require not growing more food but rethinking broader systems of trade and aid, farming’s heavy reliance on fossil fuels, food waste and meat eating, experts said.

Farmers today grow sufficient crops to feed twice the current population – but but nearly a third of food produced globally is spoiled or thrown away, said Philip Lymbery, the chief executive of Compassion in World Farming International.

At the same time, grain that could feed billions of people is instead fed to factory-raised food animals – suggesting a reduction in meat consumption is one clear way to cut hunger, he said at a conference on global food systems in London last week.

In Europe alone, 60% of grain is now grown for animal food, said Tim Benton, a food systems expert at the London-based think tank Chatham House, which raises questions about whether scarce land could be better used.

As global leaders look for ways to keep food available and affordable, and prevent rising hunger, “it’s not about food scarcity because there’s no food scarcity,” Lymbery noted.

Surging hunger

Globally, hunger is surging, with 258 million people in nearly 60 countries facing acute food insecurity last year, a 33% jump from 2021, according to the Global Report on Food Crises 2023, released in March.

Problems are growing not just in traditional aid recipient countries such as Yemen, Somalia and Afghanistan but also in nations from Nigeria to the Democratic Republic of Congo, it showed.

The report, backed by agencies from the U.N. World Food Program to the World Bank, found that climate change impacts – from floods in Pakistan to drought in the Horn of Africa – were key contributors to the surge.

But conflicts – including Russia’s invasion of Ukraine, which slashed wheat exports from Ukraine and drove up the prices of energy and fossil fuel-based fertilizers – also played a major role, particularly in contributing to rising food prices.

“We depend more and more on a small number of countries for production of the major crops we depend on,” said Olivier De Schutter, co-chair of IPES-Food, an international expert panel on sustainable food systems.

That means when climate change slashes production in one or more key producers, or a conflict breaks out in one, “global supply chains are disrupted … (and) the whole global food system is impacted.”

In the wake of the Ukraine invasion, food costs also rose as speculators, hedge funds and a handful of big agribusiness companies that control most global food trade made profits, said De Schutter, who is also a U.N. special rapporteur on extreme poverty and human rights.

He suggested that finding ways to wean global agricultural production off its heavy reliance on fossil fuel-based fertilizers could be a key way to protect access to food from volatile oil and gas prices.

Helping poorer countries escape their often heavy debt burdens could also help them shore up their food security, allowing them to focus more on growing food for their own people rather than raising export crops to bring in the cash needed to service debt, De Schutter said.

Competing answers

Benton, of Chatham House, said two very different views of how to achieve future security are now competing.

In the first, the assumption that the world will need 50% more food by 2050 – in part to meet growing demand for meat and dairy as poor countries grow richer – demands much more intensive production from limited agricultural land.

That view assumes agriculture in the future will become much more technological and centralized, with heavy use of drones, satellites and the "internet of things" driving smarter production – and likely resulting in fewer farm jobs.

The second view, however, envisions farmers shifting to more ecologically friendly, smaller-scale and less fossil fuel-intensive agriculture, with food demand not growing significantly because food waste is cut and meat-intensive diets decline.

"Everybody agrees food system transformation is needed" – just not what kind, said Molly Anderson, a food studies professor at Middlebury College in the United States.

Seth Watkins, a farmer in the U.S. state of Iowa, said at last week’s food conference that he had seen first-hand how intensive farming systems were damaging soil health, raising questions about the long-term viability of farming, especially as climate change impacts worsen.

“Often (a focus on) technology holds us back from the sustainable solutions we need to fix our food system,” he said, calling for a switch to more environmentally friendly and low-carbon ways of producing food.

Decisions made now are crucial because “it’s our own regeneration or extinction we’re talking about,” Watkins said.

Susan Chomba, director of the Vital Landscapes in Africa program for the World Resources Institute, said efforts to cut food waste were particularly crucial as key farm resources from available land to water grow scarcer.

“No matter how much we try to produce, if we can’t address what is lost and wasted it’s a counterproductive process,” she said in an interview.

A range of powerful vested interests stand in the way of shifting food systems to effectively manage growing hunger, climate threats and ecological decline, the analysts said.

Worsening disinformation and a rise in authoritarian governments around the world also are acting as a brake on change, they said.

But with hunger growing fast and new challenges appearing – from an expected drought-spawning El Nino weather pattern emerging this June to new conflict in Sudan, adding to humanitarian burdens – public discontent and pressures on politicians for change are also likely to increase.

“Because we’re not tackling the environmental crisis, the disruptions we see are going to get bigger and bigger,” warned

Benton of Chatham House.

Climate change continues to causeuncertainties for commodity prices

It can alter rainfall patterns, increase temperatures, and cause extremClimate played a major role in commodity prices last year and looks like doing so again in 2023.
Scorching heatwaves in the northern hemisphere hit production of wheat in the US and Europe in 2022, and climate change means that catastrophic weather events are becoming more frequent.
These include La Niña, which is stretching into an unprecedented third consecutive year and will be detrimental

to maize and soybean production in the first half of 2023, in addition to other crops like sugar and coffee, according to Economist Intelligence Unit (EIU).
Wheat, which was heavily affected by war-related supply disruptions in 2022, faces significant climate risks. In the US large swathes of the southern plains remain under drought conditions, and crops are in unusually poor condition heading into winter dormancy. Extremely dry, occasionally frosty weather in Argentina is causing damage across major producing provinces there, but Russia and Australia are on course for a second consecutive year of bumper crops, which, for the moment, is alleviating concerns about production in the western hemisphere.
Weather will loom large in energy markets as well, EIU noted. Europe's heatwave drove up demand last summer, causing gas and electricity prices to spike, especially as winds dropped to levels insufficient to generate enough power to meet Europe's electricity needs while drought affected hydropower generation in many countries.
These dry conditions, together with rising water temperatures, also hit nuclear power generation.
In addition, the severity of Europe's current energy crunch depends largely on how cold temperatures fall over the winter, not just in 2022/23 but in 2023/24 as well.
"The colder the winter, the more countries will have to draw down stockpiles built up over 2022. Below-normal temperatures will not only raise the spectre of energy rationing, but also put upward pressure on prices over the summer as Europe scrambles to refill reserves—this time without Russian supplies," EIU said.
Obviously, climate change can have significant impacts on commodity prices by affecting their production, transportation, and demand for various goods.
Climate change can impact commodity prices by affecting crop yields, energy prices, water availability, and transportation costs.
It can alter rainfall patterns, increase temperatures, and

cause extreme weather events like droughts and floods, which can reduce crop yields.
This can lead to lower supply and higher prices for commodities like wheat, corn, soybeans, and other agricultural products.
Climate change can also impact energy prices by affecting the production and transportation of oil, natural gas, and other energy resources.
For example, extreme weather events can disrupt oil and gas production and transportation infrastructure, leading to supply disruptions and higher prices.
Changes in rainfall patterns and increased water scarcity due to climate change can impact the availability of water for agricultural production and energy generation. This can result in higher prices for water-intensive commodities like meat, dairy, and processed foods.
Climate change can also affect transportation costs, particularly for goods that rely on sea or river transportation.
Rising sea levels and changes in ocean currents can disrupt shipping routes and increase shipping costs, which can lead to higher prices for imported goods.e weather events like droughts and floods, which can reduce crop yields

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The High Cost of Carbon Pricing

Amid the growing enthusiasm for carbon border taxes, Western policymakers have largely ignored the negative impact on the world's poorest countries. For carbon-pricing policies to succeed, developed countries must show their commitment to shared prosperity by enabling knowledge-sharing and fostering equitable climate finance.

NEW DELHI – Carbon pricing is all the rage these days, at least in the developed world. But while global leaders and experts – most of them from rich countries – increasingly embrace the idea of putting the "right price" on carbon, the concept remains vague and ill-defined. Worse, its growing acceptance and increasingly protectionist bent may have the perverse effect of impeding efforts to decarbonize the global economy.

The idea of carbon pricing seems like a no-brainer. Meeting even the least ambitious climate goals requires decarbonizing developed and developing economies alike. Changing the relative prices of carbon-intensive activities would encourage investors to finance renewable sources of energy and the technological innovation needed to achieve net-zero emissions.

Fossil fuels account for most of the world's greenhouse-gas emissions, so hydrocarbons seem like a good place to start.

But how? Should policymakers consider the relative price of fossil fuels, or production based on consuming them?

The two most commonly discussed forms of carbon pricing – cap-and-trade schemes and carbon taxes – are based on the carbon intensity of production. A cap-and-trade system is designed to limit greenhouse-gas emissions by dividing the total target amount into allowances that can be traded among high and low emitters. While this supposedly establishes a market price for carbon dioxide emissions, it does not consider their negative social and environmental externalities. A carbon tax, by contrast, sets a price on carbon by taxing emissions-heavy activities.

But these two models reflect a very narrow (and possibly even distorted) view of how carbon should be priced into the economic system. A 2017 report by the High-Level Commission on Carbon Prices, chaired by Joseph E. Stiglitz and Nicholas Stern, provided a much more nuanced analysis. In addition to cap-and-trade and carbon taxes, the report recommended reducing or eliminating fossil-fuel subsidies and creating new financial incentives for low-carbon projects; offsetting the negative distributional impact of carbon pricing by using the proceeds to finance policies to protect poor and vulnerable populations; and complementary policies, such as investment in public transport and renewable power. Perhaps most important, the authors noted, countries must be able to choose instruments that fit their specific circumstances, resources, and needs.

Amid the growing enthusiasm for carbon pricing and border adjustment measures, policymakers and experts have largely ignored these points. The European Union’s Carbon Border Adjustment Mechanism is a case in point. When the CBAM takes effect in October, it will impose a tax on carbon-intensive imports in order to “put a fair price on the carbon emitted during the production of carbon-intensive goods that are entering the EU” and to “encourage cleaner industrial production in non-EU countries” (emphasis added).

The CBAM will initially apply to imports of cement, iron and steel, aluminum, fertilizers, electricity, and hydrogen. At first, firms will simply have to report the (direct and indirect) emissions embedded in the goods they import. But, beginning in 2026, the EU will impose tariffs on these emissions based on the weekly average auction price of cap-and-trade allowances.

The stated purpose of this measure is to eliminate so-called “carbon leakage” and ensure that the EU’s climate efforts are not undermined by production moving to countries with lower emission standards. Effectively, it protects European firms from competitors in such countries.

By taxing imports to the EU, the CBAM imposes on exporters in other countries the nearly impossible task of measuring emissions. Most developing countries (and many developed ones) lack granular data on firm-specific emissions, not to mention the ability to track the emissions of all the inputs used. Even if such data were available, the costs of collecting and analyzing it over time would be enormous. As the United Nations Conference on Trade and Development noted in 2021, the CBAM attempts “to impose on developing countries the environmental standards that developed countries are choosing.”

The EU wants to be viewed as a global leader on climate change, but it is difficult to see the CBAM as anything but a protectionist device. While the CBAM purports to encourage countries outside the bloc to reduce emissions by imposing their own carbon taxes, the EU has done nothing to help exporting countries attract new green investment or gain access to new technologies. In fact, it has persistently reneged on its (paltry) promises on climate finance and the commitments European leaders made as part of the 1992 Rio Agreement, restricting access to green technologies controlled by EU-based companies.

For decades, advanced economies have exported their emissions to developing countries by offshoring carbon-intensive production and then importing those goods. Now that greener technologies are available to (and largely controlled by) Western companies, developed countries promote reshoring without sharing knowledge or finance, thereby undermining low- and middle-income countries' economic prospects and ability to achieve a green transition.

In February, Republican US Senator Bill Cassidy said he would unveil an emissions tariff bill in the coming months, following similar proposals by Senate Democrats. Meanwhile, lawmakers on both sides of the Atlantic have done little to limit fossil-fuel production and trade – by far the biggest sources of CO2 emissions. The CBAM does not cover trade in fossil fuels, and neither would the proposed tariffs in the United States. If decarbonization is the real goal, rather than protecting domestic industries, then regulation and reducing direct and indirect fossil-fuel subsidies are far more promising policies.

For carbon pricing to succeed, developed countries must demonstrate their commitment to shared prosperity by enabling knowledge-sharing and fostering equitable climate finance. If they continue to focus on border taxes on goods produced (mostly) in developing countries, their carbon-pricing efforts will fail. Worse, they will exacerbate global inequality and reinforce the perception that all their lofty rhetoric about the need for international cooperation to fight climate change is merely a fig leaf for cynical and self-serving policies.

Green power is the first domino

As world leaders convene at the UN Climate Change Conference (COP27), it is obvious to all that bolder action is needed to avert disaster. The UN warns that global efforts to reduce greenhouse-gas (GHG) emissions remain insufficient to limit temperature increases to 1.5C, relative to pre-industrial levels.

To meet this target, decarbonising the power sector is critical. Electricity accounts for about 25% of the world's GHG emissions, and it also will play a critical role in decarbonising other sectors, such as buildings, transportation, and manufacturing. The challenge, then, is to achieve "24/7 carbon-free energy" (24/7 CFE): the total elimination of carbon from the electricity sector – at every hour of every day, in every grid around the world.

Research in the United States and Europe has shown that 24/7 CFE strategies have a greater impact on the decarbonisation of electricity systems than the current practice of purchasing electricity from renewable sources to match annual consumption patterns. Recent International Energy Agency modelling for

India and Indonesia shows that hourly matching strategies lead to more diverse technology portfolios, with the clean, dispatchable generation and storage needed for net-zero transitions in the power sector. Critically, this approach helps electricity systems shift away from fossil fuels by accelerating uptake of the full suite of carbon-free technologies needed to deliver around-the-clock clean power.

Decarbonising energy systems worldwide is possible, but it will require collective action to accelerate the development and deployment of advanced clean-energy technologies. New investments, supportive public policies, and partnerships among stakeholders are all part of the solution. That is why the UN, Sustainable Energy for All (SEforALL), Google, and a diverse group of signatories launched the 24/7 CFE Compact in 2021. The compact represents a growing global community of stakeholders that are committed to providing the support, tools, and partnerships needed to make 24/7 CFE a reality everywhere.

Among the most recent to join the 24/7 CFE Compact is the Scottish government. “Scotland was the first country in the United Kingdom to declare a climate emergency, and indeed among the first in the world to recognise the importance of taking immediate and bold action,” notes Scottish First Minister Nicola Sturgeon. “Governments must hold themselves to account in limiting global temperature rise to 1.5C. We are committed to putting accountability at the centre of all that we do. Our position is clear that unlimited extraction of fossil fuels is not consistent with our climate obligations.”

Similarly, just last month, Google and C40, a network of almost 100 cities, launched a first-of-its-kind 24/7 CFE programme focusing on regional electricity grids. With urban areas accounting for over half the world’s population and more than 70% of global carbon dioxide emissions, cities have a critical role to play in driving the changes needed to tackle the climate crisis.

Developing and emerging economies will need more energy to bridge energy-access gaps, and to support economic growth and development. But as capacity expands, it must be clean. A 24/7 CFE approach can serve both purposes, providing both greater access and cleaner energy. We therefore must move faster to make 24/7 CFE cheaper and more accessible globally. According to the latest IEA data, the number of people living without electricity will rise by almost 20mn in 2022, reaching nearly 775mn. Most of that increase will be in Sub-Saharan Africa, where the size of the cohort lacking access has nearly returned to its 2013 peak.

The world cannot achieve net-zero emissions without first ensuring universal electricity access. That will require annual investments of at least $30bn – two-thirds of which will need to go to Sub-Saharan Africa – between now and 2030. Fortunately, not only is 24/7 CFE a moral imperative, but it also represents the most cost-effective option for connecting underserved populations.

Many of these populations will otherwise continue to rely on dirtier sources of energy. Small island developing states such as Nauru, Palau, the Bahamas, and Trinidad and Tobago, for example, all have electricity grids that depend heavily on inefficient, carbon-intensive technologies such as diesel generators. These countries' experience shows why 24/7 CFE must not be framed merely as a European or North American issue. It is a global one, and it has become increasingly urgent for developing countries on the front lines of climate change.

Implementing 24/7 CFE strategies globally will require not only funding but also measures to scale up the deployment of advanced technologies, to create more favourable market conditions, and to share best practices and data. If we can fully decarbonise our grids, the rest of the green transition should become cheaper and easier.

The 24/7 CFE Compact provides an opportunity to drive the much-needed policy change, investment, and research in this crucial next phase of climate action. We invite all governments, companies, and organisations to join us and help chart a more sustainable path toward a net-zero future. –

COP27: Financing for climate ?damages gets a foot in the door

AFP/Sharm El-Sheikh

UN climate negotiations yesterday offered a sliver of hope and “solidarity” for developing countries battered by increasingly costly impacts of global warming, in agreeing to discuss the thorny issue of money for “loss and damage”.

Countries least responsible for planet-heating emissions – but hardest hit by an onslaught of weather extremes – have been ramping up the pressure on wealthy polluting nations to provide financial help for accelerating damages.

But in a sign of how contentious the issue is among richer nations fearful of open-ended climate liability, the issue was only added to the formal agenda to the UN’s COP27 climate summit in the Egyptian resort town of Sharm el-Sheikh after two days of last-ditch negotiations.

This “reflects a sense of solidarity and empathy for the suffering of the victims of climate induced disasters,” Egypt’s Sameh Shoukry, the COP27 president, said to applause.

At last year’s UN summit in Glasgow, the European Union and the United States rejected calls for a separate financial mechanism.

Instead, negotiators agreed to start a “dialogue” extending through 2024 on financial compensation.

The issue has grown ever more urgent in recent months as nations were slammed by a crescendo of disasters, such as the massive flooding that put a third of Pakistan under water in August.

Senegal’s Madeleine Diouf Sarr, who represents the Least Developed Countries negotiating bloc, said climate action across the board had been far too slow.

“Lives are being lost. Climate change is causing irreversible loss and damage, and our people carry the greatest cost,” she said, adding that an agreement on funding arrangements must be reached in Egypt.

Appeals for more money are bolstered by a field known as event attribution science, which now makes it possible to measure how much global warming increases the likelihood or intensity of an individual cyclone, heat wave, drought or heavy rain event.

“Today, countries cleared an historic first hurdle toward acknowledging and answering the call for financing to address increasingly severe losses and damages,” said Ani Dasgupta, head of the World Resources Institute, a climate policy think tank.

But he said that getting negotiators to agree to discuss the issue was only an initial step.

“We still have a marathon ahead of us before countries iron out a formal decision on this central issue for CO27,” he said.

Wrangling over loss and damage has unfolded against the backdrop of an unmet promise by rich nations to provide $100bn a year starting in 2020 to help the developing world green their economies and anticipate future impacts, called "adaptation" in UN climate lingo.

That funding goal is still $17bn short. Rich nations have vowed to hit the target by the end of 2023, but observers say the issue has severely undermined trust.

The UN Environment Programme has said the goal – first set in 2009 – has not kept up with reality, and estimates that funding to build resilience to future climate threats should be up to 10 times higher.

Meanwhile, countries are far off track to reach the Paris deal goal of limiting global warming to 1.5 degrees Celsius.

The UN says the world is currently heading to 2.8C of warming, or a still-catastrophic 2.4C even if all national pledges under the Paris treaty are fulfilled.

Depending on how deeply the world slashes carbon pollution, loss and damage from climate change could cost developing countries $290-580bn a year by 2030, reaching $1-1.8tn in 2050, according to the Grantham Research Institute on Climate Change and the Environment in London.

The World Bank has estimated the Pakistan floods alone caused $30bn in damages and economic loss. Millions of people were displaced and two million homes destroyed.

Simon Stiell, the UN's climate change executive secretary, said vulnerable countries are "tired" and "frustrated".

"Here in Sharm el-Sheikh we have a duty to speed up our international efforts and turn words into action to catch up with their lived experience," he said.

Up to now, poor countries have had scant leverage in the UN wrangle over money. But as climate damages multiply, patience is wearing thin.

The AOSIS negotiating block of small island nations told AFP that they would like to see the details for a dedicated loss-and-damage fund worked out within a year.

"There's not enough support for us to even to begin to prepare for the loss and damage that we are expected to face," said AOSIS lead negotiator on climate finance Michai Robertson.

China is doubling down on coal despite its green ambitions

Bloomberg / Beijing

China is building a vast array of new coal-fired power stations, potentially more than the operating capacity of the US, even though it knows the plants will probably never be fully used.

The puzzle of why the world's leading installer of clean energy is investing so much in the worst polluting – and increasingly expensive – fossil fuel shows the depth of Beijing's concern over the global squeeze in energy supplies. But it also reflects planning for a gradual relegation of coal's role, from prime power source to a widely available but often idle backup to China's rapidly expanding renewables fleet.

Work on at least 165 gigawatts of plants powered by coal should begin by the end of 2023, the National Development and Reform Commission told executives at a meeting in September, according to state-backed Jiemian News. The chairman of China Energy Engineering Corp, meanwhile, has forecast the country could add a total of 270 gigawatts in the five years to 2025 – more than currently exists in any other nation.

New coal permits have already increased, and while the final extent of the ramp-up isn't known, adding 270 gigawatts could cost 568bn to 766bn yuan ($79bn to $106bn), according to a calculation based on BloombergNEF data. Excluding China, the rest of the world's pipeline of coal power projects stands at about 101 gigawatts, data compiled by Global Energy Monitor show.

China's strategy is designed to avoid the pitfalls that have hobbled parts of the US and Europe, which stopped investing in fossil fuel production and infrastructure before renewables were ready to take over. That's led to an over-reliance on imports in some places, and in others a dependence on grids that can fall prey to the unreliability of sunshine and wind.

At the recent party congress, President Xi Jinping laid out how China's energy transition would be different by following "the principle of building the new before discarding the old." In practice, that means adding both clean power and more coal to try and eliminate economy-crippling power shortages and create a buffer against volatile global fuel prices, while at the same time advancing the country's long-term climate goals.

As China's economy grows, it requires ever more power, and it has said it plans to peak coal consumption only by the middle of the decade.

But even as new plants are built, the intention is for them to be used less and less as they're displaced by increasing amounts of clean energy.

In the context of global energy insecurity, it's not surprising that China would ramp up its coal capacity, said Yan Qin, an analyst in Oslo, Norway, at Refinitiv. “But the push to add more clean energy to the grid hasn’t slowed down, meaning that growing renewables will squeeze the running hours of coal plants,” she said.

The plan carries big risks. Coal financiers are directing capital to investments that are almost designed to be stranded. If they protest because their projects are being underutilised, it could slow the decarbonisation of the planet’s worst polluter. And the world’s carbon budget is finite, which means that any coal burned at all in China increases the chances of missing targets to avoid catastrophic warming.

The NDRC’s proposal is already facing some pushback from utilities and local lenders, according to a person familiar with the matter. Many coal power generators are losing money amid high fuel prices and aren’t enthusiastic about funding and running plants that would only be used during times of peak demand, the person said, declining to be identified because the talks are private.

Still, it’s clear that the regulator’s tone on coal power has changed since last year’s energy crisis, according to the person. More plants will be built in areas that are reliant on hydropower, and near the massive wind and solar farms being built in the desert interior, to ensure reliable supply when intermittent renewables generation stalls, the person said.

China is also making efforts to lessen the burden on coal power generators, in large part by leaning on miners to boost output to record levels and keep the Chinese market well below sky-high international prices. The government has also given utilities leeway to charge higher rates to industrial customers. And, it’s making progress in developing a mechanism that would compensate coal plants that sit idle while on backup duty, Refinitiv’s Qin said.

In any case, the rate at which clean energy is added will probably be more instructive than power plant spending in determining when coal burning starts to dwindle, said Dave

Jones, a lead analyst at the climate think tank Ember in London.
Once renewables are installed they’re basically free to produce, which means they’ll be prioritised over coal. The moment that new clean energy generation outpaces new power demand is when coal use begins to fall, he said.
China is by far the world’s largest renewables market, and its expansion continues to accelerate. Spending in the first half of this year more than doubled to $98bn, compared to $12bn in the US. As wind, solar and hydropower all charted strong growth over the period, mostly coal-based thermal power generation dropped 3.5%.
Although the historic drought in the summer curtailed hydropower so much that coal is back on track for a year-on-year increase, it won’t be long before new clean energy capacity puts the fuel into permanent decline, Jones said.
“There is so much wind and solar being built and generating clean electricity,” he said. “As long as China’s not inventing a whole new use for thousands of terrawatt-hours of power, then from a demand perspective it’s got to be reducing coal power, because there’s nowhere else for that electricity to go.”