



NEWS ROUNDUP

03 APRIL 2023 [08:00 am]

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ACT ALLIANCE

[Philippines: Accountability needed to achieve climate justice](#)

By: The National Council of Churches in the Philippines (NCCP)

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BUSINESS WORLD

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The Intergovernmental Panel on Climate Change (IPCC) has recently released its AR6 Synthesis Report: Climate Change 2023, which summed up its five years of reports. In a statement, the IPCC said that the challenge needed to limit warming to 1.5°C becomes greater now since it stressed such a challenge in 2018, as greenhouse gas emissions continued to rise.

CNBC

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By: Jennifer Liu

The climate crisis impacts everyone, and young people feel especially stressed about the warming planet.

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By: Laura Paddison and Rachel Ramirez

Scientists have watched in astonishment as ocean temperatures have steadily risen over the past several years – even as the cooling La Niña phenomenon had a firm grip on the Pacific. The oceans have been record-warm for the past four years, scientists reported in January. Then in mid-March, climatologists noted that global sea surface temperature climbed to a new high.

JOURNAL ONLINE

[EcoWaste Coalition Promotes Low-Carbon and Plastic-Free Holy Week](#)

The EcoWaste Coalition, an advocate for a zero waste and toxics-free society, exhorted the faithful to mark the Holy Week with less carbon dioxide and less plastic waste.

MANILA BULLETIN

[DOE plans separate auction for offshore wind supply](#)

By: Myrna M. Velasco

The Department of Energy (DOE) is planning a separate ‘auction call’ for the power supply agreements (PSAs) to be awarded to offshore wind investors via the Green Energy Auction Program (GEAP) of the government.

[PH, UK keen on increasing maritime cooperation amid ‘thriving’ ties](#)

By: Raymund Antonio

The Philippines and the United Kingdom (UK) reaffirmed their commitment to strengthen already “thriving” ties, as their high-ranking officials agreed last week to “work more closely” on “mutual priorities” that include maritime cooperation and regional stability.

NASA

[Planes, Shipping Lanes, and Automobiles: Surprising Ways Climate Change Can Affect Transportation](#)

By: Alan Buis

The effects of global climate change are broad and impact everyone, as well as Earth’s natural systems.

PHILIPPINE DAILY INQUIRER

[Shift to renewable energy fostering new investments](#)

By: Meg J. Adonis

Increasing support for renewable energy in the Philippines is encouraging more investments in the industry, with nonhydropower technology expected to spur growth in the next nine years, according to a Fitch Solutions study.

[PH longest bridge now powered by P60-M hybrid solar farm](#)

By: Dale G. Israel

The Cebu-Cordova Link Expressway (CCLEX), the picturesque third bridge linking mainland Cebu to Mactan Island and now turning to be a new landmark here, is going solar.

[UK's King Charles III given insights into Mindoro oil spill by Filipino climate activist](#)

By: Jean Mngaluz

During a meeting with the United Kingdom's King Charles III, a Filipino climate activist told the king about the Oriental Mindoro oil spill, according to the Youth Advocates for Climate Action Philippines (Yacap) on Friday.

PHILIPPINE NEWS AGENCY

[Denmark's leading wind energy firms eyeing opportunities in PH](#)

By: Kris Crismundo

Danish Ambassador to the Philippines Franz-Michael Mellbin said the liberalization of the renewable energy (RE) sector in the Philippines has attracted the interests of Denmark's largest wind energy companies.

REUTERS

[Policy Watch: The IPCC has given us a roadmap to a safe future for humanity. But will we follow it?](#)

By: Angeli Mehta

Do countries need a Ministry for the Future, a body charged with defending all creatures, both today's and those yet to come, as in Kim Stanley's Robinson's novel of the same name?

THE MANILA TIMES

[Easterlies bring hot, humid weather](#)

By: Arlie O. Calalo

Hot and humid weather is expected in most parts of the country because of the easterlies, the dry and cold prevailing winds coming from the Pacific Ocean, the Philippine Atmospheric, Geophysical and Astronomical Services Administration said.

[Innovations in campus sustainability and green technologies](#)

By: Ludwig O. Federigan

THE field of sustainability has seen rapid innovation in recent years, with new technologies and practices emerging to reduce energy consumption, greenhouse gas emissions and waste reduction. Campuses have been at the forefront of these innovations, as they seek to reduce their environmental footprint while providing a high-quality educational experience for their students.

[PH needs to prepare for Agri 5.0](#)

By: Janine Alexis Miguel

THE Philippines should start preparing for Agriculture 5.0 to address the problems the country's food systems are facing, according to the Philippine Society of Agricultural and Biosystems Engineers (PSABE).

THE PHILIPPINE STAR

[Philippines urged to engage in International Court of Justice's hearings on climate duties](#)

By: Gaea Katreena Cabico

The Philippines, one of the countries most at risk from the impacts of climate change, should actively engage in the proceedings of the world's top court tasked to outline the legal obligations of governments for curbing global emissions, a group said.

CCC IN THE NEWS:

DWIZ

[State Universities and colleges hinikayat ng CCC na taasan ang kanilang budget proposals para sa 2024](#)

By: Gilbert Pardez

Nagsagawa ng orientation ang Climate Change Commission PH (CCC) at Department of Budget and Management (DBM) para sa state universities and colleges (SUCs) na may kaugnayan sa climate change expenditure tagging (CCET).

Information and Knowledge Management Division

ACT ALLIANCE

Philippines: Accountability needed to achieve climate justice

By: The National Council of Churches in the Philippines (NCCP)

Anamarie Rivera, a mother of four, had just given birth to her youngest daughter when last September's Super Typhoon Noru hit her hometown of Jaen, Nueva Ecija in the Philippines. "We went to my sister-in-law's house when the winds got stronger", she says. "I was only able to get my kids out ... I wasn't able to save any of my belongings." Anamarie's house was made from light materials with a makeshift roof of galvanized iron, a type of housing that is common in Filipino communities living in poverty.

The typhoon struck several provinces in the northern part of the Philippines, causing widespread damage not only to housing, but to farms and the livelihoods of farming communities. "It completely destroyed our crops," says Ashley Arante, whose mother worked in the rice fields. "We had a hard time meeting our daily expenses afterwards."

The stories of Anamarie and Ashley illustrate just two of the struggles endured by millions of Filipinos affected by the climate crisis. Climate change impacts are measured not only by the strength of typhoons, but also by the lasting impact they have on already-vulnerable communities.

In the case of Super Typhoon Noru, aid came from the most rural of local churches through to international agencies. ACT Alliance responded to the immediate needs of typhoon victims through the National Council of Churches in the Philippines (NCCP). But given the typhoon's extensive and lasting damage, organizations can only do so much.

On average, at least twenty typhoons make landfall in the Philippines every year. Five of these will be destructive. This destruction has become such a normal occurrence in marginalized Filipino communities that they are being praised worldwide for their resilience and optimism in otherwise hopeless scenarios.

According to the Global Climate Risk Index 2021, the Philippines is one of the countries that is most vulnerable to the long-term impacts of climate change. The country must address the loss and damage induced by the climate crisis and implement adaptation and mitigation measures to achieve a people-centered, low-carbon future.

The Philippines' contribution to world greenhouse gas (GHG) emissions is minuscule compared to the G20, yet studies show that the country's emissions increased by 114

percent from 1990 to 2017, largely due to the energy and industry sectors. The Philippines needs to take genuine steps towards climate crisis mitigation. This includes banning practices such as deforestation, illegal mining and logging, and plastic waste pollution, which are known to harm the environment. The country must also address the vulnerabilities of most Filipino people, who live in poverty, and strengthen their adaptation capacities at the local level.

At the global level, the NCCP believes that the climate crisis must be addressed by holding major GHG contributors accountable for the impacts of climate change. The climate crisis is “a consequence of the historical impact of the patterns of consumption and industrialization by what are now the wealthiest and so-called ‘developed’ nations in the world,” they say.

To be accountable, the wealthiest nations must use climate finance, technology transfer, and capacity building to support the most vulnerable countries, such as the Philippines. They must also keep their own carbon footprint in check.

BUSINESS WORLD

Where PHL is in the renewable shift

The Intergovernmental Panel on Climate Change (IPCC) has recently released its AR6 Synthesis Report: Climate Change 2023, which summed up its five years of reports. In a statement, the IPCC said that the challenge needed to limit warming to 1.5°C becomes greater now since it stressed such a challenge in 2018, as greenhouse gas emissions continued to rise.

Losses and damages being experienced and would continue to be felt in the future, which especially impact most vulnerable people and ecosystems intensely, are in sharp focus of the IPCC's latest climate change report. Nonetheless, it outlined several options that could be undertaken to reduce emissions.

The energy sector, having a critical part to address climate change, is striving for a clean energy future. But where is the industry now in turning the vision of a clean energy future into a reality?

In the Department of Energy's (DoE) National Renewable Energy Program 2020-2040 (NREP), the country has set a target of 35% renewable energy (RE) share in power generation mix by 2030, then 50% by 2040.

In the past years, however, the country saw a downward trend in RE's share in power generation. From the DoE's Energy Sector Accomplishment Report 2016-2022, the country's installed capacity of renewables went down to 28.9% or 7,965 megawatts (MW) in 2021 from 32% (6,994 MW) in 2016. The share of coal, which remained to be the country's primary energy source, went up from 34% (7,419 MW) to 42.5% (11,684 MW) in the same period.

Looking at the capacities of different renewable sources, as per the Global Energy Monitor, the Philippines has a 1,757 MW of currently operating solar farm capacity as of January; geothermal power capacity of 1,590 MW; 435 MW in wind farm capacity; and 125 MW in bioenergy capacity.

In terms of prospective capacities, the country has a prospective capacity of 27,357 MW in solar farm; 14,988 MW in wind farm; 250 MW in geothermal power; and 42 MW in bioenergy.

The Global Energy Monitor has yet to release its tracker on global hydropower. As per DoE's accomplishment report, hydropower had the highest RE share in the country with

3,781 MW in 2021. An additional hydropower capacity of 233 MW for the period 2021-2027 is expected from the committed RE power projects.

The Philippines is seen to have a potential of 246,00 MW untapped renewable capacity. So what are some of the recent programs and expansion involving renewables in the country?

The Green Energy Auction Program (GEAP) was issued in 2021 to provide an additional market for renewables via competitive electronic bidding of RE capacities.

The second round of GEA is set in June, with the DoE hoping to have 11,160 MW of RE available in the few succeeding years, according to DoE undersecretary Rowena Cristina L. Guevara. For the coming year, 3,590 MW of the 11,160 MW is targeted for installation, with Luzon accounting for 2,400 MW, Visayas with 860 MW, and 330 MW for Mindanao.

Ground-mounted solar, roof-mounted solar, onshore wind, and biomass would be among the RE sources.

The first round of auction generated nearly 2,000 MW of RE capacities committed to deliver energy in 2023 to 2025.

“Compared to the first auction or GEA-1 last year, we are more aggressive this year and we are looking for RE developers who have ready capacity by next year,” Ms. Guevara was quoted as saying.

Meanwhile, the Energy Regulatory Commission (ERC) is confidently expecting a “significant increase” in the participants of the net metering program.

Net metering allows consumers to generate electricity for their own use by installing a maximum of 100 kilowatts (kW) of RE systems and sell their excesses to the distribution grid.

The ERC said there are 7,583 net metering participants as of end-2021, with 6,120 are in Luzon, 1,168 in Visayas, and 295 in Mindanao.

“While the program demonstrates potential savings in electricity cost and protection from bill shock, actual data shows the need for more aggressive efforts to promote and implement the program in many parts of the country,” the ERC said last January.

“We can encourage more end-users to sign up via information campaigns so consumers will be aware of what net metering is all about, how to join and highlight the benefits,” it added.

Full foreign ownership of RE projects has also been allowed in the country, as the DoE issued Circular No. 2022-11-0034, amending Section 19 of the Implementing Rules and Regulations of the Renewable Energy Act of 2008. Foreign ownership of RE projects was limited to 40% then.

“With the impressive amount of interest, the DoE has been receiving both from the local and foreign investors in RE development, particularly in the offshore wind potential, the state can now directly undertake the exploration, development, production, and utilization of RE resources or it can enter into RE service or operating contracts with Filipino and/or foreign citizen or Filipino and/or foreign-owned corporations or associations,” DoE Secretary Raphael P.M. Lotilla said in a statement.

The Philippines committing to net zero is seen to have the capacity to “send a strong signal” to investors, which could then help the country attract investment needed to make the energy transition happen.

“On the flip side, without a net zero goal, the Philippines risks detaching itself from an increasingly climate-conscious global community and worsening its own exposure to climate change,” said David Kayanan, a financial and market analyst at Wärtsilä Energy.

Wärtsilä said in a statement from September that the Philippines could achieve net zero by 2050 through renewable-based power systems, backed by grid balancing engines and energy storage.

The country has yet to declare a clear net-zero target. Instead, it has committed to reducing its emissions by 75% by 2030 for its first Nationally Determined Contribution submitted to the United Nations Framework Convention on Climate Change in April 2021.

CNBC

[How 2 Gen Z climate leaders turn their eco-anxiety into action: 'This isn't a fad. This is the future'](#)

By: Jennifer Liu

The climate crisis impacts everyone, and young people feel especially stressed about the warming planet.

In 2021, a global study of 10,000 young people found 45% of those between the ages of 16 and 25 said climate anxiety was affecting their daily lives, and both the United Nations and the American Psychological Association say humans are increasingly at risk of climate change-induced mental health issues.

In a recent conversation at the South by Southwest conference in Austin, Texas, tech founder and philanthropist Alexis Ohanian spoke with two Gen Z climate leaders about how they manage their eco-anxiety.

Hope and joy as tools of resilience

Maya Penn, 22, has been a vocal climate activist since she was 8 years old and founded the sustainable fashion brand Maya's Ideas. In the last year, she took part of the 776 Foundation and Fellowship Program launched by Ohanian, where he invests money and resources in Gen Z-led climate initiatives and businesses.

Penn says the biggest way she confronts climate anxiety is by taking action, and her biggest motivator is using hope and joy as tools of resilience. Most recently, Penn says she channels her climate anxiety through art, namely through her first animated short film "Asali: Power of the Pollinators" with executive producer Viola Davis, which comes out in April.

She also stresses the need to tap into Black, Brown and Indigenous communities to measure negative impact as well as seek solutions.

"So many marginalized communities are of course most adversely impacted by environmental issues, but also have so many of the solutions, the tools and the traditional ecological knowledge" to create better alternatives, Penn says. "They just need resources to be able to support and scale that. So I want to see more supporting of those amazing ideas and communities."

She adds that she hopes corporations will take a larger responsibility given their impact on climate change, and says they could take up great conservation efforts by collaborating and open-sourcing their solutions.

“There’s this race to cater to this green market and do this and that,” Penn says. But “this isn’t a niche. This isn’t a trend. This isn’t a fad. This is the future of both business and nonprofits, and I think it’s really important to understand that we will go farther together. This isn’t just a marketing opportunity.”

We have ‘the highest chance of being able to solve’ climate change
Rostam Reifschneider, a 2021 MIT grad, is the co-founder and chief technology officer of Hydrova Inc., a company developing circular economy and decarbonization solutions for the aluminum industry.

He says his eco-anxiety comes from not being able to work on everything all at once. “There’s a lot more challenges beyond recycling that we’re going to need to solve,” he says, like policy changes or sweeping cultural shifts to move away from relying on things that contribute to a warming planet.

Taking a step back and being realistic is crucial: “I have to trust that there’s a lot of other amazing people out there tackling the other areas,” he says.

He also takes a look at the upside as a means of self-preservation. It’s easy to get depressed about the state of the climate, he says, but “I get really excited about technology and innovation and the power that we have in our hands today to make change. Right now, we have the most weapons in our arsenal to fight climate change than we ever have before.”

“So while the existential threat is the highest it’s ever been,” Reifschneider continues, “we also have the highest chance of being able to solve that, and that gets me really excited about this.”

CNN

[Climate activists dye Spanish Steps fountain water black](#)

By: Barbie Latza Nadeau

A group called Ultima Generazione or Last Generation have poured what they described as a charcoal-based black liquid into the water of the Barcaccia fountain at the base of the Spanish Steps in central Rome.

The group posted a video on Twitter, showing three men and a woman inside the fountain opening paper bags of a black powder.

"It is absurd that this gesture should shock you, when we are experiencing a drought emergency that is putting agriculture, energy production in crisis," the group said in the tweet.

The group was stopped by Carabinieri officials and Rome Capital police on Saturday, a police spokesperson said.

They are in custody pending charges of defacing a public monument and entering a fountain.

The water remained black with visible stains to the marble fountain on Saturday afternoon.

Rome's mayor Roberto Gualtieri visited the fountain — designed by Pietro Bernini in 1629 — and posted a photo of himself staring at the inky water.

"Rome is at the forefront in the fight against climate change and in the protection of the artistic heritage," he said.

"Throwing black liquid into the Barcaccia, risking ruining it, is an absolutely wrong gesture that does not help the environment," he added, saying work was under way to ensure there was no permanent damage.

The same group glued themselves to a plinth in the Vatican museums, to Sandro Botticelli's "Primavera" masterpiece at the Uffizi galleries in Florence and to the Unique Forms of Continuity in Space statue at the Museo del Novecento in Milan last year.

They are also facing charges in Rome for throwing orange paint on the Italian Senate façade in January this year.

[The oceans just reached their hottest temperature on record as El Niño looms. Here are 6 things to watch for](#)

By: Laura Paddison and Rachel Ramirez

Scientists have watched in astonishment as ocean temperatures have steadily risen over the past several years – even as the cooling La Niña phenomenon had a firm grip on the Pacific. The oceans have been record-warm for the past four years, scientists reported in January. Then in mid-March, climatologists noted that global sea surface temperature climbed to a new high.

The incredible trend worries experts about what could lie ahead, especially as forecasts predict El Niño is on its way starting this summer – and along with it, impacts like extreme heat, dangerous tropical cyclones and a significant threat to fragile coral reefs.

La Niña and El Niño are natural phenomena in the tropical Pacific Ocean; La Niña is marked by cooler-than-average ocean temperatures, while El Niño brings warmer-than-average temperatures. Both have major influence weather across the globe. And a switch to El Niño will almost assuredly bring warmer global temperatures along with it.

Daniel Swain, a climate scientist with the University of California, Los Angeles, said there is already a “dramatic transition” from La Niña to El Niño happening in the tropical Pacific.

“Right now, the atmosphere and the ocean are both in sync and screaming ‘El Niño rapid development’ over the next few months,” he said.

The last three years have still been some of the warmest on record, even with La Niña’s cooling effect. “We’re now switching that off,” Professor Adam Scaife, head of long-range prediction at the UK Met Office, told CNN.

It’s unclear how strong the coming El Niño will be – some models predict it could reach super-strength, others suggest it will be more moderate. But what is clear is that, layered on top of human-caused global heating, the signs point to El Niño ushering in severe and unprecedented impacts for many parts of the world.

Here are six weather and climate extremes to look out for.

The world could breach 1.5 degrees of warming for the first time
El Niño could – for the first time – push the world past 1.5 degrees Celsius of warming above the pre-industrial levels of the mid-to-late 1800s.

Countries pledged in the Paris Climate Agreement to limit global warming to well below 2 degrees – and preferably to 1.5 degrees – compared to pre-industrial temperatures. Scientists consider 1.5 degrees of warming as a key tipping point, beyond which the chances of extreme flooding, drought, wildfires and food shortages could increase dramatically.

A strong El Niño could push the planet to that point, Scaife said, even if only temporarily.

“We will probably have, in 2024, the warmest year globally on record,” Josef Ludescher a senior scientist at Potsdam Institute for Climate Impact Research, told CNN. The hottest year on record is currently 2016, which followed a very strong El Niño.

The world has already seen around 1.2 degrees of warming, as humans continue to burn fossil fuels and produce planet-heating pollution. And despite three years of cooling La Niña, temperatures have soared to dangerous levels.

Europe saw its hottest summer in 2022, with temperatures over 40 degrees Celsius (104 Fahrenheit) and Pakistan and India experienced a searing heatwave, where parts of the country reached more than 49 degrees Celsius (120 Fahrenheit).

Ultimately, whether the 1.5-degree threshold is hit or narrowly missed “doesn’t really matter,” Scaife said. “It’s the first time in human history that that value is within reach – and that’s the really significant point.”

Whatever the exact level of heating El Niño brings, some of its impacts – including extreme temperatures – are very likely to be unprecedented, Scaife said. “Each time we now get an El Niño, it’s adding on to an ever-larger amount of global warming that we’ve accrued.”

There could be more drought-busting rain in the West

California has seen an onslaught of rain and snow in recent months. That could intensify during El Niño.

California already faces potential flood threats this spring, NOAA reported in March, after record-breaking snow fell in the Sierra and torrential rain drenched the rest of the state.

Once El Niño kicks in, much of the state will likely see an elevated chance of above-normal rainfall with an increased risk of flooding, landslides and coastal erosion, experts told CNN.

It could even deliver “meaningful drought relief” to the Colorado River Basin, said Brad Rippey, a meteorologist with the US Department of Agriculture.

“Whereas La Niña is historically a ‘drought maker’ for the continental United States, El Niño is a ‘drought breaker,’” Rippey told CNN. “Although the exact location of drought, or lack thereof, varies considerably from event to event.”

The situation on the Colorado River, which provides water for drinking, irrigation and electricity for roughly 40 million people across the Southwest, has been plagued by overuse and a climate change-fueled drought. The water crisis has become so dire that the federal government announced never-before-seen mandatory water cuts in the last two years.

Jon Gottschalck, a head forecaster at NOAA’s Climate Prediction Center, echoed Rippey, noting that a stronger and extended Pacific jet stream — fast-flowing air currents in the upper atmosphere that influence day-to-day weather — could “elevate odds for atmospheric river-type events for the West Coast,” while also causing more intense precipitation in the South.

Drought, heat and fire elsewhere

In other parts of the world, El Niño could amplify droughts, fierce heatwaves and dangerous wildfires.

South Africa and India are at risk of drought and extreme heat, as are nations near the West Pacific including Indonesia, Australia and Pacific island nations such as Vanuatu and Fiji.

For Australia – still reeling from extensive flooding – El Niño is likely to bring much drier, hotter weather, especially in the eastern areas of the country. Since 1900, 18 of the 27 El Niño years have meant widespread winter and spring drought, a spokesperson for Australia’s Bureau of Meteorology told CNN.

Its recent floods have also increased fears for a particularly destructive bushfire season, as increased vegetation growth could provide fuel for fires as the weather gets drier and hotter.

India, too, is bracing itself for the impacts of El Niño, which can weaken the monsoon that brings the rainfall it relies on for filling aquifers and growing crops.

The monsoon tends to be most affected when there is a flip from a La Niña winter, which we have just seen, to an El Niño summer, which the 2023 summer is likely to be, said Raghu Murtugudde, an Earth systems scientist at the University of Maryland.

“The overall [monsoon rainfall] deficit can be as high as 15%,” he told CNN.

El Niño could also push up temperatures in India, which is already experiencing unusually early heatwaves. It’s a “compound hazard because heat waves and El Niño tend to delay the onset of the monsoon,” said Kieren Hunt, a research scientist at the University of Reading in England.

Months of dry spells would “put a tremendous strain on water security,” he said.

Warmer Pacific Ocean fuels stronger cyclones

One of the first fingerprints of El Niño, according to Gottschalck, will be evident in the changes in tropical cyclone activity.

Unlike La Niña, El Niño tends to reduce Atlantic hurricane activity, but creates the opposite effect in the Pacific, where warm waters can fuel more intense typhoons.

“Tropical cyclones can often form further west in the basin and remain stronger longer and so potential impacts to Hawaii are increased,” Gottschalck said. This means “more chances of landfall and remotely driven impacts, such as stronger and longer duration seas, heavy rainfall, and more.”

Elsewhere in the Pacific, Swain said models show “very warm waters” off the coast of Peru that are already bringing in unusually heavy precipitation and flooding in the deserts. “That is a classic precursor to a significant El Niño event.”

As El Niño forms and strengthens later this year, Peru could be at even greater risk of more flooding. The government is already set to invest more than \$1 billion on climate and weather measures to prevent the worst consequences.

Coral reefs could see catastrophic bleaching

El Niño is an ocean heater, and warmer water is bad news for coral reefs.

When they get too hot, corals will spit out the algae living within their tissue, which provides them with both their color and most of their energy. This causes corals to turn white – in a phenomenon called bleaching. While they can recover if temperatures eventually cool, bleaching puts them at higher risk of starvation and death.

A particularly catastrophic period of coral bleaching happened between 2014 and 2017 – hitting every major reef on earth. Australia’s Great Barrier Reef saw nearly 30% of its corals die in a record-breaking marine heatwave in 2016 – which followed a very strong El Niño that started in 2015.

More mass bleaching events have followed, and with El Niño on the horizon, scientists are increasingly concerned about the impacts on coral that has simply not had enough time to recover.

“What’s being predicted here is very scary,” said Peter Houk, a professor at the University of Guam Marine Laboratory who studies coral in Micronesia. “Every time one comes it grows a little bit more in intensity.”

El Niño doesn’t necessarily mean that all coral will be affected, Houk said. Each El Niño is different and there are always other natural climate patterns at play. “But when it does happen, it’s brutal,” he said.

Whenever it arrives, El Niño is going to be a chance to learn more about how coral reacts and where pockets of resilience might appear, Houk said. He just wants it to hold off a bit longer. “We hope that the predictions are wrong and then we can buy a few more years for the corals to recover.”

More Antarctic ice melt?

Antarctic ice is already in trouble and El Niño could make it worse.

Earlier this year, ice levels on the continent dipped to record-breaking lows for the second time in two years, sparking fear that after years of ups and downs, it could now be on a steep downward trend.

El Niño could help speed up this process, according to recent research, which found a link between the strength and frequency of El Niño events and the speed of Antarctic ice melt.

“Models that project a greater increase in El Niño systematically produce a faster ice sheet melt than models that projected a smaller change in El Niño,” Wenju Cai, chief research scientist at CSIRO, Australia’s national science agency, told CNN.

Scientists are watching Antarctica closely because it holds such a catastrophic amount of water in its ice. Though the Antarctic ice sheet is unlikely to melt completely, it has enough water in it to raise global sea level by 230 feet (70 meters).

In the immediate term, El Niño events have divergent impacts across Antarctica, Cai said, with increases and decreases in different areas. But taken together, he said, the trend is clear – “an overall sea ice decrease.”

JOURNAL ONLINE

[EcoWaste Coalition Promotes Low-Carbon and Plastic-Free Holy Week](#)

The EcoWaste Coalition, an advocate for a zero waste and toxics-free society, exhorted the faithful to mark the Holy Week with less carbon dioxide and less plastic waste.

“As we remember and reflect on Christ’s sufferings, we appeal to the faithful to keep the Holy Week as low-carbon and plastic-free as much as possible,” said Ochie Tolentino, Zero Waste Campaigner, EcoWaste Coalition.

“We invite the faithful to keep the health and wellness of Mother Earth in mind as faith-inspired acts of prayer, atonement and charity are carried out in our homes, churches and communities,” she said.

“Together, let us use the holy days, as well as the long weekend, to turn away from practices that poison and destroy the environment and the climate with pollutants such as vehicular emissions and plastic chemicals and wastes,” she said.

Ecological conversion and solidarity, the group pointed out, is urgently needed amid the triple planetary emergencies involving climate change, pollution and biodiversity loss, which threaten human health and livelihoods and the ecosystems upon which we depend on.

Towards a low carbon, plastic-free Holy Week, the EcoWaste Coalition invited the faithful to heed the following eco-measures:

1. Turn your back on practices that pollute the environment such as the careless use and disposal of single-use plastics and littering in pilgrimage sites during the Passion Week and after.
2. Minimize the use of plastic tarpaulins, which may contain toxic cadmium and lead, for announcing Holy Week activities. Politicians should do away with “Happy Easter” plastic banners.
3. Donate pre-loved clothes and other useful items to Caritas Manila’s Segunda Mana program and other donations-in-kind projects of other charitable organizations.
4. Quiet down and “staycation” at home for a meaningful bonding time with your loved ones. For those going out-of-town, remember: “take nothing but pictures, leave nothing but footprints, kill nothing but time.”
5. Keep the makeshift altar for the Pabasa ng Pasyon austere by using recycled or repurposed materials. If painting is desired, pick lead-safe paints.

6. Share food and water for the penitential Caridad in reusable instead of disposable containers. Go meatless!.
7. Observe a litter-free and smoke-free conduct of the Senakulo.
8. Take public utility vehicles, bike or walk for the Visita Iglesia on Maundy Thursday. Prioritize churches nearest to you to cut on fuel use and car emissions.
9. Never litter on the Alay-Lakad trail to the churches of the Our Lady of Peace and Good Voyage (Antipolo City), Our Lady of the Rosary of Manaoag (Pangasinan) and other popular shrines. Stay hydrated as you walk in the sun by bringing water in a reusable container.
10. Add an environmental dimension to your neighborhood's Via Crucis on Good Friday by picking up litter along the route.
11. Light the carozza of the Santo Entierro with energy-efficient and mercury-free LED lamps and adorn it with locally-sourced flowers and plants.
12. Hail the Risen Christ during the Salubong on Easter Sunday without polluting firecrackers and fireworks, and balloons, too. And keep the Easter fun activities for kids simple and, very importantly, not wasteful.

“As stewards or caretakers of God’s creation, it is our shared responsibility to demonstrate respect for the environment, especially when performing faith-based activities,” the EcoWaste Coalition reminded.

MANILA BULLETIN

[DOE plans separate auction for offshore wind supply](#)

By: Myrna M. Velasco

The Department of Energy (DOE) is planning a separate 'auction call' for the power supply agreements (PSAs) to be awarded to offshore wind investors via the Green Energy Auction Program (GEAP) of the government.

According to Atty Marissa P. Cerezo, director of the Renewable Energy Management Bureau of the DOE, many investors have been battling for a "quota" or "mandatory pie" to be allotted for offshore wind as a fraction of the overall capacity being set under the Renewable Portfolio Standards (RPS), a policy enshrined under the Renewable Energy Act.

The RPS edict requires industry participants, primarily the distribution utilities, to secure prescribed percentage of their supply from RE-generated capacities; and the increment was mandated by the DOE at 2.52-percent annually.

The energy official said the strategy being studied by the department will be "separate auction" for offshore wind capacity'; although she qualified that the actual volume has not been decided yet.

Similar to the other renewable energy (RE) technologies being offered under GEAP, she emphasized that the 'reserve price' shall also be drawn up by the Energy Regulatory Commission (ERC) for the offshore wind capacity that will be placed on tender.

On the initial years, Cerezo stated that the bidding target will just be purely for offshore wind capacity; but when storage will already reach higher scale of commercial maturity and advancements, the next game plan could be coupling between OSW and energy storage, including that of green hydrogen.

When the government opened up the RE sector for 100-percent foreign ownership four months ago, the DOE acknowledged that majority of the interested investors have been setting their sights on offshore wind farm projects.

Over 50 service contracts had already been awarded by the DOE to various investors in the OSW investment space; and the actual megawatts are anticipated for delivery 5-7 years down the road.

In a study undertaken by the World Bank Group relating to investment hurdles for offshore wind in the Philippines, it listed major concerns yet to be addressed squarely – mainly those on energy cost; transmission or grid integration; environmental and social (E&S) impacts; limited local supply chain; financing and bankability of projects.

At this stage, the levelized cost of electricity (LCOE) for offshore wind is still way higher versus other RE technologies, but investors are hoping that this will track downtrend in the years ahead.

And for the industry to triumph over that, the World Bank qualified that the technology “could become competitive with the cost of conventional, thermal generation through large market-scale and competition.”

As noted by developers of offshore wind projects, the rule of thumb on upfront capital cost for this technology installation is relatively expensive at \$2.5 million per megawatt if compared to solar which is now at less than \$1.0 million per megawatt.

Transmission of generated capacity has also been cited as a dilemma, with the World Bank pointing out that “to connect projects at large scales sufficient to drive down the cost of energy, transmission grid upgrades and strengthening will be required to deliver power to demand centers.”

The World Bank similarly underscored that massive offshore wind installations could yield “risks of adverse environmental and social impacts, especially when cumulative impacts from multiple projects are considered.”

In view of that then, it propounded that “data, stakeholder engagement, careful planning and robust regulations will be required to manage this (E&S impact).”

Additionally, the World Bank conveyed that “despite the Philippines’ strong industry, a comprehensive local supply chain will not be feasible in the short and medium-term and many components will need to be imported.”

On project financing aspect, the bank highlighted that “the unique and high risks associated with offshore wind will require careful risk management and mitigation measures to ensure bankability and minimize the cost of capital.”

[PH longest bridge now powered by P60-M hybrid solar farm](#)

By: Dale G. Israel

The Cebu-Cordova Link Expressway (CCLEX), the picturesque third bridge linking mainland Cebu to Mactan Island and now turning to be a new landmark here, is going solar.

The corporation that operates the toll bridge has announced the completion of its P60-million on-grid and hybrid solar farm located near the foot of the bridge landing in Cordova town on Mactan Island.

Some 862 photovoltaic panels were installed strategically in three different areas at the 8.9-kilometer modern toll expressway, the longest bridge structure in the country.

The CCLEX solar farm generates a total of 50,400 kilowatt hours of electricity per month, which has been tapped for the power needs of the bridge starting April.

Significant milestones

“It will supply the expressway’s daytime power requirement for roadway lights, traffic control room, closed-circuit television cameras, road weather information system, variable message signs and toll plaza,” said Cebu Cordova Link Expressway Corp. (CCLEC) in a press statement released on March 31.

The solar farm is expected to gain carbon emission savings of 237,082 kilograms or the equivalent of 7,076 trees planted, the corporation said.

CCLEC president and general manager Allan Alfon explained the need to tap renewable energy to power the day-to-day operation of its 8.9-km modern toll expressway.

“The completion of our solar farm is a significant milestone in our drive toward being more sustainable in our operations by reducing our carbon footprint and promoting the use of clean, renewable energy,” he said.

“Setting aside a significant area for this project is staying true to our mission of bringing good life to people, not only through our infrastructure developments but also through sustainable practices,” he added.

Apart from the solar farm, CCLEC also installed 13 oil interceptors along the expressway, a P60.7-million investment to prevent contaminants from polluting the sea.

These interceptors, CCLEC said, collect vehicle grease and oil that spilled on the road and were washed away by rain.

CCLEC said they are also in the works of other sustainable projects such as a sewage treatment plant and a noise barrier system.

The CCLEX was seen to not only ease traffic congestion in Metro Cebu but to also spark socioeconomic development in the province.

The expressway is a project of CCLEC in partnership with the local governments of Cebu City and Cordova.

CCLEC is a wholly owned subsidiary of Metro Pacific Tollways Corp., the toll road arm of Metro Pacific Investments Corp., a publicly listed infrastructure holding company and a member of the MVP Group of Companies.

PH, UK keen on increasing maritime cooperation amid 'thriving' ties

By: Raymund Antonio

The Philippines and the United Kingdom (UK) reaffirmed their commitment to strengthen already “thriving” ties, as their high-ranking officials agreed last week to “work more closely” on “mutual priorities” that include maritime cooperation and regional stability.

In a tweet, Foreign Affairs Secretary Enrique Manalo shared this outcome of his meeting with UK Minister for Indo-Pacific Anne-Marie Trevelyan on Thursday, March 30.

“Reaffirmed the Philippines’ commitment to strengthen PH-UK enhanced partnership during my meeting with UK Minister of State for Indo Pacific Anne-Marie Trevelyan,” he wrote.

The UK official, who was in the country from March 30 to 31 to launch the British Investment Partnerships (BIP) in the Philippines that will help boost UK-backed investment in green energy and infrastructure, described the relationship between the Philippines and UK as “thriving.”

“UK-Philippines ties are thriving, from our Enhanced Partnership to our cooperation through ASEAN,” her tweet read.

She added that it was a “pleasure” to meet Manalo as they “agreed to work more closely on mutual priorities from maritime security to regional stability.”

British Ambassador to the Philippines Laure Beaufils also shared some more details about the meeting on Twitter.

“Great meeting between (UK) Minister for Indo Pacific @annietrev & (Philippines) @SecManalo. They agreed to further strengthen our Enhanced Partnership- including on maritime security, green infrastructure, economic security and climate change,” she wrote.

During the meeting with Manalo and other officials, both parties discussed defense, trade and climate issues.

Trevelyan also met with Philippine Coast Guard (PCG) chief Admiral Artemio Abu to discuss maritime security and marine conservation.

Part of her agenda was to visit the PCG headquarters, where she joined a tour of a Coast Guard vessel and Manila Bay.

Her visit though was primarily to launch UK's new BIP initiative.

“Working with the Philippine government and private sector partners, BIP will mobilize high-quality, reliable investment and technical expertise to support sustainable infrastructure development and the transition to clean energy in the Philippines,” a statement from the UK government said.

Trevelyan added that the initiative would “boost high quality, sustainable infrastructure development across the Philippines, accelerate the green energy transition, and secure resilient growth for the Philippines.”

BIP builds on the ongoing work by UK development finance institutions, which are already providing funding and expertise support to the Philippines for its aim to achieve resilient growth.

Among the financing opportunities include the UK's Mobilist program, which is investing in green energy, including \$25m in financing for the Philippines' first solar plants on Negros Island.

NASA

[Planes, Shipping Lanes, and Automobiles: Surprising Ways Climate Change Can Affect Transportation](#)

By: Alan Buis

The effects of global climate change are broad and impact everyone, as well as Earth's natural systems.

Much has been written about the major impacts of climate change. Effects such as rising global surface temperatures, higher sea levels, longer and more intense heat waves, melting glaciers and ice sheets, polar sea ice loss, extreme weather and climate events, and impacts on animal habitats are well-documented and in the news regularly.

In this new NASA Climate feature series, we're examining some of the lesser-known, and often surprising, ways Earth's changing climate is affecting our world.

Before the Industrial Revolution, human travels had little impact on Earth's climate. That changed once we began burning fossil fuels to power trains, boats, cars, trucks, and planes. Today, transportation generates about a fourth of global carbon dioxide emissions, second only to the electric power sector.

Climate change is affecting transportation in major ways, such as the ongoing shift to zero-emissions automobiles. But some of the impacts of climate on transportation are less obvious. Here are a few.

Bumpier Skies

Our changing atmosphere may make future airline flights bumpier by strengthening vertical wind shear in jet streams. Jet streams are fast-moving belts of wind that travel around the planet in wavy, meandering paths in the upper parts of the atmosphere. Aviators often use or avoid them to increase the efficiency of their flights.

Vertical wind shear creates irregular air motions called turbulence, which is a significant and costly issue for airlines, resulting in injuries, damaged aircraft, delayed flights, and inspections and investigations.

Sometimes bumpy flights happen without significant cloudiness or thunderstorms. This phenomenon is known as "clear-air turbulence." British atmospheric scientist Paul Williams of the University of Reading studies clear-air turbulence. Among his findings:

- By 2050, the frequency of reported clear-air turbulence is expected to double, and the average strength of turbulence is expected to increase by 10 to 40%.
- Severe turbulence at typical airplane cruising altitudes could become two to three times more common. This will impact airspace over large regions of the Northern Hemisphere.

NASA develops technologies to improve aviation efficiency and maintain safety. Researchers at NASA's Langley Research Center recently designed a special infrasound microphone that can "hear" ultralow frequencies generated by turbulence. This technology was tested on an uncrewed stratospheric glider called HiDRON.

Climate change can also make it harder for aircraft to take off. As temperatures rise, air becomes less dense, so planes have a harder time generating the lift they need to become airborne. Because of this, some aircraft runways may not be long enough for certain planes to take off. It also might force aircraft operators to reduce the takeoff weight of planes and helicopters.

Arctic Travel Gets Both Safer and More Dangerous

One of its most significant changes to the planet is the continuing decline of Arctic sea ice. Over the past 40 years, the amount of ice cover at both the annual maximum and minimum has shrunk, and the percentage of thick ice that survives from year to year has also dropped. As reported in 2018, this has opened the Arctic to new commerce opportunities, but also to serious environmental concerns. At the center of both lies the shipping industry.

On the positive side, reduced sea ice cover is increasingly allowing ships to sail across the Arctic Ocean without support from icebreaker ships. This can significantly shorten travel times between Asia, Europe, and North America. As a result, many nations are preparing for more Arctic shipping.

There are also negatives. Scientists and environmentalists worry more shipping activity will increase pollution and oil spills and disturb marine life. And ships are still encountering plenty of ice as they sail closer to the North Pole and in waters that are not well charted. Increased exploration and tourism also mean search-and-rescue operations become more challenging for the U.S. and Canadian coast guards. Finally, some traditional travel routes over the sea ice (used by snowmobiles, trucks, and other vehicles) could become unsafe as the ice thins.

(Not) Rollin' on the River

Climate change is expected to increase the frequency and/or intensity of droughts and floods, so the impacts on water levels in rivers and reservoirs may become more severe and erratic.

The impacts on shipping cargo by boat could be significant. Water levels can drop such that rivers can become too shallow to navigate, and some ships may have to carry less cargo to safely navigate a river. In the United States, cargo transport along the Mississippi River has been impacted in recent years. For example, low water in 2012 closed an 11-mile stretch of the Mississippi River near Memphis. Such closures have a big economic impact along the river.

PHILIPPINE DAILY INQUIRER

Shift to renewable energy fostering new investments

By: Meg J. Adonis

Increasing support for renewable energy in the Philippines is encouraging more investments in the industry, with nonhydropower technology expected to spur growth in the next nine years, according to a Fitch Solutions study.

The think tank noted that the private sector was reducing its stakes in coal power, which accounts for the majority of the country's power source at 57 percent.

"Private sector companies in the power sector have also made commitments to expand their portfolio of renewable power projects, and we believe that it reflects the growing sentiment by the power companies to expand the market's renewable power capacity over the coming years," Fitch Solutions said.

The Ayala-led ACEN Corp. is among the power industry leaders that have committed to increasing clean energy generation and capacity.

The company recently said it sought to raise its renewable power capacity from 4 gigawatt-hours (GWh) to 20 GWh by 2030, following its divestment from the coal-fired plant of South Luzon Thermal Energy Corp. last year.

Meanwhile, Aboitiz Power Corp. will be spending P190 billion to increase its clean energy capacity over the coming years.

Fitch Solutions said this growing interest in clean energy could increase the Philippines' net installed capacity to 45.4 GW by 2032.

At present, the country has 29.5 GW of installed capacity.

It also expects that the majority of this growth would come from the nonhydropower renewables sector. INQ

[UK's King Charles III given insights into Mindoro oil spill by Filipino climate activist](#)

By: Jean Mangaluz

During a meeting with the United Kingdom's King Charles III, a Filipino climate activist told the king about the Oriental Mindoro oil spill, according to the Youth Advocates for Climate Action Philippines (Yacap) on Friday.

The climate activist, Mitzi Jonelle Tan, is Yacap's spokesperson.

"There's an oil spill in the Philippines right now and we need help. It's not getting any question or accountability, and really, majority of the world need climate finance and climate reparations, especially [those] battling the impacts of colonialism, making us more vulnerable to the climate crisis," she told King Charles III.

King Charles said he has been trying to get attention to the climate change issue.

"If it's any consolation, which it isn't, I keep trying. I have been trying for forty years. The difficulty is to get people to listen," said King Charles III.

Present in the encounter was the president of Germany Frank-Walter Steinmeier, climate activists Elizabeth Wathuti from Kenya and Licypriya Kangujam from India.

According to a statement from Yacap, there is a need for countries from the Global North to give reparations to countries like the Philippines, which are adversely affected by climate change as a result of colonialism.

"Yacap calls on those in the energy industry to transition to renewable sources of energy, and start phasing out oil- and coal-powered facilities. The group also calls on the Philippine government to act with urgency to address the long-term impacts of the oil spill and prioritize the development of the country's science and technology so that the Filipino people can maximize and develop local renewable energy plants," said the group in a statement.

The group also said it would hold a fact-finding mission in the affected areas of the Oriental Mindoro oil spill.

The oil spill was caused by the sinking of the MT Princess Empress on February 28 in the waters of Oriental Mindoro. It carried 800,000 liters of oil, which has since reached Batangas and Palawan.

PHILIPPINE NEWS AGENCY

[Denmark's leading wind energy firms eyeing opportunities in PH](#)

By: Kris Crismundo

Danish Ambassador to the Philippines Franz-Michael Mellbin said the liberalization of the renewable energy (RE) sector in the Philippines has attracted the interests of Denmark's largest wind energy companies.

On the sidelines of a recent event at the Department of Energy (DOE), Mellbin told reporters that the Royal Danish Embassy here is "looking at a handful of companies" that are interested to explore business in the Philippines.

"[W]e have the two of the largest wind companies in the world, Vestas and Siemens Gamensa. There are also big interests from these companies to move into the market," he said.

The envoy said the Philippines became an attractive market for Danish RE firms following the amendments to the Renewable Energy Act that now allows 100-percent ownership of projects for foreign investors.

Last week, Mellbin witnessed the signing of service contracts for Copenhagen Infrastructure Partners (CIP) with the DOE for three offshore wind energy projects to be located in Camarines Norte and Camarines Sur, in Northern Samar and in Pangasinan and La Union.

CIP is the first foreign firm that announced it will undertake renewable projects in the Philippines at full ownership.

The Danish firm said it will invest USD5 billion for the three offshore wind energy projects to be delivered within the term of President Ferdinand R. Marcos Jr.

Mellbin said CIP's investment in the Philippines is one of the offshoots of the recent official visit of Marcos to Europe.

"Definitely President Marcos has sent some very strong, positive signals about more openness to business, and this has stimulated both in Demanrk (and) also in Europe," the envoy added.

He added that the Danish firms see the policy reform of the Marcos administration to open the renewables sector for foreign investors as a key measure to attract more energy investments into the Philippines.

“It’s very important because Denmark is a world leader when it comes to wind technology, so some of the investors feel more comfortable working in control of the projects... [T]he investments of these companies also bring a lot of know-how and knowledge to the Philippines,” Mellbin said.

He said Danish RE firms are interested in onshore and offshore wind energy projects, small modular reactors, waste-to-energy, and biomass projects in the Philippines.

The Danish envoy noted that the Philippine government can do more ribbon-cutting ceremonies when it cuts the red tape.

“[R]ed tape is a challenge for foreign investors in this country, and the government can do a lot to get more foreign investments in by cutting the red tape,” Mellbin said.

REUTERS

[Policy Watch: The IPCC has given us a roadmap to a safe future for humanity. But will we follow it?](#)

By: Angeli Mehta

Do countries need a Ministry for the Future, a body charged with defending all creatures, both today's and those yet to come, as in Kim Stanley's Robinson's novel of the same name?

It's been 33 years since the Intergovernmental Panel on Climate Change (IPCC) produced its first assessment of the threat of climate change. Its latest Synthesis Report paints a bleak picture of how little we've done. 2030, the year by which emissions must halve if we're to limit average global warming to 1.5 degrees, is now within sight, not so far in the future as to be unimaginable. However, we've already reached 1.1C degrees of warming, with emissions still rising and no sign of a cut in subsidies for fossil fuel consumption.

There's still a chance to bend that emissions curve if only today's governments will grasp it, say the IPCC authors. There are "tried and tested policies and practices that can work in diverse contexts to reduce the emissions and advance climate resilience, but they need to be scaled up and applied more widely," IPCC chair Hoesung Lee told journalists at a briefing to launch the report.

Even in the UK, which in 2008 adopted pioneering legislation for climate action, progress has stalled. It took the High Court to force the government to revise its net zero strategy, to meet its obligations under the Climate Change Act.

But the policies, announced at the end of March, have failed to impress. Climate think tank E3G described them as "underwhelming". Just days before the government unveiled the new strategy, its climate advisors lambasted the government's failure to act on adaptation.

Launching the Climate Change Committee's latest assessment, Julia King, Baroness Brown of Cambridge, who leads on adaptation at the Climate Change Committee, was blunt: "The last decade has been a lost decade in terms of preparing for and adapting to the risks, the risks we already have, and those that we know are coming."

Will court cases be enough to effect global change? Around the world, there has been successful legal action taken by NGOs against government and companies for failing to act. The UN recently passed a resolution asking the International Court of Justice to

advise on the duties of states to combat climate change, and the legal consequences of disregard, including for “present and future generations affected by the adverse effects of climate change”. The island state of Vanuatu, reeling from two recent strong tropical cyclones, has been pressing for the resolution for four years.

Anders Wijkman, who chairs the board of Climate-KIC, a public private partnership for low-carbon innovation in Europe, is sceptical. “When you look back at history, there is not one example of a peaceful transformation in a society without war or deep crisis. So, I'm afraid we really have to understand that transformation doesn't happen unless we are really pushed against the wall,” he said.

“And Putin pushed us against the wall, so a lot of things are happening that wouldn't (have) without him. But I'm not sure it's fast enough,” he adds.

Europe's response to the Russian invasion of Ukraine was to launch REPowerEU, designed to end its dependence on Russian oil and gas and transform the bloc's energy system. However, it has also sent Europe in search of oil and gas from Africa. Now it is ramping up clean-energy investments to counter the threat from the U.S. the Inflation Reduction Act (IRA), which is already luring companies to U.S. shores. The IRA itself is expected to reduce emissions by 40% (compared to 2005 levels) as well as cut the “social costs” of climate change through, for example, better health outcomes.

Sandrine Dixson-Declève, co-president of the non-profit Club of Rome, who leads on its Earth4All initiative, says there are positive signals, but “we just are not pushing the market fast enough to transition out of the biggest polluters. And that is the key.”

She says a change in narrative is needed. “I don't think that governments really understand how to shift the economy away from being dependent on fossil energy, how to enter into really difficult conversations with the oil in the gas sector – but also with other manufacturing sectors – and put in place the capital flows that are really going to enable that shift.”

There is no shortage of ideas, ranging from reducing demand in the global north to reshaping economics and finance. Most recently, the Energy Transitions Commission has provided a blueprint to get the money flowing across the globe.

“It's not as if the solutions aren't there. It's a question of bravery, and leadership from governments,” Dixson-Declève adds.

Next week, informal discussions take place at the U.N. on a Declaration for Future Generations. These form part of the preparations for a Summit of the Future, in 2024, aimed at re-enforcing global governance structures and advancing the 2030 Sustainable Development Goals.

“The logic underpinning these proposals is simple,” says UN Secretary-General António Guterres in a policy paper on the summit. “What we do for future generations is also what we need to do for ourselves, which is to take challenges and opportunities that lie in the future far more seriously than we currently do.”

He argues there’s no trade-off between meeting present and future needs. “There is no solution to the problems of the present that does not take a longer-term perspective.”

As the IPCC notes in the Synthesis report, there are challenges and choices to be made. At the end of the press briefing, the IPCC's Lee said: “Let's hope we make the right choices, because the ones we make now, and in the next few years, will reverberate around the world for hundreds, even thousands, of years.”

THE MANILA TIMES

Easterlies bring hot, humid weather

By: Arlie O. Calalo

Hot and humid weather is expected in most parts of the country because of the easterlies, the dry and cold prevailing winds coming from the Pacific Ocean, the Philippine Atmospheric, Geophysical and Astronomical Services Administration said.

"Generally, the easterlies, the dry and cold prevailing winds that blow from the east- are affecting the country but in a different way," weather forecaster Benison Estareja said.

"While it will bring hot and humid weather over Metro Manila and the rest of the country, it also affects other areas especially in Mindanao where scattered rain showers and thunderstorms will be experienced," he said.

Palawan, Eastern Visayas and Mindanao will have overcast skies with scattered rain showers and thunderstorms.

Metro Manila and the rest of the country will have partly cloudy to cloudy skies with isolated rain showers or thunderstorms.

Innovations in campus sustainability and green technologies

By: Ludwig O. Federigan

THE field of sustainability has seen rapid innovation in recent years, with new technologies and practices emerging to reduce energy consumption, greenhouse gas emissions and waste reduction. Campuses have been at the forefront of these innovations, as they seek to reduce their environmental footprint while providing a high-quality educational experience for their students. Some of the most promising innovations in campus sustainability and green technologies include the following:

Renewable energy. Renewable energy sources such as solar, wind and geothermal have become increasingly popular on college and university campuses. Many institutions have installed solar panels on their roofs, generating clean electricity to power their buildings and reduce their reliance on fossil fuels.

Quezon City Mayor Josephine Belmonte, during the media launch of Earth Hour 2023, shared that by the end of her second term, all campuses of public educational institutions in the city will be 100 percent solarized.

Solar power systems. A few colleges and universities have also turned to the power of renewable energy. First, Manuel L. Quezon University, known as Manila's first solar-powered university, installed a 96-kilowatt-peak solar panel system on the roof of its buildings, covering a total area of 621 square meters. The solar panels are capable of providing around 28 percent of the school's daily energy needs.

In the Visayas, the Holy Name University (HNU) in Bohol was the first to have a fully integrated solar power energy system in its operation in April 2016. HNU installed a solar power plant composed of 1,100 solar thin film panels. Considered the largest thin film solar installation in the country, the HNU plant would save the school roughly 20 to 25 percent of its monthly energy cost.

In Mindanao, Ateneo de Davao University kept the lead for renewable energy use. It currently houses 842 solar panels that can generate 285.37 kilowatt of power or 520 megawatt-hour of energy each year.

Energy efficiency. Campuses have also made significant progress in improving the energy efficiency of their buildings and operations. This includes installing energy-efficient lighting, heating and cooling systems, and building envelopes, as well as implementing energy management systems to optimize energy use. Some institutions have also implemented demand response programs which allow them to reduce energy consumption during peak periods of demand.

Green building design. The green building design has become a standard practice in the construction and renovation of campus buildings. This includes incorporating sustainable materials such as recycled steel and reclaimed wood into building designs and optimizing the orientation and layout of buildings to maximize energy efficiency. Some campuses have also implemented green roofs and living walls, which provide insulation and absorb rainwater, reducing the heat effect and mitigating stormwater runoff.

The Philippines has a National Voluntary Green Building Rating System called the Building for Ecologically Responsive Design Excellence (Berde). It is recognized by the Philippine government, through the Department of Energy's Philippine Energy Efficiency Project-Efficient Building Initiative. It is a tool to measure the resource efficiency and environmental performance of building projects. Berde measures how a building performs above and beyond existing national and local building, and environmental laws, regulations and mandatory standards.

Travel and waste reduction

Smart transportation. Transportation is a significant source of greenhouse gas emissions on college and university campuses. To address this, many institutions have implemented smart transportation solutions such as bike-sharing programs, electric vehicle charging stations and shuttle buses powered by alternative fuels. Some campuses have also implemented remote work policies and virtual meetings, reducing the need for travel altogether.

Prior to the Covid-19 pandemic, the University of the Philippines (UP) Diliman and the Department of Science and Technology launched the "Intelligent Electric Transportation Network" (IntElect). It is a fleet of electric tricycles aimed at providing eco-friendly transportation systems to the state university's sprawling campus. The project's monitoring system tracks, monitors and provides data on these e-vehicles (EVs).

A major part of the IntElect project is a ride-sharing and guidance system that will compute the optimal locations of charging stations in the area. One of the key developments is the improvement in the EV-charging time which is now significantly shorter.

A mobile app for ride-hailing was also developed. The e-trikes are initially expected to service UP personnel, but can be expanded to serve more passengers in the near future.

Waste reduction. Waste reduction and recycling programs have become standard practice on college and university campuses, with many institutions implementing composting programs and banning single-use plastics. Some campuses have also implemented closed-loop systems, which capture and reuse waste materials within the campus ecosystem, reducing the need for disposal.

PH needs to prepare for Agri 5.0

By: Janine Alexis Miguel

THE Philippines should start preparing for Agriculture 5.0 to address the problems the country's food systems are facing, according to the Philippine Society of Agricultural and Biosystems Engineers (PSABE).

"Agriculture 5.0 is about applying technology to farming, fishing and food processing in order to attain efficiency, but at the same time making agriculture sustainable and environmentally friendly, and resilient to the effects of climate change," PSABE President Andres Tuates Jr. explained.

He also said that Agriculture 5.0 has solutions that can help modernize the country's agriculture sector and make it resilient against climate change.

"Agriculture 5.0 is also about selecting the most appropriate technologies from the biological, mechanical and digital spheres, and aiming to create an ecosystem where food producers and consumers mutually benefit, " Tuates said.

He also mentioned that one of the major goals of Agriculture 5.0 is to attain food security and achieve a sustainable system appropriate for food production.

To increase the awareness of Agriculture 5.0 in the Philippines, it will be highlighted at the 72nd Philippine Society of Agricultural and Biosystems Engineers (PSABE) Annual National Convention" and "19th International Agricultural and Biosystems Engineering Conference and Exhibitions" as part of the 34th Philippine Agricultural Engineering Week. The events will be held in the latter part of this month.

With the theme "Agricultural and Biosystems Engineers: Strong Leaders and Key Innovators Towards Sustainable Food-Secured Philippines," Tuates said that the simultaneous events reflect the need to introduce more technologies in the country's agriculture sector.

According to the data released by the Philippine Statistics Authority, domestic agriculture production plummeted by 1.0 percent in 2022, with decreases noted in palay (unmilled rice) and corn or lower by 2.5 percent and 6.9 percent, respectively. Among the major problems identified in lower farm production are extreme weather conditions and lack of technology adoption.

THE PHILIPPINE STAR

[Philippines urged to engage in International Court of Justice's hearings on climate duties](#)

By: Gaea Katreena Cabico

The Philippines, one of the countries most at risk from the impacts of climate change, should actively engage in the proceedings of the world's top court tasked to outline the legal obligations of governments for curbing global emissions, a group said.

The United Nations General Assembly adopted a resolution asking the International Court of Justice to lay out nations' obligations to climate change and the legal consensus of inaction. The measure was hailed as a victory for the climate justice movement.

The ICJ will hold hearings and request submissions over the next few months, and an advisory opinion will be issued in 2024.

"Filipino communities, who have suffered the brunt of climate impacts for decades, deserve to have their voices represented in this discussion," Greenpeace Philippines campaigner Virginia Benosa-Llorin said in a statement.

She added that the Marcos administration should represent the interests of Filipinos in seeking climate justice as well as payment for loss and damage.

Benosa-Llorin noted that the Philippines can substantially contribute to the proceedings.

In 2022, the Commission on Human Rights issued a report on the obligations of governments and businesses in tackling climate change, which is also a human rights issue. The report of the CHR was one of the first proceedings globally to have examined the links between climate impacts and human rights harms.

Benosa-Llorin said the findings and recommendations in the CHR report could be a key source of information for ICJ's discussions and could further strengthen the case for an advisory opinion in favor of climate-vulnerable nations.

Although ICJ opinions are not binding, they carry significant legal and moral weight, and are often taken into account by national courts.

"This gives Filipinos hope that we can demand more ambitious climate action and an end to fossil fuel extraction and expansion in order to secure the survival of present and future generations," Benosa-Llorin said.

CCC IN THE NEWS:

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[State Universities and colleges hinikayat ng CCC na taasan ang kanilang budget proposals para sa 2024](#)

By: Gilbert Pardez

Nagsagawa ng orientation ang Climate Change Commission PH (CCC) at Department of Budget and Management (DBM) para sa state universities and colleges (SUCs) na may kaugnayan sa climate change expenditure tagging (CCET).

Kasabay nito, hinikayat ng CCC at DBM ang mga SUCs na taasan ang kanilang climate budget proposals para sa FY 2024.

Ayon sa dalawang ahensya, mahalagang nakikita sa CCET ang mga ililinyang programa, proyekto at aktibidad ng SUCs bilang suporta sa isinusulong nitong mga hakbang at polisiya na may kinalaman sa paglaban sa pabago-bagong klima.

“We call on SUCs to increase and prioritize their budgets for climate research and development to produce the best available science and technologies locally,” wika ni CCC Commissioner Albert Dela Cruz Sr.

Halos limang daang kinatawan mula sa higit isang daang SUCs ang dumalo sa CCC-DBM-led orientation ukol sa CCET.

Samantala, sinabi naman ni CCC Vice Chair at Executive Director Robert E.A. Borje na kumpiyansa silang mapapataas nila ang pondo para sa climate-related activities sa pamamagitan ng mga isinasagawa nilang orientation sessions.

“SUCs are among our key partners in addressing climate change. They provide us site-specific climate information that enable local government units to determine fit-for-purpose programs and activities to address climate change and its impacts,” ani Borje.

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