

ESG

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ESG Country Updates

Singapore

- Locally based recycling company Redux launched an automated solar panel recycling facility on 24 Nov, as solar panel waste in Singapore is expected to rise with older units becoming obsolete or reaching the end of their lifespan. The number of solar panels to be decommissioned in Singapore annually is estimated to grow from 134,305 in 2025 to 157,087 in 2030. The solar panel recycling facility aims to recover, recycle and reuse up to 96% of each solar panel, which avoids up to 1,400 tonnes of carbon emissions as compared to the disposal of solar panels in Singapore's landfill. It is expected to process 36,000 solar panels annually, which represents around 27% of Singapore's current solar panel waste. Building capabilities to manage solar panels at the end of their life cycle can support Singapore's waste reduction goals and avoid emissions from waste incineration.
- A data centre test bed will be built on Jurong Island for researchers and operators to trial the use of green technologies. The pilot-scale data centre is expected to be powered by green energy sources like solar power and biofuels, while being equipped to support the intensive computing needs of artificial intelligence (AI). It will be located within the area set aside for the low-carbon data centre park, where JTC and the National University of Singapore will commence a study in 2026 on establishing the facility. One aim of the study is to find out how AI data centres can interact with hydrogen-ready power plants, low-carbon fuels, batteries and other alternative energies on Jurong Island. Other than the low-carbon data centre park, land will also be set aside for new energies such as greener fuel, to enable Jurong Island's green transition.

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China

- China installed 12.6GW of new solar capacity in October, 30% more than the previous month, according to the statistics by the National Energy Administration (NEA). Installations continued to recover from a mid-year drop-off triggered by a new renewables pricing mechanism that created uncertainty for investors. Despite the mid-year drop-off, installations were up 39% from the 2024 level at 252.87GW from January to October. If new additions continue at the same pace for the rest of the year, 2025 solar installations will be just about on par with 2024's record annual surge of 277GW. Simultaneously, China is implementing grid upgrades to address increasing curtailment rates for solar in China.

Rest of the world

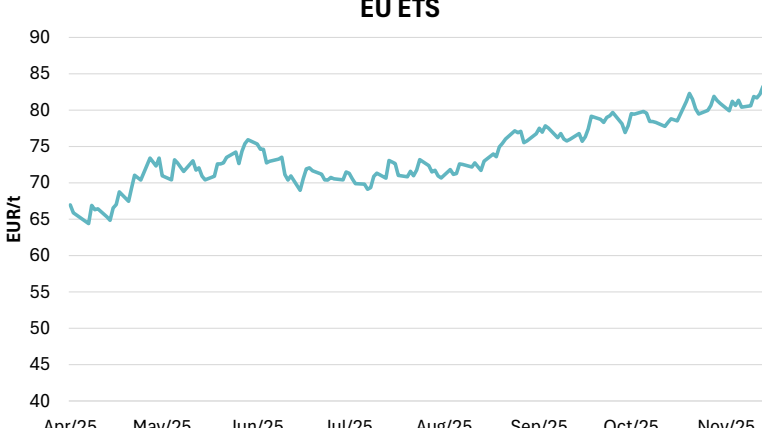


- The European Parliament has voted in favour of delaying the implementation of the European Union's deforestation law by one year. Large operators and traders will now have to respect the obligations of this regulation as of 30 Dec 2026, and micro and small enterprises from 30 Jun 2027. The additional time is intended to enable a smooth transition and to allow the implementation of measures to strengthen the IT system that operators, traders and their representatives use to make electronic due diligence statements. This delay has been prompted by concerns about the readiness of businesses and IT systems for compliance. The European Parliament has also requested a simplification review by 30 Apr 2026 to assess the law's impact and administrative burden. It will also start negotiations with member states on the final shape of the law, which has to be endorsed by both Parliament and the Council and published in the EU Official Journal before the end of 2025, for the one-year delay to enter into force.

Special Coverage: Continued push for sustainable aviation fuel (SAF) despite high costs

- The aviation sector has committed to net-zero emissions by 2050, but this is hindered by the limited availability and high costs of sustainable aviation fuels (SAF). Nonetheless, several ASEAN states are pushing for SAF production, including:
 1. The Civil Aviation Authority of Singapore (CAAS) announced that passengers flying out of Singapore from October 2026 will pay a levy of between \$1 and \$41.60 that will go towards the purchase of sustainable aviation fuel. A new facility by Aster and Aether Fuels on Pulau Bukom will produce sustainable aviation fuel from 2028.
 2. Indonesia's state-owned energy company Pertamina is ramping up efforts to produce SAF as part of the country's drive to cut carbon emissions from air travel. The company plans to expand SAF production capacity at its existing refineries and is exploring the possibility of building new green refineries.
 3. Malaysia's first SAF facility, EcoCeres Renewable Fuels Sdn Bhd, has been producing commercial-grade fuel at its Tanjung Langsat plant since October. The facility can produce up to 350,000 tonnes of SAF annually.
- Currently, the aviation sector's decarbonisation efforts primarily focus on scaling up the supply of SAF, enhancing aircraft efficiency and utilising carbon offsets. Some markets are also witnessing the development of regulations and policies that support SAF adoption. While ambitions surrounding SAF usage are high, SAF availability is currently limited, with the most affordable SAF still about three times more expensive than conventional jet fuel.

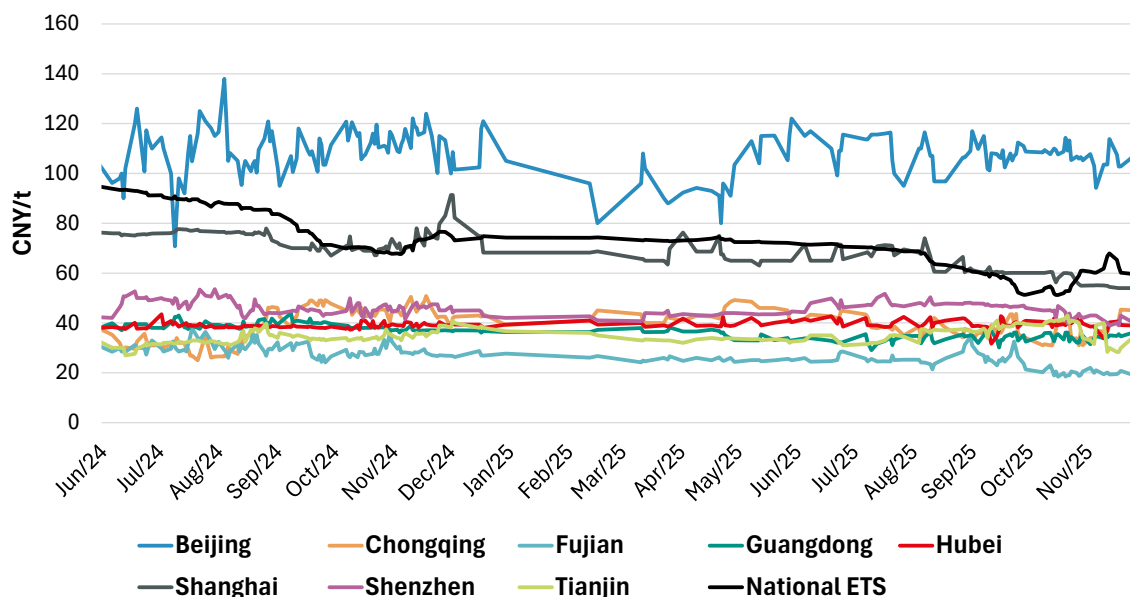
Carbon Markets: Weekly Overview

ETS markets	Price	Weekly change	Week high	Week low
EU ETS (EUR/ton)	83.26	3.5%	83.26	80.41
China ETS (CNY/ton)	59.65	-8.6%	65.27	59.60

Market	Commentary	
EU ETS	<p>The recent bullish momentum is largely driven by the approaching end of the annual auction program, tightening short-term supply and adding support to prices. Falling gas costs has also boosted industrial output and EUA demand.</p>	<p>EU ETS</p> 
China	<p>National ETS: Prices closed the week at CNY 59.65/t, down 8.6% from the previous week and halting three consecutive weeks of an upward trajectory. Total trading volume also declined from the previous week to a little over 10 mn tonnes, down 14% from the previous week.</p> <p>CCER: CCER traded volume saw a significant jump to total 1,753,541 tonnes, nearly 22 times the total volume traded the previous week. Daily average prices rose slightly and were in the range of CNY60.04/t to CNY65.28/t. CCER prices have rose above China ETS prices, which may slow buying activity if the bullish momentum holds.</p>	<p>China ETS</p>  <p>China CCER</p> 

Pilot ETSs: The total traded volume across all the pilot ETSs was 738,883 tonnes, down 32% from the previous week. The Hubei pilot ETS contributed to the bulk of the volume, accounting for 57.6% of the total, down slightly from the previous week.

National and Pilot Allowance Spot



Pilots	Closing price on listed trade (CNY/t)	Weekly change (%)	Weekly volume on listed trade (t)
Beijing	108.27	5.29	3,086
Chongqing	40.61	-9.76	11,874
Fujian	18.81	-3.54	56,421
Guangdong	39.83	14.98	50,662
Hubei	38.72	-5.10	285,619
Shanghai	53.79	-0.43	30,831
Shenzhen	41.00	0.00	260
Tianjin	30.00	0.00	100

Source: Refinitiv Workspace

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