

## China - Beijing pilot ETS

### General Information

<p>Summary</p>	<p><b>Status:</b> ETS in force</p> <p><b>Jurisdictions:</b> Beijing</p> <p>The Beijing Pilot ETS was launched in November 2013; to date, it has completed seven compliance years. Beijing is one of the two Chinese pilots with ETS regulation passed by its regional congress. The ETS covers ~45% of the city's total emissions, including: both direct and indirect emissions from electricity providers; heat, cement, petrochemicals, and other industrial enterprises; manufacturers; the service sector; and public transport. In 2016, it lowered the inclusion thresholds from the original 10,000 to 5,000 tCO<sub>2</sub>/year while adding the public transport sector. In 2020, Beijing also included the aviation sector in its mandatory reporting scheme, preparing the sector to be included in the carbon market.</p> <p>Beijing is the only regional pilot in China that uses a price floor (CNY 20.00 (USD 2.90)) and ceiling (CNY 150.00 (USD 21.74)) as a price stability mechanism. In cases of consecutively high or low average prices, the government can auction or buy back extra allowances. The Beijing pilot has seen a relatively high carbon price level, as compared to other pilots (average price in 2020 was above CNY 80.00 (USD 11.59)). The Beijing pilot is also open to diversified market participants including compliance entities, institutional investors, and individuals.</p> <p>Beijing also has pioneered cross-regional trading with its neighboring provinces. A 'Framework Agreement for Cooperation on the Study of Cross-regional Carbon Emissions Trading' with Tianjin, Hebei, Inner Mongolia, Shaanxi, and Shandong signed in 2013 provided a basis for cooperation. As a consequence of this, several cement companies from the Hebei province as well as companies from both the cement and power generation sectors voluntarily participated in the Beijing ETS in 2014 and 2015. Several companies from the same sectors in Inner Mongolia also voluntarily participated in 2015.</p> <p>The Beijing Pilot ETS is managed by the Beijing Municipal Ecology and Environment Bureau (EEB), which became the competent authority for the Beijing ETS in 2019. Updated implementing legislation is contained in the '2018 Carbon Emission Management and Trading Plan.'</p>
<p>Year in Review</p>	<p>In April 2020, the Beijing EEB released a notice on the 'Management of Key Carbon Emission Units and the Pilot Work of Carbon Emissions Trading in 2020'; the notice had several documents on MRV, allowance allocation, and offsets as attachments. Most noticeably, the notice included the domestic aviation sector in the mandatory emissions reporting scheme, laying the foundation for covering this sector in its carbon market later. In this context, the Beijing EEB introduced monitoring and reporting guidelines for the aviation sector and updated its existing MRV guidelines for the other sectors.</p> <p>As part of the revisions to 'the carbon allowance approval methods of enterprises (units) in Beijing' which specifies the pilot's allocation methods, the Beijing EEB adjusted the benchmark values of different unit types of power generation enterprises (combined heat and power), increasing their stringency. It also officially indicated that some sectors currently using grandfathering, such as cement as well as heat production and heat</p>

	<p>supply, will move to benchmarking soon. It further set the emission reduction factors for all the covered sectors for 2019 and 2020.</p> <p>In addition, the Beijing EEB published a new voluntary offset methodology for low-carbon transportation attached to the April notice, by modifying and improving the 2017 methodology focused on motor vehicles.</p> <p>The Beijing EEB moved the compliance deadline for 2019 emissions from 15 June to 15 November 2020 as a result of the COVID-19 pandemic. The government announced a 100% compliance rate at the end of 2020.</p> <p>According to the Chinese national ETS rules, regional markets that have already allocated allowances for 2019 and/or 2020 for the power sector will remain under the regional system for those years. As Beijing already announced the emission reduction factors for 2020, this implies that the power sector entities that are overlapping between Beijing and the national ETS will be covered under the regional carbon market in 2020 and moved to the national one from 2021 onwards.</p>
Overall GHG emissions (excluding LULUCF)	<b>Emissions:</b> 188.1 MtCO <sub>2</sub> e (2012)
Overall GHG emissions by sector (in MtCO <sub>2</sub> )	No information available yet.
GHG reduction target	<b>By 2020:</b> 20.5% reduction in carbon intensity compared to 2015 levels. Pledge to peak Beijing CO <sub>2</sub> emissions by 2020 (Beijing 13th Five-Year Plan on Energy Saving and Climate Change)
Carbon Price	<i>Current Allowance Price (per t/CO<sub>2</sub>e):</i> CNY 87.06 (USD 12.62) (average 2020 price)

## ETS Size

Covered emissions	0.45
GHGs covered	CO <sub>2</sub>
Sectors and thresholds	<p>Industrial and non-industrial companies and entities, including electricity providers, heating sector, cement, petrochemicals, other industrial enterprises, manufacturers, service sector, public transport, and domestic aviation.</p> <p><b>INCLUSION THRESHOLDS:</b>  <b>Until 2015:</b> 10,000 tCO<sub>2</sub>/year, considering both direct and indirect emissions.  <b>From 2016 onwards:</b> 5,000 tCO<sub>2</sub>/year, considering both direct and indirect emissions.  <b>MANDATORY REPORTING:</b> 2,000 tonnes of coal equivalent (tce) energy consumption/year.</p>
Point of regulation	<p>Downstream.</p> <p>Both direct and indirect emissions from electricity consumption are covered.</p>
Number of entities	831 (2019). In addition, 14 aviation entities and 634 other entities have mandatory reporting but no surrender obligations.
Cap	~50 MtCO <sub>2</sub> e (2018)

## Phases & Allocation

Trading periods	2013 and ongoing*
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\* In the short term, the existing Chinese regional carbon markets are expected to operate in parallel with the national Chinese carbon market. Over the medium to long term, they are expected to be integrated into the national market, once it is fully operational.

Allocation	<p><b>FREE ALLOCATION:</b> Free allocation through grandparenting based on historical emissions or emissions intensity in the baseline years, which are the previous three years.</p> <p>Benchmarking is used for new entrants and entities with expanded capacity, as well for the power sector. Benchmarking will be expanded to sectors such as heat production and cement.</p> <p><b>AUCTIONING:</b> Beijing could set aside up to 5% of allowances for regular and irregular auctions (see “Market Stability Provisions” section). To date, no auctions have been held.</p>
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## Flexibility

Banking and borrowing	<p>Banking is allowed.</p> <p>Borrowing is not allowed.</p>
Offsets and credits	<p><b>QUANTITATIVE LIMIT:</b> Domestic project-based carbon offset credits—Chinese Certified Emission Reduction (CCER) credits—are allowed. In addition, Beijing also has introduced its local offset programs focusing on carbon sinks, low-carbon transport, and energy saving. Offset use is limited to 5% of the annual allocation. The limit has been increased to 20% since 2019 only for the local low-carbon transport offsets.</p> <p><b>QUALITATIVE LIMIT:</b> CCERs from energy conservation projects and forestry carbon sink projects are allowed, whereas credits from hydropower, HFC, PFC, N<sub>2</sub>O, and SF<sub>6</sub> projects are not eligible. CCERs must come from projects that began operation after the beginning of 2013 (with exceptions for carbon sink projects, for which the date is February 2005).</p> <p>Out of the 5% limit, at least 50% must come from projects within the jurisdiction of the city of Beijing. Among non-Beijing CCERs, priority is given to those with regional climate or pollution control cooperation agreements (e.g., Hebei and Tianjin).</p>
Market Stability Provisions	<p><b>PRICE FLOOR AND CEILING:</b> The competent authority can auction extra allowances if the weighted average price exceeds CNY 150 (USD 21.74) for 10 consecutive days, and buy-back allowances from the market using a special funding source from the municipal budget if the price is below CNY 20 (USD 2.90).</p> <p><b>EXCHANGE:</b> The China Beijing Environment Exchange implements a system of limits on price increases and decreases for trading over the exchange which is <math>\pm 20\%</math> of the reference price (the weighted average price of all transactions on the previous trading day) to prevent large price fluctuations. It also sets the maximum position limit for the different market participants: the sum of their annual allocated allowances plus one million tonnes for the compliance entities, one million tonnes for institutional investors, and 50,000 tonnes for natural persons.</p> <p><b>RESERVE:</b> The competent authority could set aside up to 5% of allowances for regular and irregular auctions. To date, no auctions have been held.</p>

## Compliance

Compliance Period	One year (1 January to 31 December): covered entities have until 15 June of the following year to surrender allowances.
Monitoring, Reporting, Verification (MRV)	<p><b>REPORTING FREQUENCY:</b> Annual reporting of CO<sub>2</sub> emissions.</p> <p><b>VERIFICATION:</b> Third-party verification is required. In addition, the government organizes expert review of all the verification reports; 30% of them are subject to further fourth-party verification.</p>

	<p><b>FRAMEWORK:</b> The Beijing EEB has updated the general rules for monitoring and reporting, as well as for sector-specific guidelines for the following sectors: heat production and supply, thermal power generation, cement, petrochemicals, public transport, aviation, other industrial enterprises, and the service sector.</p> <p><b>OTHER:</b> In addition to the ETS participants, all legal entities with energy consumption of more than 2,000 tce must report their emissions. Verification is not required.</p>
Enforcement	<p>Penalties for failing to submit emissions or verification reports on time can result in fines up to CNY 50,000 (USD 7,245.57). Furthermore, companies failing to surrender enough allowances to match their emissions are fined up to five times the average market price over the previous six months for each missing allowance. Other nonfinancial penalties include negative impacts on access to bank loans and subsidy programs.</p>

## Linking

Links with other systems	No information available yet.
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## Other Information

Institutions involved	<p>Beijing Ecology and Environment Bureau (competent authority) China Beijing Environment Exchange (trading platform) Beijing Research Center for Climate Change (registry)</p>
Evaluation / ETS review	No information available yet.
Revenue	No information available yet.
Implementing Legislation	<p><a href="#">Beijing Municipal People's Congress ETS Pilot Bill</a></p> <p><a href="#">Interim Measures for the Management of Emissions Trading in Beijing</a></p> <p><a href="#">List of Covered Entities (2019 compliance year)</a></p> <p><a href="#">Beijing EEB Notice on the Management of Key Carbon Emission Units and the Pilot Work of Carbon Emission Rights Trading in 2020</a></p>

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