

2018 CHINA CARBON PRICING SURVEY

Executive Summary

Huw Slater CCF / ICF

Dimitri de Boer CCF

Wang Shu ICF

Qian Guoqiang SinoCarbon



An independent platform to foster trust and cooperation among China's stakeholders for climate action

2018 China Carbon Pricing Survey – Executive summary

This report is a summary of results from the *2018 China Carbon Pricing Survey*, jointly conducted by China Carbon Forum, ICF, SinoCarbon, Tsinghua University China Carbon Market Center, the Norwegian Environment Agency and the Dutch Emissions Authority.

The survey, undertaken from late March to late April 2018, obtained expectations about the future of carbon pricing in China from 317 stakeholders. The survey is a collective "best guess" by these stakeholders. It does not claim to be representative, but it does provide a clear indication of dominant stakeholder views about the likely future of carbon pricing in China. The project builds on similar surveys conducted in 2013, 2015 and 2017.

This is the first market survey undertaken after the December 2017 official launch of the 'Development Plan' for a national ETS in China, and comes at a time of global interest in China's climate action, given the negotiations on rules for implementation of the Paris Agreement, as well as the new Ministry of Ecology and Environment taking charge of climate change mitigation efforts. The Development Plan outlines the roadmap for development of the national ETS, and confirms a three-phase roadmap: a capacity building phase, a simulation trading phase, and a market operation phase. The national ETS will start with the power generation sector, and gradually cover other sectors once certain conditions are met.

Respondents

The survey received 317 responses from professionals in a range of sectors, including industry (67%), consultancies (10%), academia (6%), carbon finance (4%), local government and research institutes (3% each). Other respondents include those from NGOs, carbon exchanges and industry associations. Half of all respondents are either covered by regional systems, or are likely be included in the forthcoming national ETS. This is much higher than for previous surveys (2017: 16%; 2015: 18%; 2013: 7%). The majority of the industry responses were facilitated by the distribution of the survey by industry associations to their members, including 90 from the power sector, 47 from the cement sector, and 46 from the non-ferrous metals sector (aluminium and copper). The remaining 31 industry responses were received through the network of the project partners. While it is likely that on average, the industry respondents which responded to the survey are at a more advanced stage of preparation for the carbon market than those which didn't respond, the extent of engagement through industry associations means that this bias is less significant than for previous surveys.

China's carbon market progress

During 2013 and 2014, pilot carbon markets were launched in five municipalities (Beijing, Chongqing, Shanghai, Tianjin and Shenzhen) and two provinces (Guangdong and Hubei). In recent years, pilot regions have further developed their markets by expanding coverage, refining their allocation mechanisms, and introducing derivative products. Fujian province also launched an ETS in late 2016.

The December 2017 announcement of the national ETS Work Plan laid out a three-phase process towards a fully functioning market, with the first two preparatory phases lasting each for about one year. Our survey respondents were asked by when they expect China's national ETS to be fully functional. Only 19% of respondents expect this to occur by 2020 or earlier (down from 47% in 2017).¹ This drop is likely due to the wait until the start of trading in the national ETS. 72% of respondents expect a fully functional carbon market by 2025.

The legal basis for the national ETS is still under development. The State Council is expected to pass overarching regulation during 2018, which 39% of survey respondents believe should be sufficient to ensure compliance, while a majority (55%) believe a law passed by the National People's Congress is necessary. Industry respondents are split on this issue however (46% vs 44%).

¹ Full text of question: "By when do you expect China national ETS to be fully functional? e.g. all key building blocks in place, including: legislation/law, cap and allocation management, complete MRVA system, registry, trading platforms, market oversight, etc."



An independent platform to foster trust and cooperation among China's stakeholders for climate action

Respondents expect carbon emissions trading to increasingly affect investment decisions in coming years. In 2018, 34% of those who expressed a view, expect investment decisions to be strongly or moderately affected, and by 2025 this figure rises to 75%.





Figure 1 Q3-1: Do you expect the ETS in China to affect investment decisions in...? (N=304, 292, 285)

Price expectations

Average price expectations in the national ETS are CNY 51/ton in 2020 and CNY 86/t in 2025. However, the price levels remain highly uncertain, especially in the more distant future. The 20th and 80th percentiles for 2025 are CNY 35/t and CNY 158/t respectively. The future price expectations are lower than at the time of the 2017 survey.²



China's carbon price is expected to steadily rise

² The average price expectation in the 2017 China Carbon Pricing Survey were CNY 38/ton in 2017; CNY 51/t in 2018; CNY 74/t in 2020; CNY 108/t in 2025. The 20th and 80th percentiles for 2025 are CNY 50/t and CNY 200/t respectively.



An independent platform to foster trust and cooperation among China's stakeholders for climate action

Carbon pricing in the mix of policy instruments

Respondents were asked what they expect to be the most important policies to reduce GHG emissions in future years (Figure 3). The expectation is that, over time, the emphasis will shift towards ETS, environmental tax, information disclosure, and energy allowances trading.

9% Mandatory closures 13% 19% 9% Punishment of polluting facilities 11% 8% 11% 12% Renewable feed-in tariffs 10% 13% 9% Subsidies for energy conservation 14% 16% 8% 15% Environmental information disclosure 7% 7% Energy allowances trading 4% 17% 14% 9% Environmental tax 21% 22% 20% ETS 2018 2020 2025

Market-based measures are expected to become the main policy instruments

Figure 3 Q3-4: Which do you expect to be the most important policies in motivating companies to reduce GHG emissions in China at different points in time? (N=314, 295, 284)

China's emissions targets and peak emissions

87% of respondents expect China to achieve the carbon emissions peak by 2030, and 48% expect China's emissions to peak by 2025 or earlier.

China's emissions are expected to peak ahead of 2030



Figure 4 Q3-5: When do you expect China's emissions will peak? (N=132)



Conducted by







Nederlandse Emissieautoriteit Dutch Emissions Authority

Funded by









