Balancing climate concerns and energy security

China searching for a new development pathway

Key Findings

- **There is a duality to China's climate politics. The international climate diplomacy side is problematic and entwined in an intricate game of changing geopolitics. The domestic climate policy side is straightforward and pragmatic, with ambitious targets.**
- **This duality is mirrored in the Western world's contradictory images of China – as both the world's number one polluter that wrecked the Copenhagen deal, and the world's biggest investor in – and hottest market for – renewable energy.**
- **China's *climate diplomacy* is largely about balancing the tradeoffs between international reputation – in the eyes of both industrialised and developing countries – and latitude for continued economic development. This dilemma, however, is much more a matter of energy security than climate concerns.**
- **China's *climate policy* is essentially a positive side effect of very ambitious energy security policies instigated in mid-2000s by the current leadership at the core of the economic development policies.**
- **China's position on the climate negotiations is built on the notion that the industrialised countries, carrying the main responsibility for greenhouse gas pollution to date, should lead in mitigating climate change. China stresses that developing countries should not be required to take on binding targets unless industrialised countries begin shouldering responsibility.**
- **China's pledge under the Copenhagen Accord to cut carbon intensity by 40-45 per cent to 2020 below 2005 levels represents a significant new commitment, but the Chinese domestic policy targets indicate a much higher ambition.**
- **In response to mounting international pressure to commit to mitigation targets, China has joined forces with India, Brazil, and South Africa in the BASIC group of emerging economies. The BASIC co-operation indicates China's understanding of climate change as a geopolitical issue and of the need to find common ground with other countries that share China's development challenges.**

Energy security driving climate policies

China's climate mitigation policies are essentially the positive side effect of a suite of ambitious policies implemented to address the country's growing energy-security concerns. In the early 2000s, just as the current leadership under President Hu Jintao and Premier Wen Jiabao came to power, it became obvious that the supercharged growth of the Chinese economy had reached a volume and momentum where energy supply was becoming a very serious challenge to China's future development. The new leaders' vision of China developing into a harmonious society would simply not be feasible unless considerable new energy sources could be secured and existing sources were used far more effectively.

The numbers speak for themselves. Although China is still the world's fifth largest oil producer, its oil fields are peaking even as oil demand continues to increasing rapidly. China currently relies on imports for over half of its supply, a figure that is projected to increase towards 80 per cent in the late 2020s. While China is also seen as richly endowed with coal, its roughly 13 per cent of global coal reserves puts it below world average in per capita terms. In fact, recent estimates shows that China's

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coal production could peak as early as the 2020s, and China has over the course of the past half-decade switched from being a net exporter of coal to an increasingly hungry importer.

How ambitious are China's climate policies?

China has a history of laudable high-level statements favouring sustainable development. But the blizzard of environmental legislation that was passed during the 1980s and 1990s did little to control the rapid increase in polluting activities that came with economic growth. The government also failed routinely and blatantly to meet its own environmental targets. As

a result, there is a widespread scepticism about China's ability to deliver on environmental policy.

But while *environmental policy* was seen by China's economic establishment as sectoral and essentially non-productive, *climate policies* are embedded in core policy priorities: energy security, innovation, trade and globalisation.

China's 2007 climate programme is based on two energy security policies that were developed in the mid 2000s for the current 11th five-year programme (2006-2010): the legally binding target to reduce China's energy intensity by 20 per cent to 2010 over the 2005 level; and the Renewable Energy Law, which stipulates a monumental expansion of renewables in China's energy mix, from about 5 per cent in 2005 to 15 per cent of final energy consumption by 2020.

China's leading climate official, Minister Xie Zhenhua, has recently stated that China is going to meet the 20 per cent energy intensity target. A new target of 18 per cent energy intensity reductions over the 12th five-year programme (2011-2015), and an indicative target of 16 per cent for the 13th five-year programme (2016-2020) have been communicated by leading officials. By 2009 the share of non-fossils had reached 9 per cent of total energy consumption (including 0.3 per cent nuclear), and China is well on its way to reach or surpass the 15 per cent 2020 target.

Internationally, China has committed to reduce its carbon intensity by 40-45 per cent by 2020 over the 2005 level as voluntary domestic mitigation actions under the Copenhagen Accord. It has been debated how ambitious this target really is. There is no doubt that the 40-45 per cent target assumes that China extends its efforts from the 11th five-year programme into the coming decade, and thus the new target represents a concrete new commitment. Still, as illustrated in figure 1, there is a considerable difference between what China is willing to commit to internationally and its domestic ambition if all the targets leading up to 2020 are added together.

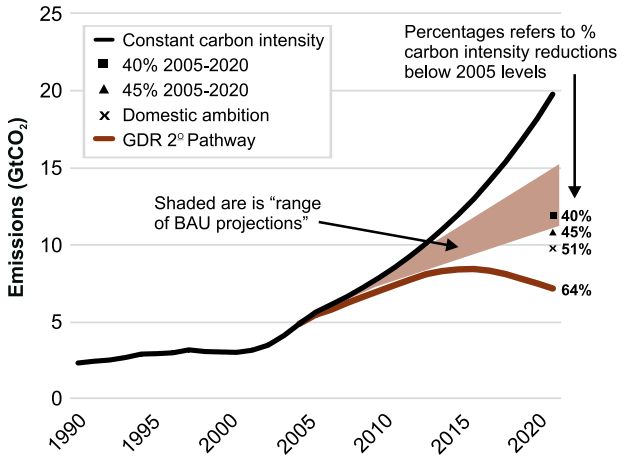

Figure 1: China's domestic climate policy ambition compared with commitments under Copenhagen Accord

Climate culprit or responsible global actor?

Despite convincing domestic undertakings, China's international climate diplomacy does not display the same kind of assertive pragmatism. In the UN climate negotiations, China is

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clearly struggling to find its role as not only a leading developing country, but also an emerging economy and major emitter that shows increased responsibility for global climate change at large. As a consequence, China's performance in international climate diplomacy does not always run smoothly.

The mainstream view of the Copenhagen Summit is that China carried a heavy responsibility for the failure to reach a legally binding agreement, primarily due to its demands to omit any reference to global targets for 2050. This is an incomplete story.

First of all, the demand to omit 2050 targets was not China's alone but backed up by the countries that became known in during COP 15 as the BASIC group, also including Brazil, India and South Africa. China, however, was the one BASIC member that made the case for that omission in the final rounds of talks.

What China, supported by the BASIC group, argued was that a combination of a global 50 per cent target and 80 per cent reductions by industrialised (Annex 1) countries would in effect imply an exceedingly stiff target for developing countries as well. Figure 2 illustrates that what appears to allow for substantial increase in absolute developing country emissions before a peak in 2030 translates, in per capita terms, to close to a constant reduction of per capita emissions starting from a very low level. This would reduce real development opportunities for much of the developing world.

As China and its BASIC peers face increasing pressure to show responsibility by taking on binding emission reduction targets, it is crucial for them to show solidarity with the broader group of developing countries in the G77. Nowhere is the disagreement greater between industrialised and developing countries than on how to divide the limited carbon budget.

In the eyes of China, the global notion of what it means to act responsibly as judged in the Copenhagen aftermath is not fair. China argues that developed countries – especially the U.S., as the chief polluter – should take the lead because they carry the overwhelming responsibility for emissions to date. This is China's key argument for not agreeing to international commitments. At the same time, China says it is unilaterally taking on ambitious climate targets regardless of what is agreed internationally, and asks developed countries to do the same. Figure 3 illustrates China's view of the skewed notion of responsibility

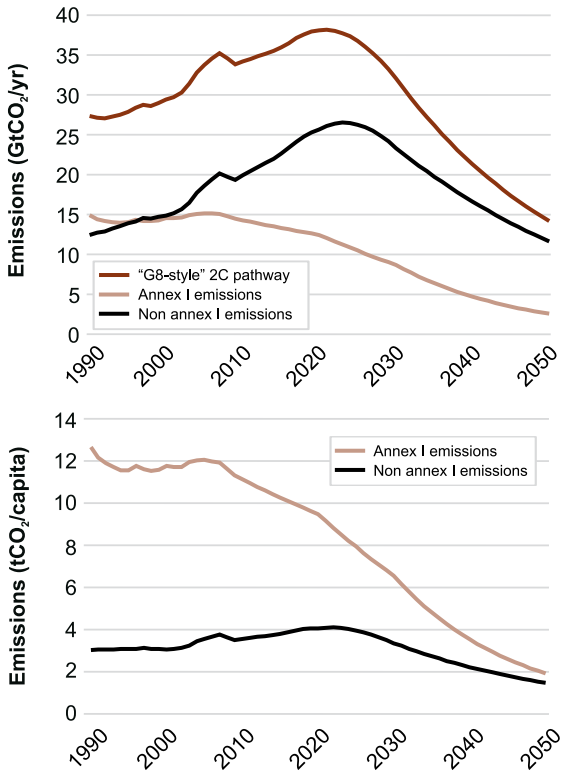

Figure 2: Developing world consequences of G8 style global 50 per cent target for 2050 combined with 80 per cent Annex 1 emission reductions.

by contrasting Chinese and American emissions to date with emission cuts as pledged in the Copenhagen Accord.

The European (mostly) accusations of China having wrecked the Copenhagen deal left many Chinese angry and frustrated, but also somewhat surprised. They had expected positive reactions to their 40-45 per cent carbon intensity pledge and their remarkable progress on energy efficiency and renewables. But the vastly different expectations – particularly between Europeans and Chinese – led to several confused and fractious encounters, where China failed to tell its version of the story.

China is increasingly keen to be recognised as a responsible emerging power, but anxious to avoid taking on targets that could risk its emergence as a global power. China's dilemma is to mix these two fundamental concerns into a convincing story.

Being an emerging global power

The emergence of China challenges the 20th century world order, where political power emanated from the West and the lion's share of global wealth was channelled through European and American financial institutions. Deng Xiaoping's China – "biding its time to build its capabilities" – is now changing into a more assertive emerging global power. U.S. economic power is beginning to be openly challenged, while Chinese foreign policy experts see the rise both as a healthy great power mentality but also, in the long run, as aspirations to an empire.

In climate diplomacy, this change is manifested by the Chinese conduct during COP 15 and in the seeking of common ground with the BASIC countries. These countries have dynamic economies, favour the concept of a multipolar world, and see the UN as central to the international system. And they share a reverence for sovereignty. As the economic centre of gravity shifts towards these four emerging powers, China sees the utility of co-operation on issues of global significance relating to climate and natural resources.

China's emergence as a global power takes place as a diminishing supply of fossil fuel and rising global temperatures intensify the competition for resources. At a speed and scale unseen in human history, China is – within a couple of decades – passing through a critical development stage, where urbanisation and industrialisation require massive amounts of capital and energy.

The geopolitics of China's climate and energy security dilemma

The Copenhagen Summit reflects a dramatic change in the understanding of climate change as a geopolitical rather than environmental issue. For China, the geopolitical links are twofold: the tight relations between carbon emissions and energy security concerns, and the need to be a responsible great power by taking the climate threat seriously. China's climate diplomacy is essentially about balancing the tradeoffs between international reputation – in the eyes of both industrialised and developing countries – and latitude for continued economic development. This dilemma, however, is much more about energy security than climate concerns.

If China continues growing by 8 per cent per year, per capita incomes (PPP) will reach $8,500 by 2020 and will touch the $20,000 mark by 2030, exceeding the current income of its neighbours Taiwan and South Korea. In PPP terms China will reach this critical $10,000-15,000 threshold where per capita incomes historically have boosted energy demands already during the coming decade. If by then, China's per capita use of oil reached the current level of its neighbours, China would consume up to 70 per cent of global oil production. That much oil, needless to say, is not available for China. Even if China's share of global oil by the early 2020s were

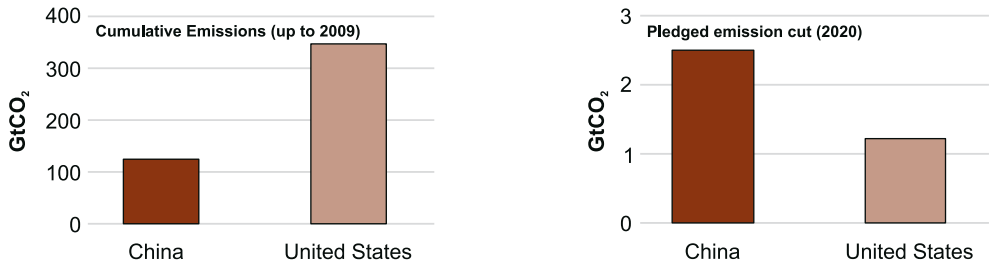

Figure 3: Comparison between China's and the U.S.'s actual cumulative emissions to date, and pledges emission cuts in relation to relevant or reasonable BAU projections

Important trends and developments

- **To get the full impression of China's climate identity, it is crucial to look at both its domestic "pragmatic" and international "problematic" personae. This is the key to constructive interaction with China.**
- **China needs to convince the world it is actually doing what it claims to be doing. China is on the right path, but actions must be stepped up, and backed with some sort of international monitoring.**
- **The Copenhagen Accord opened up for China to commit to control its carbon emissions in relation to development. These are significant but not sufficient developments.**
- **China's engagement with the BASIC countries follows a pattern where China engages in South-South co-operation. These are countries that came out strengthened from the financial crisis, which are now establishing functional platforms for co-operation where strategic interests overlap.**
- **The increasing power of emerging economies has implications for the framing of the climate equity debate. This is challenging the more widespread (Western) interpretations on burden-sharing.**

capped at 20 per cent (compared to its current 10 per cent), global oil production would have to be boosted by roughly 10 per cent per year. In the past 25 years, global oil production has increased by about 1 per cent.

Even if there are mechanisms available to cushion the fossil energy race, there will be considerable implications for China and the global community in the coming decade. To begin with, China is likely to be able to buy its way into energy markets. But the most oil-dependent economies that happen to be poor African countries are the ones that are most likely not to get oil, with far-reaching consequences for global stability.

But the question is how China should be able to sustain its growth without the access to cheap fossil energy that historically underpinned rapid growth when other countries passed through China's development stage. China has to find a new path of economic development that no other country has yet managed to tread. And without growth in China, and other developing countries, the prospects for global growth in the coming decades look gloomy.

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