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Chi on China

The Conundrum of China's Excess Capacity

There are things known and there are things unknown, and in between are the doors of perception.

Aldous Huxley

SUMMARY

- Excess capacity in China is widely known. What is less known is an irony that China is also suffering from under-investment. The coexistence of these two conflicting forces lays bare a severe structural flaw in the Chinese system – capital misallocation.
- The culprit of China's excess capacity is not too much investment but the state sector's soft budget constraint under the old development model which focuses on misallocating capital to a few giant inefficient state-dominated industries.
- The state-sector's excess capacity dominates the whole economy and stymies "animal spirits" while the rest of the system remains under-capitalised. Now the old model is broken. Genuine supply-side reform, not the ones that are currently implemented, is the only way out of this conundrum.

The Chinese economy has been suffering from diminishing marginal returns on investment and deteriorating financial efficiency (with each additional unit of new loan generating a lesser amount of successive GDP) for many years[1]. This is a clear evidence of excess capacity destroying economic values. Ironically, China's excess capacity is not a result of too much investment, as conventional wisdom has it. Evidence shows that China overall is still under-capitalised. How could excess capacity coexist with under-investment?

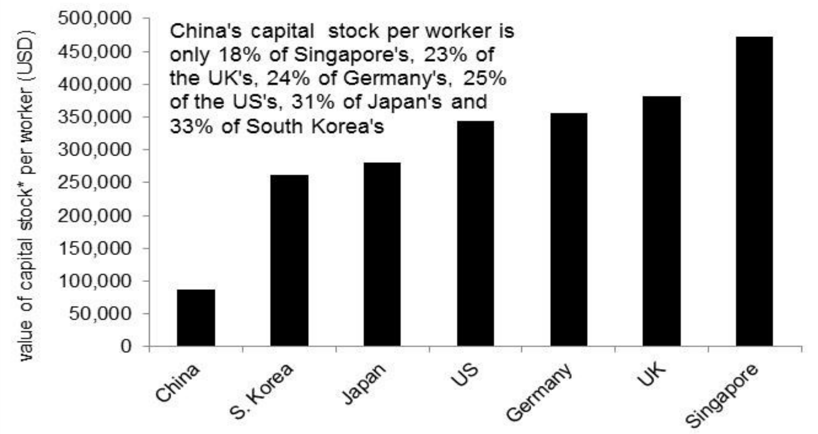
[1] See "*Chi on China: A Binary Choice for China's New Leaders*", 5 March 2013.

China is still under-capitalised…

In terms of capital stock accumulation, China is a late comer. Its capital stock per worker is significantly less than the major economies and its Asian peers (Chart 1). China only started building up capital in the late 1980s while most of the other major economies started in the 1950s (Chart 2). The data also shows that the speed of capital accumulation rose exponentially after 15 to 20 years into the building-up process.

China's capital accumulation has just started to accelerate and the pace is not as aggressive as that in South Korea, Singapore, Germany or the UK (Chart 2). Even after 30 years of catching up, the gap between China's capital-to-worker (or per-capita capital) ratio and that of the major economies remains large (see Chart 1). Another indication of China's under-investment is its railway network density, defined as metres of railway length per squared-kilometer of area. It is lagging behind the major economies, including India which has a lower per-capita capital stock (USD44,077 versus China's USD86,901 in 2014) but a much bigger railway network than China (Chart 3). All this suggests that China still has a lot of room for catching up. At this stage, China is still under-capitalised.

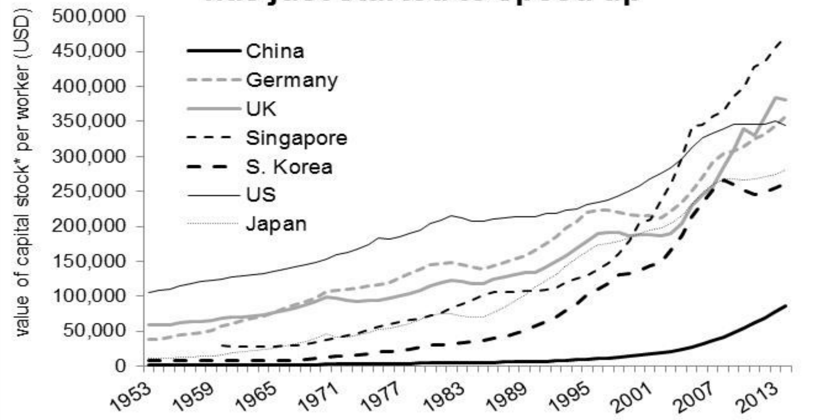
Chart 1: China is still under-invested (2014)



* in purchasing power parity terms

sources: Penn World Table 9.0, BNPP IP (Asia)

Chart 2: China's capital stock accumulation has just started to speed up



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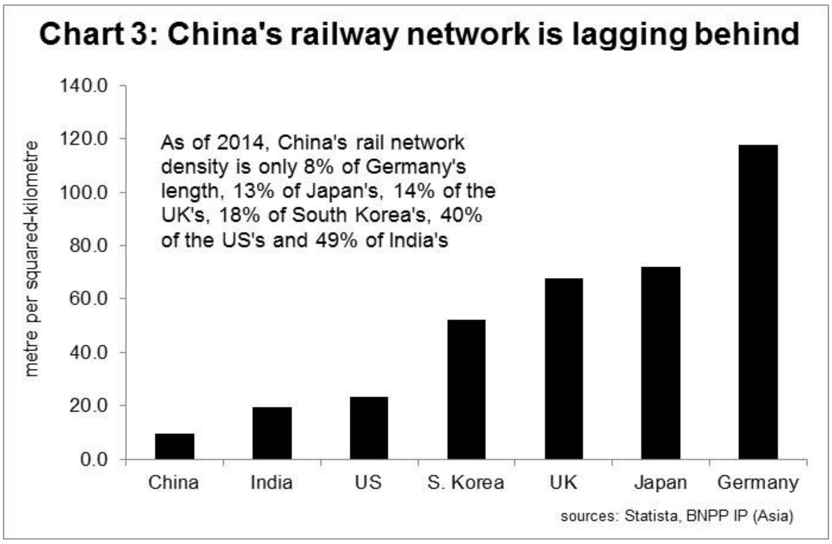

…but also suffers from excess capacity

China's under-investment has happened despite more than 30 years of reckless state-owned enterprises (SOEs) expansion. The SOEs' investment has been supported by easy access to state bank credit and favouritism, including heavily-subsidised state land. They build/invest/produce NOT according to demand conditions but to expand supply so as to create jobs that, in turn, create demand. This is the supply-expansion model that has been driving China's growth for over three decades.

When President Xi Jinping came to power in late 2012, he set out to change this growth model through slower growth with structural reforms. Swift demand became history. Rationally, as demand weakens, firms make the necessary adjustment by producing and investing less. But the SOEs have not. The structural change in the growth model has exposed the inherent excess supply problem in the old model.

Decades of investment-led lopsided growth funded by cheap state-bank credit and preferential government policies have channelled most resources to a few giant inefficient state industries, which Beijing has now identified as coal, iron & steel, aluminium, shipbuilding, flat glass and cement, allowing them to build up a significant amount of debt while starving the private sector of credit. These six excess-capacity industries have liability-to-asset ratios significantly higher than the industrial sector's average of 55% (Chart 4). Their excess capacity has been manifested in the sharp fall in their capacity utilisation ratios below the 80% normal level (Chart 5). This is unlikely to be just a cyclical phenomenon because there is a structural decline in both Chinese and global demand after the 2007-09 Great Financial Crisis (GFC).

The high debt ratios of these excess-capacity industries are the key contributor to the high corporate-sector debt ratio, which stood at almost 160% of GDP in 2015. The combination of high debt and excess-capacity has pushed many firms into losses. Indeed, the share of loss-making firms in the six excess-capacity industries is twice the industrial sector's average (Chart 6).

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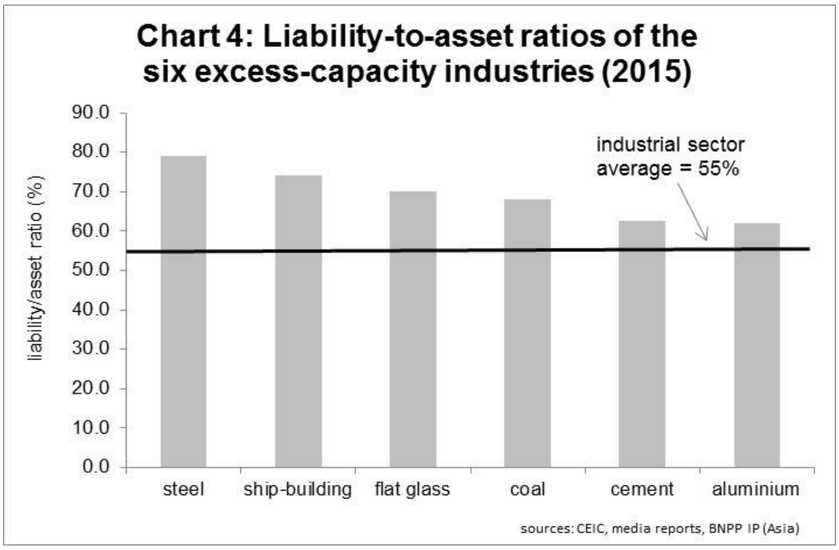
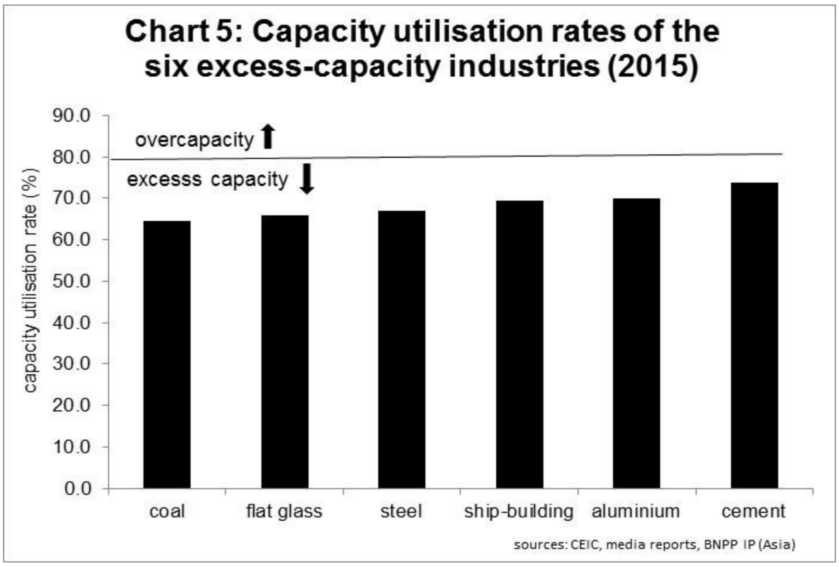
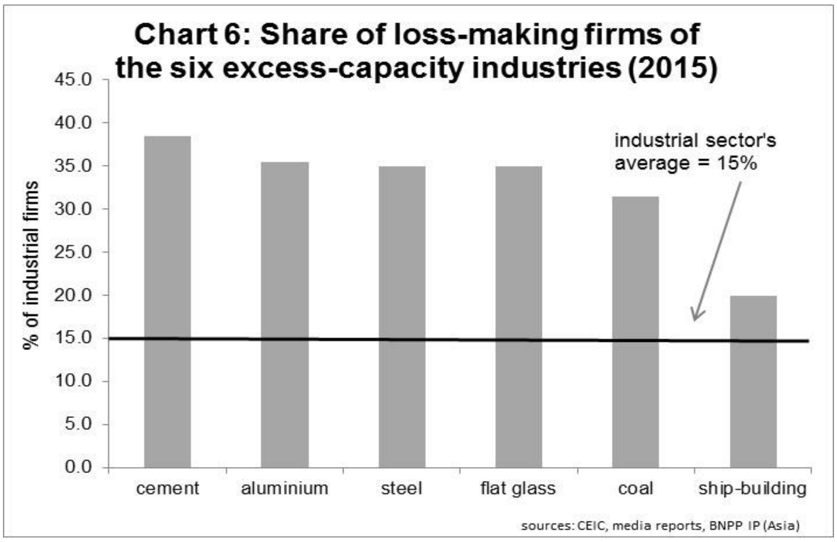




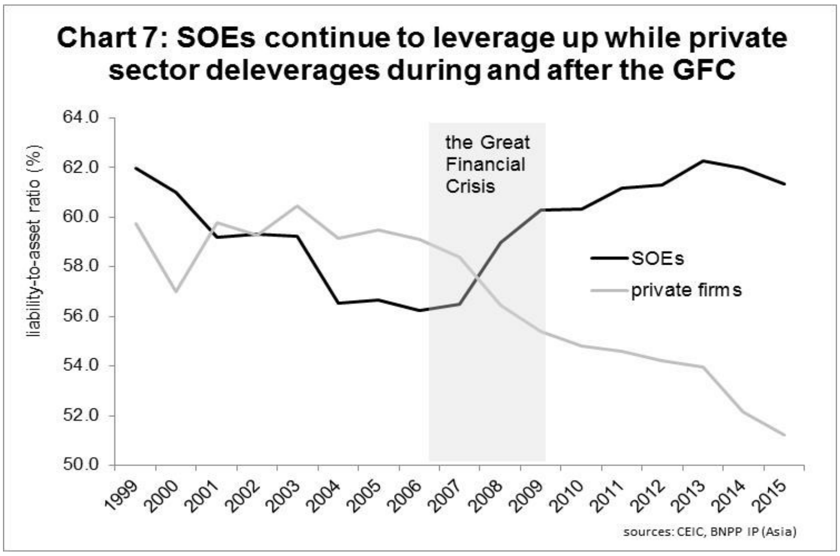


SOE and excess capacity

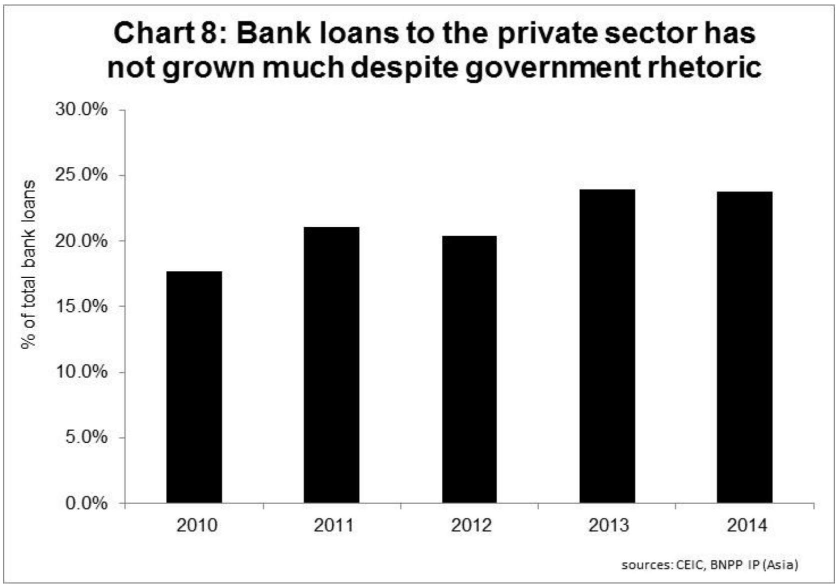
SOEs dominate the excess-capacity industries, with assets and liabilities accounting for an average of 40% of the industrial sector's total. Their dominance is especially prominent in the coal and steel industries where SOE assets and liabilities account for over 70% and 50%, respectively, of the total.

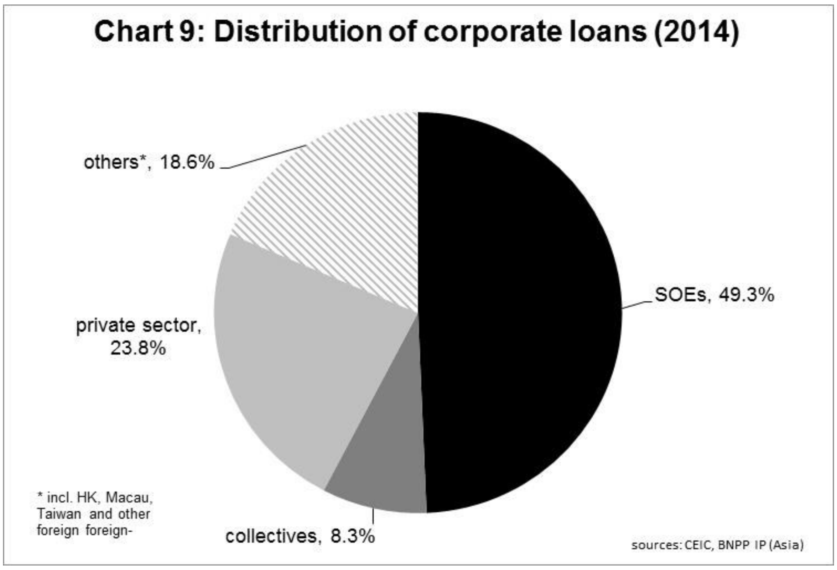
The culprit for the SOEs' dominance is their soft budget constraint. This arises when their spending budget becomes non-binding because the government always pays for their excess spending through cheap state-bank loans. Such forbearance of excessive spending has bred moral hazard by encouraging the SOEs to make imprudent and excessive investment based on the soft budget but not on commercial basis.

Under the old model of high growth at all cost, many SOEs armed with soft budgets and government-subsidised land expanded recklessly. During economic downturns, such as the GFC, when mounting losses forced private firms to cut back production and deleverage, SOEs continued to produce by leveraging up (Chart 7). The SOEs' lack of financial discipline is a direct result their soft budget constraint and the root cause of excess capacity.



Despite the official rhetoric of allowing the market to play a bigger role in the economy, bank loans to the private sector have not grown much (Chart 8); they have remained stuck at less than 25% of total loans (Chart 9). This means that SOEs have taken up the bulk of the financial resources and crowded out the private sector. Now that demand is permanently constrained under the new growth model, the supply-expansion development strategy that produces all this excess capacity has become unsustainable.





The way out

In sum, China's excess capacity is a soft-budget problem, with capital misallocation channelling the bulk of resources to a few inefficient state industries, enabling SOE over-production to stymie the private sector. Beijing will have to resolve this conundrum under the "new normal" economic environment by implementing genuine supply-side reforms like what former premier Zhu Rongji did between the late 1990s and early 2000s[2]. In its current form, the Chinese-style supply-side reform aims at improving operational efficiency of the SOEs with minimal impact on employment and bankruptcy. This can only contain the flow of the structural problem under the weight of capital misallocation and excess capacity. It cannot solve the stock of the problem.

Granted, Beijing is facing significant headwinds in implementing the painful reforms, but this is not an excuse for eschewing them. Ultimately, it still needs to bite the bullet and allow liquidation and true restructuring of

[2] See "*Chi on China: China's Supply-side Reform is not What You Think*", 25 May 2016.

the SOEs, encourage bad debt write-offs by the banks and truly liberalise interest rates[3] in conjunction with other structural reform measures. Crucially, the government needs to honour its pledge on giving the market a bigger role in the economy. Retreating from the financial sector will be a good start. Some progress on this front has been made, but the long march to genuine structural rebalancing has just begun.

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[3] See "*Chi Time: China's Financial Reforms: Big Bang or Caution?*" 21 May 2014.

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