# LA LETTRE DU

No 298 - 21 April 2010

**CEPII** 

D'ÉTUDES PROSPECTIVES ET D'INFORMATIONS INTERNATIONALES

## CHINA: THE END OF THE OUTWARD-ORIENTED GROWTH MODEL

China, which since the 1980s has developed a dynamic export sector in order to drive its economic development, was hit hard by the collapse in global demand in late 2008. This episode revealed the fragility of the Chinese growth model, which is currently at a crossroads, not only as a result of the global context but also owing to the internal tensions it has caused. The results of thirty years of economic openness, as evidenced by CEPII studies, show that China's outstanding successes on international markets also have adverse effects and cannot be deemed to constitute a long-term development strategy. CEPII analyses are now assessing the changes that may occur in Chinese supply and the need to refocus growth on internal demand.

#### Cross-section of Chinese exports

Thirty years after launching its opening-up policy, China became the world's largest exporter in 2009, ahead of Germany. This dramatic commercial ascent was bolstered by a rapid diversification in exports. China moved from its initial position in the global market for low-technology products (textiles, toys, etc.) to a stunning entry into the worldwide market for electronic and computer products at the beginning of the 1990s.¹ The share of high-technology products in Chinese exports thus doubled to 33% between 1997 and 2007; China replaced the USA as the world's largest exporter of high-technology products in 2003. Overall, Chinese exports currently show a level of "sophistication" (technological level, complexity of the production process, intensity of human capital, etc.) comparable to that of a country with a per capita income (at purchasing power parity) three times higher (Figure 1).

CEPII analyses have shown the factors on which this commercial performance is based. International segmentation of production processes typically swells the export performance of countries like China, which specialises in the final stages of production and whose exports have a large import content. Thus, around half of Chinese exports come from assembly operations (which involve converting imported goods exempt from customs duties in order to re-export them). The emergence of China has resulted in a reorganisation of production in Asia and a triangular trade network. Companies in the advanced economies in Asia have production sites in China and rather than exporting finished products to the USA and Europe, they export intermediate products to China to have them assembled.<sup>2</sup> This assembly business, which represents the majority of hightechnology exports (78% in 2007), is very heavily (over 80% in 2007-2008) owned by foreign-capital companies. Therefore, the spectacular rise in these exports does not reflect advances made by actual Chinese companies in innovation and technology.3 This dualism in the Chinese export sector has even increased over the past ten years: between 1997 and 2007, the percentage of high-technology products in exports from foreign-capital 1

<sup>1.</sup> F. Lemoine & D. Ünal-Kesenci (2008), "Rise of China and India in International Trade: From Textiles to New Technology", China & World Economy, 16(5).

<sup>2.</sup> G. Gaulier, F. Lemoine & D. Ünal-Kesenci (2007), "China's Emergence and the Reorganisation of Trade Flows in Asia", China Economic Review, 18, 209-243. G. Gaulier,

F. Lemoine & D. Ünal-Kesenci, "China's Integration in East Asia: Production Sharing, FDI & High-Tech Trade", Economic Change and Restructuring, 40(1-2).

<sup>3.</sup> F. Lemoine & D. Ünal-Kesenci (2004), "Assembly Trade and Technology Transfer: The Case of China", World Development, 32(5).

Figure 1 – Chinese exports, 1997-2007: change in the share of high-tech products and level of sophistication

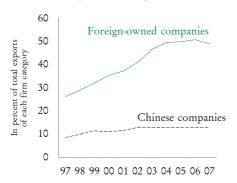


N.B.: (a) The left axis shows the level of income per capita in constant PPP dollars (2005) represented by the composition per product of Chinese exports. Thus, in 2007, the sophistication of China's exports corresponded to that of a country with a revenue of approximately \$14,000 per inhabitant (such as Portugal), whereas China had a per capita income of only \$5,000 for that year. (b) The right axis shows the percentage weighting of high-tech products in exports. The definition of high-tech products is taken from Lall ("The Technological Structure and Performance of Developing Country Manufactured Exports, 1985-98", Oxford Development Studies, 28(3), 337-369, 2000).

Source: Authors' calculations based on Chinese customs data (J. Jarreau & S. Poncet, 2009).

companies actually doubled (going from 25 to 50%), whereas it remained unmoved in Chinese companies (Figure 2). Admittedly, the latter also diversified their exports but the gap in sophistication between the two types of companies grew considerably (it more than doubled).<sup>4</sup>

Figure 2 – Share of high-technology exports from Chinese companies and from foreign-owned companies (1997-2007)



N.B.: See note (b) to Figure 1 for a definition of the high-technology indicator. Source: Authors' calculations based on Chinese customs data (J. Jarreau & S. Poncet, 2009).

#### Weaknesses of the Chinese strategy

These successes mask certain disappointing aspects of the opening-up strategy, in terms of technological catching up, and are, furthermore, the source of a deterioration in terms of trade. The 2008 crisis also highlighted the vulnerability of this strategy to changes in the international environment.

Firstly, the dualism of the export sector limits the spillover effect of exports on technical progress and growth. Analysis of Chinese provinces<sup>5</sup> shows that the high level of sophistication in exports affects the growth in per capita income only when it comes from Chinese companies: the technological innovations incorporated into the exports of foreign firms do not appear to contribute directly to growth. Progress in exports from national and foreign companies cannot thus act as instruments to promote economic growth.

Secondly, the rise in the technological content of the products exported by China has not been accompanied by these products becoming more high-range. China has remained heavily specialised in low-price products (measured in terms of unit values).<sup>6</sup> This is not only true of traditional industries such as textiles and clothing. In the high technology sector as well, China mainly exports standardised, mass-produced products. India, on the other hand, appears to have repositioned itself towards medium and top of the range products<sup>7</sup> (Table 1).

Table 1 – Composition by range of Chinese and Indian exports to the EU (in %)

	China		India	
	1995	2007	1995	2007
High-range	4	4	8	10
Mid-range	27	30	27	37
Low-range	69	66	65	53
All ranges	100	100	100	100

Source: I. Bensidoun, F. Lemoine & D. Ünal (ibid, 2009).

The unit values for exports from China fell between 1997 and 2003 and have risen only slightly since then. Exporting companies have achieved rapid gains in productivity, mobilised massive reserves of low paid manpower and engaged in frenzied competition on global markets. The undervaluation of the yuan<sup>8</sup> encouraged this strategy. Import prices, on the other hand, rose sharply, which affected not only primary products (with Chinese demand contributing to a rise in global prices) but also manufactured products, since China is importing more and more sophisticated inputs for its manufacturing industry. The double movement of a drop in unit values for exports and the rise in unit values for imports can be analysed as a deterioration in China's terms of trade in favour of its trading partners, primarily developed countries (Figure 3).

<sup>4.</sup> J. Jarreau & S. Poncet (2009), "Export Sophistication and Economic Performance: Evidence from Chinese Provinces", CEPII Working Document, no. 2009-34.

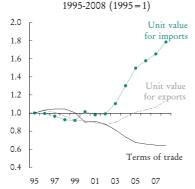
<sup>5.</sup> J. Jarreau & S. Poncet (2009), ibid.

<sup>6.</sup> G. Gaulier, F. Lemoine & D. Ünal-Kesenci (2006), "Chine : le prix de la compétitivité", La Lettre du CEPII, no. 254, March.

<sup>7.</sup> I. Bensidoun, F. Lemoine & D. Ünal (2009), "The Integration of China and India into the World Economy: a Comparison", The European Journal of Comparative Economics, 6(1), 131-155.

<sup>8.</sup> A. Benassy-Quéré, A. Larèche-Revil & F. Lemoine (2003), "Le yuan doit-il être rééavalué?", La Lettre du CEPII, no. 227, October; B. Rzepkowski (2004), "Spéculations sur le yuan", La Lettre du CEPII, no. 234, May; A. Benassy-Quéré, A. Larèche-Revil & V. Mignon (2004), "Le Yuan et le G20", Revue d'Économie Financière.

Figure 3 - Change in unit values for exports and imports and terms of trade for China,

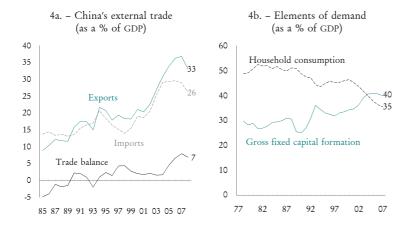


Source: For the 1995-2004 period, G. Gaulier, F. Lemoine & D. Ünal-Kesenci (*ibid*, 2006), and for 2004 onwards, authors' calculations based on quarterly bulletins issued by the People's Bank of China.

Finally, the acceleration in growth during the 2000s was shored up by a record investment rate (gross fixed capital formation has been over 40% of GDP since 2003). The surplus industrial capacities thus created encouraged exports at ever lower prices. Household consumption was then curtailed by the weak growth in already low salaries and an insufficient redistribution policy via public finances. The growth of GDP has become increasingly dependent on external demand: the trade surplus reached 7% of GDP in 2007. Household consumption has become the weak link in Chinese growth (with a relative percentage falling from 46% to 35% of GDP between 2000 and 2007, Figure 4).9

Although the Chinese economy resisted it much better than many others, the collapse in global demand in October 2008 resulted in a drop in exports and a brutal slow-down in its production during the last quarter of 2008 and the first quarter of 2009. It was only thanks to a vigorous internal stimulus package that growth bounced back from mid-2009 onwards.

Figure 4 - Imbalances of the 2000s



Source: Authors' calculations based on Chinese data.

#### A strategic turning point

The shock of the global economic crisis forced China to rebalance its economy. By refocusing on its internal demand, China is making a change to its growth regime that is not only tactical but also strategic. Above and beyond the policy of supporting investment in infrastructures that was launched in late 2008, the authorities are now seeking to accord greater importance to private consumption.

This new strategy requires institutional and financial reforms and strong political will, since it involves changing how gains in growth are distributed between regions, sectors and social groups. It involves integrating the Chinese regions and redistributing income in favour of households. The reforms in progress include extending the system of social protection, particularly to rural areas, where 55% of the Chinese population live; this should play a central role in stimulating household consumption and creating a vast internal market. The situation of the public finances will give the government sufficient room to manoeuvre to increase social transfers and spending on education and health, which in turn will reduce precautionary savings. In 2009, the State's budget deficit was around 3% and public debt (excluding public companies) was under 20% of GDP. However, this redistribution policy will require the setting up of institutional channels, and this will take time.

#### Dividing up China's domestic market

If China takes this new step in its development, the needs of Chinese companies and consumers will, in the coming years, overtake those of Western consumers as a stimulus for Chinese growth. This will result in changes in the sectorial structure of demand and the sources of supply. The Chinese internal market will be a more important factor than ever. Dividing it up between local production

and imports, the respective roles of Chinese companies and foreign companies in providing local supply, and the participation of the various partners involved in imports will depend on several factors: how well the products proposed by the different players are adapted to the demand, but also on Chinese policies on exchange rates and access to the market.

Nevertheless, with a GDP (in current dollars) around three times smaller than the USA or the European Union, Chinese internal demand can have only a limited effect on re-establishing a global macroeconomic balance in the short term. It has less weight in international demand than its total imports suggest, since its ordinary imports (those intended for the internal market) represented only 4.4% of global

<sup>9.</sup> Furthermore, the acceleration in industrial growth was accompanied by a widening of (regional and social) inequalities, a rise in energy intensity and an aggravation in harm caused to the environment.



Source: Authors' calculations based on Chelem and Chinese customs data

imports in 2007. Although they are progressing rapidly, they are still a long way behind those of the USA or the European Union (over 19% each, Figure 5).

However, Chinese internal demand can significantly alter Asian dynamics in the near future. In 2010, China is the largest economic power in Asia, ahead of Japan, with each country producing around a third of the region's GDP. The proliferation of free trade agreements and initiatives in favour of regional integration shows that Asia is seeking to take advantage of China's rise in power to create an independent engine for growth, something it has lacked until now. This economic 'decoupling' would have political and geostrategic ramifications.

#### A change in Chinese supply?

The undervaluation of the Chinese currency is an impoverishing factor and China's economic development will require increases in the prices of its exports through an appreciation of its currency (in nominal and/or real terms), and redistribution of trade gains within the country. Over the coming years, changes in the country's demographics, i.e. the drop in the population of working age (especially the younger generations), should from 2015 mark a break with the past trend and should accelerate the increase in wages in real terms.

The rise in wage costs should force exporting companies to ensure they offer products of a higher quality and at a higher

price. China will have to avoid falling into the "intermediate revenue country trap", referring to countries that have neither the comparative advantages of countries with very low salaries nor those of technologically advanced countries. 10 This will also have ramifications on the conditions of competition between Chinese production, production from developing countries and production from advanced countries. The competition between China and Europe will become head-on, as it is starting to be with South Korea.

Whether actual Chinese companies will be able to catch up technologically is another condition for long-term development and remains the objective of the Chinese authorities. Two factors can contribute to this. The former is reinforcing the spillover effects exercised by technologically dynamic companies (especially foreign ones) on the rest of the industrial sector. The latter is reforming the financial system and access to credit. Up to now, private Chinese companies seeking to bridge the technological gap have been hindered by difficulties with financing, especially since sectors featuring a lot of innovation and technology have significant fixed costs.

#### Conclusion

 $\Gamma$ or three decades, the growth model of the Chinese economy has recorded some remarkable successes, but over the last few years it has generated trends that, if not reversed, risk leading it into a dead end (terms of trade losses, weakness of private consumption, damage to the environment, etc.). The shift in the Chinese economy's centre of gravity towards its internal market is a condition of its long-term development. It can only be achieved gradually and by redistributing the gains from growth inside China, which requires reforms and a strong political will. These changes will also have repercussions on the relations between China and the rest of the world, the role of foreign investors in China and the role of Chinese businesses worldwide.

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10 L. Fontagné, G. Gaulier & S. Zignago (2008), "Specialisation across Varieties and North-South Competition", Economic Policy, CEPR-CES-MSH, 23. L. Fontagné & R. Paillacar (2007), "La Chine vend plus de produits aux États-Unis que l'Allemagne", La Lettre du CEPII, no. 270, September.

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### LETTRE DU

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PUBLISHER: Agnès Bénassy-Quéré Director of CEPH

CHIEF EDITOR Agnès Chevallier

DTP Laure Boivin

DIFFUSION:

SUBSCRIPTION only to the original, French version (11 issues per year) France50 € VAT DOM-TOM (NET, econ. air mail) 50,80 € NET

Other countries (NET, econ. air mail) 51,90 € HT

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WEB site: www.cepii.fr ISSN 0243-1947

CCP n° 1462 AD 21 April 2010

Imp. Centre d'analyse stratégique Imprimé en France

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