EMERGING ECONOMIES TRANSITION

China in the World Economy

THE DOMESTIC POLICY CHALLENGES

OECD

CHINA IN THE WORLD ECONOMY

China in the World Economy

THE DOMESTIC POLICY CHALLENGES

OECD

ORGANISATION FOR ECONOMIC CO-OPERATION AND DEVELOPMENT

ORGANISATION FOR ECONOMIC CO-OPERATION AND DEVELOPMENT

Pursuant to Article 1 of the Convention signed in Paris on 14th December 1960, and which came into force on 30th September 1961, the Organisation for Economic Co-operation and Development (OECD) shall promote policies designed:

– to achieve the highest sustainable economic growth and employment and a rising standard of living in Member countries, while maintaining financial stability, and thus to contribute to the development of the world economy;
– to contribute to sound economic expansion in Member as well as non-member countries in the process of economic development; and
– to contribute to the expansion of world trade on a multilateral, non-discriminatory basis in accordance with international obligations.

The original Member countries of the OECD are Austria, Belgium, Canada, Denmark, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland, Turkey, the United Kingdom and the United States. The following countries became Members subsequently through accession at the dates indicated hereafter: Japan (28th April 1964), Finland (28th January 1969), Australia (7th June 1971), New Zealand (29th May 1973), Mexico (18th May 1994), the Czech Republic (21st December 1995), Hungary (7th May 1996), Poland (22nd November 1996), Korea (12th December 1996) and the Slovak Republic (14th December 2000). The Commission of the European Communities takes part in the work of the OECD (Article 13 of the OECD Convention).

OECD CENTRE FOR CO-OPERATION WITH NON-MEMBERS

The OECD Centre for Co-operation with Non-Members (CCNM) promotes and co-ordinates OECD's policy dialogue and co-operation with economies outside the OECD area. The OECD currently maintains policy co-operation with approximately 70 non-Member economies.

The essence of CCNM co-operative programmes with non-Members is to make the rich and varied assets of the OECD available beyond its current Membership to interested non-Members. For example, the OECD's unique co-operative working methods that have been developed over many years; a stock of best practices across all areas of public policy experiences among Members; on-going policy dialogue among senior representatives from capitals, reinforced by reciprocal peer pressure; and the capacity to address interdisciplinary issues. All of this is supported by a rich historical database and strong analytical capacity within the Secretariat. Likewise, Member countries benefit from the exchange of experience with experts and officials from non-Member economies.

The CCNM's programmes cover the major policy areas of OECD expertise that are of mutual interest to non-Members. These include: economic monitoring, structural adjustment through sectoral policies, trade policy, international investment, financial sector reform, international taxation, environment, agriculture, labour market, education and social policy, as well as innovation and technological policy development.

Publié en français sous le titre :

La Chine dans l'économie mondiale

LES ENJEUX DE POLITIQUE ÉCONOMIQUE INTÉRIEURE

FOREWORD

To reap the full benefits of further integration in the world economy, the Chinese economy must undergo fundamental adjustments. A substantial reallocation of resources among economic sectors and a major restructuring of the business sector will be needed to correct widespread inefficiencies. The government will face demands from society to ease the pressures created by this historic transition.

Many OECD Member countries which have undergone similar economic upheavals have found that international co-operation in the framework of the OECD can provide valuable support in designing institutions and policies that maximise the benefits of liberalisation while minimising its costs. This landmark study grew out of what the OECD perceived as a strong interest by the Chinese authorities in sharing the collective knowledge and experiences of economic development that OECD Member countries have accumulated through this process.

Since 1995, China and the OECD have engaged in a fruitful dialogue on many policy issues of common interest in the framework of a comprehensive programme of co-operation managed by the Centre for Co-operation with Non-Members.

This study takes stock of the results of these activities and develops the analysis of the policies that will have to be adjusted in order to meet the challenges of further trade and investment liberalisation. It is published under my responsibility.

I hope that this work can provide the Chinese authorities and people with tools and encouragement to continue their momentous undertaking.

Donald J. Johnston
Secretary-General
OECD

ABOUT THE STUDY

This study has been undertaken in the framework of the ongoing OECD-China programme of dialogue and co-operation, managed on the OECD side by the Centre for Co-operation with Non-Members. Although the study draws on the understanding gained from several years of dialogue with a number of Chinese Ministries and Agencies, this remains an independent study of the OECD Secretariat and is published under the Secretary-General's responsibility.

ACKNOWLEDGEMENTS

This study has been produced by a cross-Directorate team led by Charles Pigott (Senior Economist for China in the Economics Department) under the supervision of Silvana Malle (Head of the Non-Member Economies Division) and has been co-ordinated by Frédéric Langer (Head of the China and Asia Unit of the OECD Centre for Co-operation with Non-Members).

OECD Contributors: Jón Blöndal, Peter Börkey, Sang Mok Choi, Andrzej Kwiecinski, Christina Tebar-Less, George Holliday, Marie-France Houde, Bernard Hugonnier, Xiande Li, Marie-Ange Maurice, Krzysztof Michalak, Elena Miteva, Makoto Nakagawa, Young-Sook Nam, Stilpon Nestor, Charles Pigott, Anders Reutersward, Udo Pretschker, Sally Van Siclen, John Thompson, Peter Whiteford, Terry Winslow, Aki Yamaguchi, Gang Zhang.

Outside Contributors: Chunlai Chen, Hunter Colby, Sylvie Demurger, Gerry Dickinson, Jean-François Huchet, Scott Jacobs, Gilles Lelong, Shantong Li, Wayne Morrison, Albert Park, Scott Rozelle, Jian-Guang Shen, Qihong Sun, Cunzhi Wan, Wei Wang, Shiqiu Zhang, Zhujian Zhou.

Research support: Chuen-Mui Wu Final copy editor: Kathleen Gray

The CCNM wishes to thank the experts from OECD Member countries and China who participated in the informal seminar under the auspices of the Economic and Development Review Committee on 10 December 2001 in Paris, contributing important comments on the draft study results. Experts from China, who took part in their personal capacity, were Mr. Wen Hai, Deputy Director, China Centre for economic research, Beijing University, Mr. Jun Han, Director General, Research Department on the rural economy, Development Research Center of the State Council (DRC), Mr. Kang Jia, Director, Institute of Fiscal Science, and Mrs. Shantong Li, Director General, Department of Development Strategy, DRC.

TABLE OF CONTENTS

SYNTHESIS OF THE MAIN FINDINGS OF THE STUDY

China's progress during the economic reform era that began in 1978 has been one of the great economic success stories of the post-war era. China has become the world's seventh largest economy and second largest recipient of foreign direct investment. Only Japan and Korea achieved a comparable record of sustained rapid growth during the latter half of the 20th century. China's performance is all the more remarkable in that its reforms have been gradual and its development has occurred despite extensive, though declining, state ownership and intervention in the economy.

The accession of China to the World Trade Organisation (WTO) marks an important milestone along the reform path China has been following for more than twenty years, rather than a new direction. China has been liberalising its international trade and investment policies since the mid-1980s and is now as open as some present WTO members. Although China stands to gain significantly from the opening of its export markets under the terms of its accession, the depth and breadth of its commitments to liberalise access to its domestic economy are acknowledged to be more extensive than those agreed to by previous adherents to the WTO. This willingness reflects the fact that opening to international markets promotes market discipline, access to technology, and other qualities that have been important goals of domestic economic reforms. In this respect, WTO entry is a complementary aspect of the next phase of China's reforms.

This report synthesises the main findings and recommendations of the OECD horizontal study of the domestic economic policy challenges posed by China's further trade and investment liberalisation (TIL). The study comprises 22 detailed reports prepared by nine OECD directorates covering the adjustments and policy challenges facing the key sectors of the real economy over the next decade, and their implications for the policies that will be critical to success in meeting these challenges. The study represents an OECD perspective drawn from the experiences of its Member countries with economic transformations, and from the work of the OECD with China and other emerging economies over the past decade. The basic question the study addresses is: how can China best reap the benefits of its opening and other economic reforms over the next decade in order to meet its basic development objectives? The reports analyse the current problems impeding China's economic development and identify key priorities and objectives, along with some suggested specific steps, in order to maximise the benefits of China's opening and other reform efforts. These analyses highlight the interdependence, and increasing need for co-ordination of policies in different areas.

Messages

The studies document the impressive progress China has made in transforming its economy during the reform era. At the same time, they indicate that the important engines that have driven China's growth in the past are losing their dynamism. The main reason is that China's economy has become badly fragmented and segmented, and this has led to increasing under and inefficient utilisation of resources. Trade and investment liberalisation, although it will require difficult adjustments by some segments of the economy, will stimulate other segments and bring positive net benefits to the economy as a whole over the longer-term. However by itself, trade and investment liberalisation is unlikely to solve the basic problems now impeding China's economic development.

As it has throughout the reform era, the realisation of China's economic potential, including the full benefits of trade and investment liberalisation, rests on its success in continuing and strengthening its domestic economic reforms. However China's economy has reached a stage that calls for some important changes in the way economic reforms are carried out. As the economy has become increasingly exposed to market forces and the scope for self-contained development of individual sectors has declined, economic problems have become more and more interdependent. Conditions in particular segments of the economy, such as rural labour markets, industry, the financial system, and regional development, now depend as much or more on developments in other areas of the economy than on developments or policies in that specific segment. Economic distinctions among various parts of the economy that have been accorded different treatment are breaking down. This interdependence has led to several "vicious circles" in which problems in a number of areas interact in a mutually reinforcing fashion to impede progress in the overall reform process. Particularly difficult is the vicious circle involving the weak performance of many of China's enterprises and the problems of the banking system.

In China's present situation, the outcomes of particular reforms depend increasingly on the interaction among measures taken by the economy's key actors – government, enterprises, workers, and the financial system – acting in markets whose functioning is shaped by key framework conditions such as competition, property rights, and corporate governance. Rather than emphasising particular sectors, reforms now need to focus more on *economy-wide* policies to promote more efficient allocation of resources and to bolster the effectiveness of markets. The study highlights three objectives as the key to the success of China's overall reforms over the next decade.

- The first and most immediate is to lay the foundation for improving the utilisation of China's resources, by removing present obstacles to business sector restructuring and by achieving better integration among various segments of the economy that have been developed separately under different sets of rules.
- The second is to improve competition law, property rights, enterprise governance and other frameworks that are essential to efficient market functioning so that resources are efficiently allocated in the future.
- And the third is to improve the capacity of the government to support economic development, by strengthening the effectiveness of macroeconomic policies while refocusing the role of regulatory policy on establishing and enforcing rules for market behaviour.

In achieving these objectives, reforms need to be both concurrent and carefully sequenced. Individual reforms to address particular problems need to be accompanied by complementary reforms in other areas in a comprehensive and co-ordinated fashion that is mutually reinforcing. Preferential development of individual sectors to "lead" the overall economy is likely to have much lower payoffs than in the past, and pose greater risks of negative outcomes. At the same time, reforms cannot be made all at once and care needs to be taken to establish the pre-conditions needed for follow-up measures.

Both principles will be particularly important to the achievement of three objectives which the study identifies as needed to break through the vicious circles now impeding reforms and establish the pre-conditions for sustained progress in the future. These are to:

- restore solvency to the financial system;
- bolster market based mechanisms as the dominant force for restructuring of the business sector;
- and establish public finances on a sound and sustainable basis.

Taking stock: the progress that has been made and the problems that need to be overcome

China's economy has undergone extensive transformations over the past twenty years (Table 1). The characteristic feature of the government's economic strategy has been to create separate channels for development outside the state sector, operating under different rules and conditions, in order to progressively increase the scope for market forces while phasing out central planning. This process, which has been termed "growing out of the plan",[1] has been highly successful but it has become increasingly apparent that its ability to push China's economic development further is coming to an

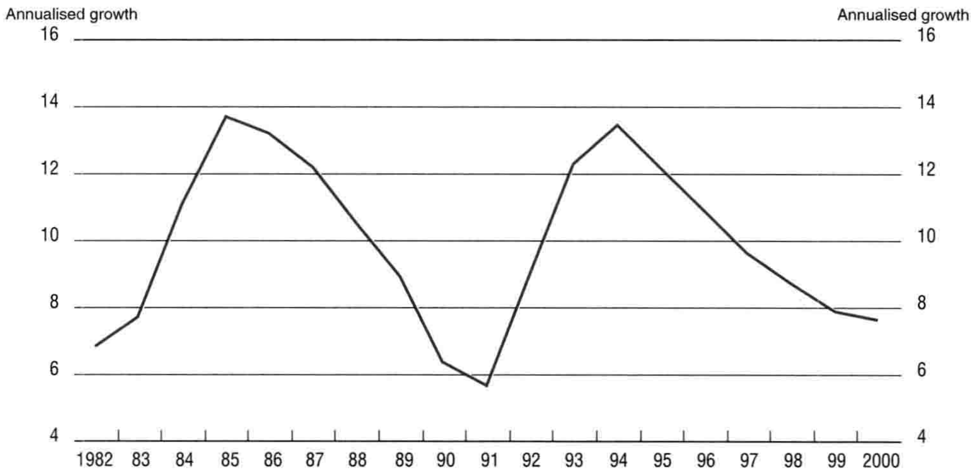
Table 1. **The transformation in China's economy**

	1980	2000
GDP per capita[1]	168	727[2]
Percentage of population in urban areas	20	31
Share of GDP (per cent) in:		
Agriculture	30	16
Industry	49	51
Services	21	33
Share of employment in:		
Agriculture	69	50
Industry	18	23
Services	13	27
Trade/GDP (%)[3]	12	42

1. In constant 1995 US$.
2. Figure is for 1998.
3. Exports plus imports as share of GDP.

Sources: World Bank, *World Development Indicators*, 2000; *China Statistical Yearbook*, 2000; IMF, *International Financial Statistics*. Figures for shares in GDP and employment for 2000 are from Chapter 1, Table 1.1.

Figure 1. **Real GDP growth**
3 year moving average



Source: China Statistical Yearbook, 2000.

end. Structural problems in the real economy have worsened progressively during the 1990s, leading to growing under-utilisation of labour and a protracted slowdown in real growth (Figure 1). These structural problems are substantially attributable to a lack of integration in factor markets, among business segments, and among regions.

Obstacles to resource utilisation in the rural economy[2]

China's agriculture employs about 50 per cent of the country's workforce and is characterised by relatively scarce land in relation to labour and small-scale production using little mechanisation. As in Japan and Korea, output per unit of land is high by international standards but output per worker is low. Land-intensive crops, notably wheat, corn, soybeans, and cotton are produced mainly in the northern part of the country while most of China's rice and sugar crops are produced in the southern half. Cultivation of vegetables, which are labour-intensive, is concentrated in coastal provinces and in areas adjacent to cities. Meat production is more evenly dispersed and largely carried out in small "backyard" facilities. Agriculture supplies less than half of total rural income. Per-capita incomes of rural households are 40 per cent of those in urban areas and, due largely to greater access to off-farm jobs, are highest in coastal areas.

Policy toward the rural economy continues to be carried out under frameworks and institutions distinct from those governing other parts of the economy. The Ministry of Agriculture is responsible not only for agricultural activities but also for general oversight of township and village enterprises (TVEs). The property rights regime in rural areas, in which village collectives formally own agricultural land, is distinct from that applying in urban areas. China's population registry system (*hukou*) includes provisions that impede migration of rural-born workers by preventing them from becoming legal residents of cities. Education resources per-capita and the average level of schooling are significantly lower than in urban areas. Pensions and other social benefits provided in urban areas are largely unavailable to the rural population.

Limits on integration with the rest of the economy did not prevent the rural sector from providing two key sources of China's development during much of the reform area. The first came from a major transformation in the policy environment in agriculture in the early 1980s. The tightly-controlled commune system of pre-reform times was replaced by a household based system in which individual farmers lease their land from the collectives, are largely autonomous in their production decisions, and bear the profits or losses from their operations. Market forces have largely replaced government plans and targets. And with the important exception of grains,[3] government intervention in the production, pricing, and marketing of agricultural products is now limited.

These policies have been instrumental in raising agricultural productivity and living standards during the reform era. The increase in agricultural productivity provided the first major impulse to the take-off in China's growth during the first half of the 1980s. However, the physical constraints on China's land and environmental resources make it difficult to increase productivity further within the existing pattern of production. Fertiliser use is already exceptionally high and the scope for increasing the use of pesticides is limited by their adverse environmental impacts. Water shortages and other environmental problems pose increasing barriers to higher agricultural productivity.

Fundamental improvements in agricultural productivity depend on substantial reallocation of resources away from land-intensive products toward labour-intensive products. However, the scope for reallocation is limited by certain government agricultural policies, the most of important of which is the grain procurement system. The policy has also had adverse consequences for macroeconomic performance in recent years: grain surpluses and falling market prices have depressed agricultural incomes and contributed to a marked slowdown in rural consumption growth.

The changing role of agriculture within the rural economy has provided a second major source of China's growth and development. In 1980, agriculture employed virtually the entire rural workforce and supplied nearly all of its income. However, rising productivity within agriculture was accompanied by the large-scale exit of workers from agriculture to industry.

In order to employ the workers coming from agriculture, local governments were encouraged to foster the growth of rural non-agricultural enterprises (REs), commonly known as TVEs.[4] These REs have been the main vehicle for absorbing this exit of workers from agriculture. REs are small and medium-size enterprises (SMEs) in rural areas that specialise in labour-intensive products, and along with foreign funded enterprises produce most of China's exports. Exemption from central planning restrictions, backing from local governments, business relations with state-owned enterprises (SOEs), greater exposure to market discipline compared to SOEs, and access to cheap rural labour, led REs to flourish beginning in the mid-1980s. They were the largest contributor to growth in aggregate GDP and employment from the mid-1980s through the early 1990s, and by 1996 employed 131 million workers, or 28 per cent of the rural workforce. The development of REs in turn has transformed rural income generation, with more than 40 per cent of rural incomes now coming from non-agricultural activities

Table 2. **Rural household incomes by source**
Net income *per capita*, per cent

	Year				
	1985	1990	1995	1998	1999
Total income (monetary and in-kind)	100	100	100	100	100
Of which: farming and related activities[2]	75	74	63	57	53
Memoranda:					
Total annual income in 1999 RMB[3]	1 311	1 370	1 718	2 132	2 210
Annual real growth rate, per cent[1]	..	0.9	4.6	7.5	3.7

1. Average growth rates for the periods between indicated years.
2. Including animal husbandry, forestry, fishing, hunting and gathering.
3. RMB amount deflated by the consumer price index.

Source: Figures are taken from Chapter 16, Table 16.4, which gives additional details. Data come from *China Statistical Yearbook* 2000, Tables 10-14 and 10-15. The data are derived from official household budget surveys using partly different definitions in urban and rural areas. Wages are assumed to be paid entirely in money.

(Table 2). The overall effect has been to increase the interdependence between the rural and urban economies, even though the traditional administrative distinctions have largely remained.

The large-scale shift of workers from lower productivity occupations in agriculture to higher productivity jobs in industry has been an important engine of China's growth, as it has been for other rapidly developing countries in the past. However, in China the bulk of the shift has taken place within the rural economy rather than through migration from rural to urban areas, due to government regulations that have impeded migration from rural to urban areas. These impediments, which amount to disincentives to migration rather than outright barriers, derive primarily from two sources. The first is related to the *hukou*, and has effectively denied services, other benefits, and most formal sector jobs in urban areas to rural migrants. The second impediment arises from the rural land tenure system, under which farmers who are absent for prolonged periods of time from their rural residences risk losing the land-use rights that are their primary old-age insurance.

Moreover, the shift of agricultural workers into REs has also been quite uneven. These industries have developed mostly in coastal provinces and have much less of a presence in the interior provinces, particularly those in the west. Even during the most dynamic phase, the growth of REs has not been sufficient to fully absorb the exit of workers from agriculture. The result has been the development of a substantial surplus of under-employed rural workers. A large portion of these workers – as many as 100 million – have become "floating" migrants who have taken up unregistered informal sector employment in urban areas.

The impetus to aggregate growth from REs has also waned in recent years. Since 1996, RE performance has deteriorated sharply, and employment has fallen by nearly 2.5 million. The slowdown in China's export growth after the 1997 Asian crisis can explain only a small part of this deterioration, which is rooted in fundamental structural problems. China's REs are suffering from financial problems and operating inefficiencies nearly as severe as those afflicting the SOE sector. The exemption from central planning restrictions and sponsorship by local governments, which gave REs an advantage in the past, have become less important as constraints on SOEs have been relaxed. The disadvantages of REs, in terms of distance from infrastructure and other facilities that benefit businesses in urban areas and which limit the scale of operations REs can achieve, have become more prominent. The degree to which these disadvantages are offset by access to lower cost but also lower skilled labour is unclear.

China's further opening to international markets offers opportunities to revive the growth forces from the rural economy but does not ensure the opportunities will be exploited. China's undertakings in agriculture under the WTO include tariff reductions and higher import quotas, elimination of the privileged position of state-trading enterprises (STEs), and increased scope for private traders in the marketing of agricultural products. The opening to international markets implies a shift of resources away from land-intensive products, notably grains (except rice) and cotton, and an increase in resources in labour-intensive products such as vegetables and horticultural products. However, several policies not covered by China's WTO accession agreement, notably government control of grain procurement prices and distribution, will need to be changed if this reallocation is to occur to more than a limited degree.

Nor does opening appreciably alter the scale of the challenge of employing China's rural workers. Estimates suggest that, even with no further opening, nearly 70 million additional workers will exit agriculture between 2000 and 2010.[5] WTO itself is expected to add only 2 to 3 million further to this decline. The analysis in the chapter on rural industries indicates that, even under optimistic assumptions about how much their performance can be improved, REs are unlikely to be able to take up more than a fraction of the rural workers who will need to find jobs outside the agricultural sector. This further underscores the fact that the development of the rural economy is increasingly dependent on conditions and policies affecting the economy as a whole.

Structural impediments to further industry development[6]

Two related structural changes have provided much of the impetus to China's industrial development during the reform period. The first is the shift from a wholly state-owned industrial sector at the beginning of the reform period toward one increasingly dominated by "non-state" enterprises, starting with TVEs and other collectively owned businesses, followed by foreign-funded enterprises, and more recently by private domestic enterprises. Enterprises either wholly owned or controlled by government entities now account for less than 30 per cent of industrial output, although they still employ nearly half of the urban workforce in the formal sector.

This transformation of industry ownership contributed to growth in at least two ways. First, it fostered a shift of resources toward enterprises that have been more efficient and more effective in responding to changing market forces than most SOEs. The fact that non-state enterprises have faced harder budget constraints than many SOEs partly accounts for this superior performance.

Second, ownership transformation helped to spur growth by increasing competition. The entry of non-state enterprises engendered particularly fierce competition in export industries and industries supplying foreign goods, where the state has allowed relatively free access. Competition has been increased further by the curtailing of central planning mechanisms and freeing of prices: nearly 90 per cent of retail prices are now completely market determined, the main exceptions being energy and other utility prices. Increased competition has helped to raise the overall profit orientation of industry. The advance of competition has, however, been uneven. Protected industries reserved entirely or mainly for SOEs include major utilities such as electricity and petroleum/gas extraction, but also mineral extraction, steel and other metallurgical industries, automobile production, basic chemicals, and tobacco.

The second structural change is the progressive opening of the Chinese economy to foreign trade and investment. China's average tariff rate has fallen from above 40 per cent in the early 1990s to 15 per cent in 2001. Since 1979, China has received a cumulative total of US$ 350 billion in foreign direct investment (FDI) and in recent years, foreign investment has averaged 4-5 per cent of GDP (Table 3). The performance admittedly has been uneven: the bulk of foreign direct investment has come from Chinese Taipei, Hong Kong, China, and other Asian countries with large ethnic Chinese populations, while China has been less successful in attracting foreign direct investment from OECD countries.[7] Foreign direct investment has been largely concentrated in coastal provinces, mainly because most of the special economic zones (SEZ) granting preferences to foreign investment have been established in those regions.

The opening to international trade and investment has increased competition, spurred the growth of domestic labour-intensive industries, especially REs, and helped to develop China's exports. Foreign-invested enterprises (FIEs) in China have also been instrumental in developing China's export industries, particularly in recent years as foreign direct investment inflows have shifted toward capital-

Table 3. **Ratio of foreign direct investment inflows to China's GDP and gross capital formation**

	Total foreign direct investment inflows (US$ billion)	China's GDP (US$ billion)	Ratio of total foreign direct investment inflows to China's GDP (%)	China's domestic GCF[1] (US$ billion)	Ratio of total foreign direct investment inflows to China's domestic GCF[1] (%)
1983	0.916	300.375	0.31	101.483	0.90
1985	1.661	305.254	0.54	115.300	1.44
1990	3.487	387.723	0.90	134.705	2.59
1995	37.521	700.278	5.36	285.928	13.12
1996	41.725	816.490	5.11	323.148	12.91
1997	45.257	898.244	5.04	343.285	13.18
1998	45.463	958.990	4.74	356.964	12.74
1999	40.319	989.621	4.07	368.446	10.94

1. GCF refers to gross domestic capital formation.
Source: The Table is adapted from Chapter 10, Figure 10.2. Data come from various issues of the *China Statistical Yearbook*.

and technology-intensive export sectors. Foreign investment has also helped to raise industry productivity and to improve industry technology, know-how and the skills of workers.

As in agriculture, the dynamism to industry imparted by structural shifts seems to be weakening. Industry financial performance has deteriorated sharply since the early 1990s. Profits fell to nearly zero in 1998, with more than one-third of enterprises making losses, and despite noticeable improvement during 1999-2001, financial performance remains weak in many sectors. Growth in industry employment and capital spending has declined markedly. The deterioration has been pervasive and not simply confined to SOEs. The performance of collective enterprises has worsened nearly as much as that of SOEs; and the SME sector generally is in particularly dire straits.

The poor industry performance can be traced in part to the accumulation of policy burdens arising from the long-standing use of enterprises to accomplish social policy goals. These burdens, which amount to government resource extraction through regulation, include excess labour, high debt loads, and responsibilities for public pensions, housing, education, and other social benefits that in other countries are the responsibility of government or individuals. Policy burdens are heaviest on SOEs but they are also borne by REs. Authorities have made significant progress in recent years in reducing excess labour and excess capacity and in reducing debt burdens of larger SOEs. However less progress has been made in reducing other policy burdens, and there has been much less improvement for other SOEs or non-state enterprises.

The biggest problem impairing industry performance is widespread inefficiency in enterprise operations. Presently, much of industry operates with inadequate resources that are poorly managed by the firms that control them and which are misallocated across firms. In contrast to formerly centrally planned economies in Eastern Europe, China's industry is characterised by widespread sub-optimal scale in production facilities, fragmentation and duplication. There are 200 separate producers of automobiles, most of which complete only a few thousand units per year. Much of the plant and equipment is outmoded. Economies of scope are also poorly exploited, as illustrated by the nearly 8 000 independent cement firms in China compared to 110 in the United States, 51 in Russia, 58 in Brazil, and 106 in India.

Inadequate technology and limited capacity to innovate are particular weaknesses of much of Chinese industry. Technology standards for a large portion of domestic firms are below international standards. China devotes proportionately fewer resources, and produces less scientific outputs such as patents, than OECD countries, as well as other large developing countries such as India. Industry also plays a relatively smaller role in technology development and innovation. Moreover, the technology transferred by foreign enterprises to Chinese firms seems to have been limited in both amount and scope.

These inefficiencies are attributable to a range of factors at the firm level, in the external environment, and in the relation between government and business. The poorly skilled and insufficiently profit-motivated management that characterises much of domestic business has neglected technology. Weak financial discipline, which has effectively presented firms and their government backers with a zero cost of capital, has been a major impetus to the development of unproductive and redundant capacity. The pre-reform policy of encouraging regional self-sufficiency together with low capital mobility has left a legacy of limited regional specialisation in production. The resulting inefficiencies have persisted and accumulated because key corrective market mechanisms have been severely impaired. Exit via bankruptcy and liquidation has been relatively rare, although it is becoming more common; and regional protectionism and other administrative barriers have severely restricted the scope for value-enhancing mergers and acquisitions (M&A). These factors have become a mutually reinforcing vicious circle (Figure 2). Government interference leads to poor SOE management and inefficient operations, which foster low profits and high debt; this in turn makes it more difficult to restructure to improve efficiency and prompts government interventions that spread the problem by extracting resources from stronger enterprises to prop up those that are failing.

Industry problems have become acute at a time when the traditional distinctions among ownership forms are becoming less and less meaningful in functional terms. Smaller SOEs and REs are blending into the broader universe of SMEs. Non-state enterprises are moving closer to enterprises formally recognised as private. The blurring of distinctions among ownership classes has not, however, appreciably levelled the playing field among enterprises even though it has modified the boundaries. The different ownership classes are still subject to distinct legal and regulatory frameworks. Differences in treatment – among smaller *versus* larger enterprises, among enterprises in competitive versus sheltered sectors, and among enterprises that receive backing from central or local governments versus those that do not – remain and in some cases have increased.

Figure 2. **The vicious cycle of poor enterprise performance**

Source: OECD Secretariat.