

# The Chinese Economy: Near-Term Outlook and Long-Term Prospects

---

Lawrence J. Lau, Ph. D.

President and Ralph and Claire Landau Professor of Economics  
The Chinese University of Hong Kong  
and

Kwoh-Ting Li Professor in Economic Development, Emeritus, Stanford University

Wharton School Alumni Association Global Forum  
Hong Kong, May 26, 2007

Phone: (852) 2609-8600; Fax: (852) 2603-5230

Email: [LAWRENCELAU@CUHK.EDU.HK](mailto:LAWRENCELAU@CUHK.EDU.HK); WebPages: [HTTP://WWW.CUHK.EDU.HK/VC](http://www.cuhk.edu.hk/vc)

# A Preview

---

- ◆ The Chinese Economy Today
- ◆ Near-Term Outlook
- ◆ Long-Term Prospects
- ◆ Concluding Remarks

# The Chinese Economy Today

---

- ◆ Mainland China is currently the fastest growing economy in East Asia and the World—averaging approximately 10% per annum since the beginning of economic reform in 1978.
- ◆ Between 1978 and 2006, Chinese real GDP grew from US\$180 billion to US\$2.68 trillion (2006 prices) (4<sup>th</sup> largest economy in the world) and real GDP per capita grew from US\$190 to US\$2,026. By contrast, the U.S. GDP (approximately US\$13.0 trillion) and GDP per capita (approximately US\$44,000) are respectively 5 and 22 times the comparable Chinese figures in 2006.
- ◆ Despite its rapid growth, China is still a developing economy in terms of its real GDP per capita. An economy is generally considered to be developed if its GDP per capita exceeds US\$10,000.

# The Chinese Economy Today

---

	1978	2006
	US\$	(2006 prices)
Real GDP	180 bill.	2.68 trill.
Real GDP per capita	190	2,026

# The Chinese Economy Today

---

	U.S.	China
	US\$ (current prices)	
2006 GDP	13.0 trill.	2.68 trill.
2006 GDP per capita	44,000	2,026

# The Chinese Economy Today

---

- ◆ The distribution of Chinese GDP by originating sector has become approximately: Primary, 12.5%; Secondary, 47.5%; and Tertiary, 40%. But the bulk of the labor force, approximately half of the total, is still in the primary sector, ensuring that there is no upward pressure on the real wage rate for unskilled entry-level labor for decades to come.

# The Chinese Economy Today

---

- ◆ China is one of the very few socialist countries that have made a smooth transition from a centrally planned to a market economy. It is a model for other transition economies and potential transition economies.
- ◆ The rate of interest (the price of money) and the exchange rate are the only prices that are still administratively managed on the margin, in addition to the prices of different forms of energy, which are also regulated.
- ◆ The private (non-state) sector accounts for more than 75% of GDP and an even greater percentage of employment compared to essentially 0% in 1978. Increasingly, even public utilities, such as electric power and water, are managed by private enterprises.

# The Chinese Economy Today

---

- ◆ The Eleventh Five-Year (2006-2010) Plan for Economic and Social Development of China is an indicative rather than a mandatory plan. It is more a set of guidelines.
- ◆ Under the Eleventh Plan, the policy of an open-door to international trade and direct investment is not only affirmed but also further enhanced. Other important objectives are an increase of personal consumption, especially in the rural areas, and maintenance of social harmony and long-term sustainability.

# The Eleventh Five-Year Plan for Economic and Social Development

---

- ◆ The Plan also calls for the doubling of per capita GDP between 2000 and 2010—implying a rate of growth of 7-8% for the rest of the decade (and doubling again between 2010 and 2020).
- ◆ Rapid economic growth is not the only objective:
  - ◆ Encouraging thrift, conservation and efficiency
  - ◆ Promoting social harmony
  - ◆ Ensuring long-term sustainability

# The Chinese Economy Today

---

- ◆ More and more Chinese enterprises will be making foreign direct investments overseas, much as their Japanese counterparts did in the 1970s and 1980s.
- ◆ The investment by the Chinese Government Investment Corporation (GIC) of US\$3 billion in the Blackstone Group is only 1 percent of its total expected capitalization of US\$300 billion.
- ◆ The Chinese objective is to maintain an overall balance of payments equilibrium (of zero) going forward. With its official foreign exchange reserves standing at US\$1.066 trillion at year-end 2006 (and more than 1.2 trillion today), China has overtaken Japan to become the country with the largest official foreign exchange reserves and certainly does not need a higher level of reserves.

# The Chinese Economy Today

---

- ◆ China is often referred to as the “World’s Factory” because of the dominant position of its exports in the markets for light manufactured goods such as textiles, apparel, shoes, electrical and electronic appliances, and furniture around the world, on the basis of its low real wage rate (surplus labor).
- ◆ However, the Chinese total (direct+indirect) domestic value-added on these exports remains low, averaging 36.8%. Moreover, almost 60 percent of Chinese exports is conducted by foreign-invested enterprises. Thus, a high proportion of the “profits” from the Chinese export trade accrues to foreign rather than Chinese nationals.

# The Chinese Economy Today

---

- ◆ China is also rapidly becoming the “World’s Market” because of its increased demands for goods and services around the world:
  - ◆ It is the World’s major user and importer of oil, minerals, and other natural resources and primary raw materials.
  - ◆ It has also become the World’s fastest-growing market for consumer goods, such as automobiles, cell phones, and tourism services, and producer goods such as aircrafts, computers, mass-transit systems, nuclear power plants and specialty steel.
- ◆ It has been an engine of growth for the Asia-Pacific region (Northeast Asia, Southeast Asia, Australia and New Zealand) since 2000. China runs a trade deficit vis-à-vis almost all countries in East Asia. It has become the most important trading partner for Hong Kong, South Korea and Taiwan.

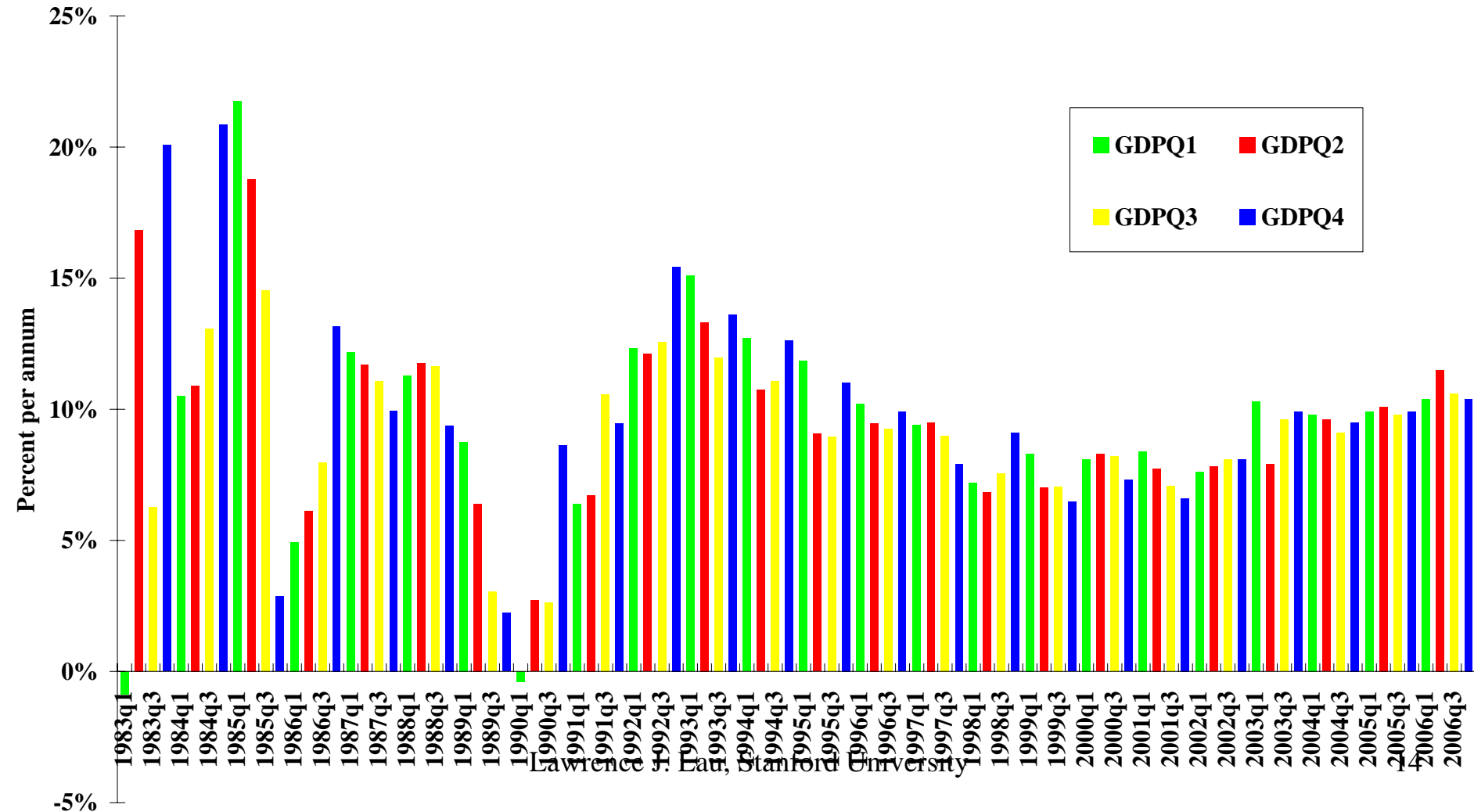
# The Chinese Economy Today

---

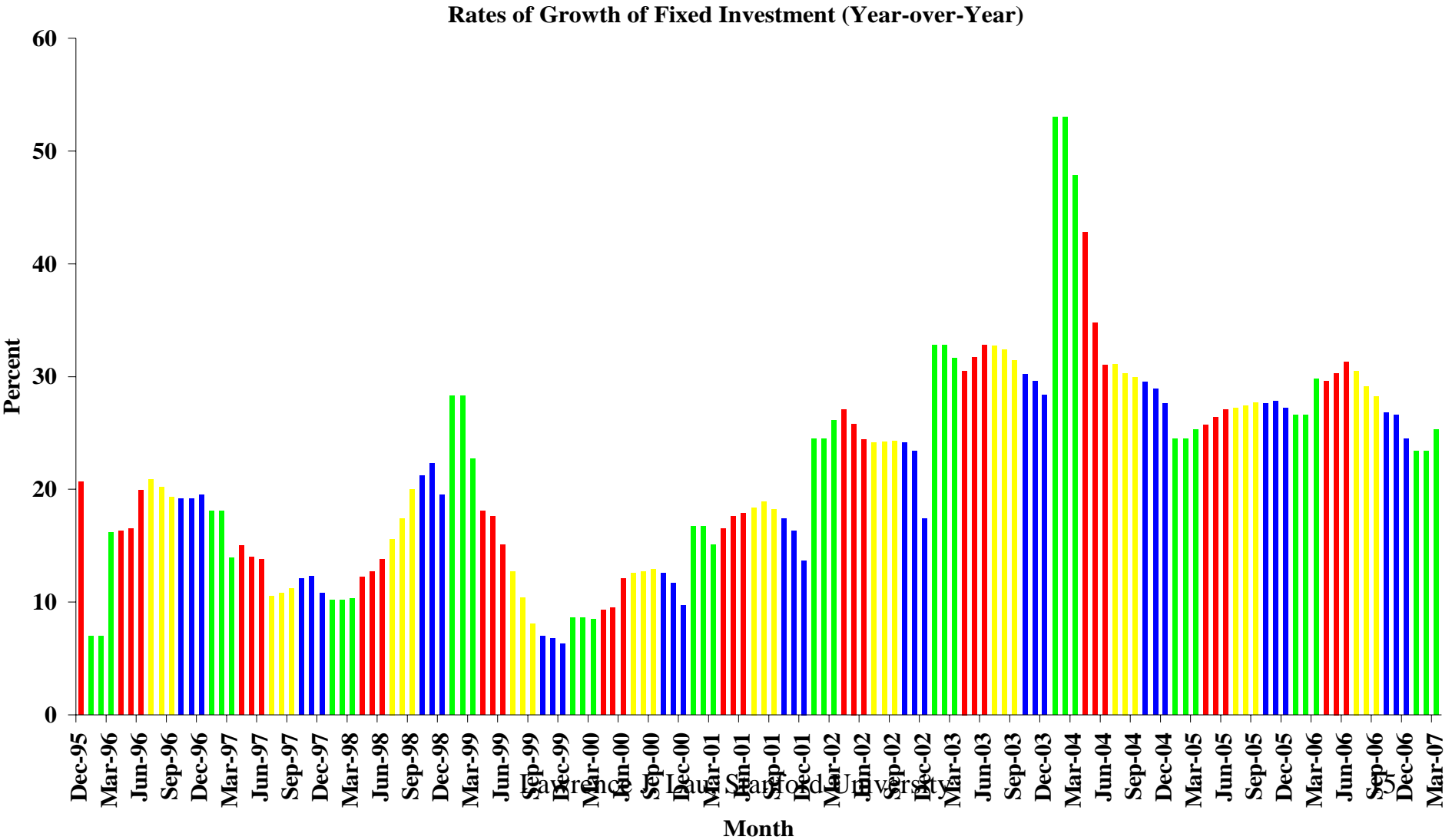
- ◆ The Chinese economy grew 10.1% in 2004, 10.4% in 2005 and 10.7% in 2006.
- ◆ However, the apparent acceleration of the measured rate of growth does not seem to be consistent with other indicators that the economy has been slowing—including the decline in the rate of growth of industrial output; the appearance of excess capacity in many sectors; rising increases in stocks (inventories); the slowdown in the rate of growth of exports and imports (and in export orders) for several consecutive months; and the decline in the price of real estate in major cities. The national income statistics do not seem to reflect the slowdown adequately.

# Quarterly Rates of Growth of the Real GDP of Mainland China (Year-over-Year)

Quarterly Rates of Growth of the Real GDP of Mainland China (YoY)



# Rates of Growth of Gross Fixed Investment, Year-over-Year



# The Chinese Economy Today

---

- ◆ We attribute this inconsistency to the fact that the quarterly rate of growth Year-over-Year is a lagging indicator, the lack of provision for recognizing the decline in the value of inventories, the inability to separate the pure appreciation in the price of undeveloped raw land from the value added of enterprises engaged in real estate development and the continued apparent rapid growth in the measured personal consumption of services due in part to the previous underestimation of its level.
- ◆ One other factor that may also be relevant is that this is the year in which provincial and local leaders are considered for possible promotions. A higher reported rate of growth of the provincial or local real GDP in 2006 can be helpful.

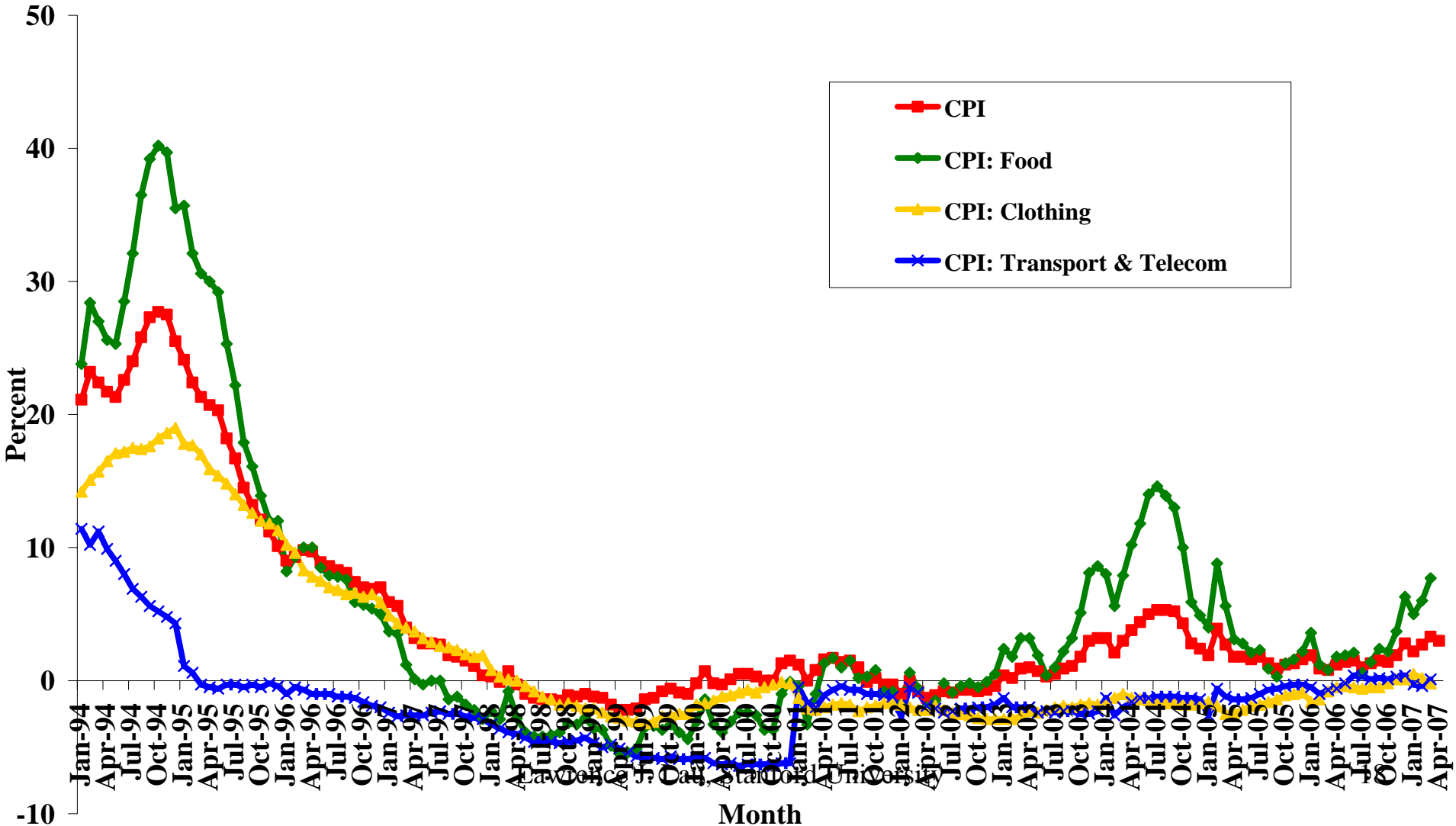
# The Rate of Inflation

---

- ◆ The Consumer Price Index (CPI) reportedly grew 1.5% in 2006, following a 1.8% increase in 2005. The People's Bank of China projected a rate of growth of the consumer price index (CPI) for 2007 to be 3%.
- ◆ Inflation has remained low thus far, despite the relatively high rate of growth of the money supply (M2). The relatively low inflation rate was the result of the stabilization of agricultural prices at their current levels and the excess capacity in many sectors such as steel and cement, driving down prices from their peaks, and that much of the growth in the money supply was absorbed by the growth of transactions in assets (financial and real) rather than goods and services.
- ◆ Prices of goods, services and assets have been declining, albeit at different rates, pointing to a gradual economic slow-down.

# Monthly Rates of Change of the CPI, Year-over-Year

Monthly Rates of Change of Consumer Price Index and Its Components Since 1994, Year-over-Year



# The Rate of Inflation

---

- ◆ China has always been a surplus labor economy. The real wage rate will remain stable as long as half of the labor force continues to be in the primary (agricultural and mining) sector, but producing only 12.5% or less of GDP. There will be little upward pressure on the real wage rate of unskilled entry-level workers for at least a couple of decades to come.

# The Rate of Inflation

---

- ◆ However, paradoxically, China is also a capital-surplus economy. There is a great deal of liquidity in the Chinese commercial banking system. Credit is easily available to state-owned enterprises as well as enterprises controlled or sponsored by provincial and local governments. Many such enterprises, or at least their executives, behave as if the loans do not need to be repaid if the investment projects fail. As a result of this moral hazard, there is chronic excess demand for credit, and hence excess investment.
- ◆ Small increases in the rate of interest are useful only as a signal of the central government's resolve to exercise macroeconomic control but are unlikely in and of themselves deter many of these enterprises from their investment projects.

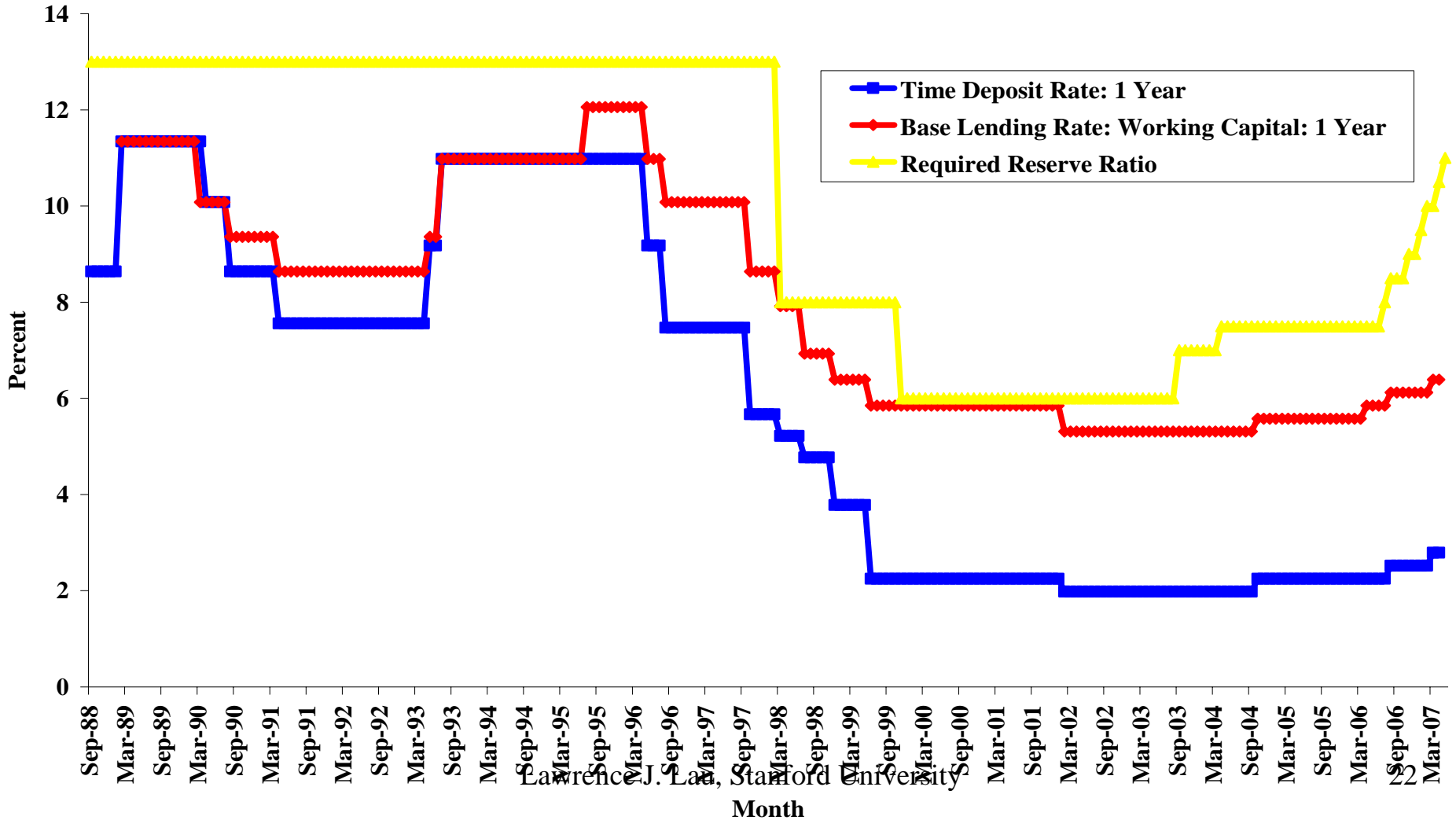
# The Rate of Inflation

---

- ◆ The excess investment often results in excess capacity in many industries, especially capital-intensive ones. With excess capacity and a saturated domestic market, the enterprises in many sectors have begun to cut prices in order to compete, despite the rising costs of raw materials and energy. The margins of many enterprises are squeezed. The variable costs are barely covered. And any remaining excess supply is put on the world market as a last resort, even at a loss (in the sense that the total costs, including fixed costs, fail to be fully recovered). Thus, Chinese exports have helped to keep the world rate of inflation from rising.
- ◆ However, this situation cannot continue forever. With mounting losses, selling and exporting at a loss will eventually come to an end. The rates of growth of exports and export orders have already been declining over the past several months.
- ◆ The rate of growth of imports has declined even faster, indicating a slowdown in the investment boom.

# Short-Term Deposit and Lending Rates & Bank Reserve Requirement

Short-Term Deposit and Lending Rates and Bank Reserve Requirement



Lawrence J. Law, Stanford University

# International Trade and Investment

---

- ◆ Chinese international trade has been growing at double-digit rates in recent years, more than twice the rate of growth of world trade as a whole and is expected to continue to do so in the future, albeit probably at lower rates.
- ◆ Total Chinese exports and imports of goods amounted to US\$1.76 trillion in 2006, an increase of 24% from US\$1.42 trillion in 2005. China is the third largest trading nation in the world, after United States and Germany.
- ◆ The Ministry of Commerce expected international trade to grow 15% to reach US\$2 trillion in 2007, this is a slow down from the 24% of 2006.

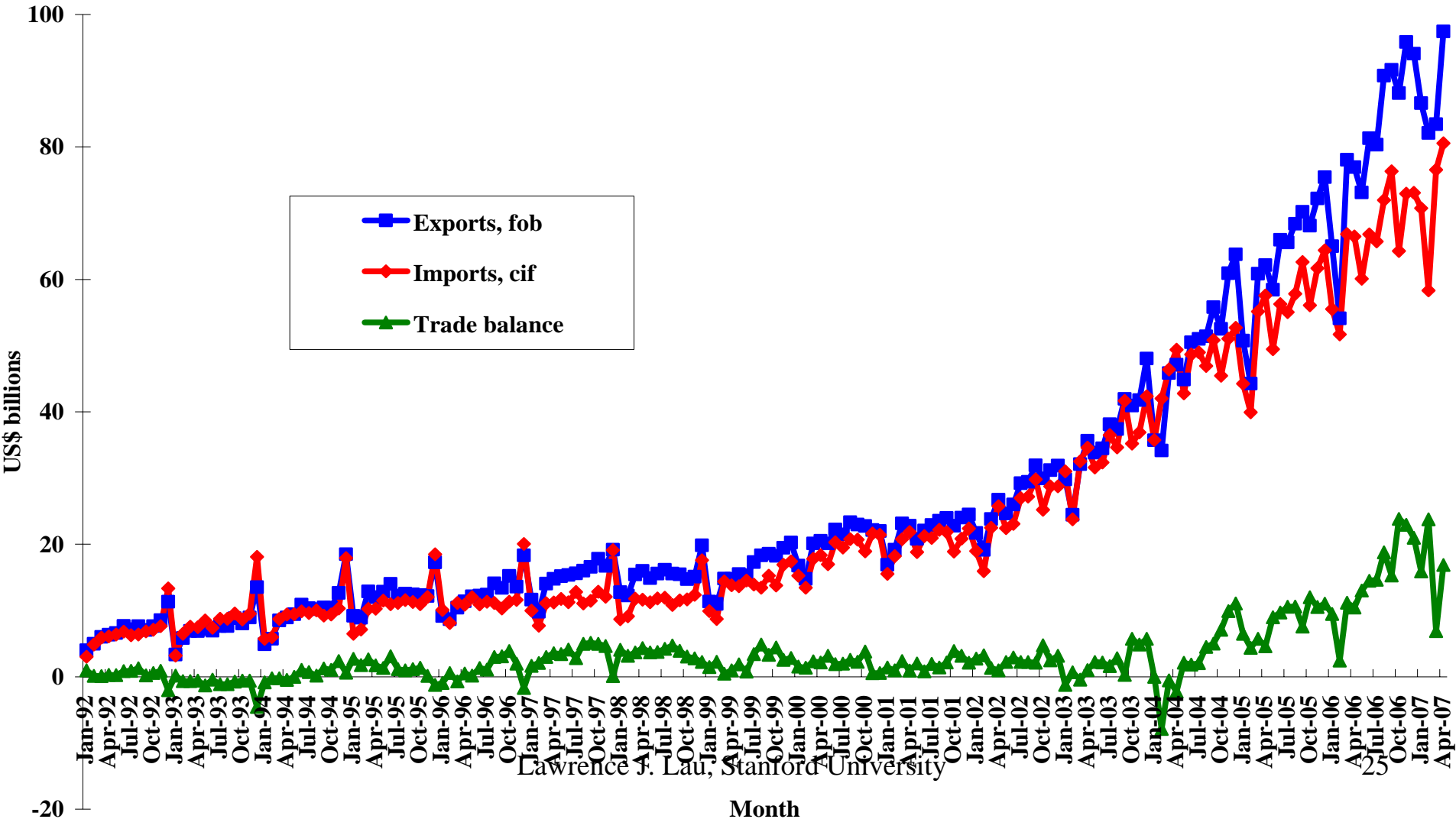
# International Trade and Investment

---

- ◆ In 2005, exports of goods alone grew 28.4% to US\$762.0 billion while imports grew 17.6% to US\$660.1 billion; resulting in a trade surplus in goods of US\$101.9 billion, or 7.2% of total trade in goods and 4.5% of GDP.
- ◆ In 2006, exports grew 27.2% to US\$969.08 billion. Imports grew only 20.0% to US\$791.61 billion. The trade surplus was US\$177.47 billion, or 10% of total trade in goods and services and 6.7% of GDP.
- ◆ Taking goods and services together, China had a trade surplus of US\$92 billion in 2005, or 5.76% of total trade in goods and services and 4% of GDP.
- ◆ However, prior to 2005, the annual Chinese trade surplus was on average below US\$30 billion.

# Exports, Imports and Trade Balance: Monthly Data

The Levels of Exports, Imports and Trade Balance of Goods at the End of the Month



Lawrence J. Lau, Stanford University

# International Trade and Investment

---

- ◆ Exports by foreign-invested enterprises account for 58.5% of total exports. More than 50% of total exports are “processing” exports, that is, production for exports only based on imported intermediate inputs, raw materials, and equipment.
- ◆ Chinese exports are still characterized by a relatively low direct domestic value-added—estimated to be 20.4% for all exports and 17.7% for exports to the U.S. The indirect domestic value-added is also very low—estimated to be 26.2% for all exports and 19.1% for exports to the U.S. (Thus a 10% revaluation of the Renminbi will result in a less than 2% net increase in the direct costs of Chinese exports to the U.S. in US\$ terms, and hence a very limited impact on the volume of Chinese exports to the U.S.)

# International Trade and Investment

---

- ◆ The rapid increase in the **measured** Chinese trade surplus during the past couple of years may be attributed to
  - ◆ The expiration of the quota system of the Multi-Fibre Agreement which effectively restricted Chinese exports of textiles in years prior to 2005;
  - ◆ The appreciation of the Yuan by 7 percent relative to the U.S. Dollar implies that if in real terms the exports and imports remain unchanged, the exports will be worth more in US\$ terms and hence the trade surplus will rise, until the real quantity of exports begins to fall and the real quantity of imports begin to rise because of the price effects. But the price effects are expected to be small.
  - ◆ The decrease in the use of under-invoicing of exports and over-invoicing of imports because of the change in the expectation of the relative benefits of holding Yuan and US\$. The prevailing view is that the Yuan is likely to appreciate relative to the US\$. Enterprises in China (whether Chinese or foreign-owned) are therefore more willing to hold the Yuan rather than the US\$. The incentive for under-invoicing of exports and over-invoicing imports has declined. It is even possible that over-invoicing of exports and under-invoicing of imports are occurring.

# International Trade and Investment

---

- ◆ Despite the existence of capital controls, there are many channels of leakages, for both inflows and outflows. For example, the statistical discrepancy in the International Monetary Fund statistics has changed directions in recent years. Over- and under-invoicing, for transfer pricing and other purposes, are prevalent, especially in international transactions between connected parties (e.g., in intra-firm trade, which accounts for almost 60 percent of Chinese exports).
- ◆ Over- or under-invoicing of exports and imports by 5% is normally undetectable. 5% of Chinese international trade in goods in 2006 amounts to almost US\$90 billion. This is comparable to the magnitude of the swing in the statistical discrepancy of Chinese balance of payments in the International Monetary Fund statistics.
- ◆ Due to the imminent equalization of the tax rates on domestic and foreign-invested enterprises in China, it is possible that the foreign-invested enterprises in China may once again prefer under-invoicing of exports and over-invoicing of imports.

# The Renminbi

---

- ◆ China reverted to a “managed floating rate” system for the Renminbi on July 21, 2005, with a modest revaluation of 2.1%. China operated a “managed floating rate” system since it unified its exchange rates and introduced current-account convertibility on January 1, 1994, when the exchange rate was 8.7 Yuan per US\$. The de facto pegged exchange rate system was actually adopted in July, 1997 in response to the East Asian currency crisis, by greatly narrowing the daily band of fluctuation to almost nothing around 8.28 Yuan per US\$.
- ◆ Since July 2005, the Renminbi has appreciated slowly and gradually. On May 15, 2006, the Renminbi exchange rate crossed the psychologically important barrier of 8 Yuan per U.S. Dollar. On January 11, 2007, it rose above 7.80 Yuan per U.S. Dollar, the same parity as the Hong Kong Dollar.
- ◆ Overall, the Yuan has appreciated approximately 8% since July, 2005. For 2006 as a whole, the Yuan appreciated approximately 3.4%.

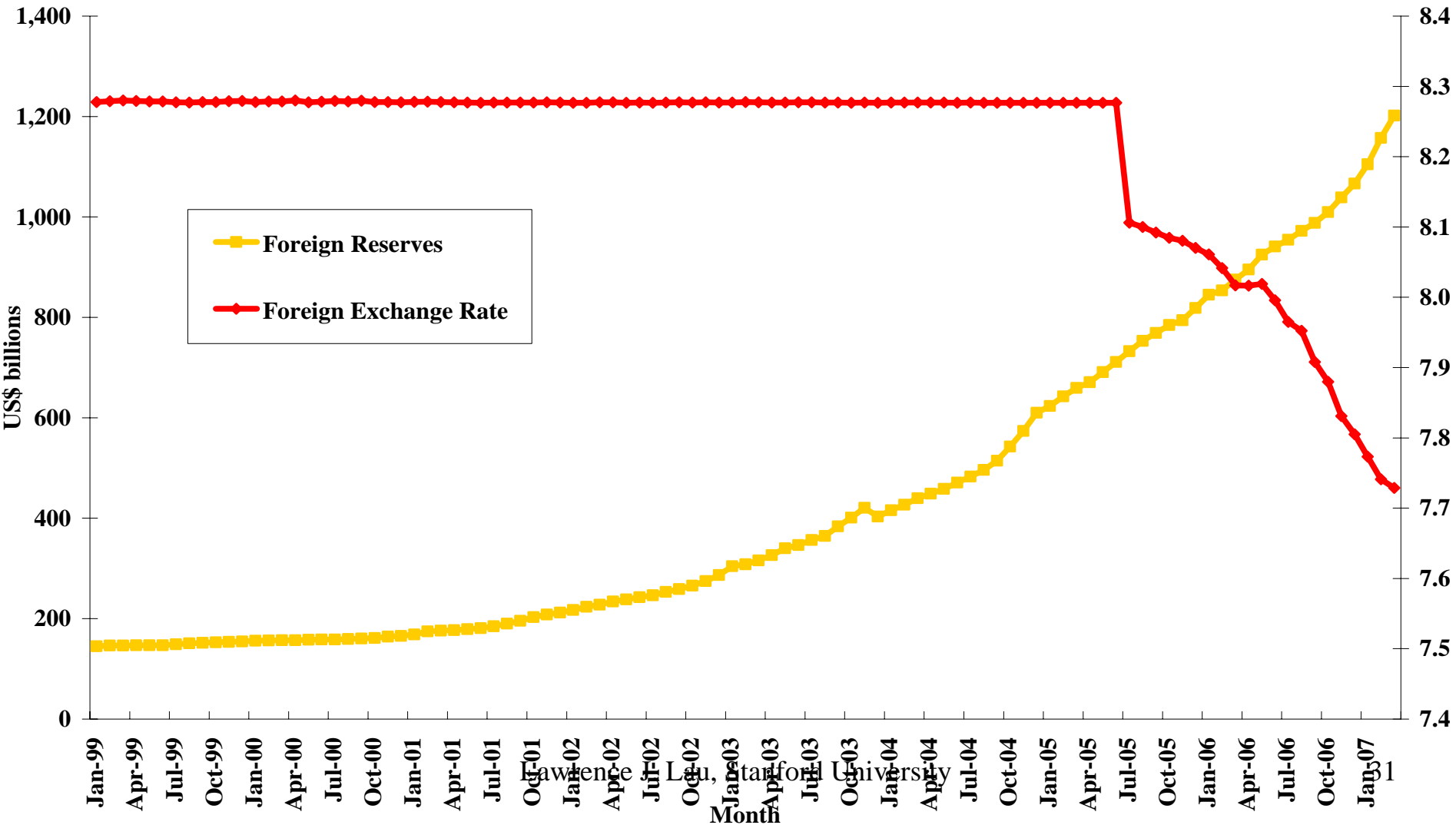
# The Renminbi

---

- ◆ The exchange rate is allowed to fluctuate within a daily band, originally set at 0.3% in either direction. The band has recently been widened to 0.5%.
- ◆ Revaluation, if any, is likely to continue to be gradual and modest.
- ◆ Full convertibility is likely within ten years although its net impact on the exchange rate is uncertain. Many observers expect the Renminbi exchange rate to fall with the introduction of full convertibility, at least initially, because of the one-off effect of portfolio diversification and re-allocation and because of possible capital flight on the part of the wealthy private entrepreneurs.

# Foreign Exchange Reserves and the Exchange Rate, End of the Month

The Level of Foreign Exchange Reserves and Exchange Rate (Yuan per US Dollar) at the End of the Month



# The Potential for Continued Economic Growth

---

- ◆ Chinese economic growth since 1978 has been mostly driven by the growth of tangible or physical inputs, principally tangible or physical capital such as structures and equipment and physical infrastructure, and not by technical progress or growth in total factor productivity. In particular, there was relatively little investment in intangible capital (e.g., R&D, human capital, advertising and good will).
- ◆ The growth of tangible capital inputs accounts for the bulk (over 80 percent) of the measured economic growth in China. The tangible capital stock has been growing at approximately 15 percent per year.
- ◆ The absence of overall technical progress is however typical of economies in their initial stages of economic growth. It was true for the United States in the 19<sup>th</sup> Century, for Japan from the Meiji Restoration of 1868 to the World War II, and for the East Asian newly industrialized economies of Hong Kong, South Korea, Singapore and Taiwan until the mid to late 1980s.

# The Fundamental Importance of Domestic Savings

---

- ◆ The bulk of the gross domestic investment in China is financed by domestic savings. Except for a short early start-up period in the early 1950s, the Chinese domestic savings rate has always been high, on the order of 30 percent. In recent years, it has approached 40-50%.
- ◆ Foreign direct investment accounts for approximately 10 percent of gross domestic investment in China. While helpful, and important in terms of bringing technology, markets, new business models and methods, and knowhow to China, foreign direct investment and foreign loans alone cannot sustain the rapid economic growth of China.
- ◆ This underscores the fundamental importance of domestic savings in Chinese economic growth--without the domestic savings financing the investment, the rapid growth of the tangible capital input would not have been possible; and without the rapid growth of the tangible capital input, the rapid growth of real output would not have been possible.

# The Advantages of a High Domestic Savings Rate

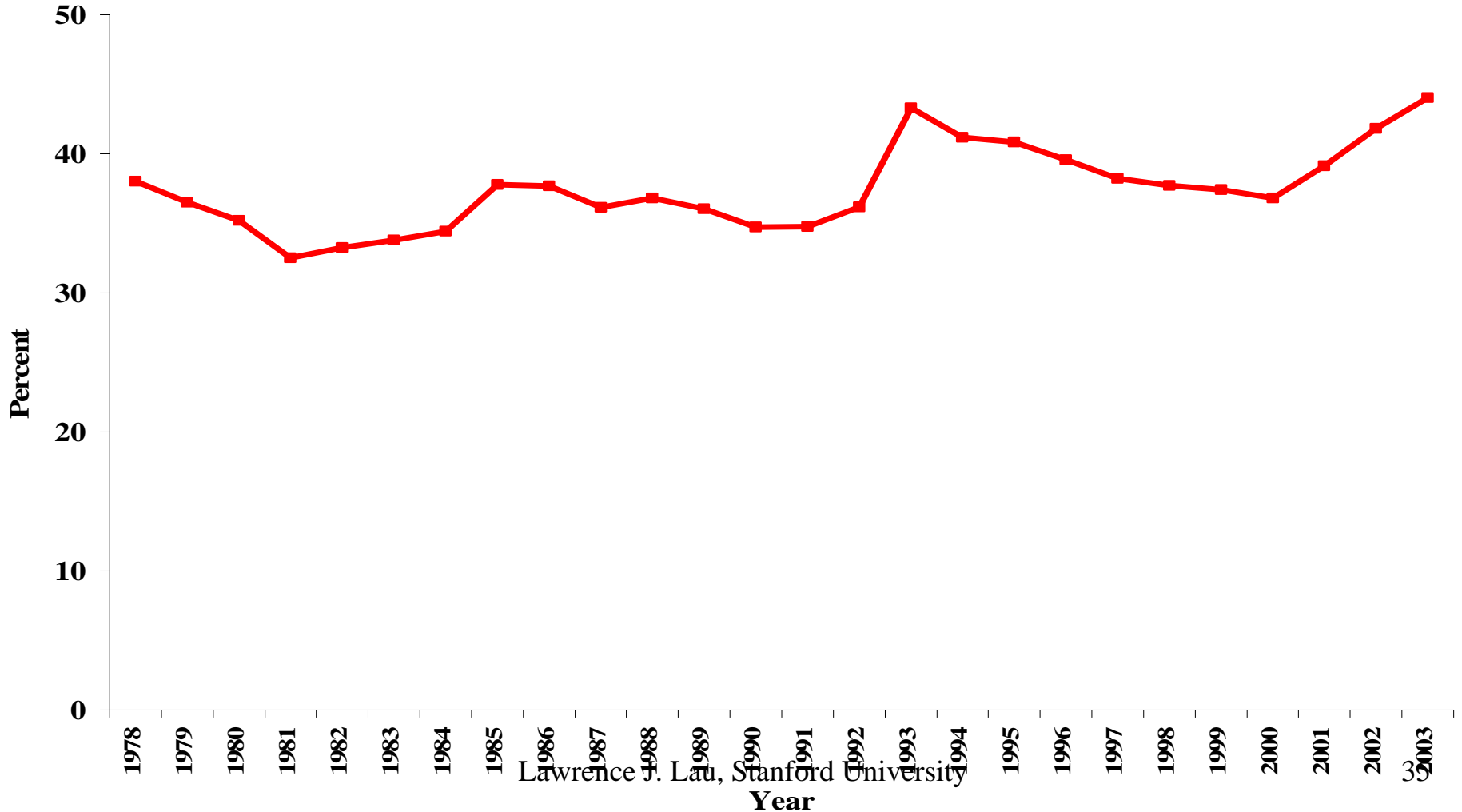
---

- ◆ A country with a high savings rate does not need to rely on foreign savings—does not need to borrow abroad and bear the potential risks of a large, and often interruptible, foreign-currency denominated debt.
- ◆ With new resources being made available each year from new savings, enabling new investments to be made, the necessity of restructuring and redeploying existing investment is greatly diminished (thus making it more possible to avoid creating losers).
- ◆ Moreover, with a high domestic savings rate, the non-state sector (which is generally more efficient) can grow without significant large-scale privatization, which can themselves be socially disruptive.

# China's Gross Domestic Investment as a Percent of GDP

---

China's Gross Domestic Investment as a Percentage of GDP



# The Advantages of a High Domestic Savings Rate

---

- ◆ Latin American economies are the chronic sufferers of a low domestic savings rate. They are therefore forced to augment their domestic savings by borrowing abroad in foreign currency. But loans have to be repaid sooner or later. When that happens, domestic investment will have to fall below domestic savings, and economic growth may not be sustainable; and in the repayment process currency crises will often result.
- ◆ The low domestic savings rate in Russia made it necessary for Russia to privatize and restructure, a process which resulted in approximately a decade of declining real GDP and the creation of many losers.

# The Growth of Personal Consumption

---

- ◆ Aggregate personal consumption is low in China not because it is crowded out by investment. On the contrary, the high investment rate is caused by the low consumption rate (high savings rate) and the abundance of liquidity in the commercial banks.
- ◆ There are many reasons for the high savings rate (low personal consumption) in China.
  - ◆ (1) The absence of a credible social security system (pension, health care, unemployment);
  - ◆ (2) The inadequate provision of social services (education, health care);
  - ◆ (3) The relative unavailability of consumer credit; and
  - ◆ (4) The unequal distribution of income (high-income households have low marginal propensities to consume).

# The Growth of Personal Consumption

---

- ◆ However, China's consumer market did register a steady and relatively fast growth since 2005. It is expected to grow faster than the rate of growth of GDP. Personal consumption of services is extremely difficult to measure accurately.
- ◆ Continuing significant demand for consumption can come from two sources, both related to urbanization—affordable owner-occupied housing and transportation.

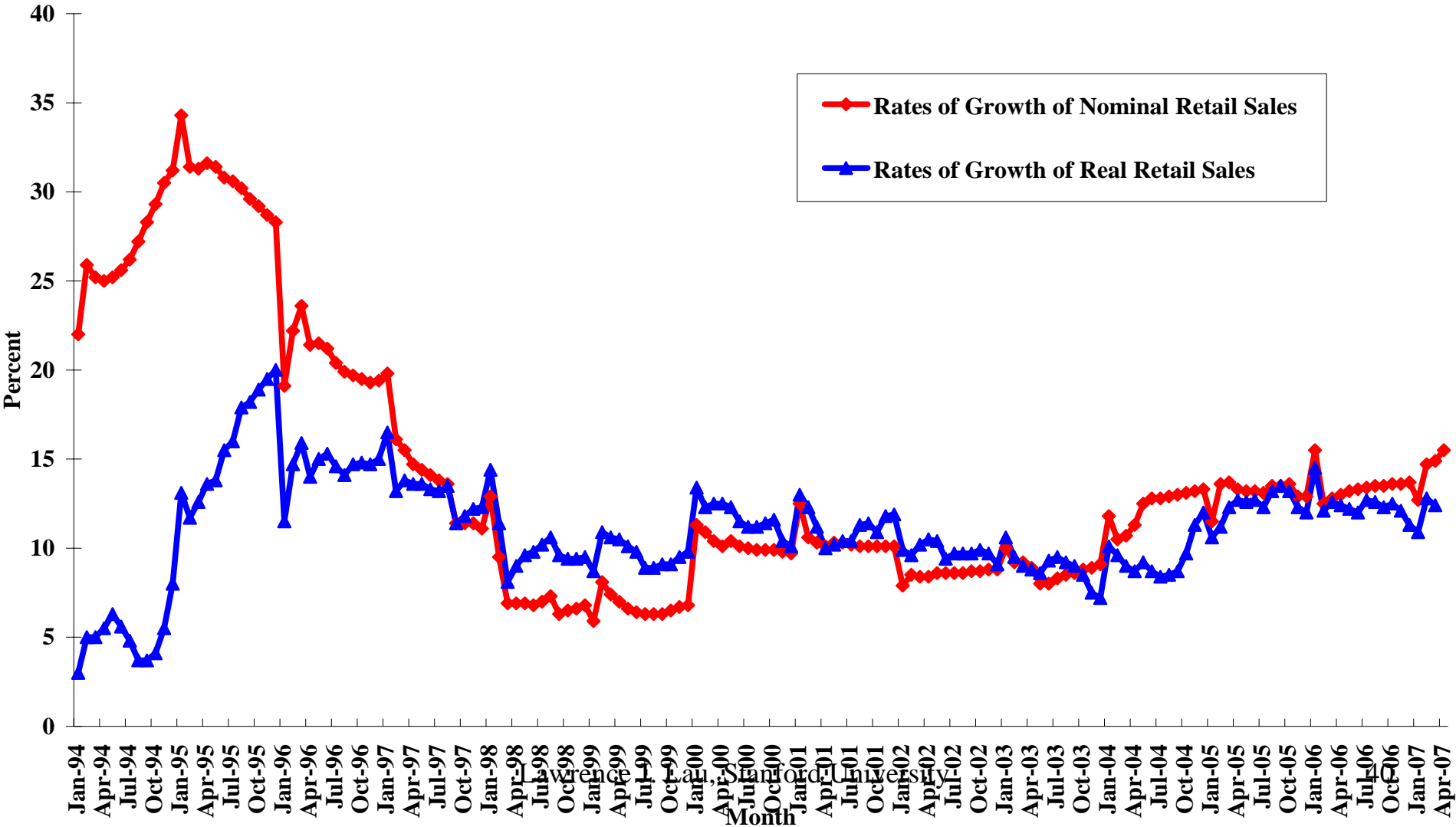
# The Growth of Personal Consumption

---

- ◆ The time has come for the government to promote and build mass-transit systems in both old and new cities. An efficient and clean mass transit system can reduce the demand for automobile usage (but not necessarily ownership) and hence environmental pollution and traffic congestion. It also permits the government to plan the urban locational patterns for commercial, industrial, and residential uses efficiently and effectively.
- ◆ The demand for other consumer durables—automobiles, motorcycles, bicycles, electrical appliances, furniture—many of which are also housing-related, will continue to be strong, especially in the urban areas on the coast.
- ◆ There has been and will continue to be a rapid increase in the demand for personal consumption services—education, health care, food and beverages services, and tourism.

# Rates of Growth of Nominal and Real Retail Sales, Year-over-Year

Rates of Growth of Real and Nominal Retail Sales, Year-over-Year



# Additional Advantages of the Chinese Economy

---

- ◆ A large internal market
  - ◆ A large internal market permits the realization of economies of scale.
  - ◆ A large internal market also allows a significant influence on the development and setting of standards.
  - ◆ A large internal market also enhances the returns to R&D and other forms of intangible capital.
- ◆ An almost unlimited supply of surplus labor—there will not be any pressure on the real wage rate of unskilled labor for decades to come.
- ◆ The advantages of backwardness—the ability to learn from the successes and failures of other economies; the ability to leap-frog stages of development; the possibility of creation without destruction

# The Sustainability of Chinese Economic Growth

---

- ◆ Paul Krugman's hypothesis—economies that rely solely on the growth of tangible inputs will eventually stop growing.
- ◆ The incremental capital-output ratio (ICOR) has been rising in China, that is, more and more tangible capital is required in order to produce an additional unit of real output. Gross fixed investment has been rising faster than the increase in output at an increasing rate.
- ◆ This is the combined effect of two phenomena:
  - ◆ (1) Diminishing marginal productivity of tangible capital; and
  - ◆ (2) Rising inefficiency of investment in tangible capital (duplication, ruinous competition, waste).
- ◆ However, in terms of tangible capital per unit labor, China is still far below the industrialized economies and hence still has a long way to go before diminishing marginal productivity of tangible capital begins to hit.

# The Vulnerability to Internal and External Disturbances

---

- ◆ Despite fluctuations in exports and imports, the rate of growth of real GDP has remained remarkably stable at 8-10%. This is due to the combination of two factors: the relatively low share of exports in GDP, and the relatively low domestic value-add content of Chinese exports.
- ◆ Chinese economic growth to date has also been investment-led, as opposed to consumption-led or export-led, with the bulk of the investment domestically financed. Foreign direct investment accounts for less than 10% of aggregate domestic gross fixed investment.

# The Vulnerability to Internal and External Disturbances

---

- ◆ Exports constitute approximately 35% of Chinese GDP; however, the direct domestic value added content of Chinese exports is low. It averages 20.4% on exports to the world, and 17.7% on exports to the United States.
- ◆ Thus, the GDP originating from exports is only approximately 7% (35% times 20% = 7%).
- ◆ 7% of GDP is a very significant amount that will result in hardships if lost; however, even if the 7% does not grow, the economy will do fine if the remaining 93% continues to grow.
- ◆ Even if we include both direct and indirect value-added, which amount to 46.6% of exports, the GDP originating from exports would constitute approximately 16%.

# The Vulnerability to Internal and External Disturbances

---

- ◆ The Chinese economy is therefore not too vulnerable to external disturbances. 16% of GDP is a great deal to lose; but if 16% of the economy does not grow, but the remaining 84% continues to grow, the economy will be fine.
- ◆ It might, however, be vulnerable to interruption of foreign energy supplies. Thus China must pursue a policy of:
  - ◆ (1) Energy conservation;
  - ◆ (2) Imposition of a gasoline tax so that the retail price of gasoline approaches the levels comparable to those of Western Europe and Japan;
  - ◆ (3) Intensified development of coal resources;
  - ◆ (4) Establishment of strategic petroleum reserves.

# The Relative Stability of the Rate of Growth of Real GDP

---

- ◆ Moreover, gross domestic investment is mostly financed through domestic savings rather than foreign investment or loans.
- ◆ Foreign direct investment (FDI) accounts for less than 10% of gross domestic investment in China, a relatively small proportion.

# The Vulnerability to Internal and External Disturbances

---

- ◆ The Chinese financial sector, however, is vulnerable because of the high debt to equity ratios of most enterprises and for the economy as a whole. There is a high proportion of indirect (credit) financing relative to direct (equity) financing.
- ◆ Enterprises with high debt-to-equity ratios are prone to failure, bringing down not only themselves but also their suppliers, customers and even lenders.
- ◆ Direct (equity) financing should be encouraged:
  - ◆ Encouraging enterprises to pay cash dividends;
  - ◆ Elimination of double taxation of corporate profit—leveling the playing field between debt and equity financing—making cash dividends of publicly listed companies deductible against profit in the same way as interest payments;
  - ◆ Cash dividends can serve as a reliable signal of an enterprise's corporate health; and
  - ◆ Intensified enforcement of security laws and regulation and supervision of both the securities market and the securities companies.

# Long-Term Economic Growth: Three Paradigms of Chinese Economic Growth

---

- ◆ Domestic demand-driven growth--the domestic market paradigm a la the United States in the 19th century. China is a large continental economy--International trade will never be as important as other, smaller countries and China must rely on internal demand for further economic growth. Value-added from exports constitutes only 7.5 percent of Chinese GDP.
- ◆ The "wild-geese-flying pattern" metaphor of East Asian industrial migration over time, first introduced by Akamatsu, can apply to Chinese provinces and regions.
- ◆ Privatizing the economy without privatization--shrinking the state sector through the growth of the non-state sector in the absence of explicit privatization--the experience of Taiwan and South Korea.

# Long-Term Economic Growth: Three Paradigms of Chinese Economic Growth

---

- ◆ What does it take?
  - ◆ Availability of infrastructure (transportation and communication, including the internet)
  - ◆ Continued marketization of the economy
  - ◆ Maintenance of a domestically open economy (the equivalent of the “interstate commerce” clause of the U.S. constitution)
  - ◆ Affirmation of tangible and intangible property rights and the rule of law (a national commercial and tax court?)
  - ◆ Maintenance of an internationally open economy--the role of the "open door" (WTO)

# Long-Term Economic Trends

## Aggregate GDP

---

- ◆ The Chinese economy is likely to continue to grow, more or less independently of what happens in the rest of the world, over the next several decades at an average annual rate of approximately 8%.
- ◆ The source of this growth will come primarily from tangible capital accumulation, supported by a national savings rate of over 30% (in 2005, the savings rate approached 50%), human capital accumulation, and economies of scale, and to a lesser extent on the growth of intangible capital (for example, R&D capital) and improvements in efficiency.
- ◆ By 2020, aggregate Chinese GDP may be projected to be US\$6.8 trillion (exceeding the then aggregate GDP of Japan and slightly less than one half of the then aggregate U.S. GDP).
- ◆ Some time between 2030 and 2040, aggregate Chinese GDP may reach the same level as aggregate U.S. GDP.

# Long-Term Economic Trends

---

## ◆ Per capita GDP

- ◆ However, even then, Chinese GDP per capita will only be able to reach US\$10,000, or not quite 20% of the then U.S. GDP per capita, some time towards the end of the decade of 2020s.
- ◆ Chinese GDP per capita will approach the level of U.S. (and Japanese) GDP per capita only beyond 2060.

## ◆ Population

- ◆ By 2035, India will have overtaken China as the most populous nation in the world.

## ◆ The currency

- ◆ The Renminbi will in time become one of the strongest currencies in East Asia and a quasi-reserve currency like the Euro. However, this will imply that China will eventually have a much higher rate of consumption and run trade deficits with the rest of the world.

## ◆ The balance of payments

- ◆ By 2020, China will probably run a small current account deficit vis-à-vis the rest of the world (more imports than exports) and also a small capital account deficit (more inflows than outflows) so that the overall balance of payments is in approximate equilibrium.

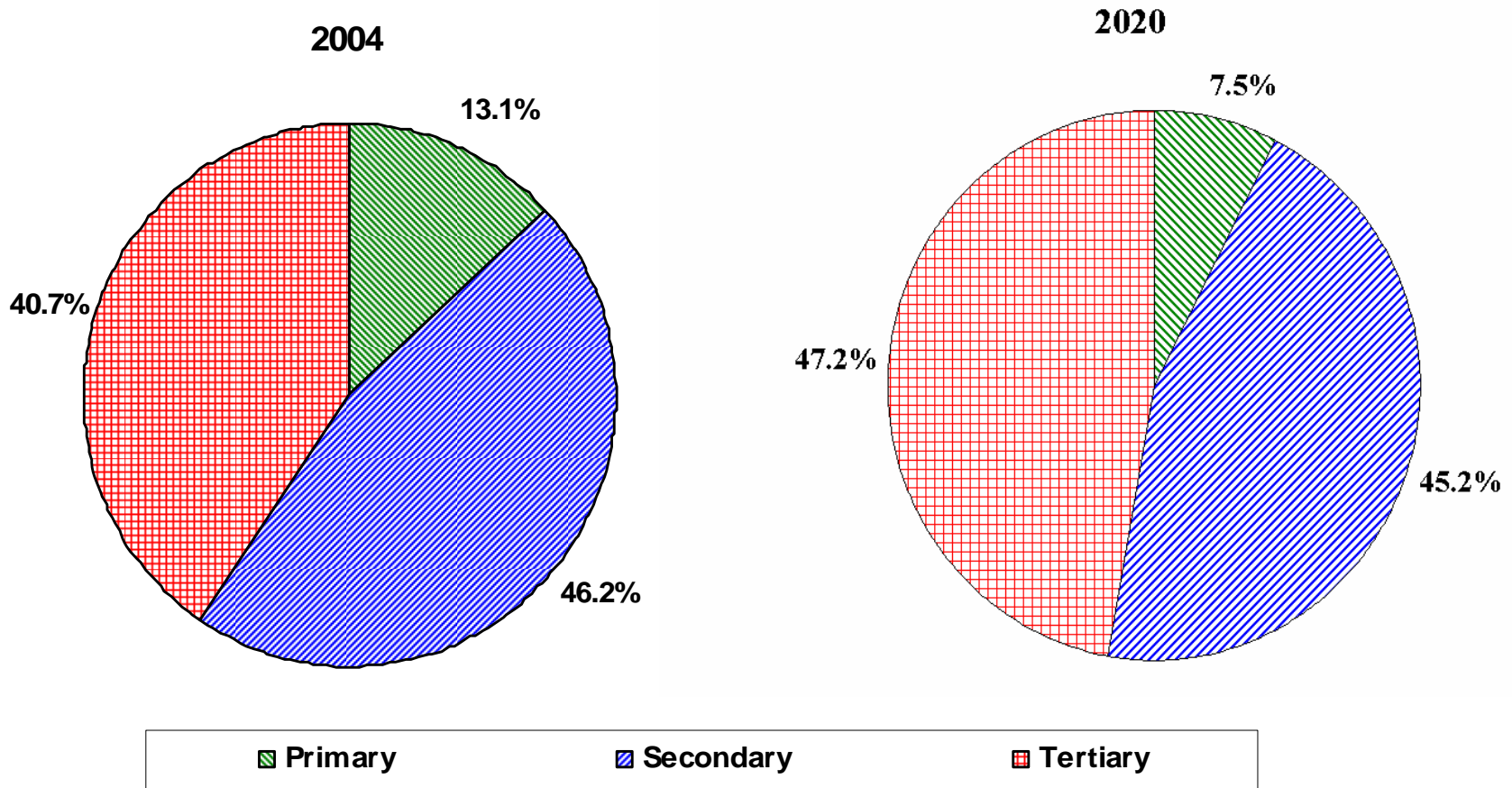
# Long-Term Projections

---

	2006	2010	2020
	US\$ (2006 prices)		
Real GDP	2.68 trill.	3.4 trill.	6.8 trillion
Real GDP per capita	2,026	2,650	5,000

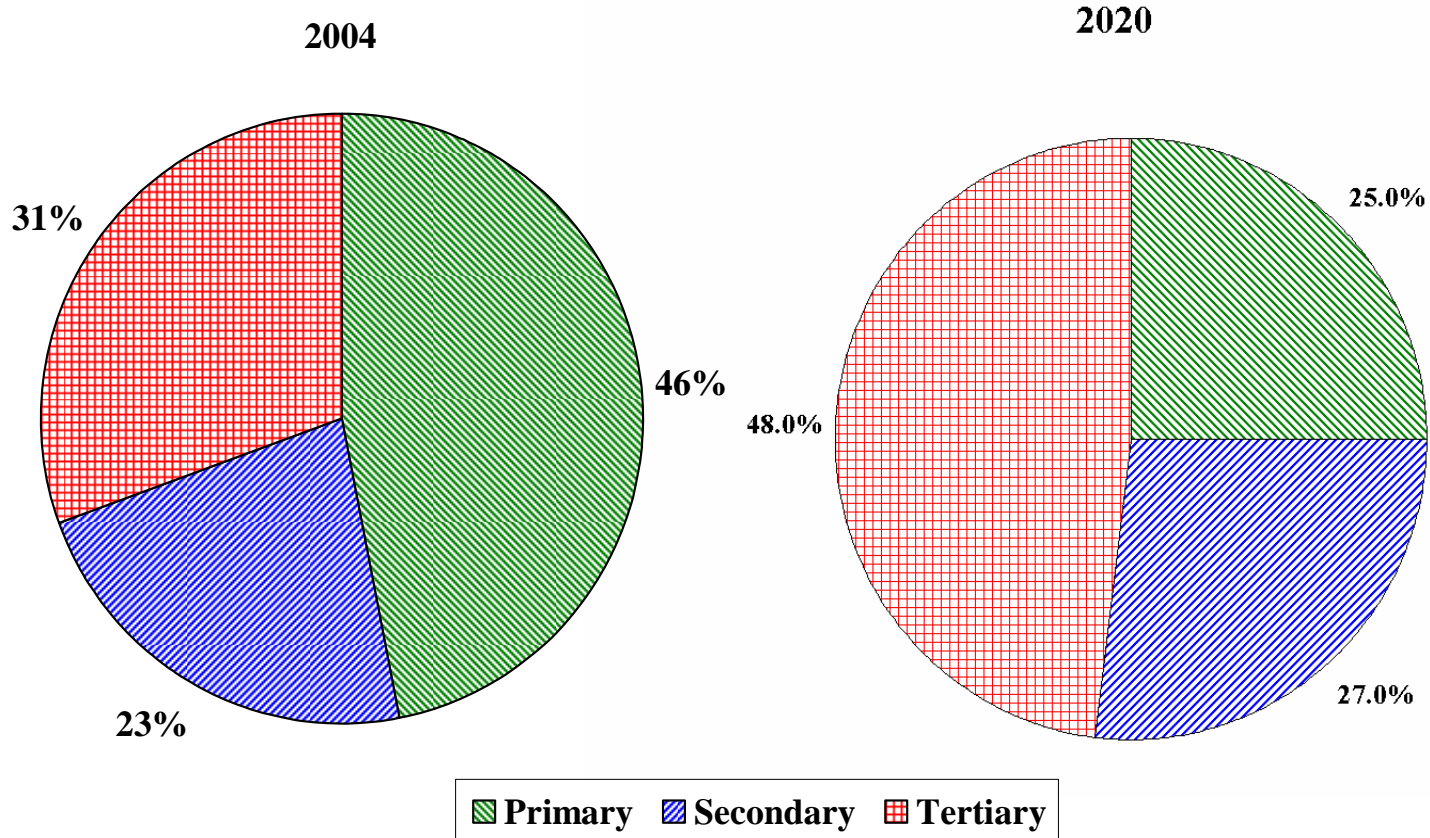
# The Structure of the Economy: GDP

---



# The Structure of the Economy: Employment

---



# Potential Risk Factors

---

- ◆ Financial Stability
  - ◆ The Banking Sector (Non-Performing Loans, Pyramid Schemes, Real Estate Bubble)
  - ◆ The Stock Market Bubble
- ◆ The Social Safety Net
  - ◆ Pension
  - ◆ Unemployment
- ◆ Social Harmony
- ◆ Exchange Rate Mechanism (Capital Flight, Abolition of Capital Control)
- ◆ Taiwan Straits
- ◆ Disruption of the supply of oil to the world from the Middle East.
- ◆ “The China Threat” threat.

# Prospects for Economic Growth

---

- ◆ Chinese economic growth during the next several decades will depend mostly on internal factors and be largely unaffected by the policies of other countries or events outside of China (a disruption of the oil supply may be an exception).
- ◆ There are numerous serious problems confronting the Chinese economy—however, these problems are not intractable.
- ◆ On the margin, foreign involvement in the Chinese economy will make some, but not a critical, difference; but it can be mutually beneficial for both China and the foreign countries.

# Prospects for Economic Growth

---

- ◆ Chinese GDP per capita will remain low relative to the industrialized economies (G-7) for at least three or more decades.
- ◆ The share of Chinese GDP produced by the non-state-owned sector will rise to 80% in another decade.
- ◆ There is significant complementarity between the Chinese and industrialized economies such as the Group-of-Seven--the industrialized economies do not export anything that China exports (and have not done so for decades) and China does not export anything that the industrialized economies export. It is this complementarity that maximizes the potential gains from free trade between the two sides.

# Concluding Remarks

---

- ◆ The prospects for continued rapid growth of the Chinese economy in the foreseeable future are excellent.
- ◆ The high domestic savings rate implies a high rate of capital accumulation. The abundant supply of surplus labor implies a low and steady real wage rate and keeps the marginal productivity of capital high.
- ◆ If the boom and bust cycles can be moderated through a more careful screening of investment projects and the spillover effects can be minimized through a decrease in the debt to equity ratio, the macroeconomic stability of China can be greatly enhanced.

# Concluding Remarks

---

- ◆ The upgrading of the labor force through investment in education as well as the increase in investment in intangible capital such as R&D capital and goodwill (brand building) should help to shift Chinese economic growth gradually from being tangible inputs-driven to technical progress-driven, as was done in Japan and in South Korea and Taiwan.
- ◆ The low external debt (coupled with capital control) and the existence of significant state-owned assets minimize the probability of a major economic crisis.

# Concluding Remarks

---

- ◆ Redistribution and control of corruption, essential to the promotion of social harmony, require a more centralized Government, not a more decentralized one.
- ◆ In the long run, in order to maintain social harmony, it is important for China to strive to become a land of hope and opportunity, a land in which everyone has a realistic and realizable opportunity to improve his or her life. Public investment in basic education (primary and secondary) in the low-income regions to truly universalize educational opportunities is the key.