China was the largest and one of the most advanced economies in the world before the eighteenth century, yet it declined precipitately thereafter and degenerated into one of the world’s poorest economies by the late nineteenth century. Despite generations of efforts for national rejuvenation, China did not reverse its fate until it introduced market-oriented reforms in 1979. Since then it has been the most dynamic economy in the world and is likely to regain its position as the world’s largest economy before 2030. Based on economic analysis and personal reflection on policy debates, Justin Yifu Lin provides insightful answers as to why China was so advanced in premodern times, what caused it to become so poor for almost two centuries, how it grew into a market economy, where its potential is for continuing dynamic growth, and what further reforms are needed to complete the transition to a well-functioning, advanced market economy.

**Justin Yifu Lin** is Senior Vice President and Chief Economist of the World Bank. He obtained his Ph.D. in economics from the University of Chicago in 1986 and returned to China in 1987, the first Ph.D. in social sciences to return from abroad after China started its economic reform in 1979. He was the founding director of the China Center for Economic Research at Peking University from 1994 to 2008 and is the author of seventeen books, including *The China Miracle* (1996), *State-Owned Enterprise Reform in China* (2001), and *Economic Development and Transition* (2009).
Demystifying the Chinese Economy

Justin Yifu Lin
Translated from the original Chinese by Stephanie Wang with further updates and revisions by Francesca Yu Sang and Bruce Ross-Larson
## Contents

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>List of figures</td>
<td>ix</td>
</tr>
<tr>
<td>List of tables</td>
<td>xi</td>
</tr>
<tr>
<td>Preface</td>
<td>xiii</td>
</tr>
<tr>
<td>1 Opportunities and challenges in China's economic development</td>
<td>1</td>
</tr>
<tr>
<td>2 Why the Scientific and Industrial Revolutions bypassed China</td>
<td>22</td>
</tr>
<tr>
<td>3 The great humiliation and the Socialist Revolution</td>
<td>55</td>
</tr>
<tr>
<td>4 The comparative advantage-defying, catching-up strategy and the traditional economic system</td>
<td>74</td>
</tr>
<tr>
<td>5 Enterprise viability and factor endowments</td>
<td>104</td>
</tr>
<tr>
<td>6 The comparative advantage-following development strategy</td>
<td>124</td>
</tr>
<tr>
<td>7 Rural reform and the three rural issues</td>
<td>152</td>
</tr>
<tr>
<td>8 Urban reform and the remaining issues</td>
<td>173</td>
</tr>
<tr>
<td>9 Reforming the state-owned enterprises</td>
<td>191</td>
</tr>
<tr>
<td>10 The financial reforms</td>
<td>207</td>
</tr>
<tr>
<td>11 Deflationary expansion and building a new socialist countryside</td>
<td>222</td>
</tr>
</tbody>
</table>
List of contents

12 Improving the market system and promoting fairness and efficiency for harmonious development 246

13 Reflections on neoclassical theories 264

Appendix Global imbalances, reserve currency, and global economic governance 287

Index 299
Figures

1.1 China’s share in global GDP  
1.2 Top five contributors to global growth, 1980–2009  
2.1 The technology distribution curve  
2.2 The invention probability curve  
2.3 The more the technology distribution curve moves to the right, the greater the probability of inventing a new technology  
4.1 Total factor productivity, 1952–88  
5.1 Relative prices of production factors and technology choices  
5.2 Relative prices of production factors and the product choices in a given industry  
5.3 Relative prices of production factors and industry choices  
11.1 Deflation from 1998 to 2002  
11.2 But growth continued at 7.8% a year  
11.3 Yet energy consumption fell in 1997–99  
11.4 More employed in primary industry in the later 1990s
11.5 Slower growth of per capita incomes in rural households 235
11.6 Prices generally falling in 2004–05 236
13.1 Falling output in the early 1990s in Eastern Europe and the former Soviet Union 266
A.1 East Asian trade surpluses 288
A.2 Three current account surplus countries 289
A.3 Global imbalances 290
A.4 Foreign exchange reserves of developing countries 291
A.5 US trade deficit due to East Asia has declined 291
A.6 Share of US–Japan and US–China trade deficits in total US trade deficit 292
A.7 Trend and cyclical GDP growth 294
A.8 Structure of China’s national savings 295
A.9 Industrial production volume indices 296
A.10 Output gap (actual versus potential) 297
## Tables

4.1 Prisoner's dilemma  
4.2 The capital accumulation rate, 1952–78  
4.3 Sectoral share of investment in capital construction, 1952–78  
4.4 Sectoral share of revenue in national income, 1952–78  
4.5 Sectoral employment structure, 1952–78  
4.6 An international comparison of working capital ratios  
4.7 Living standards of urban and rural residents, 1952–78  
7.1 China and other emerging industrial economies in efficiency of growth  
7.2 Agricultural growth, slow before 1978  
7.3 Urban and rural income growth in China, 1978–2004  
10.1 The risk, cost, and return of direct and indirect financing  
11.1 Average annual growth rate of fixed asset investment  
11.2 Penetration rates for home appliances in China's urban and rural areas
Preface

The book is based on my lecture notes for the course on China’s economic development and transition at Peking University. I started to offer this course each semester when I founded the China Center for Economic Research at Peking University in 1993. Before I took the job as the Chief Economist and Senior Vice President of the World Bank in June 2008, I turned the notes into a book, and the Chinese edition was published by Peking University Press in 2009. The book covers the reasons for China’s decline from its zenith before the eighteenth century, China’s efforts to reverse that decline ever since, and the reforms necessary for China to complete the transition to a well-functioning market economy. In the English edition, I have updated the relevant chapters and included an appendix on global imbalances.

Sustained economic development relies on continual technological innovation and structural transformation. In premodern times technological inventions were based on the experience of farmers and craftsmen. The rate of technological innovation was slow and structural transformation was unperceivable. Most people at that time lived on subsistence agriculture, and only a few of them were
ruling class, warriors, and craftsmen. With a large population, China naturally had a large number of farmers and craftsmen and thus enjoyed certain advantages in invention and technological innovation. What’s more, China had a relatively advanced market system and upheld Confucian philosophy and a civil service examination system, which improved resource allocation, allowed social mobility, and facilitated national unity. That is why China led the world in many aspects for a very long period.

In the fifteenth century the Scientific Revolution in the West was characterized by mathematics and controlled experiments, in time leading to the Industrial Revolution in the mid-eighteenth century. When scientific experiment became the basis of invention, technological development in western countries accelerated at an amazing pace, as did their structural transformation and economic development. Many countries in Africa, Asia, and Latin America, defeated in conflicts, were reduced to colonies of western powers and left far behind.

The civil service examination system, based on Confucian classics, repressed Chinese intellectuals’ incentives to learn mathematics and how to conduct controlled experiments, so a scientific and industrial revolution could not take place spontaneously in China. Within decades after the onset of the Industrial Revolution, China was no longer a leader in technological and economic development – but was instead left behind. After the Opium War in 1840 China suffered repeated humiliations by western powers, and its national sovereignty faced lethal challenges.

Under the influence of Confucianism, China’s intellectuals regarded national prosperity as their responsibility, and generations of social elites and patriots strived unremittingly for national salvation. But it was not until the founding of the People’s Republic of China in 1949, or actually not until the reform and opening program started in late 1978, that China began to change its course of poverty and backwardness.
After World War I nationalist movements surged around the world and after World War II the former colonies in Africa, Asia, and Latin America won their independence one after another. As in China, these newly independent countries, under the leadership of their first generation of revolutionaries, began to pursue modernization guided by the then-mainstream theories, hoping to build up advanced capital-intensive industries on their agrarian base. The priority industries went against their countries’ comparative advantages and were not viable in open, competitive markets. The establishment of those industries and their continued operation relied on government protection and subsidies through various distortions to the market system. Despite the tireless efforts of a generation or two, economies stagnated, social and political crises broke out, and the gap with the developed world in per capita income grew even wider. By the end of the 1970s only a couple of East Asian economies succeeded in catching up with the developed countries.

In the 1950s and 1960s the international academic community criticized the market-based, export-oriented development strategy that the governments of East Asian economies adopted. The same thing happened when China initiated its reforms in the late 1970s. China’s reform and opening program embarked on a gradualist dual-track approach. On the one hand, the government continued to provide necessary protections to the state-owned firms in old priority sectors, and on the other hand, it liberalized the private enterprises’ entry to the new labor-intensive sectors, which were consistent with China’s comparative advantage. From day one the policies elicited widespread skepticism in international academic circles. But against a wave of criticism China’s economy notched up one amazing achievement after another, producing the “China miracle,” with thirty consecutive years of rapid growth.

When China initiated its reform and opening in the late 1970s, other developing countries, in both socialist and non-socialist camps, were also undergoing various reforms, guided by the then-prevalent
Washington Consensus. Despite much effort, the growth rates of these economies were lower than those before the reform era. Many of them ended up in economic collapse and long-term stagnation.

This experience shows that there was no good theory to guide developing and transition countries in promoting their economic, social, cultural, and political development and transformation – and to realize modernization quickly and soundly. Why might this be?

Theories proposed by social scientists are usually based on phenomena in the countries they are from. Take economics. Since Adam Smith published *The Wealth of Nations* in 1776, laying a foundation for modern economics, the prevalent economic theories have been proposed mainly by economists from developed countries, interpreting the phenomena and resolving the problems of developed countries. But the opportunities and challenges facing developed countries differ from those of developing countries. So the theories tailored for the former are not necessarily applicable to the latter. And because the socioeconomic conditions and problems in developed countries are constantly evolving, their dominant theories changed from time to time. So, when attempting to adopt theories from developed countries to guide their policies, developing countries may be at a loss about which one to pick. Even if they select one, the theory may not fit their conditions.

Social science is by nature a simple logical system of causes and effects. Whether the theory is applicable to a country depends on whether the basic assumptions of the theory align with the socioeconomic conditions in that country. Usually only the scholars in that country have a good understanding of its history, culture, and realities – and thus can find the key variables among complex socioeconomic conditions and build a simple logical system capable of explaining the causes of problems and predicting the effects of actions in their countries.

The intellectuals in China and other developing countries should thus deepen the understanding of their own countries in all aspects,
including in political, economic, and other social dimensions. Through that they may creatively construct a theoretical framework capturing the nature, challenges, and opportunities of their countries’ modernization. This book is an attempt in that direction. By demystifying China’s successes and failures, I hope the book will shed light on China’s as well as other developing countries’ future development.

Justin Yifu Lin