

Comments on “Demographic Changes and Social Security Sustainability in China”

Presented by Dr. GONG Sen, China Center for International Knowledge on Development

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Major Demographic Indicators of China

	Unit	2015	2020 (Target)	2030 (Target)
Total population	Million people	1,375	1,420	1,450
Total fertility rate		1.5-1.6	1.8	1.8
Sex ratio at birth		113.5	≤112	107
Share of population aged 60 years and over	%	16.1	-	25
Life expectancy	Years	76.3	77.3	79
Average years of schooling of working-age population	Years	10.23	10.8	11.8
Urban population's share of total population	%	56.1	60	70

Source: State Council, "National Population Development Plan for 2016-2030," January 2017.

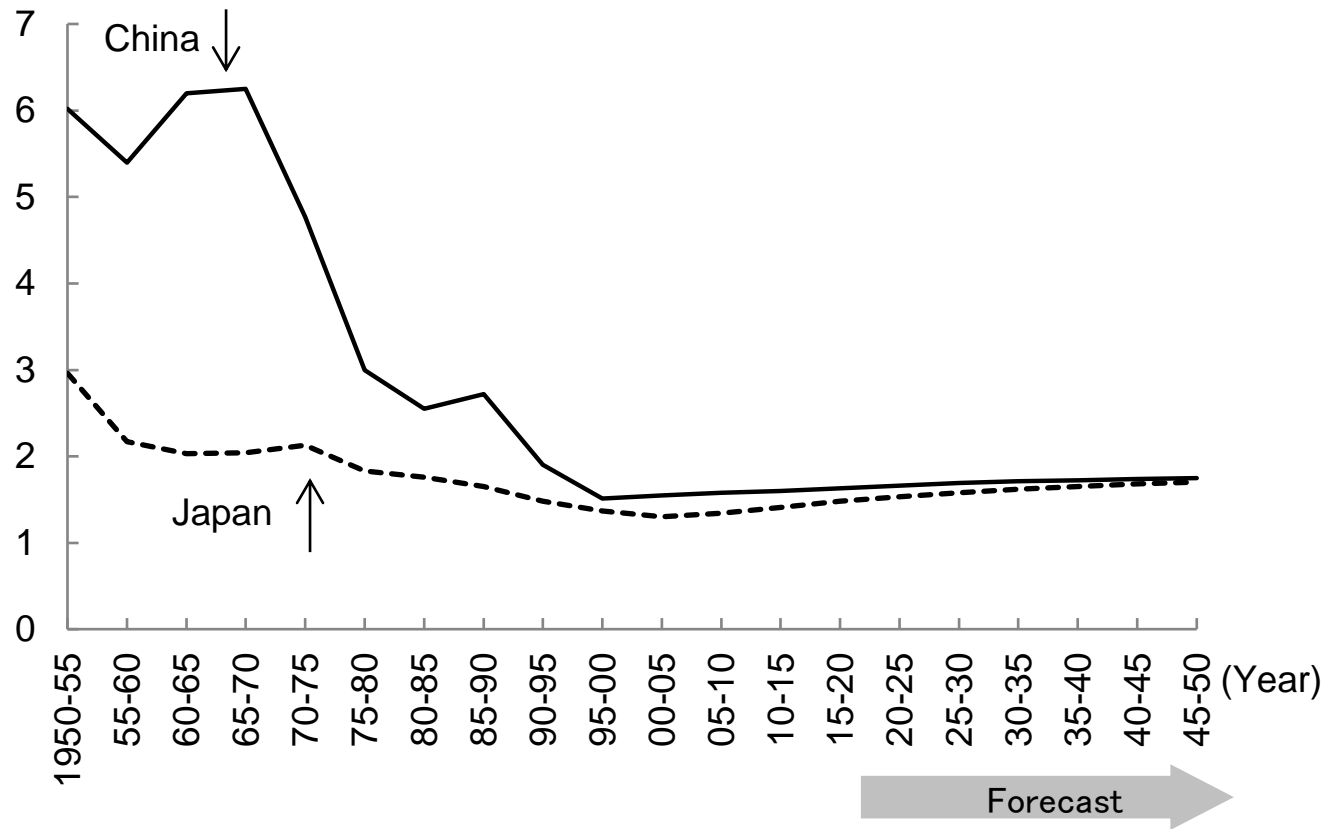
Growth Rates of Total Population and Working-age Population in China



Note: Average over 5 years.

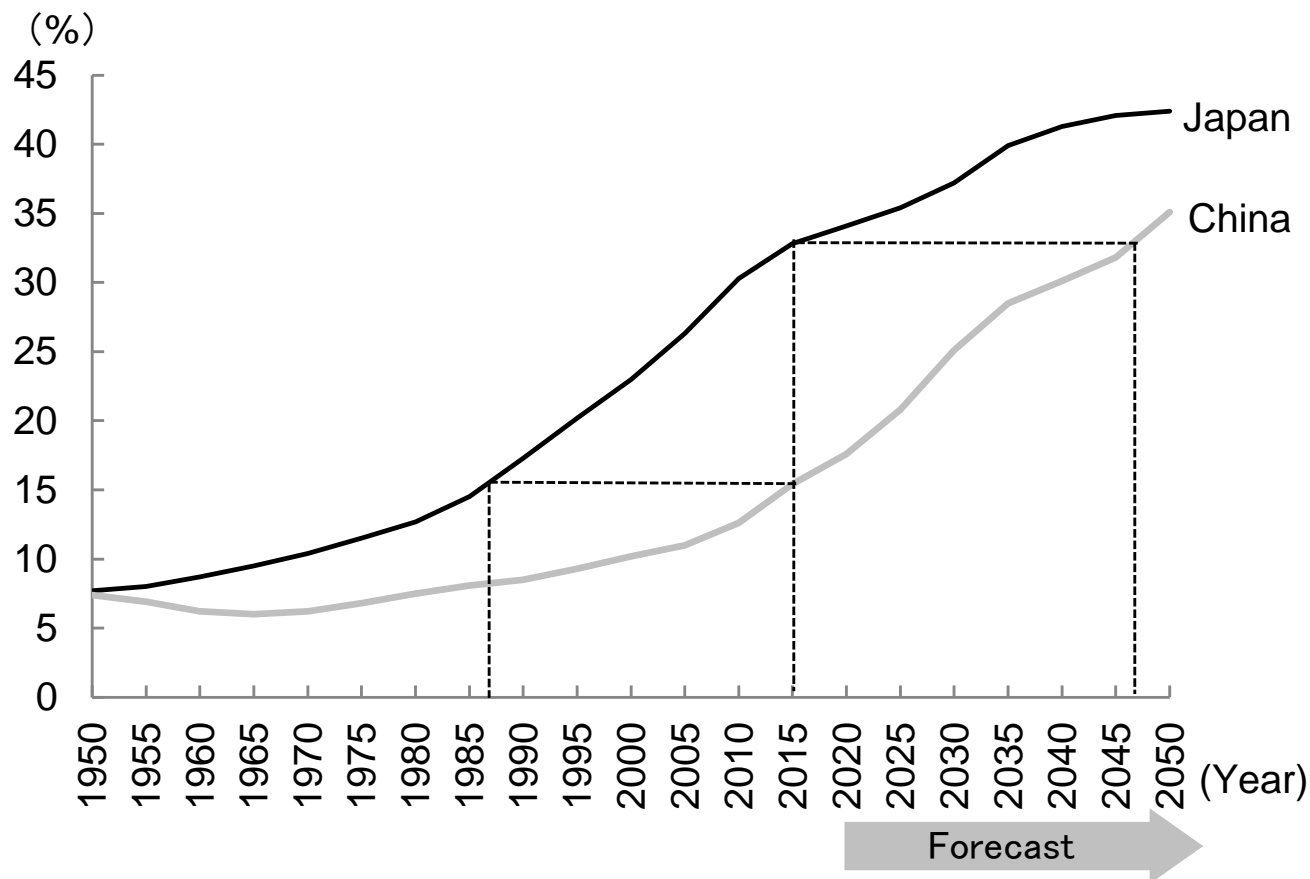
Source: Compiled by Nomura Institute of Capital Markets Research based on United Nations, *World Population Prospects: The 2017 Revision*.

Total Fertility Rate - Comparison between China and Japan



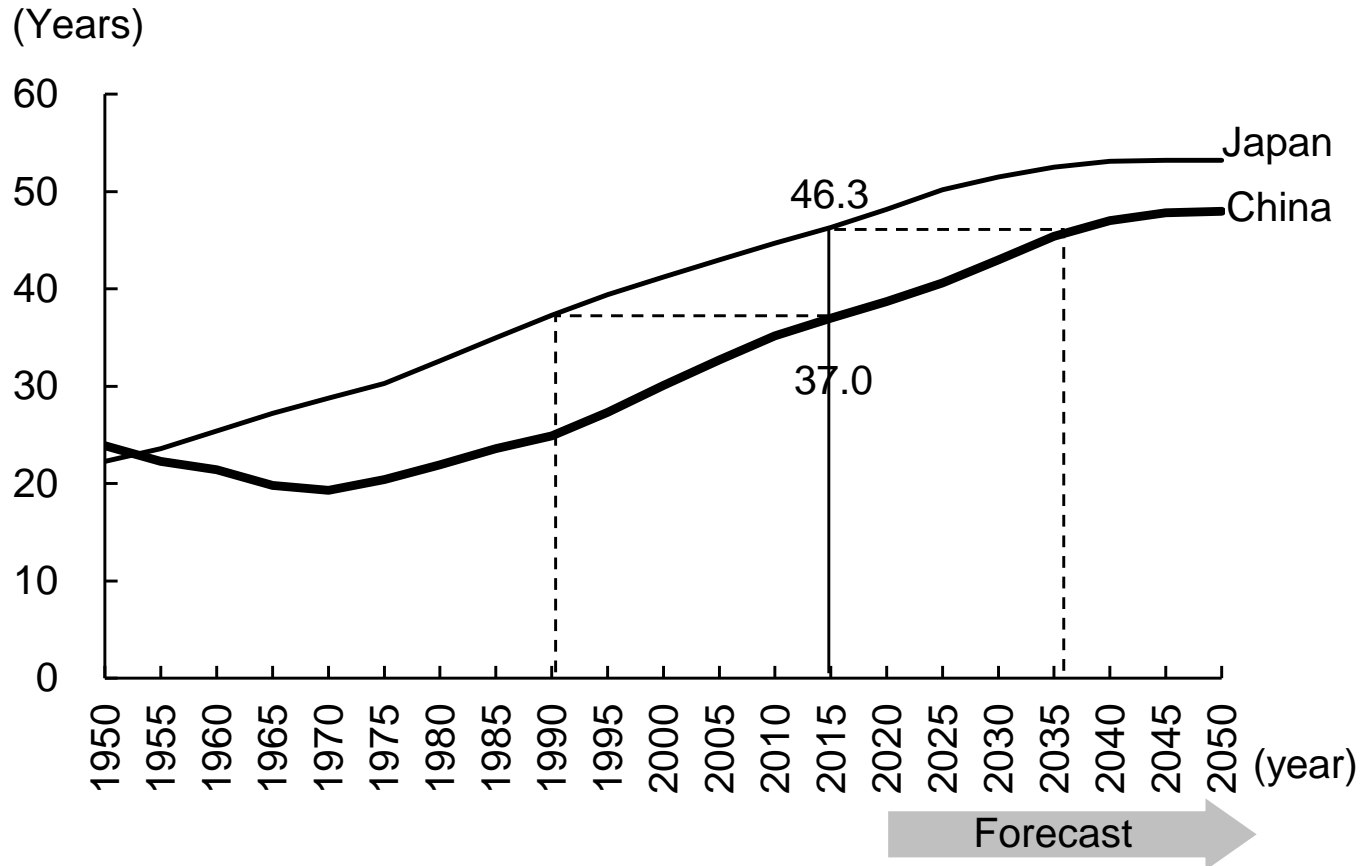
Source: Compiled by Nomura Institute of Capital Markets Research based on United Nations, *World Population prospects: The 2017 Revision*.

Share of Population Aged 60 Years and Over - Comparison between China and Japan



Source: Compiled by Nomura Institute of Capital Markets Research based on United Nations, *World Population prospects: The 2017 Revision*.

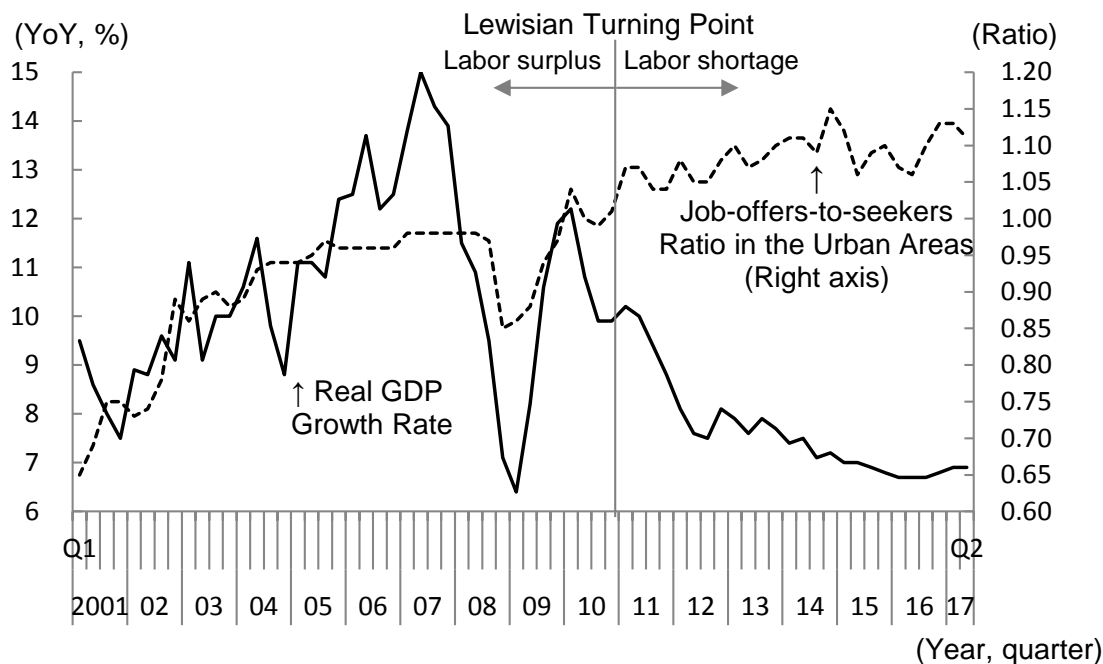
Median Age of the Total Population - Comparison between China and Japan



Source: Compiled by Nomura Institute of Capital Markets Research based on United Nations, *World Population prospects: The 2017 Revision*.

Changes in the Labor Market Suggest a Fall in the Potential Growth Rate

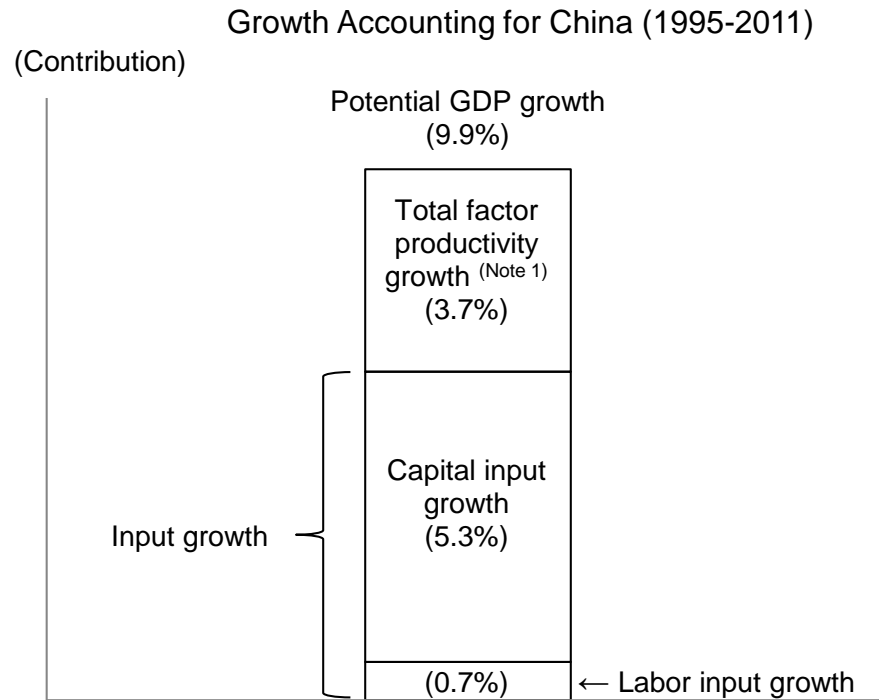
Economic Growth and Job-Offers-to-Seekers Ratio in Urban Areas



- Despite a sharp fall in the economic growth rate, the labor market has remained tight.
- The job-offers-to-seekers ratio has followed an upward trend since 2009 and stayed at a high level.
- The job-offers-to-seekers ratio has diverged sharply from the economic growth rate, suggesting that the economy may have arrived at the Lewisian turning point where surplus labor in rural areas has dried up.
- Coupled with the decline in working-age population, the potential growth rate has fallen sharply.

Note: The job offers-to-seekers ratio shown above is calculated by dividing the number of job offers by that of job seekers registered in public employment services organizations in approximately 100 cities in China.
 Source: Compiled by Nomura Institute of Capital Markets Research based on data provided by the National Bureau of Statistics of China and the Ministry of Human Resources and Social Security.

Factors Contributing to the Decline in China's Potential Growth Rate



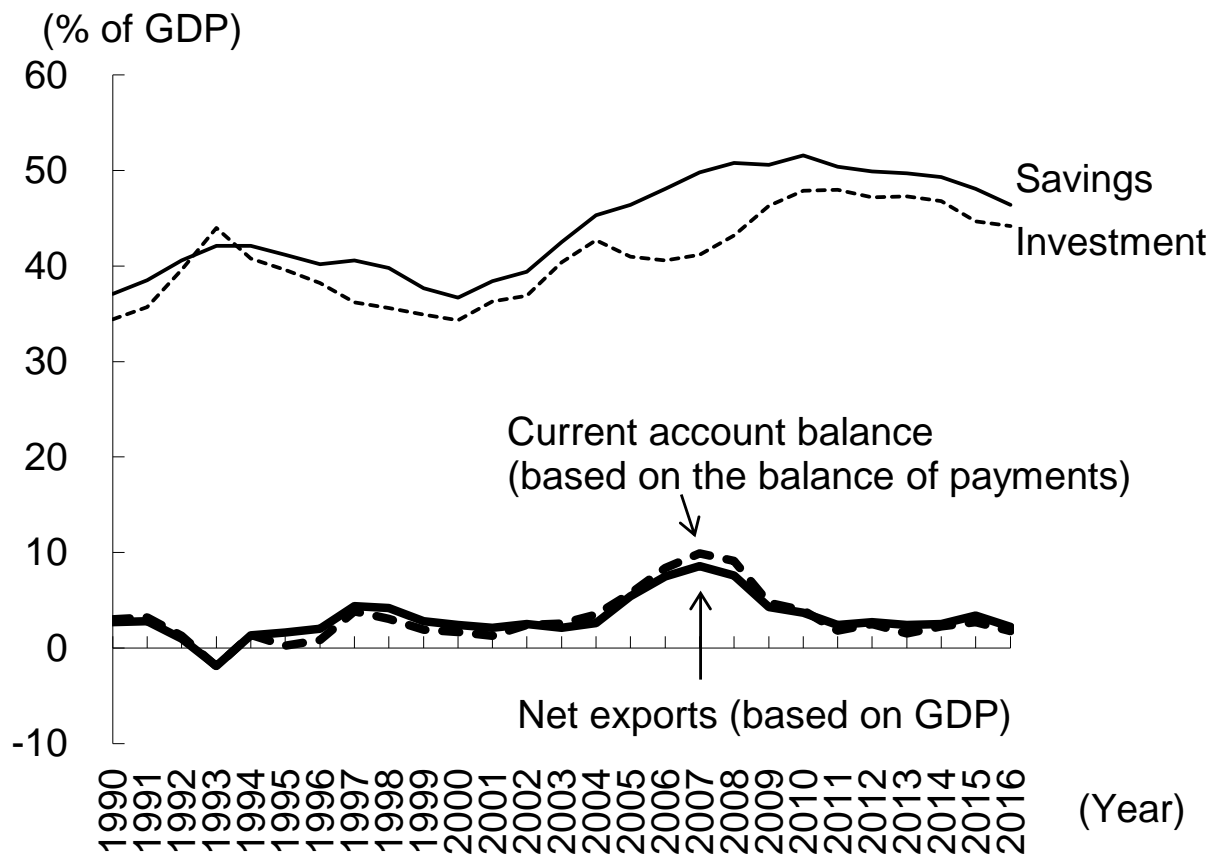
Notes: 1) Contribution of total factor productivity growth includes contribution from human capital growth.

2) Components do not add to 9.9% due to rounding.

Source: Compiled by Nomura Institute of Capital Markets Research based on Kuijs, Louis, "China's Economic Growth Pattern and Strategy," Paper prepared for the Nomura Foundation Macro Research Conference on "China's Transition and the Global Economy," November 13, 2012, Tokyo.

- The contribution of labor input is turning negative as working-age population declines and the pool of surplus labor in rural areas dries up.
- The contribution of capital input should be suppressed by a lower savings rate.
- The one-child policy has been relaxed, but the effect is expected to be limited.
- Since the traditional growth pattern based on expanding inputs is no longer sustainable, China needs to shift to a new one based on productivity growth.

Changes in the Current Account of China Based on the Balance of Savings and Investment



Source: Compiled by Nomura Institute of Capital Markets Research based on the China Statistical Abstract 2017 of the National Bureau of Statistics of China.

- Innovation
 - Strengthen protection of intellectual property rights
 - Turn brain drain into brain gain
 - Support startup businesses
 - Guarantee the free flow of information
- Industrial upgrading
 - Promote new industries instead of protecting old ones
 - Promote inflow of foreign direct investment
 - Promote free trade (through regional trade agreements) so that Chinese companies can export from headquarters
 - Enhance mobility of factors of production, particularly labor and land
- Ownership reform
 - Privatize state-owned enterprises
 - Allow zombie companies (mostly state-owned) to go bankrupt
 - Lower entry barriers for non-state-own enterprises
 - Strengthen protection of private property

Changes in the Number of Chinese Students Going Abroad to Study and Returning Home

Year	Number of Students Leaving to Study Overseas (a)	Number of Students Returning from Overseas Study (b)	Ratio of Outgoing to Returning Students (%) (b)/(a)
2001	83,973	12,243	14.6
2002	125,179	17,945	14.3
2003	117,307	20,152	17.2
2004	114,682	24,726	21.6
2005	118,515	34,987	29.5
2006	134,000	42,000	31.3
2007	144,000	44,000	30.6
2008	179,800	69,300	38.5
2009	229,300	108,300	47.2
2010	284,700	134,800	47.3
2011	339,700	186,200	54.8
2012	399,600	272,900	68.3
2013	413,900	353,500	85.4
2014	459,800	364,800	79.3
2015	523,700	409,100	78.1
2016	544,500	432,500	79.4

Source: Compiled by Nomura Institute of Capital Markets Research based on data from Ministry of Education of the People's Republic of China.

Comparison between China's Two Major Pension Schemes (2015)

		Old-age Insurance for Employees	Old-age Insurance for Residents
Revenues	Billion yuan	2,655.4	287.9
State subsidies	Billion yuan	389.3	204.4
Expenditures	Billion yuan	2,309.2	213.5
No. of participants	Million people	331.23	504.72
No. of pensioners	Million people	85.37	148.00
Expenditures/No. of pensioners	Yuan	27,049	1,443
State subsidies/No. of pensioners	Yuan	4,560	1,381

Source: Table 1 of GONG and Ministry of Human Resources and Social Security of the People's Republic of China.

Towards a More Sustainable Social Security System

■ Author's proposal

- Gradually raise retirement ages and reverse incentive for early retirement
- Raise female labor participation rate
 - Equalize retirement age for both men and women
 - -Improve childcare and elderly care
- Shift welfare development from expansion to prioritization
 - Focus more on human capital accumulation, which has to do with education and healthcare

■ Further suggestions

- Use the proceeds from selling state-owned stocks (privatization) to provide additional funding for pensions
- Shift public spending from building infrastructure to social services
 - Given very large income disparities in China, more emphasis should be placed on equity than on efficiency when formulating economic policy.
 - In addition to education and healthcare, priority should be put on pensions (particularly for peasants), housing (particularly for migrant workers), and environmental protection.



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Books in Japanese	<i>The New Normal of the Chinese Economy</i> , Nikkei Publishing Inc. 2015. <i>China Facing Two Traps</i> , Nikkei Publishing Inc., 2013. <i>China as Number 1</i> , Toyo-keizai Shimposha, 2009. <i>Economists Who Changed China</i> , Toyo-keizai Shimposha, 2007. <i>Japan-China Relations - A Win-win Game</i> , Toyo-keizai Shimposha, 2005. <i>China's Economic Reform - The Last Lap</i> , Nihon-keizai Shimbunsha, 2005. <i>Dilemma Facing the Chinese Economy</i> , Chikuma Shobo, 2005.
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