

Private (Occupational) Pensions in China

A Note on Recent Developments

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China, as the most populous country in the world, is ageing rapidly. Against the background of dramatic demographic changes in this century, China's current pension system is badly structured, and not able to cope with the rapid ageing population. The Chinese government is well aware of this issue, and has been working hard to solve it by initiating a range of structural pension reforms. The most important one, i.e. a multi-pillar system, started in 1997, which was largely influenced by recommendations from the World Bank. In this paper, we focus on the second pillar of the newly established system. We first briefly review recent development in employer sponsored occupational pensions in China. Then, we argue that in order to stimulate growth of occupational pensions, a number of issues should be addressed. Firstly, we argue that whether to choose DC or DB schemes depends on characteristics specific to the firms. A firm with many young workers might find DC schemes appropriate, and vice versa. Secondly, in terms of pension fund investment, a diversified portfolio is justified, in that it reduces risk for a given level of return. In addition, any quantitative restriction on investment in some assets is inappropriate. Last, it is a good start to give employer contributions some taxation benefits in China's occupational pensions. In order to maximise the beneficial impacts, however, such benefit should be extended to employee contributions, and should not be limited to some provinces only.

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I Introduction

China, as the most populous country in the world, is ageing rapidly. Forecasting statistics [UN 2004]¹ estimate that the 65+/total population ratio will be 16 per cent in 2030 and 24 per cent in 2050, increased from 7.3 per cent in 2003. Similar to other countries [Hu 2005a] the rise in old age dependency ratios in China is mainly due to two factors, i.e. an increasing life expectancy and a decreasing fertility rate [Munnell 2004]. Over the past four decades, Chinese life expectancy has risen from 36 years in 1960 to 71 years in 2003. In addition, on average each woman had 1.88 babies in 2003,² which fell from 3.39 in 1960. The large drop in the fertility rate can be explained by the “one child per couple” family planning policy which commenced in the late 1970s.

Against the background of dramatic demographic changes in this century, China's current pension system is badly structured, and not able to cope with the rapid ageing population. The Chinese government is well aware of this issue, and has been

working hard to solve it by initiating a range of structural pension reforms (MOLSS 2005]. Among others, the most important reform started in 1997, when the authorities released the milestone regulation, i.e. *State Council Document No. 26 Establishment of a Unified Basic Pension System for Enterprise Employees*. The regulation - largely influenced by recommendations from the World Bank [Friedman et al 1996 and World Bank 1997], requires the establishment of a multi-pillar system across the country. The first pillar is a pay-as-you-go (PAYG) component, the second pillar is an occupational pension component, while the third pillar is voluntary and involves employees/personal savings only. Given the scope of this paper, we will discuss the second pillar only, and interested readers might refer to other papers [Feldstein 1998; Asher and Newman 2000; Hu 2005b] for more details about the Chinese pension system.

II Occupational Pensions

II.1 General background

Over the past two decades, the Chinese pension system has witnessed new developments as the pension reform gathers pace. One of those recent developments is related to growth of the supplementary 2nd pillar, i.e. occupational pensions. First introduced in 1991, China's occupational pension industry was underdeveloped in terms of member participation and pension asset accumulation in the 1990s. In 2004, the Ministry of Labour and Social Security of China [MOLSS 2004] published the *Provisional Regulations on the Occupational Pensions*. The Regulations is the first of this kind, detailing operational coverage, fund resources etc. For example, based on the Regulations, enterprise contributions should not exceed 1/12 of the total wage bill, and collectively enterprises and individuals should not contribute over 1/6 of the total wage bill. Meanwhile, as participation incentives, employer contributions - up to 4 per cent of the total wage bill - are allowed to be deducted before tax. All contributions are credited to individual accounts and these accounts are fully funded. In addition, sponsoring enterprises should set up a committee overseeing the operation of pension funds, and the committees have representatives from employees and/or plan participants.

Given the importance of pension fund management and regulation [MOLSS 2004], another regulation, specifically focused on the occupational pension funds, was released in late 2004. It specifies the minimum requirements for qualified asset managers which are willing to manage pension assets. For example, registered capital should not be less than RMB 10bn, and during the past three years there should not be any malpractice or illegal behaviour. Regarding investment regulations, quantitative restrictions apply. The upper limit on investment in bank deposits and fixed-income securities is 50 per cent of the total assets, but the lower limit on government bond investment is 20 per cent. The investment limit on shares is maximum 20 per cent of the total assets. Like regulations on other domestic pension funds in China, investment in foreign assets and alternative assets, e.g. hedge funds is not allowed.

In addition, the provisional regulations note that the annuities assets should be fully funded, and assets accumulated in the accounts belong to the beneficiaries. The choice of DC³ and DB⁴ schemes, however, is left with individual employers to decide.

Extensive research has been conducted on the differences between DC and DB plans [Baker 2005; Clark and Hu 2005a]. In line with the global trend of declining DB occupational plans, e.g. the US [Munnell 2006], and the UK [Clark and Hu 2005b], employers in China mainly provide DC plans to the members [Tuo and Zhu 2005]. This popularity of DC plans is largely due to the low risk advantage of DC plans from the point of view of employers. In other words, most risk, principally investment risk, is borne by the DC plan members, and employers have no further obligations beyond their periodic contributions.

Despite the sluggish development in the 1990s, since 2000, however, China's annuities market has started growing, largely owing to the governmental efforts. Statistics show that, as of 2002, occupational pension schemes were established in 17,000 enterprises, with 89 million participants, and RMB26 billion assets [Zhong 2004]. Regarding industry distribution, around $\frac{3}{4}$ of the total assets are accumulated within a handful of monopolistic industries, e.g. railways, telecommunications. It is consistent with the Provisional regulations noted above, in that those industries are very profitable and thus more likely, and able to contribute more, besides the basic pensions, by participating in occupational pensions. Regarding geographical distribution, most assets are concentrated in affluent coastal regions, e.g. Shanghai, Guangdong, which again is due to the better financial position in these areas.

II.2 Case study – Shanghai and Shenzhen Annuities Management Centres

In addition, in order to facilitate the development of China's occupational pensions, the Annuities Management Centre (AMC) has been established across the country since 1997, when the authorities started to create a national multi-pillar pension system in China. The AMC serves as the supervisory agency, overseeing operation and management of the occupational pensions at the municipal level. Among the hundred AMCs established in China, two have attracted a great deal of attention from the public, given their active participation in China's stock market; they are Shanghai AMC and Shenzhen AMC. As of November 2004, occupational pension schemes were established in 770 enterprises in Shenzhen, with 56,000 members and RMB 1.4bn assets [SZPF 2005]. Based on the investment regulations, the annuities assets should be invested in treasury bills, government bonds, monetary market or other low return but safe assets. Since the publication of the provisional regulations on occupational pensions in May 2004, however, the annuities assets have been encouraged to invest in equities, aiming to achieve a high return. Tables 1a and 1b give detailed information about those shares the SZAMC (Shenzhen Annuities Management Centre) invested in and was also among the 10 largest shareholders⁵ as of 2004. Table 1a shows that seven shares meet the criteria. Among them, the SZAMC was the 2nd largest shareholder in terms of tradable shares for Taiyi Technology, and the 9th largest for Jinan Steel. In terms of the stock market capitalisation, as of 2004 the total value was RMB17.9 million, which was around 1/100 of the total 1.4bn assets. It is worth noting that most AMCs in China always entrust their assets to external professional asset managers, and they do not conduct in-door investment.

Table 1a: Stock investment by SZAMC*, 2004

Name	Ranking of SZAMC as the largest shareholders	No. of share held (million)	Stock market capitalisation (RMB** million)
Lu Tian Hua	10	0.8	5.3
Jinan Steel	9	0.8	5.1
New Zhongji	4	0.1	1.1
Taiyi Technology	2	0.2	1.0
Jilin Shengong	7	0.2	1.1
Tengda Construction	5	0.2	1.1
Antai Group	7	0.4	3.2

Source: www.hexun.com; *, Shenzhen Annuities Management Centre; **, RMB, Chinese currency.

Table 1b: Summary of stock investment by SHAMC*,2004

Name	Ranking of SZAMC as the largest shareholders	No. of share held (million)	Stock market capitalisation (RMB** million)
Min	2	0.1	1.0
Mean	6	0.4	2.6
Median	7	0.2	1.1
Max	10	0.8	5.3
Total	n.a.	2.6	17.9

Source: www.hexun.com; *, Shenzhen Annuities Management Centre; **, RMB, Chinese currency.

When turning to the Shanghai Annuities Management Centre (SHAMC), it is found in Table 2a that the SHAMC served as the top 10 shareholder for 17 listed companies in China. For example, for Rocket Ltd, the SHAMC was the largest shareholder in terms of tradable shares. Correspondingly, the stock market capitalisation of these shares was RMB136.5 million. In addition, as shown in Table 2b, on average, the SHAMC was the 6th largest shareholder, while the average number of shares held by the SHAMC was 4 million. Meanwhile, the total value of shares approximated RMB432.7 million, while the minimum value was RMB2.1 million which is related to Taihang Shuini as shown in Table 2a.

Overall, as of 2004, the total amount of assets allocated to equities by these two centres was around RMB450 million, and the total number of shares held by these two centres was 67 millions. In addition, it is noticed that SHAMC and SZAMC have actively taken part in buying and selling of 24 shares in China, in that they were among the top 10 shareholders as of 2004. In terms of the shareholding structure, on average, the annuities funds were the sixth largest shareholders concerning the tradable shares. Given that there were 1,377 listed shares in China's two stock markets (Shanghai Stock Exchange and Shenzhen Stock Exchange), we can say that SHAMC and SZAMC, as newly established institutional investors in China, has

started imposing their influences in the stock market, which to some extent reflects the start of corporate engagement by pension funds in China [Clark 2000; Hu 2005b].

Table 2a: Stock investment by SHAMC*,2004

Listed company	Ranking of SHAMC as the largest shareholders	No of shares held (million)	Stock market capitalisation (RMB** million)
Galaxy Technology	8	1.9	13.2
Chengxing Ltd.	10	2.1	11.5
Zhuhai Zhongfu	10	2.3	11.4
Standard Ltd	5	1.7	13.0
Yueyang Paper	6	0.4	2.7
Zhongda Ltd	6	1.6	9.3
Huawei Electronics	10	0.9	9.3
Pian Zi Huang	10	0.2	2.3
Rocket Ltd	1	12.6	136.5
Taji Group	2	3.2	24.6
Shanghai Jinling	3	3.5	18.2
Taihang Shuini	1	0.6	2.1
Shenghua Paike	8	1.0	5.9
Dongfeng Car	2	24.9	119.3
Minsheng Bank	10	6.8	45.2
Bohui Paper	9	0.8	8.2

Source: www.hexun.com; *, Shanghai Annuities Management Centre; **, RMB, Chinese currency.

Table 2b: Summary of stock investment by SHAMC*,2004

	Ranking of SHAMC as the largest shareholders	No. of share held (million)	Stock market capitalisation (RMB** million)
Min	1	0.2	2.1
Mean	6	4.0	27.0
Median	7	1.8	11.4
Max	10	24.9	136.5
Total	n.a.	64.3	432.7

Source: www.hexun.com; *, Shanghai Annuities Management Centre; **, RMB, Chinese currency.

III Policy Recommendations

In this section, based on previous review, we will talk about three issues relating to occupational pensions in China, i.e. the choice between DC and DB schemes, pension fund investment and taxation incentives. Firstly, as noted in Section II.1, occupational pensions are required to be fully funded by the regulations. The choice between DC and DB schemes, however, is left with sponsors to decide. Currently, most employers in China provide DC schemes to the members. Given that the stock market in China is

very volatile [Hu 2005b], there is such a concern that if a large volume of annuities assets are invested in domestic equities, the plan members might end up with taking on excessive risk. Meanwhile, under the DC regime, sponsors have low incentives to optimise returns [Davis 2004]. As a result, any shortfall might have to be met by the nation state if the occupational schemes cannot deliver sufficient supplementary income to avoid pensioner poverty and income inequality [Clark and Hu 2005b]. To solve this issue, one way is to encourage employers to provide DB plans. In this case, most risk is transferred to sponsors, and the members are guaranteed a certain level of benefits.

Another relevant argument is that whether to provide DC or DB schemes depends on characteristics specific to the firms. If the firms mainly consist of young workers, it is advisable to have DC schemes implemented, in that such schemes are fully portable, therefore young workers' job movement across different regions and pension schemes is not restricted. In contrast, DB schemes reward those workers who work longer in the same firm. Thus, if a firm wants to retain those high-skilled workers, it might be better to consider DB schemes. Meanwhile, if a firm's labour force mainly consists of old workers, e.g. older than 40 years, DB schemes are recommended in that those workers are highly risk averse and thus find DB schemes safer than DC schemes. According to this classification, firms in those industries, e.g. mining, should adopt DB schemes, while those joint ventures⁶ in coastal regions in China might find DC schemes more appropriate.

Secondly, due to the short history of China's occupational pensions, annuities assets' investment is very conservative. Until last year, i.e. 2004, all assets were required to be invested in government bonds, monetary market and other low risk assets only. Meanwhile, pension fund investment in China is always subject to some quantitative restrictions, e.g. a minimum percentage of the total assets should be invested in government bonds. Foreign investment and other alternative investment, e.g. hedge funds, are prohibited. It is sensible to protect pension funds from risky investment. However, excessive allocation of funds on low return and risk assets is not justified from the financial perspective. Davis (2005) and Hu (2005c) argue that in order to diversify pension fund portfolio's risk and achieve a relatively high return, international investment should be considered. The underlying reasoning for the global portfolio is that the markets of the world do not move in the same direction, so a downturn in one country can be offset by a rise in another country, which reflects the typical phenomenon of varying business cycles across countries.

Given this argument, it is recommended that China's pension assets should be allowed to invest abroad, and any quantitative restriction on pension fund investment, if applicable, should be erased. This policy change, we argue, could be achieved in two phases. In the short term, international markets should be used as soon as possible, since the longer the funds stay in domestic markets, the riskier and lower returns achieved. At the same time, the quantitative restrictions on low risk assets, i.e. bank deposits and government bonds should be gradually eased. But investment limit on domestic stocks and other high risk assets is still justified in that current stock market in China is very risky, and once described as "a big casino" by a renowned economist [Wu 2001]. The process of developing efficiency might take a long time given the structural weaknesses associated with Chinese stock. In the long term, however, when Chinese financial markets become more developed, the final objective

is to apply the prudent person rules in the Chinese pension fund investment industry, i.e. there is no any quantitative investment restriction, and fund managers invest those funds as they would their own personal assets.

The third issue we consider in this section is relating to taxation incentives. A significant element in government commitment to private pension provision has been tax relief on employee and employer contributions to certified pension plans [Clark and Hu 2005a]. In the main, this means that tax on gross income is paid net of pension contributions. In effect, particularly for higher income workers, this policy reduces their taxable income and shifts the tax burden on pension contributions far into the future upon receipt of deferred income as paid retirement income. Likewise, employers benefit from making contributions on behalf of their employees discounting taxable gross profit up to limit set in statute and by government regulation.

As noted in Section II.1, however, only employers are allowed to deduct up to 4 per cent of the total wage bill from gross income in China. Regarding employee contributions, there is no any relevant taxation incentive, i.e. their contributions are paid from net income. Therefore, in order to encourage members' participation, it is better to allow employees to deduct a pre-determined portion of their income from gross income, like the 401(K) scheme in the US. Meanwhile, such taxation incentive regulation is only applicable in a number of provinces in China for the time being. Hence, such regulation should be extended to other parts of China, so as to maximise the resultant benefits, e.g. the positive effects of pension assets growth on economic growth [Davis and Hu 2005, 2006; Hu 2005d].

IV Concluding Remarks

China is a relatively young country now, but about to undergo a remarkable demographic transformation in the near future. Despite foreseeable dramatic demographic changes, the current retirement system in China is badly structured, and not able to cope with the rapid ageing population in this century. In order to solve this critical issue, the authorities have initiated a number of pension reforms in China. The general move is the shift from the pay-as-you-go (PAYG) system to the multi-pillar system. In this paper, we briefly reviewed recent development of the second pillar, i.e. employer sponsored occupational pensions in China. The problems associated with this pillar include bias towards DC schemes, conservative asset investment and insufficient taxation incentives. To tackle the issues, we argued that whether to choice DC or DB schemes depends on characteristics specific to the firms. A firm with many young workers might find DC schemes appropriate, and vice versa. In terms of pension fund investment, a diversified portfolio is justified, in that it reduces risk for a given level of return. In addition, any quantitative restriction on investment in some assets is inappropriate. Last, it is a good start to give employer contributions some taxation benefits in China's occupational pensions. In order to maximise the beneficial impacts, however, such benefit should be extended to employee contributions, and should not be limited to some provinces only.

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Notes

¹Despite the adoption of the one-child policy in the late 1970s, many Chinese, mainly those in rural areas have managed to have more than one child. It is partly due to the relaxation of the policy in the countryside, and partly due to many Chinese families' willingness to pay the penalty, as long as they can have more children. In addition, the one-child policy does not apply to minority nationals in China. All these explain why as of 2003 on average each woman had more than one baby.

² A typical defined benefit (DB) plan is a plan which links the pension paid at retirement to a member's length of service and his/her final salary³. As its name suggests, the pension benefit is defined, and is not directly related to the returns on assets invested. In this context, any shortfall must be covered by the plan sponsors

³ Compared to the DB scheme, the defined contribution (DC) scheme is a conceptually simpler arrangement. For a typical DC scheme, both employees and employers make their respective contributions to employees' personal accounts. Herein, employers have no further obligations beyond their periodic contributions. Consequently, most of the risk borne by employers under the DB scheme is here assumed by the employees.

⁴ It is noted that in aggregate, around 2/3 of the shares in China's listed firms are not tradable, since they are controlled by the government. Hence, the shareholders in this paper refer to those who hold any of these 1/3 tradable shares in the stock market.

⁵ Thousands of joint ventures and foreign firms settle down in China's costal areas, and most workers are very young rural-urban migrants, i.e. the average age was 25.4 for female and 28.3 for male (Fan 2004). Those young and unskilled workers are always engaged in labour intensive work but paid low.