

OPTIONS FOR FINANCING ELDERLY CARE IN CHINA

Summary Paper¹

I. Background

The World Bank report “Options for Aged Care in China,” completed in FY18, describes the determinants of demand for aged care and identifies key building blocks for developing a sustainable, equitable, and efficient delivery system. The report covers such areas as regulatory oversight and quality assurance in the context of “commissioner-provider” relations in the provision of aged care services, the role of the private sector, the coordination and integration of services, issues for developing an aged care workforce, and initiatives and institutions for policy learning to better formulate aged care policies. The report concludes with a set of recommendations specific to China, prioritizing such areas as (i) urgently building-up government stewardship capacities and developing the relationship with private-sector providers, and (ii) extending long-term care financing in a systemic, yet sustainable way.

As the next step in supporting China in developing its aged care services, the World Bank has initiated a study, “Options for Aged Care Financing in China,” to be delivered in FY19. The outputs of this study are a collection of technical papers addressing various aspects of financing needs, approaches, and resources, including:

- Understanding China’s long-term care insurance pilots (Output 1)
- Willingness-to-pay for home- and community-based aged care services (Output 2)
- The opportunity cost of providing informal care borne by family caregivers (Output 3)

The study is part of the overall package of support to China for building its aged care system. It aims to deepen our understanding of the various aspects of financing aged care, following the path of “Options for Aged Care in China,” as well as two investment operations in Anhui and Guizhou provinces that were designed using that report’s findings and recommendations.² Going forward, the World Bank is about to embark on the preparation of a third investment operation, to be delivered in FY21, which is expected to extend the approaches applied in Anhui and Guizhou and develop a national platform for stewardship and financing of elderly care. At the same time, the World Bank is starting a comprehensive study on aging in China, which, among other things, will continue to look into the issues of financing, using forthcoming data from the implementation of the current investment projects.

This summary paper presents key findings and selected policy recommendations based on the findings of technical outputs mentioned above. Section II begins by stating the problem of providing affordable long-term care services for older people with functional limitations, and the challenges that China’s current financing model faces. These challenges include a lack of formal care for the middle-class, lack of involvement of the private sector, lack of mechanisms for government enforcement, too great a focus on the luxury end of the market, and too much focus on medical, rather than care, services. To address these issues, a new financing model is needed, one that supports the efficient delivery of quality services while providing for equitable access. Section III briefly summarizes international good practices in financing long-term care in OECD countries, while section IV explores the current situation in China and the links

¹ This paper is drafted by Elena Glinskaya, (Lead Economist, World Bank Group), Zhanlian Feng, (Senior Research Analyst, RTI International), Yang Huang (Economist, World Bank Group), and Dewen Wang (Senior Economist, World Bank Group).

²See Anhui Aged Care System Demonstration Project (P154716), <http://operationsportal.worldbank.org/secure/P154716/home> and Guizhou Aged Care System Development Program (P162349), <http://operationsportal.worldbank.org/secure/P162349/home>

between service delivery and financing. Section V presents the Chinese government's current policies regarding the public financing of elderly care, and section VI provides information about out-of-pocket payments in China. Section VII discusses future needs for formal elderly care in China and the economic cost of not meeting them. Section VIII concludes by offering a way forward, focusing on key points and observations emerging from the China's ongoing long-term care insurance (LTCI) pilots in 15 cities.

II. Stating the problem

Throughout the world, long-term care services are unaffordable without some third-party coverage for most older people with ADLs and IADLs (that is, who need help performing these basic tasks).³ For this reason, long-term care in developed countries is financed primarily through government or quasi-government programs. When public financing is not available, older people with ADLs and IADLs rely on family care or forgo care altogether. Both of these actions entail an economic cost, which is incurred through two main channels. First, without access to elderly care, public and private expenditures on medical care would rise. Those who need care would use more expensive medical care, either right away or in the future as the probability of injuries rises without access to social care. Consequently, there would be an increase in in-patient and out-patient admissions and hospital stays. In addition, family members who provide care would face an increase in the probability of physical and physiological illness, as a result of providing care without proper training and access to respite service. Thus, they themselves would require more prescription medications and medical services. Second, with quality elderly care unavailable, prime-aged adults with elderly family members needing care would be compelled to provide that care themselves, forgoing opportunities in the labor market, either by reducing the number of hours worked or dropping out of the labor force altogether.

In China, there is no social insurance for long term care or dedicated budgetary resources at the national level. Public financing for elderly care comes from the Public Welfare Lottery Fund (PWLF) and from local budgets, in roughly equal amounts, on average, Publicly-financed aged care services are granted to only the most disadvantaged elderly, the “three no’s” (*Sanwu*) and “three no’s-five guarantees” (*Wubao*).⁴ These services are mostly provided in public welfare homes, with local governments funding the capital and operating expenses. In the last few years, private providers of institutional care have started to develop rapidly, leading to a phase-out and halt in new construction of public homes. Private facilities receive a one-time construction subsidy of about USD 1,000 and an operating subsidy of approximately USD 40 per month. Public welfare homes are increasingly accepting self-paying elderly, and public facilities that are better equipped can offer an attractive array of services and maintain a waiting list of interested clients. There is little *functional ability* or *needs assessment* of self-paying customers (or anyone else) in either public or private institutions, and many institutions tend to admit elderly with low ADL and IADL needs to save on labor costs. The reimbursement system in public welfare homes operates on a per-capita basis, while private nursing homes (and public facilities with self-paying customers) largely charge on a “fee-for-

³ The terms “aged care” and “long-term care” are used interchangeably in this paper to refer to the range of services designed to support people who are unable to perform physical and cognitive functions. A person’s ability to perform these functions is measured through his or her capacity to carry out basic self-care or personal tasks, known as activities of daily living (ADLs) and instrumental activities of daily living (IADLs). ADLs are basic, self-care tasks performed daily, such as bathing, dressing, walking, and eating. IADLs are tasks essential for independent living, such as shopping, cooking, doing laundry, and managing finances. People may need long-term care due to disability, chronic conditions, trauma, or illness, which limit their ability to complete ADLs and IADLs on their own. A person’s ability to perform ADLs and IADLs is determined based on a functional ability assessment or needs assessment. (Genet et al., 2012).

⁴ The “three no’s” are the indigent poor, people who have no legal guardians to support them, have lost the ability to work, and have no clothing, housing, medical care, and burial expenses.

service” basis. Recently, localities have started developing home-based and community-based services by engaging private providers, offering subsidies for selected vulnerable groups. A typical subsidy comes from the local budget and is about USD 20 per month. Eligibility is determined locally, and the basket of services provided is determined locally as well, resulting in a wide variation in accessibility across the country. Vouchers or demand-side subsidies for care are not wide-spread. High-end facilities and services are also expanding rapidly.

There are a number of problems with the current financing model in China, including:

- With access enabled primarily by current eligibility for public financing or by ability to pay, it is predominantly the small numbers of the indigent poor and the affluent who have access to some form of care and services, leaving the middle class without access to formal care.
- Without broad-based effective demand, there is simply not enough interest from the private sector to invest in developing elderly care. The number of providers is far below what is needed and private providers that do operate find it difficult to expand their businesses, leading to shortages in the delivery system. Because the demand for elderly care is very price elastic, the effective demand is consequently far below the actual need. Households therefore forego elderly care or seek informal providers, and economies of scale in the production of elderly care services are not realized.
- Because the government (or a public agency) is not a purchaser for a broad segment of the population, it cannot be a price setter, and thus has few (if any) mechanisms for enforcing efficiency and quality among private providers. Market failures, such as information asymmetry, moral hazard, and consumers’ myopathy, mean competition does not drive prices to marginal cost, resulting in missing markets for social services and unaffordability for middle class consumers. Even high-end establishments do not have sufficient quality control, because the government lacks efficient enforcement tools.
- Private-sector interest is concentrated in the luxury segment of the market and in developing services for the able-bodied elderly, a practice known as “creaming the market.” Private investments are also more focused on funding residential developments than services.
- As hospitals and other providers offer services that are reimbursable by medical insurance, they focus on providing medical, rather than care services, driving up the cost of care services higher.
- Public welfare homes accept self-paying customers who enjoy public subsidies, but there are no criteria for determining the level of disability of these customers, leading to inefficiencies in service provision.

Because of these challenges, a new financing model needs to be developed to support the efficient delivery of quality services, with equitable access. The design of any financing model has three main elements: (i) the source of finance, (ii) rules defining eligible target groups and the type of care services provided, and (iii) a system of payment for the services provided, which is linked to the delivery system. This study focuses on the first and second elements of the financing model, attempting to understand ongoing trends and experiments in the context of current policies, as well as the determinants of private households’ willingness-to-pay. In addition, the study examines the future financing needs of formal elderly care as well as the opportunity cost of a lack of access to such care.

In examining the sources of financing, this study does not attempt to understand measures taking place to optimize existing financing for elderly care provided by the PWLF and local budgets. It also does not address issues of mobilizing resources for capital investments in aged care infrastructure, where the government sees the private sector, and especially SOEs, playing a major role. The study also does not elaborate on the system of payment for service provision, which is part of any financing system and is a key link between the financing and delivery systems. From a policy perspective, all of these areas are important and are expected to be included in the China-World Bank collaboration on aged care. They are

not covered here because of the limited scope of this study, and also because the data needed for these investigations are not readily available yet.⁵ It is proposed that these important areas of study are included as part of the forthcoming implementation of the investment projects in Anhui and especially Guizhou.

III. Brief summary of good international practices in financing long-term care

Approaches to financing and the amount spent on financing elderly care vary significantly across OECD countries. Historically, the amount of public financing for formal long-term care has largely depended on how much a society can rely on informal care. Factors that have a long-term impact on the need for elder care and expenditure levels include the ratio of elderly to the working-age population, disease prevention and health promotion, household structure, female labor participation, and migration patterns.

The main sources of financing for formal aged care services in OECD countries are general taxation, obligatory social security contributions, voluntary private insurance, and out-of-pocket payments directly made by users. At one extreme is universal coverage within a single program, in which long-term care is provided through a single system (as in tax-based models in Nordic countries; public long-term care insurance models in Germany, the Netherlands, Luxembourg, Japan, and Korea; and personal care and nursing care through health coverage in Belgium). At the other end of the spectrum are means-tested (that is, free for the poor or full payment for the well-off) safety-net schemes, in which strict income or asset tests are used to set financial thresholds for eligibility for publicly funded services, with benefits targeting the needy (as in England and the United States).

Table 1: Elements for designing a model of financing for aged care

Source of finance	<ul style="list-style-type: none"> • Tax-based (Nordic European countries) • Public, compulsory long-term care social insurance models (Germany, the Netherlands, Luxembourg, Japan, and Korea) • Co-payment by clients (a common requirement in many countries which may vary by care setting)
Eligible target group	<ul style="list-style-type: none"> • Level of needs according to <i>needs assessment</i>: <ul style="list-style-type: none"> ○ Universal coverage ○ Means-tested, based on strict income or asset tests to set financial thresholds for eligibility for publicly funded care
Forms of services	<ul style="list-style-type: none"> • Home care • Community care (day care centers) • Institutional (residential) care
Payment for service provision	<ul style="list-style-type: none"> • To eligible clients: cash payment or in-kind services, vouchers • To service providers: payment for time, services, or outcomes

Source: Authors, based on Colombo et al 2011.

As long-term care services are unaffordable without some third-party coverage for most people in the developed world, especially for older people with disabilities, the state plays an active role in financing. However, there are limits to taxpayers' willingness to contribute to the cost of long-term care through higher taxes. All countries with a public long-term care coverage scheme require some cost sharing by care recipients, especially for room and board in institutional settings (Colombo et al., 2011), regardless of the specific financing mechanisms used. For co-payments (out-of-pocket payments made directly to the

⁵ In addition, part of the resources of this AAA had to be deployed to respond to the request from the municipal government of Beijing to provide inputs into the Mid-term review of the implementation on the 13th FYP. The paper "13th Five Year Plan for economic and social development of Beijing - responding to population ageing" is provided as part of the package of outputs of this study.

provider), the purchasing power of clients is typically increased through transfers, such as cash benefits or vouchers. Co-payments can be fixed rates or means-tested.

Private payments on the part of care users are a general feature of all publicly financed care systems. Private financing accounts for one-third of total long-term care expenditure in Germany, around 26 percent in Slovenia, 22 percent in the United States (Kaiser Family Foundation, 2013), and 17 percent in Austria (European Commission 2014, based on the OECD Health Database and national sources). The most frequent form of private financing is out-of-pocket payments. Private insurance for elder care services is not very common, due to a range of limiting factors, including adverse selection, in which people at greater risk of needing care buy insurance, while people with “good risks” do not, making the pool consist of high-cost individuals and driving up premium prices for everyone. Another reason for a lack of development of private insurance for aged care is that such insurance is expensive and beyond the means of most people. Even if affordability is less of an issue, individuals tend to be myopic, and when they are young, they do not believe that they will need aged care in later years. Out-of-pocket payments are often capped; an upper limit (with annual adjustment) for individuals’ private contributions was introduced in the United Kingdom with the Care Act 2014.⁶ Two other important parameters of individuals’ financial capacity are whether their assets are considered for co-payment and whether their relatives are obliged to make financial contributions.

To determine eligibility, countries operating means-tested programs. Countries such as England, New Zealand, and the United States limit public benefits to people who are poor (usually a definition that takes into account both income and assets) or who become poor due to the high costs of medical and long-term care. The philosophical premise behind means-tested programs is that the primary responsibility for care of older people and younger people with disabilities rests with individuals and their family, and that government should act only as a payer of last resort for those unable to provide for themselves. Other countries (including Germany, Japan, the Netherlands, Sweden, and Korea) opt for universal coverage, following the philosophical approach that the government should take the lead in ensuring that all people with disabilities, regardless of financial status, should be eligible for the long-term care services they need. In this type of system, social solidarity is highly valued, and the right to long-term care is viewed similarly to the right to medical care.

Regardless of the financing model used, eligibility for public benefits requires meeting specified disability criteria based on a *needs assessment*. For publicly-financed services, governments tend to exercise a “gate-keeping” role to ensure that those services reach individuals with the most need and that they meet minimum quality standards. Otherwise, healthy individuals would also want to qualify for these services, since the package of aged care services typically includes services that are valued generally, such as housekeeping and meal preparation.

Spending levels also depend on the efficiency of the delivery system. Most countries have partly or totally contracted out aged care services to private non-profit or for-profit organizations. Few countries rely on public services. For historical reasons, spending levels also depend on the form or mix of publicly-funded services, which vary greatly across home, community, and institutional-care settings. Policies in many countries strive to transform care models from historically institutional to home and community-based care, as part of a deinstitutionalization movement. This is because institutional care is more expensive than care provided at home or in the community. Expenditure levels are contained by supporting informal caregivers and less cost-intensive home and community-based services.

In terms of payment systems, methods for paying providers include fixed or negotiated budgets or fee-for-services that are based on a per-unit time, number of visits, number of care packages, or care intensity.

⁶ Care Act 2014, <http://www.legislation.gov.uk/ukpga/2014/23/contents/enacted>.

Payment by results or outcomes is less frequent, but is a basic feature of social-impact bond models. As results or outcomes are difficult to measure, and adverse incentives should be avoided, a combination of payment by results and input or process indicators would be desirable. In many countries, publicly-supported long-term care is provided in the form of in-kind services rather than cash benefits, although there are notable exceptions, including Germany, Italy, Austria, and a few other countries. Public payments and subsidies for long-term care typically go to service providers rather than directly to care recipients.

As a result of these variations, spending levels for elder care services differ greatly among OECD countries. For medical and social care combined, public spending in EU countries ranges from 0.2 percent in Cyprus to 4.5 percent of GDP in Denmark, with an average of 1.8 percent. For social care alone, spending ranges from 0.02 percent of GDP in Latvia to 0.7 percent of GDP in the Netherlands (European Commission 2013, based on data from the 2012 Ageing Report). The northern and western European countries have higher shares of public financing. Expenditures for long-term care are relatively small compared to general health services and public pension systems.

Currently, the main challenge in most OECD countries is that needs and demands are increasing, while the availability of funds is decreasing. Due to changing demographics and labor market characteristics, the provision of informal care by family members is becoming a less-feasible option. Meanwhile, long-term care services are not affordable for the vast majority of people with disabilities and elderly people with lower income levels. As discussed earlier, private insurance for aged care is not well developed and too expensive for many. A mix of public and private financing is thus the rule, with the common principle that individuals contribute to the cost of care unless they cannot afford to do so, in which case the state pays.

Overall, there is no “silver bullet” to ensure sustainable financing of long-term care. Each of the approaches discussed here has advantages and disadvantages, as summarized in table 2. Any discussion of the sustainability of long-term care must also consider the need to influence the demand side (that is, the needs of an aging population), through prevention, rehabilitation, and adaptations to the living environment (European Commission, 2014).

Table 2: Advantages and disadvantages of financing approaches to aged care

Approach	Advantages	Disadvantages
Mandatory social insurance (Germany, South Korea, Japan)	Entitlement to benefit Affordable contribution (if income-related)	Limited tax base Rigidity in benefits awarded Implicit debt
Tax-based, universal systems	Broader tax base	No direct link between revenues and benefits Less transparency in benefit allocation Implicit debt
Private insurance	Theoretically neutral for the public budget	If voluntary: <ul style="list-style-type: none"> • Not affordable for people with low, insecure income • Adverse selection (If mandatory, may require subsidies for people with low incomes)

Source: European Commission, 2014

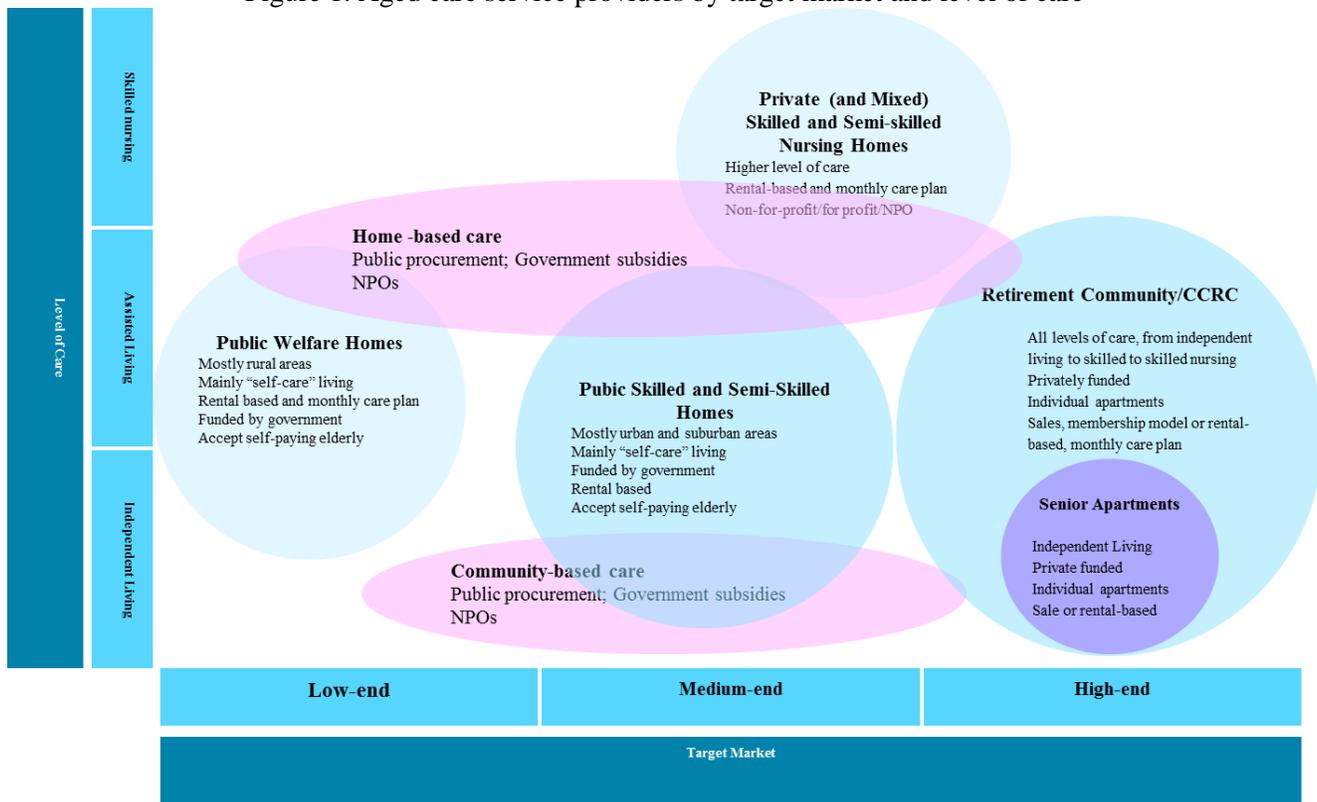
IV. The current situation in China: links between delivery and financing

In China, as elsewhere, long-term care is provided mostly by family members and other informal, unpaid caregivers, supplemented by formal, paid services and supports where they are available and affordable. The emergence of formal long-term care services to meet the needs of the elderly who can no longer be

cared for adequately by family caregivers is a relatively recent phenomenon. Formal long-term care services take three broad forms: home care, community-based care, and institutional care. The current long-term care landscape in China has been shaped by government policies, consumer needs, market forces, and tradition. On the supply side, the mix of services available and the delivery system have been driven by three major evolutions in recent years: (i) a fast growing residential and institutional aged care sector, (ii) the slow and limited development of home and community-based services, and (iii) the increasing involvement of the private sector.

Formal services, both publicly and privately provided, are available to the general population and require private payment. In terms of institutional care, broadly, there are three main types of facilities in China today, differentiated by the target clientele, source of revenues, and level of care provided (see figure 1). These include public social welfare facilities, skilled nursing homes, and retirement communities. Public social welfare facilities (welfare homes and public nursing homes) have been around for decades and exclusively serve welfare recipients, such as the childless elderly, orphans, and developmentally disabled adults without families. Many such facilities, mostly in urban areas, have recently expanded to also take in non-welfare individuals who pay for their care privately. Such individuals currently constitute the majority of residents. The services and amenities available in public social welfare facilities depend, to a large extent, on which level of government owns and runs the facility. Municipal government-run facilities, many of which have a long waiting list for interested clients, typically are better equipped and offer a more attractive array of services than facilities run by lower-level governments (such as districts, counties, or townships). Skilled nursing homes, both public and private, have professional staff, including nurses, therapists, and physicians, available to provide skilled nursing, rehabilitation, and medical services. Private retirement communities, including senior apartments and assisted-living facilities, provide various levels of personal care assistance, but with fewer professional services.

Figure 1. Aged care service providers by target market and level of care



In terms of the ownership of fixed assets (that is, the premises), facility management, and service provision, institutional care facilities comprise government-built and government-operated facilities, government-built and privately-operated facilities, and privately-built and privately-operated facilities. The government is promoting the latter two types to encourage private-sector engagement in the aged care industry. For government-built and privately-operated facilities, subsidies are provided in the form of free or below market-value rentals. Private facilities charge higher prices than public facilities, and as discussed earlier, those public facilities that are better equipped and offer an attractive array of services keep a waitlist for interested clients. Overall, the development of home and community-based services is still limited, although it has received increasing attention, while residential care facilities are booming.

Home and community-based services have emerged and expanded in recent years, but are largely concentrated in major metropolitan areas. Broadly, there are two types of community centers. The first type is the physical community center, which provides cooked meals, organized social activities, basic diagnostic health checks, rehabilitation through basic exercise and rehabilitation equipment, assistance with personal tasks, companionship, and services referrals. These services are provided during the day and some centers may also set up beds for seniors to stay overnight. Services are provided free-of-charge to eligible seniors, while other seniors are offered services at below-market prices. There are currently different systems in place for payment, depending on the local circumstances. The second type of community center is the virtual center, where services are offered through an information network that links community services to seniors. Home-based care typically includes social services, such as assistance with daily living (bathing, feeding, household chores, and so on) and medical care services, such as nursing and rehabilitation. Non-government providers operate the majority of community centers and provide home-based care.

Community-based services have two broad channels of funding: public welfare assistance funds and other sources, such as individual and corporate contributions and contributions from schools and hospitals. Those that are funded by public assistance funds target low-income groups, such as the *dibao* beneficiaries (a government-provided minimum living guarantee for the needy), and are usually available to the intended beneficiaries free or for a minimal charge. Those that receive external financing provide a broader set of services, encompassing adult day-care centers, in-home care, community-sponsored meals programs, community kitchens, recreational centers, and mutual-aid networks. These services require payment and therefore are affordable only to the elderly who are able to pay.

Private-sector involvement comes from two types of organizations: non-profit organizations and commercial for-profit organizations. Non-profits, which include domestic civil society, faith-based organizations, and community-oriented organizations, tend to provide affordable services and earn modest financial returns. They usually target the lower-middle and low-end of the market and serve seniors who can make modest payments. In contrast, for-profit commercial organizations tend to target the mid to high-end price range of the market, with the goal of earning substantial financial returns on their investments while striving to provide high-quality services. Virtually all private sector residential care facilities in China are currently registered as non-profit, non-enterprise entities.

In the past few years, local and foreign real estate firms, operators, and Chinese institutional investors have targeted wealthy Chinese seniors for assisted living facilities, nursing homes, and continuing care retirement communities, with only a few planning to enter the mid-tier market in the future. The high-end facilities are relatively few in number, of varying quality, and too expensive for most elderly people. Many high-end facilities are operating far below full capacity, due in large part to a lack of effective demand. Chinese real estate and insurance companies are actively entering the senior housing market, targeting seniors with mid to high incomes.

As discussed above, much of the government funding for aged care comes from the PWLF. The Ministry of Civil Affairs (MOCA) reports that between the mid-1980s and 2010, about three-fifths of national elderly welfare-related expenditures were funded from the PWLF, while local governments contributed about one-quarter of spending and other sources accounted for about 15 percent (MOCA, 2015). Money for the PWLF is derived from the proceeds of the Welfare Lottery and the Sport Lottery. Total revenues from these two lotteries more than doubled in nominal terms between 2010 and 2014 and have continued to increase in the last five years. In 2014, the Welfare Lottery received RMB 206 billion, and the Sports Lottery, about RMB 175 billion. The allocation of lottery funds is complex. After deducting lottery prizes (about half of all revenues) and administrative costs (around 15 percent of revenues), the remaining 35 percent is placed in the PWLF. Accordingly, the estimated amount retained in the PWLF in 2014 amounted to approximately RMB 133 billion. (Annex 1 presents a graph explaining the flow of funds from the Welfare and Sports lottery.)

The funds in the PWLF are shared equally between the national and provincial authorities. Funds retained at the provincial level are required to be spent on public welfare, and about half of the Welfare Lottery fund (but not the Sports Lottery fund) is directed toward various elderly welfare projects and activities. In 2014, the provincial authorities appropriated an estimated RMB 18 billion nationwide from the PWLF for elderly welfare. From the proceeds retained at the national level, elderly-welfare-related expenditures are estimated at 1.0 to 1.5 percent of the PWLF, or RMB 0.9 billion in 2014. More recently, the Chinese government mandated that over 50 percent of the PWLF should be allocated to support elderly care services and required that this be monitored and reported to the national authorities.

About 90 percent of all PWLF funds are spent on infrastructure, with the share of non-infrastructure being higher at the provincial and prefecture levels and lower at the district and county level. Non-infrastructure expenditures include various subsidies to the elderly and other activities. By the end of 2014, 18 provinces had used PWLF resources to launch subsidy policies for elderly age 80 and above, 22 provinces had launched subsidies for elderly in economic difficulties, and 4 provinces had launched subsidies for nursing care targeting elderly with mental impairments and economic difficulties (MOCA, 2015). Although there has been a trend in recent years to increase the share of non-infrastructure spending at all levels, PWLF expenditures are still mostly used for financing various infrastructure projects, including new construction, reconstruction, and expansion of existing facilities, such as nursing homes, rural old people's homes, honor homes (for veterans), and cultural, recreational, and activity centers for the elderly.

Overall, public funding is mobilized from PWLF and local budgets, and is spend on: (i) supporting the “three no’s,” (ii) helping to construct residential care facilities, nursing homes, and community centers for the elderly, (ii) operating subsidies to privately-run elderly care facilities and community centers, and (iv) long-term care insurance experiments.

Going forward, the national and local governments are encouraging the development of a “mixed model,” through outsourcing the operation of publicly-owned facilities to the private sector as the main delivery model for the mid-tier market. Management contracts and leasing are emerging as the two most common types of public-private partnerships in institutional elder care. Private operators are selected to manage the public facilities, following due procurement procedures.

Local governments are experimenting with various types of “mixed models,” and a number of commissioning models are currently being developed, including public procurement, management contracts, leasing, service contracts, and shareholding. For-profit companies are more likely to operate specialized skilled nursing facilities that tend to be located in large cities and predominantly serve the middle and upper classes. To attract and retain a demanding and educated clientele, they generally provide a broader and higher level of care that might not be available in public senior-care facilities. In terms of community care services, they focus on care commissioned by real estate developers targeted at mid to

high-income seniors and their families. Foreign companies also provide home-based care targeting mid to high-income seniors, with a focus on major cities.

Outsourced service provision creates a “quasi-market,” with a triangle system consisting of a public contractor, a private service provider, and the individual served. Unlike in conventional markets, there is a split between the public contractor and the provider system, which may include private as well as public and not-for-profit organizations. Various service providers are selected and contracted by a public contractor, then chosen by clients, who are free to choose their preferred service providers (or at least have a voice in expressing their satisfaction with service quality), creating market competition. A typical problem of a quasi-market like the aged care service sector is market imperfection. A public contractor acts on behalf of the clients, but pursues multiple objectives (including quality of care and cost containment) and does not have full information. Clients of aged care services also tend to lack information, and rarely have the opportunity to choose freely among different providers.⁷ Free choice and the possibility of changing providers is more feasible in the case of home care services, but rather limited in the case of residential care, as the move from one facility to another can be a challenging endeavour. To overcome the pitfalls and risks of market failures, governments apply instruments to regulate markets, such as commissioning rules, accreditation of providers, service standards, and monitoring.

To be operational, the “mixed model” requires developing a transparent and flexible market with an enabling regulatory framework that is enforced, where new providers can enter the market, good performers can grow, and bad performers can exit. A network of different types of private providers—large and small, profit-oriented and non-profit organizations—ensures that consumer needs and demands can be met in urban as well as in more remote rural areas. It also requires an explicit commissioning strategy by the government, including a set of tools to define the characteristics of the elderly care delivery system and address its specific objectives, such as quality improvement, integrated service provision, encouragement of innovative approaches, ensuring national standards, equity of service delivery, and containment of expenditures. The commissioning of social care involves collaboration not only between local authority commissioners and independent providers, but also among different public agencies to ensure a service continuum with integrated health and social services.

To provide financial underpinning for this market, the government is encouraging experiments with LTCI, optimization of the existing financing for elderly care (the PWLF and local budgets), and mobilization of resources for capital investments, largely through SOEs. Private co-pay is an explicit part of the strategy.

V. Recent Government policies regarding public financing of elderly care

Compared with financing health care and pensions, financing aged care in China is at a nascent stage. China has expanded its health insurance system at a speed that has few precedents globally, from coverage of only about 55 percent of the urban population and 21 percent of the rural population in 2003, to 90 percent and 98 percent, respectively, by 2015. Significant increases in government subsidies for health insurance have helped reduce out-of-pocket spending, a major cause of impoverishment, and insurance benefits have also been expanded gradually. The New Rural Cooperative Medical Scheme (NRCMS), which covers the rural population, has become more comprehensive, incrementally adding outpatient benefits while including coverage for specific chronic diseases (such as certain types of cancer and diabetes). The expansion of pension coverage has also proceeded at an unprecedented rate. China established the National Rural Pension Scheme in September 2009 and introduced the Urban Resident Pension Scheme in July 2011. Both schemes were rolled out rapidly, and by the end of October 2012, the urban employee pension scheme had 229 million contributors and a coverage rate of 65.4 percent, and the

⁷ This situation is commonly referred to as “information asymmetry.” There are many markets with goods that possess this quality (for example, health care and used cars).

rural and urban resident pension schemes had 325 million contributors and a coverage rate of 76.7 percent.

The Chinese government started to face its population aging issues in early 2000, while addressing sustainable financing in its regular Five-Year Plans. In 2001, the State Council issued the “10th 5-Year Development Plan of Understandings on Aging (2001-2005),” which emphasized increasing inputs to facilities, in particular in rural areas, set up targets for ten beds per thousand elderly in cities and 90 percent coverage of rural welfare homes, and highlighted the important role of community service platforms in delivering a comprehensive and multi-layer services for the elderly.⁸ The Chinese government also started directing public investment in building social welfare infrastructure during this period. One of the first large investments in such infrastructure was the launch of the “Starlight Program” to strengthen community service facilities. From 2001 to 2004, the investment in the “Starlight Program” was 13.4 billion yuan, helping to set up 32,000 “Starlight Centers for Seniors.” These centers provide family visits, emergency aid, daily care, health and rehabilitation services, and recreational activities, benefiting over 30 million elderly people.

In 2006, the State Council issued “Opinions on Accelerating the Development of Social Services for the Elderly,” and the National Committee on Aging released the “11th 5-Year Development of Understanding on Aging (2006-2010),” encouraging various social forces to invest in establishing elderly care service institutions at different levels, especially providing care and nursing services for those elderly people who cannot, either partially or completely, take care of themselves. With these efforts, the concept of home-based care was formally introduced and emphasized. In 2008, ten ministries announced the “Opinions on Comprehensively Promoting the Work of Home Based Care Services,” calling for a broad coverage of home care service networks in urban communities and promoting the construction of home care services to cover nearly one-third of rural villages. In addition, funding for elderly care services had gradually extended to cover low-income old people and those with economic difficulties, as well as social services and care. At this stage, advocacy for elderly care services helped establish a good foundation for the development of social services for the elderly.

The 12th 5-Year Plan period (2011 to 2015) and beyond became a “golden age” of design, piloting, and implementation of elderly care policies. During this period, three leading policy documents outlined a policy framework for China’s elderly care system. The first is the “12th 5-Year Plan of Undertakings on Aging,” which outlined a blueprint for establishing a social security system and elderly care system in China. The second is the “Development Plan of the Elderly Service System,” which defined the objectives and tasks for establishing an elderly service system in five years. The third is the State Council’s “Some Opinions on Accelerating the Elderly Service Industry,” which set up the longer-term targets for the development of the elderly care system by 2020. In 2017, the “13th Five-Year Plan for the Development of Elder Care Services and Building of Elderly Care System” was also issued. It stated that local authorities are required to devote over 50 percent of the Welfare Lottery Fund to support elderly care services, and set this as a specific monitorable target.

According to these policy documents, the elderly care system in China will have three integrated components, with home-based care as a bedrock, supported by community-based care and underpinned by institution-based care. These documents also defined the scope of elderly care, calling for combining social care and medical care, welcoming the participation of non-profits and the private sector, and introducing government purchasing services to leverage the development of the elderly care service

⁸MOCA had also issued a series of policy documents, such as “Opinions on Promoting Urban Community Construction Nationwide” and “Opinions on Strengthening and Improving Community Services,” and took active measures to strengthen community construction and service delivery. By the end of 2005, there were 195,000 urban community service amenities and 8,479 comprehensive social service centers in China.

market. Following these leading documents, relevant ministries have issued a number of supporting policy initiatives, independently or jointly, covering almost all the elements of establishing an elderly care system, including land provision, financial support and credit, workforce, information systems, government subsidies, tax preferences, licensing, standards, monitoring and assessment, and management.

Two of these documents are particularly relevant for financing elderly care: “Guiding Opinions on Piloting the Long-Term Care Insurance System” (Document No. 80, herein referred to as the “Guiding Opinions,” issued by the Ministry of Human Resources and Social Security in June 2016, and the “Opinions on Promoting the Development of Aged Care Services,” issued in April 2019, (Document No. 5, herein referred to as the “Opinions on Promoting Aged Care Services”) by the General Office of the State Council. These are discussed in more detail below.

The Guiding Opinions on Piloting the Long-Term Care Insurance System (2016)

The “Guiding Opinions” signaled the government’s intention to move forward with piloting social LTCI. According to the “Guiding Opinions,” the LTCI pilots aim to achieve two overarching objectives: (i) explore the establishment of a social insurance system that raises funds through social mutual assistance, in order to provide financial support or services to long-term disabled persons for basic care in daily living and closely-related medical and nursing care, and (ii) use the pilot experience accumulated over a period of one to two years to set up a LTCI policy framework during the 13th Five-Year Plan period (2016 to 2020).

The main tasks of the pilots are to explore specific policies governing the scope of LTCI coverage, premium contributions, and benefit design, as well as standards and regulations governing needs assessment, classification, and certification for eligibility determination. The pilots will also examine measures to evaluate the quality of various long-term care service providers, protocols for contractual management, and reimbursement methods, as well as LTCI management, regulation, and operational mechanisms.

In broad strokes, the “Guiding Opinions” provided guidance on key policy parameters regarding the target population of the insured, target beneficiaries, financing mechanism, and payment for covered benefits. Each of these topics is outlined below.

- *Target population of the insured:* In the pilot phase, in principle, LTCI mainly covers individuals enrolled in Urban Employee Basic Medical Insurance (UEBMI), a public health insurance for urban employees. Individual pilot cities may gradually expand the insured population, based on local circumstances as well as fundraising and coverage needs.
- *Target beneficiaries:* LTCI is targeted at insured persons who have been disabled for an extended period of time, particularly those who are severely disabled, to cover the costs for basic care for daily living and closely-related medical and nursing expenses. Individual pilot areas determine qualified beneficiaries and specific benefits covered, according to insurance funds available, and may gradually adjust the scope of coverage and benefits commensurate with local economic development.
- *Financing mechanism:* In the pilot phase, LTCI may raise funds through optimizing the structure of UEBMI accounts, transferring the surplus of UEBMI pooled funds, and adjusting the rate of employees’ contribution to UEBMI premiums. A multi-channel LTCI financing mechanism should gradually be established, with mutual assistance and shared responsibility among stakeholders. LTCI fundraising goals and standards should be reasonably determined following the general principle of “balancing revenues and expenses, with a small surplus maintained,” based on local conditions and needs. It is also suggested that a “dynamic financing mechanism”

be established that is compatible with local economic and social development and the evolving needs for insurance coverage.

- *Payment for covered benefits:* LTCI reimbursement for qualified long-term care expenses should vary according to the level of care and type of services provided. In general, reimbursement rates should be controlled at around 70 percent of allowable costs. Specific requirements and payment rates are to be determined by individual pilot cities.

The “Guiding Opinions” made recommendations with regard to LTCI fund, service, and operations management, with key points highlighted below.

- *Fund management:* The LTCI fund should be earmarked for its intended purpose, and managed separately from funds for other existing social insurance programs (such as medical care and pensions).
- *Service management:* LTCI should establish and improve systems of contractual management, supervision, and auditing of service providers, and specify technical management protocols regarding service provision, standards, and quality rating. In addition, LTCI should establish standards for needs assessment, classification, and certification; formulate management measures regarding the application, qualification, and disqualification for benefits; explore the introduction of third-party regulatory mechanisms to enhance supervision over the use of services and insurance funds; strengthen cost control and budget management; and explore suitable payment methods.
- *Operations management:* Pilot cities should strengthen the capacity building of LTCI management services, formalize institutional setup and functions, actively coordinate personnel allocation, and accelerate the construction of information systems. They should also formulate procedures for LTCI operations, optimize service processes, clarify relevant standards, and innovate management service mechanisms. Social insurance agencies may explore various implementation paths and methods, such as entrusted management and purchasing or commissioning services and products. Under the premise of ensuring the safety and effective monitoring of insurance funds, pilot cities are encouraged to actively engage various social forces, such as qualified commercial insurance companies, to help improve management service capacity. They should strengthen the construction of information network systems, in order to gradually realize information sharing and interconnection with information platforms for nursing facilities, medical and health care institutions, and other allied sectors.

In addition, the “Guiding Opinions” suggested a number of supportive measures for LTCI implementation, highlighted below.

- *Coordinating with other social insurance systems:* LTCI should coordinate with other social insurance systems in policies and management with regard to fundraising and benefits. LTCI should not pay for services that are already covered under other existing social insurance systems, so as to avoid duplicate coverage of benefits for the insured.
- *Furthering development of the long-term care service system:* Pilot cities should make a concerted effort to further develop the long-term care system and encourage and guide non-government organizations to participate in developing the long-term care service industry. LTCI should leverage policies and payment incentives to prioritize the use of home and community-based services instead of institution-based care, and encourage long-term care facilities to extend

services to communities and homes. Family caregivers, neighbours, and volunteers are encouraged to provide care and services for the insured.

- *Exploring the establishment of a multi-level long-term care financing system:* Pilot sites should actively guide the use of social assistance, commercial insurance, philanthropy, and other supplements for LTCI to address various levels of care needs. They should also encourage the exploration of an aged care subsidy system to meet the long-term care needs of certain needy elderly, and encourage commercial insurance companies to develop marketable insurance products and services to meet diverse and multi-level long-term care needs.

As is typical of the policy-making process in China, policy directives issued by central government agencies, such as the “Guiding Opinions,” are meant to provide general guidance for subnational governments without prescribing policy details. Currently, 15 cities from 14 provinces or provincial-level municipalities have been selected as the pilot sites. The 15 pilot cities are: Chengde (Hebei Province), Changchun (Jilin Province), Qiqihar (Heilongjiang Province), Shanghai (Municipality), Nantong (Jiangsu Province), Suzhou (Jiangsu Province), Ningbo (Zhejiang Province), Anqing (Anhui Province), Shangrao (Jiangxi Province), Qingdao (Shandong Province), Jingmen (Hubei Province), Guangzhou (Guangdong Province), Chongqing (Municipality), Chengdu (Sichuan Province), and Shihezi (Xinjiang Uygur Autonomous Region). The 15 pilot cities are responsible for making specific policies and implementing them for the LTCI pilot programs.

The Opinions on Promoting the Development of Aged Care Services (2019)

The “Opinions on Promoting Aged Care Services” calls for deeper reforms in the sector, including reforms in financing. It also calls for establishing a comprehensive supervision framework to hold local authorities and providers accountable for negligence through random inspections, and publicized through a social credit system. Various levels of government are encouraged to share information on quality and ratings of aged care facilities. Responsibility for setting up the framework would fall on the MOCA, National Development and Reform Commission (NDRC), People’s Bank of China (PBOC), and State Administration for Market Regulation (SAMR).

The reforms would target publicly and privately managed institutions, ensuring that these facilities are meeting the basic needs of their clients. Services at public facilities should be provided free-of-charge or at a reduced cost, and empty beds should be made available to those in need. Public facilities that primarily target self-paying clients could consider registering as SOEs. Carrying out these reforms would fall on the MOCA, NDRC, Ministry of Finance (MOF), Central Institutional Organization Commission, State-Owned Assets Supervision and Administration Commission of the State Council (SASAC), and National Health Commission (NHC).

The reforms would also include a reduction in taxes and fees that aged care facilities are required to pay. Facilities meeting certain criteria would enjoy the same preferential treatment as small and micro-enterprises. Non-profit facilities and those providing daycare, rehabilitation nursing, and meal services would also enjoy tax and fee reductions, as well as assistance with utility bills. The MOF, General Administration of Taxation, NDRC, and SAMR would be responsible for carrying out this assistance.

In addition, the “Opinions on Promoting Aged Care Services” calls for increasing the earmarking of the PwLF from 50 to 55 percent by 2022. Public and private facilities that care for disabled and advanced-age clients experiencing financial difficulties would receive an operating subsidy based on the number of clients served. Provincial governments would be encouraged to purchase aged care services, particularly daily-life care, rehabilitation nursing, institutional operation, social work, and personnel training. The MOF, MOCA, and NHC would oversee the implementation of these directives.

The document also encourages the development of chains and franchises of aged care facilities. The reforms encourage the creation of “influential and competitive brands” in aged care services and strengthening laws protecting these brands. Firms with business licenses from elsewhere in the country would not be required to set up new subsidiaries in order to operate locally. Efforts to establish new brands should be sensitive to local needs and learn from the experience of firms already operating in the area. Non-profit facilities seeking to expand locally should be able to do so without extensive red tape. The SAMR, National Intellectual Property Administration, MOCA, and NDRC would be responsible for this scale-up.

The reforms would, moreover, encourage provincial governments to publicize information and guiding policies for aged care services. Such information would include the supply and demand for aged care services in the region as well as investment guidelines for the sector. Provincial governments would establish criteria for disclosing the quality of service at aged care institutions and publicize a list of services provided and service standards. Governments should eliminate practices, such as local protection measures and excluding for-profit companies, that make the procurement and PPP-selection process less competitive and efficient. The National Bureau of Statistics, NDRC, MOCA, MOF, and SAMR would be responsible for carrying out these reforms.

Furthermore, the document calls for expanding investment and financing channels for aged care services. Private facilities experiencing temporary financial difficulties would be eligible for financial support. Cracking down on the illegal collection of service fees, assessment fees, commitment fees, and fund management fees charged by financial institutions would also reduce the financial burden for aged care facilities. The government would encourage commercial banks to consider issuing asset (facility) mortgage loans and receivable pledge loans to private facilities that have a clear title to their property, and allow for-profit companies to mortgage with land, facilities, and other assets purchased. In addition, insurance companies should offer funds for the construction and operation of for-profit facilities, and the government would encourage start-up loans for eligible individuals and SMEs, and encourage financial institutions to set reasonable interest rates on loans. The PBOC, MOF, China Banking and Insurance Regulatory Commission (CBIRC), China Securities Regulatory Commission, and Ministry of Natural Resources (MONR) would be responsible for this area.

The “Opinions on Promoting Aged Care Services” also calls for developing a framework to attract foreign capital to the aged care sector. It states that foreign capital that participates in the government procurement and PPP-selection process should enjoy the same treatment as national companies. Foreign capital that supports basic-needs of the elderly should receive the same preferential policies and government subsidies as domestic facilities. Exhibition areas for aged care products and services should be included in the China International Import Expo. The NDRC, MOCA, and Ministry of Commerce would be responsible for overseeing the treatment of foreign capital.

Moreover, the document calls for expanding the long-term care system in several important ways. It directs local governments to establish scope, standards, quality evaluation methods, and other industry norms, improve the professionalism of those working in the sector, and link long-term care with the home and community services. It calls for establishing a national ability assessment that would examine disability, dementia, and other conditions among the elderly, and serve as a basis for providing subsidies and basic care for older people. Subsidies for the advanced-aged and disabled elderly should be established and linked with subsidies for the disabled population at large. Responsibility for implementing these policies would fall on the MOCA MOF, NHC, SAMR, National Healthcare Security Administration, CBIRC, and China Disabled Persons’ Federation (CDPF).

The document also calls on commercial insurance companies to provide reverse-mortgage-backed insurance in cities at the prefecture-level or above, and establish green channels in real estate transactions, mortgage registration, notarization, and other processes.

In addition, “Opinions on Promoting Aged Care Services” provides further guidance on strengthening home-based services by focus on implementing a home adaptation project for the elderly. Funded by a government subsidy, this project would, by the end of 2020, follow barrier-free design codes to make homes accessible for the destitute and elderly of advanced age with dementia or disability. Local governments with sufficient capacity and resources could help urban and rural households adapt their homes to meet the needs of elderly family members. Such efforts could also be combined with transformation projects in old residential areas. The MOCA, MOHURD, MOF, NHC, State Council Leading Group Office of Poverty Alleviation and Development, and CDPF would be responsible for overseeing such a project.

Finally, the document also aims to strengthen the “mixed model” by encouraging the use of vacant public rental housing by private providers to provide day care, rehabilitation care, lunch assistance, elderly education, and other services for the elderly. Municipal and county governments should establish guidelines for transforming idle areas into aged care facilities. If real estate registration is needed, the government should ensure a speedy process. Certain training centers and sanatoriums affiliated with SOEs could also expand to provide aged care facilities. This process would be overseen by the MOHURD, MONR, MOCA, and SASAC.

VI. Private financing (out-of-pocket payments)

Out-of-pocket spending is a substantial part of long-term care financing, although it is not the principal source of financing in any country with a developed long-term care service system. In countries with public LTCI, consumers typically must pay a coinsurance for services or supplement the amount paid by the insurance plan (Colombo et al., 2011). In Japan, there is a 10 percent coinsurance for services, except for the low-income population (Campbell et al., 2010). The coinsurance has two purposes: (i) for home and community-based services, a coinsurance serves to limit demand for services that may be inherently desirable even to people who are not disabled, such as homemaker services, and (ii) for institutional services, the copayment amount is conceptually designed to be equivalent to the normal living costs of room and board that individuals would incur even if they were not disabled and living in a nursing home. In countries with public LTCI, such as Germany and Japan, means-tested public assistance programs provide help with the coinsurance for people who cannot afford it.

In countries with means-tested programs, people who do not meet the income and asset requirements must pay out-of-pocket for all of their care. Given the high cost of care, this is a substantial financial burden for most service users, many of whom deplete their savings and impoverish themselves until they qualify for the means-tested coverage. In a study that examined people age 50 and older in the United States over a ten-year period, two-thirds to three-quarters of nursing home residents who were eligible for Medicaid (the means-tested program) spent down to the program threshold and were not originally eligible for the program prior to admission (Wiener et al., 2013). In the United Kingdom, the impoverishment of middle-class older people who entered care homes was the primary motivation for enacting limits on out-of-pocket spending for social care (United Kingdom Department of Health, 2013). The implementation of these limits, however, has been postponed until 2020. In the United Kingdom, an individual’s house is counted as an asset in determining eligibility for means-tested programs, so most people must sell their houses when they enter a care home in order to cover the costs. In the United States, the home is an excluded asset in determining eligibility for services. Means-tested programs typically require that people in institutions contribute all of their income toward the cost of their care, except for a small to modest personal needs allowance. This contribution helps further limit the cost of the program, since the government will only pay the difference between the government-set payment rate and the

contribution toward the cost of care. In the United States, Medicaid programs are legally required to recover the cost of long-term care from the estates of deceased Medicaid beneficiaries (typically the house), but enforcement of that requirement is not widespread (Karp et al., 2005).

In China, private co-pay is an explicit part of the strategy for developing a broad-based elderly care system. At this point it is difficult to estimate the amount of out-of-pocket financing. Instead, this study attempts to estimate willingness-to-pay for home-based elderly-care services using a special-purpose survey developed in the context of implementing a World Bank-financed investment project in Anhui province. The survey consists of modules collecting information about the elderly living at home, the institutionalized elderly, and also about the providers of aged care service. In each household, one member over age 65 was randomly selected as a respondent and basic demographic information about the respondents and their households was collected. The survey asked questions about willingness-to-pay for various home-based elderly-care services, and also collected information about the health conditions of respondents and about care provision modalities that they receive. In addition, caregivers' demographics, income levels, health conditions and work status were also collected. The survey was fielded in 2018.

Results show that the mean monetary value that households with elderly are willing to pay for services is 1,548.4 yuan, while the median value is 1,500 yuan. These figures represent 6.5 percent of average (and 6.3 percent of median) disposable income per capita in Anhui in 2018.⁹ There are differences in Willingness-to-pay across socio-demographic and other characteristics of the elderly and their families. Willingness-to-pay and amount paid for home-based services are both correlated with age. Younger elderly (those age 65 to 69) are more willing to pay for services than the older elderly. At the same time, the oldest elderly (those age 80 and above) are willing to pay the highest amount of money for services, possibly reflecting their need for more intensive care. There is also a strong positive association between willingness-to-pay and amount paid and education level. Possibly, higher education is a proxy for higher income, in addition to measuring the true effect of education. In addition, the elasticity of willingness-to-pay and the amount paid with respect to education (and, possibly income) is high.

There is little correlation between willingness-to-pay and amount paid and the presence of chronic diseases and/or ADL/IADLs. On average, elderly with or without diseases or functional limitations have the same willingness-to-pay for home-based services. However, among elderly who do have some chronic diseases and/or limitations, there is some positive association between willingness-to-pay and the number of diseases and/or degree of limitation. The correlation between willingness-to-pay and the number of diseases is linear and positive, while the relationship between willingness-to-pay and the number of limitations is concave. The presence of chronic diseases and/or limitations does not seem to be correlated with the amount of money that the elderly are willing to pay for services.

The most desirable services for which individuals are willing to pay are routine checkups, followed by home medical care, and then followed by emergency aid. These patterns are consistent across age and education levels as well as the presence or lack of chronic diseases and ADLs/IADLs.

VII. Future needs for formal elderly care and the economic cost of not meeting them

The report “OECD health and long-term care expenditure projections and its application to China” developed estimates for health and long-term care for the elderly for 2012, placing public expenditures for long-term care at 0.17 percent of GDP.¹⁰ This estimate is considerably higher than estimates obtained in

⁹ See [Anhui 2018 Statistic Bulletin](#).

¹⁰ See *Public Expenditure Projections for Health and Long-Term Care for China Until 2030* (Oct. 2015) found here: https://www.oecd-ilibrary.org/social-issues-migration-health/public-expenditure-projections-for-health-and-long-term-care-for-china-until-2030_5jrs3c274vq3-en

“Options for Aged Care in China”, because they include expenditures executed by the MOCA through its channels and at medical establishments, both through the budget of the MOH and Health Insurance.

For the purposes of this study, we use the estimates from the OECD, as the report also developed a set of projections to 2030. The methodology of the OECD study is briefly summarized below. The methodology allows us to disentangle health care from long-term care expenditure and to consider the separate effects of demographics, income, and the demand for formal long-term care services.

LTC estimates for 2012 are obtained by calculating the share of the population dependent on formal long-term care and expenditure per dependent, or unit cost. The unit cost is assumed to be the same for all ages; no cost curve of average expenditure by age or sex has been developed. The average expenditure per dependent in the base year in China, regardless of the age of the dependent, is equal to total public long-term care expenditures divided by the number of dependents. Expenditures by age were obtained from the China National Health Development Research Center, but apparently only total expenditures were used in the calculations. Expenditures include only public long-term care expenditures, not informal or private spending.

To project total public long-term care expenditures to 2030, the OECD projected the number of dependents and the average expenditure per dependent and multiplied them. These numbers were projected by adjusting first for demographic factors and second for non-demographic factors, discussed in more detail below.

Projections of the number of dependents to 2030 (demographic adjustment)

- To adjust for demographics, the number of dependents at each age was adjusted upward in proportion to the increase in population at that age (the dependency ratio, or ratio of dependents to population, is assumed to remain constant). Population projections by age and sex come from the UN.
- The number of dependents was then adjusted downward due to the “healthy aging hypothesis,” which assumes that as life expectancy increases, the extra years of life are healthy years. Thus, if life expectancy went up by one year between now and 2030, the dependency ratio at age 80 in 2030 would be equal to the dependency ratio at age 79 today. While expenditure per dependent is assumed to be the same for all ages, the dependency ratio is therefore assumed to increase with age.

Projections of expenditures per dependent to 2030 (non-demographic adjustment)

- Expenditure per dependent was assumed to increase faster than inflation and roughly in proportion to productivity increases in the economy. The assumption is that long-term care costs are primarily labor costs, and therefore the costs will increase with wages. In China, it was assumed that the labor market is less tight than in Europe, so long-term care costs were increased by 100 percent of inflation and 50 percent of expected wage growth (rather than by 100 percent of expected wage growth) for the cost pressure scenario, and by 100 percent of inflation and 25 percent of expected wage growth for the cost containment scenario.

Projections of expenditures per dependent to 2030 (labor force participation rates)

- An adjustment was then made for the expected increase in demand for public long-term care services. This adjustment is based on the assumption that as formal labor force rates increase, more people will demand higher quality long-term care, and less people will be available to provide informal or family-based care. It appears that this increase in cost was assumed to be included in the adjustment for wage increases. This is measured by looking at the change in expected female labor force participation rates at ages 50 to 64 years old.

This methodology yielded the following estimates of public long-term financing needs as a percent of GDP:

Cost in 2012	0.17% of GDP
Demographic adjustment	+0.26%
Non-demographic adjustment	+0.17%
Labor force participation rates adjustment	-0.06%
2030 projected cost	0.55% of GDP

These financing needs could be compared with the estimates of

VIII. Way forward

Future needs are large, and so are cost of not meeting them. This study estimates that the opportunity costs of familial provision of aged care (the economic value of activities forgone by family members because of providing informal care to the elderly) is about 740.84 billion yuan per year (in 2011 yuan) or about 1.51 percent of China's GDP. Public finance is a pre-condition for building a service market with wide coverage, accessible for all clients in need and where consumers can exercise their choices. In OECD countries, long-term care provision is based on stable public financial resources, either tax-based or social insurance-based. Financial pressure has led to gradual adjustments, but the basics of wide coverage of quality services have been maintained in all countries.

As a very important step in the direction of securing financing for elderly care, the government of China has embarked on piloting LTCI. The LTCI pilots currently implementing in the 15 pilot cities are fairly new and still in the early stage of implementation. It may not be realistic to achieve the ambitious goal of "using the pilot experience accumulated over a period of 1-2 years to set up a LTCI policy framework during the 13th Five-Year Plan period" by 2020, as suggested in the "Guiding Opinions." At the same time, the central government of China has already indicated an interest in expanding the current LTCI pilots.¹¹ While this is a very positive development, given the limited understanding of the current pilots in terms of their viability, impact and long-term sustainability, it would be useful to continue allocating time and resources in further developing the current LTCI pilots in order to solidify and finetune key policy parameters. Equally important, more time and efforts are needed to gather empirical data and conduct rigorous research to assess the impact of the LTCI pilots. A research-based evidence base goes a long way toward informing future LTCI policy options beyond the pilot phase. Outlined below are a number of high-level observations and discussion points on key aspects of the ongoing LTCI programs across the 15 pilot cities as the government plans to expand the LTCI pilots.

Target population of the insured

- Currently, eight pilot cities cover UEBMI enrollees only, two cities cover both UEBMI and URBMI enrollees, and only five cities provide the most inclusive coverage for all UEBMI and BMIURR enrollees. There is a clear bias in favor of urban employees, ahead of urban residents and rural residents.
- Prioritizing LTCI coverage for certain population subgroups over others by type of health insurance runs the risk of prolonging existing inequalities among population subgroups, instead of eliminating them.

Financing mechanism

¹¹ Speech by Premier Li Keqiang, Government Working Report for the year of 2019, at the second meeting of the 13th National People's Congress, March 5, 2019. http://www.gov.cn/premier/2019-03/16/content_5374314.htm

- The heavy reliance on the transfer of UEBMI funds as the main revenue source for LTCI financing in most of the pilot cities is potentially problematic. Despite near-universal coverage, China’s current social health care insurance schemes are known to provide shallow coverage in terms of covered medical services and reimbursement rates. As such, out-of-pocket expenses for medical bills remain significant, especially among URBMI enrollees and rural NCMS enrollees. Siphoning away the surplus of pooled medical insurance funds to fund LTCI may exacerbate these problems.
- Individual contribution on a regular basis, a hallmark feature of any social insurance model, currently plays a minimal role in most of the LTCI pilots. For long-term sustainability, it is reasonable and necessary to mandate and gradually increase individual contributions to the LTCI fund (F. Li & Otani, 2018).
- Likewise, employer contributions on top of employee contribution to LTCI funds, also typical of social LTCI programs (Rhee, Done, & Anderson, 2015), is absent from the vast majority of current LTCI pilots. However, politically it may not be feasible to mandate employer contribution to LTCI, given the already high burden on employers, who are currently required to make regular contributions to other existing social insurance programs (such as pension, medical care, work injury, unemployment, and birth).
- All LTCI pilots rely on locally-pooled funds that are dependent on local resources and economic development. Absent substantial and ongoing financing support from the central government, it will be difficult to establish a sustainable LTCI system in the long run.

Eligibility for benefits

- Currently, an insured person needs to meet highly stringent eligibility criteria to qualify for LTCI benefits. Presumably, a significant number of the beneficiaries are patients near the end of life. The strict eligibility criteria mean that LTCI can only serve a small percentage of disabled people.
- While at the pilot stage it may be necessary and advisable to set a high bar for eligibility, over time the eligibility criteria should be relaxed reasonably, so that the majority of disabled people in need can qualify for LTCI benefits.

Benefit package

- There exist substantial variations in the LTCI benefit package across the pilot cities, which is conducive to creating regional disparities.
- In most pilot cities, the current benefit package can be characterized as meager and certainly far from generous. There are also glaring disparities in the benefit package among subgroups of beneficiaries, with benefits usually more generous for urban employees enrolled in UEBMI than for urban residents and rural residents.
- While from a fiscal perspective it is understandable to “start low” in the benefit package at the pilot stage of LTCI, it is a desirable policy goal to gradually increase the covered benefits, so long as the LTCI fund remains solvent.

To increase the coverage and quality of aged care services in China, an effective and sustainable public financing system needs to be established. A mix of public and private payments should be designed and implemented. This study showed that China’s elderly are willing to pay for home-based care services, even though the monetary value of this willingness to pay is quite low. The most desirable services for which individuals are willing to pay are routine checkups, followed by home medical care, and then followed by emergency aid. These patterns are consistent across age and education groups as well as the presence or lack of chronic diseases and ADLs/IADLs. These findings could guide further development of elderly care services and their delivery models.