

Averting Crisis: A Path Forward for China's Healthcare System

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Summary

Little attention has been paid to China's ailing healthcare system in the West, even though the debate over healthcare has drawn officials, academics and industry insiders into one of the most open policy discussions going on in China today. While the space allotted here does not allow for a definitive compilation of the challenges facing China's healthcare system, it does attempt to discuss the past and current system as comprehensively as possible.

The Urgency of Reform

On 21 January 2009, the State Council revealed an ambitious plan to spend RMB 850 billion (USD 124b) by 2011 on providing universal primary medical care to its citizens.¹ Although reform has been ongoing, ensuring affordable access to basic health services for its citizenry has gained new urgency during the global financial crisis. Official media recently estimated that 10 million migrant workers lost their jobs in the third quarter of 2008 and urban unemployment reached 4.2% at the end of December, the first jump in five years.² No job means no health insurance, and unemployment is only expected to grow.

How has Chinese healthcare reached a state in which one-third of rural farmers reported not receiving any form of healthcare whatsoever in 2002³ and less than half of urban residents were receiving medical coverage as of 2006? In the mid-1970s and 80s, the central government had achieved nearly universal coverage of its citizens. State-owned Enterprises (SOE) and rural collectives together covered an estimated 90% of Chinese citizens.⁴ Yet this system proved financially unsustainable: abuse and overuse of free health services and the unrestricted spending of unaccountable state enterprises became too much of a burden on the state. Both SOEs and collectives were eventually downsized or dismantled during market reforms. However, no social safety net had been established to replace this system of guaranteed medical care. First, the emphasis on economic efficiency hardly left room to tackle a problem that clearly required large infusions of funding. Second, it appears that the regime mistakenly assumed the market would give rise to sufficient health services.⁵ As a result, millions lost healthcare access virtually overnight. The regime belatedly began passing a series of ad hoc measures meant to regulate prices and provide citizens with medical coverage, but these have largely been unrealistic, bandage policies.

Little attention has been paid to China's ailing healthcare system in the West, even though the debate over healthcare has drawn officials, academics and industry insiders into one of the most open policy discussions going on in China today. While the space allotted here does not allow for a definitive compilation of the challenges facing China's healthcare system, it does attempt to discuss the past and current system as comprehensively as possible. Thus this brief is organized as follows: section I outlines the current structure of both urban and rural healthcare schemes. Section II analyzes three interrelated and, arguably the biggest systemic obstacles the regime must overcome in order to reach universal healthcare: funding, costs, and coverage. Section III examines the social, economic and political repercussions of the system's failures. Section IV presents the strengths and

¹ "Chinese Pin Hope on New Health Care Reform Plan." *China View*, 22 January 2009.

² Tan Yingzi "China's Unemployment Rate Climbs." *China Daily*. 21 January 2009.

³ Brant, Simone, Michael Garris, Edward Okeke, and Josh Rosenfeld "Access to Care in Rural China: A Policy Discussion." University of Michigan. 2006.

⁴ World Bank "Financing Health Care: Issues and Options for China." China 2020 Series. World Bank. 1997.

⁵ "Access to Care in Rural China: A Policy Discussion." University of Michigan. 2006.

weaknesses of two suggested, competing solutions to the healthcare crisis that have emerged in policy circles. The brief will conclude in Section V by looking at the future of healthcare policy.

Section I: the Structure of Healthcare

Urban

Pre-reform urban insurance policy separated the urban population into two publicly financed schemes based on job description. Between the Public Health Insurance Scheme and the Labor Health Insurance Schemes, about 75% of the urban labor force was covered.⁶ Public health insurance covered public sector employees. This group included employees of government, academia and political institutions; military personnel, veterans and college students. It was financed by the state and regulated by China National Labor Union and the Ministry of Organization. The labor insurance scheme covered industry employees, i.e., city workers in SOEs and collective-owned enterprises (COE). This group was financed by enterprises⁷ and overseen by The Ministry of Labor and Social Security.⁸

In 1998 the “Basic Health Care Insurance for Urban Employees” emerged, partially reforming the above system. In addition to narrowing the gap in health benefits the two groups can access, it diverged from the original scheme in three major ways:

- Compulsory participation for all employers and compulsory enrolment for all formal employees;
- Funding: social pooling and individual accounts have been established with contributions by both employers and employees;
- Management of health insurance funds is carried out by municipal governments and regulated by the relevant government bodies.⁹

By the end of 2006 only 47% of urban residents had been covered.¹⁰ Among the reasons for low coverage is its exclusion of the unemployed, self-employed, children and students, as the target has only been formal employees thus far. Noncompliance by foreign and public enterprises seeking to cut costs and local officials reluctant to

⁶ Guo, Baogang “Transforming China’s Urban Health-care System,” *Asian Survey*, vol 43 no 3 (2003) p 385-403.

⁷ However, welfare benefits ultimately came from the state. If an enterprise was in the red, it would be subsidized by the regime. See Edward Gu and Jianjun Zhang “Health Care Regime Change in Urban China: Unmanaged Marketization and Reluctant Privatization,” *Pacific Affairs*, vol 79 no 1 (2006) p 49-72.

⁸ Hougaard, Jens Leth, Lars Peter Østerdal, and Yi Yu “The Chinese Health Care System: Structure, Problems and Challenges” Department of Economics, University of Copenhagen. 2008.

⁹ “Transforming China’s Urban Health-care System” p 392-393; “Health Care Regime Change in Urban China: Unmanaged Marketization and Reluctant Privatization” p 59.

¹⁰ Gu, Edward “Towards Universal Coverage: China’s New Health Care Insurance Reforms” (*forthcoming*).

responsible for funding the public health services under its own administration. The central government finances only national hospitals, research institutions and medical schools. This has aggravated regional inequalities, which will be discussed further below.

This does not mean that the regime has failed to spend on health; indeed, China's total health expenditures have almost doubled since 2002. However, in the context of its overall growth—in which China's economy has maintained an average growth rate of over 10% per annum since 1998—the percent of GDP it spends on healthcare has failed to keep up with the relative size of the economy and its healthcare needs.

Year	GDP (USD Million)	Total Health Expenditures (USD Million)	Percentage of GDP
2002	120332.7	5790	4.81166
2003	135822.8	6584.1	4.847566
2004	159878.3	7590.3	4.747549
2005	183217.4	8659.9	4.726571
2006	211923.5	9843.3	4.644742
2007	249529.9	11289.5	4.524308

Source: China Statistical Yearbook 2008

In 2005 public versus private spending on healthcare was 36.7% to 63.3%.¹⁴ This number is reflective of the regime's admitted failure to finance health services adequately and indicative of the burden of health care costs being passed to consumers. The available public funding is generally skewed towards hospitals as opposed to public health programs, depriving citizens of a robust health education and disease prevention resource.¹⁵ Further, a disproportionate amount of funding has been allocated to building a four-tier disease prevention and control system. This is, of course, an attempt to avoid another costly and highly public SARS incident. Though laudable in its intentions, it seems counterintuitive that the majority of the regime's attention has been focused on state of the art epidemic alert and containment when it has not devoted nearly enough money and manpower to supporting a critical component of disease control—education.

Health indicators reflect system failures. According to the World Bank, after a 40 year decline, the under-five infant mortality rate (IMR), in China plateaued in the mid-1980s, coinciding with the significant drop in public funding for healthcare.¹⁶ Additionally, WHO released a 2006 bulletin in which the re-emergence of “snail fever” (schistosomiasis) in areas that had previously achieved control over the infection was attributed to diminished funding, education, and awareness.¹⁷

¹⁴ “Towards Universal Coverage: China's New Health Care Insurance Reforms.”

¹⁵ “Financing Health Care: Issues and Options for China.”

¹⁶ *ibid.*

¹⁷ Song Liang, Changhong Yang, Bo Zhang, and Dongchuan Qiu “Re-emerging schistosomiasis in hilly and mountainous areas of Sichuan, China,” *Bulletin of the World Health Organization* vol 84 no 2 (February 2006) p 139-144.

Rising Costs

Even though the regime has reduced public spending on healthcare providers, it has allowed providers to support themselves with user fees and fees for certain types of treatments and pharmaceuticals. To prevent the most obvious abuses from occurring and also to compensate for the absence of meaningful insurance schemes, the Departments of Price Administration and its provincial branches, Health, and the State Commission of Reform and Planning issued a regulated fee schedule intentionally designed to provide implicit insurance to poor patients. The most basic health services are priced well below market averages while fees for high-technology diagnostic equipment are set well above them.¹⁸ Pharmacies, which are attached to hospitals, are allowed to charge a 15% markup on the wholesale price of drugs.¹⁹ The table below demonstrates the sources of revenue for healthcare providers:

Sources of Revenue for General Hospitals Under the Ministry of Health

Source/Year	2002	2003	2004	2005	2006
Government Funding	10.2%	8.8%	12.8%	7.4%	8.4%
Other	2.6%	2.7%	2.2%	2.1%	1.9%
Pharmaceuticals Sales	43.0%	43.4%	40.3%	43.0%	41.3%
Medical Services	44.2%	45.1%	44.6%	47.5%	48.4%

Source: China Health Statistical Yearbook, 2005-2007 as cited by Edward Gu "Towards Universal Coverage" p 5

This markup policy has created a system in which “medicine maintains hospitals.” By linking the income of hospitals and often the salaries (as well as commissions) of doctors to certain procedures and pharmaceuticals, there has been a rise in the price and frequency of prescriptions for medicines and high diagnostic technologies. At the same time, “basic” services and medicines are less accessible because hospitals will underinvest in unprofitable services and overinvest in high technologies. An example is the availability of essential medicines. Essential medicines are defined by the World Health Organization as those “that satisfy the priority healthcare needs of the populations [and] are intended to be available within the context of functioning health systems at all times in adequate amounts...at a price the individual and community can afford.”²⁰ A 2006 study in China by WHO of 41 surveyed medicines—19 of which were essential—showed that only 10% were available in private pharmacies as branded products and 15% as generics.²¹

¹⁸ Eggleston, Karen and Yip, Winnie “Hospital Competition under Regulated Prices: Application to Urban Health Sector Reforms in China,” *International Journal of Health Care Finance and Economics* vol 4 (2004) p 343-368.

¹⁹ *ibid.*

²⁰ World Health Organization “Essential Medicines” < www.who.int/topics/essential_medicines >

²¹ World Health Organization “Essential Medicines List” < www.who.int/mediacentre/factsheets/fs325/en/index.html >

Rising costs have been passed directly to patients. Fee for service and out-of-pocket payment are the dominate payment methods used by consumers²² and nearly 50% of healthcare costs are borne by individuals.²³ It is clear that more and more patients are unable to bear the costs. From 1990 to 2006 outpatient costs on average were 12 times the amount in 1990; in-patient treatment about 10 times the cost of that in 1990. Urban and rural incomes, however, had only increased about 5-7 times during the same period.²⁴

Inequality

We see how the first systemic problem we identified—lack of funding, led to the second problem, that is, costs and treatment availability. These in turn have aggravated the third systemic problem: inequality. The cycle of poverty is perpetuated by rising out-of-pocket costs that poor Chinese can little afford with the simultaneous shrinking of medical coverage. The divide is not limited to urban-rural but rather rich-poor, including the urban poor. However, urban-rural offers the clearest example of system inequality because urban-rural healthcare are, in effect, different systems altogether, with the advantages almost exclusively aggregating on the urban side. In 2000 China was ranked 188/191 among WHO members for fairness of health care finance.

- Funding and Access. On an individual level, lower incomes are often positively correlated with the incidence of malnutrition, certain communicable diseases like tuberculosis, and higher infant mortality rates. For instance, in 2000, the infant mortality rate in China's first-tier cities was about 6.0 per 1,000 births; the IMR in "type 4" rural areas, or China's least developed, poor rural areas, was 54.0 per 1,000 births.²⁵ This statistic is not just about income disparities between individuals but the quality of care available in localities. As mentioned, the decentralization of healthcare funding from the central to provincial and county governments has led to wide regional disparities. Naturally, more affluent urban areas like Shanghai and Beijing can direct sufficient resources to health services whereas an inland province may not generate enough income to properly finance its hospitals. This in turn means that hospitals in poor areas, and even health programs meant to benefit the poor like the Maternal and Child Health Program, must support themselves through user charges,²⁶ a disincentive for the poor to seek medical attention. Further, even though health providers in poorer areas are charging fees far above the ability for many patients to pay, it can

²² For a comprehensive look on healthcare payment methods, see: Meng Qingyue "Review of Health Care Provider Payment Reforms in China." 2005.

²³ Fairclough, Gordon "Beijing Plans \$124 Billion Overhaul of Health Care." *Wall Street Journal*. 22 January 2009.

²⁴ "Towards Universal Coverage: China's New Health Care Insurance Reforms."

²⁵ Zhao, Zhongwei "Income Inequality, Unequal Health Care Access, and Mortality in China," *Population and Development Review* vol 32 no 3 (2006) p 461-483.

²⁶ "Financing Health Care: Issues and Options for China" p 37.

provide neither the higher quality nor the range of services that its wealthier urban counterparts can. Wealthier hospitals are able to invest in innovative equipment, specialists, and better doctors.

- Quality. Without accounting for the potential differences in medical education and training between the West and China, the majority of doctors in China have not continued with medical education beyond a Bachelor's Degree level—only 3.8% of health care personnel have received a Doctor's Degree or an MA.²⁷ Therefore, using the BA as the norm for a standard medical education, and judging competency of treatment by the level of education completed by healthcare personnel, the differences in education between those working in hospitals versus township health centers (THC) are striking. Township health centers are the most readily available healthcare providers for rural areas both financially and geographically; vertical transfers, that is, moving from THC to higher level providers, i.e. hospitals, generally mean longer travel and reduced coverage for patients. Only 2.9% of healthcare personnel working in THC hold a BA; 24.9% have received a junior college education; 56.5% have secondary technical school backgrounds; and 15.8% have received a high school level of education or below.²⁸ For hospitals, those same numbers are: 38.8%, 33.2%, 20.7% and 3.6% respectively.²⁹ This means that the likelihood of a patient receiving medical care from a provider with a university degree in the healthcare resource most available to him is shockingly low.
- Coverage. Medical coverage in rural areas is constrained in two ways. The first cause is infrastructure. Rural areas have neither the managerial capacity nor the infrastructure to support broad policy initiatives like mandatory insurance. Medical schemes, including the NCMS, remain community financed and voluntary. Risk is pooled at only the township level, which means the threat of insolvency exists, the fate of most rural Chinese financing schemes.³⁰ Smaller risk pools also increase the problem of adverse selection: those with expensive, chronic illnesses subscribe more which drives up premiums and increases the rate of drop-outs by “good risks”—those who utilize medical care rarely (the healthy). The risk pool then becomes a pool of bad risks, which again raises the possibility of collapse. This scenario is ever-present as the “good risks” in rural areas are generally younger Chinese that leave for urban areas. This brings us to the second constraint on medical coverage: subscribers cannot take their coverage with them. WHO projects that by 2020, 300 million rural dwellers will have migrated into the cities. That means 50%

²⁷ “The Chinese Health Care System: Structure, Problems and Challenges” p 15.

²⁸ Ministry of Health as cited in “The Chinese Health Care System: Structure, Problems and Challenges.”

²⁹ *ibid.*

³⁰ “Access to Care in Rural China: A Policy Discussion.”

of China's population will be living in urban areas.³¹ This will obviously have huge implications for healthcare—both in coverage and also in overutilization of healthcare resources.

Section III: the Repercussions of a Broken System

The current state of China's healthcare system has already had a wide range of social, economic, and political consequences. In the future, these will only grow in urgency as demographic shifts put more pressure on healthcare providers. In terms of public health, few health education programs have been funded well enough or executed competently enough to put a dent in the soaring rate of smoking, combat the reemergence of communicable diseases in vulnerable populations, or implement preventative programs that may be the key to suppressing future outbreaks of epidemics like SARS. While many of these dangers may disproportionately affect poor, rural Chinese, urban Chinese are not immune to rising healthcare costs and the fear of medical impoverishment either.

These fears compel many Chinese to save rather than spend. The measures passed by the central government, including its stimulus package, assume that it can raise domestic consumption to offset flagging international demand and fuel future growth. Raising consumer spending presents a monumental challenge. In the past decade, Chinese households have generally spent only 60% of their income as compared to the worldwide average of 80%.³² The fear of medical impoverishment is cited as one of the top three reasons for this savings rate. According to a survey by the Ministry of Health, spiraling costs left about 21% of urban Chinese and 18% of rural Chinese unable to seek outpatient care “due to financial constraints” in 2003.³³ It is widely believed that healthcare is one of the keys to reducing household saving.

Lastly, the sensitive nature of health and access to medical treatment invariably gives rise to political challenges. Though there is widespread discontent with the system, there is little record of protests that specifically reference rising medical costs and unequal access to health services. However, given the economic implications of the broken healthcare system, it may not be citizens' political action but rather their *inaction* that causes the biggest headache for the regime. That is, the refusal to spend when an uncertain future looms, will doubtlessly prolong the pain of the financial crisis in China, which in turn has the potential to affect social stability on the Mainland.

Section IV: Policy Debate

³¹ Office of the World Health Organization Representative in Beijing “Implementing the New Cooperative Medical Schemes in Rapidly Changing China,” *World Health Organization* (2004) p 19.

³² Zhang Ran “Personal Savings hit Record US \$1.7 Trillion.” *China Daily*. 17 January 2006.

³³ “Towards Universal Coverage: China's New Health Care Insurance Reforms.”

There is little disagreement that the regime must take action. The goals of the 11th Five-Year Health Plan include extending the NCMS to all rural residents by the end of 2010, dispatching doctors from the city to rural areas, and encourage non-government organizations as well as individuals to get involved. By recently promising to spend RMB 850 billion in healthcare expansion by 2011, the regime has clearly made the issue one of its priorities. It has also proved remarkably open to suggestion: the debate over healthcare reform between policymakers, business leaders and academics has been lively and occasionally contentious. Disagreements over which course of action best suits China's political and economic system and its present capabilities have flared. Two suggested solutions have emerged: the supply-side solution and the demand-side solution.

Advocates of the supply-side solution, the most prominent among them being the Development Research Centre under the State Council³⁴, attribute the failures of the current healthcare system to failed marketization. They propose that the regime take a strong lead and re-nationalize public healthcare providers: all would be funded and controlled directly by the government.³⁵ According to them, providers would cease profit maximizing behavior—and thus prices would fall—if they were properly funded and the links between prescriptions for pharmaceutical and diagnostic technology and provider incomes were cut. Their model, a “mini-NHS”, would be a separate system that provides primary healthcare services in cities and villages through community health centers for free or low-cost. Patients with more serious conditions would be transferred to larger hospitals. The supply-side model has been received popularly by officials and the media who believe that the government has to rein in out of control marketization.

There are others who believe patients' needs cannot be met by an administration-led solution. Demand-side solution subscribers point to two major weaknesses in the supply-side solution. First, they claim that supply-siders fail to consider existing insurance schemes with institutional frameworks already in place in their proposed model. The supply-side solution would essentially mean starting from scratch. Second, they point to the model's cost—paying for the model itself, coordinating and administering it on all levels of government, and transitioning to it.

Instead, the demand-side model, which the Ministry of Finance supports, attributes the failure of the current system mainly to the “underdevelopment of the health security system and the malfunctioning of the third-party purchase.”³⁶ Essentially, they advocate a system that would *properly* accommodate both state and market. It calls for the introduction of health security agents that purchase healthcare services on behalf of patients which, according to proponents, would create an adequate risk pooling system and reduce the challenges of adverse selection. To fund the system, including a strengthened regulatory framework, demand-sider proponents advocate lifting the restrictions on private capital. Private investment would not only provide

³⁴ *ibid.*

³⁵ *ibid.*

³⁶ *ibid.*

necessary capital, but may also have the effect of standardizing practices and tightening accountability.

The demand-side solution is considerably less radical than the supply-side. Reform would be incremental and improve upon the existing system rather than scrap it entirely. Although it is not as popular as the supply-side, many predict that it will prevail, particularly as the government as shown recent signs of capitulating to the need for private investment.

Section V: the Future of Reform

Recent moves by the regime, including capital commitments and lifting restrictions on private investment, are hopeful signs. Additionally, proposed models by academics, officials and industry insiders demonstrate that promises to improve healthcare are not simply political posturing. That being said, though the regime and both models propose structural improvements, replacements, and means of investment, neither address the fundamental issue of *human capital*. This includes healthcare personnel, system administrators, and supervisory organs. Training programs on all levels of healthcare implementation need to be improved. The plan to “dispatch doctors” must include programs that train and *competitively fund* medical personnel, from the undergraduate level onward, to work in poorer areas so that rural “brain drain” doesn’t deprive residents of equal quality care. NGOs that address healthcare issues should be allowed and encouraged to secure wider funding for grassroots education programs and broaden the scope of their operations. Epidemic disease alert systems should not be prioritized above basic primary medical care.

It has become clear that government attempts to keep basic procedures below market prices have actually produced higher costs. Distorted incentives have driven up supplier-induced demand for profitable pharmaceuticals and high technology diagnostic procedures. The relevant ministries should begin examining these policies more closely to determine how they can be modified or discarded entirely without adversely affecting the uninsured.

The regime faces considerable obstacles in revamping China’s healthcare system. Those obstacles – providing access to those who have lost their insurance along with their jobs, and stimulating domestic spending – are even more daunting in the current financial climate. Although the plan for investing the RMB 850 billion has not been released yet, domestic audiences hope that it will demonstrate both the direction and pragmatism that are needed.

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