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## Minisymposium

## The challenges of healthcare reforms in China

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## SUMMARY

China is in the process of a new round of healthcare reforms. The Chinese Government has launched ambitious healthcare reforms aiming to achieve equitable access to basic health services; and to build a safe, effective, convenient and inexpensive healthcare system for both urban and rural residents. This paper will provide a brief overview of China's healthcare reforms, and describe the challenges and opportunities facing these reforms.

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China is in the process of a new round of healthcare reforms. To understand its approach, it is helpful to describe the Chinese healthcare system in the period between the founding of the People's Republic of China (PRC) in 1949 and the market-oriented economic reforms since the early 1980s, and then the period in which the consequences of the market reforms contributed to the current situation – i.e. soaring medical fees, lack of access to affordable medical services, profit-driven (or even profit-making) public hospitals and poor patient–doctor relationships – which compelled the Chinese Government to launch the new round of reforms.

In 2009, we celebrated the 60th anniversary of the PRC. From 1949 to 1978, the first 30 years of the PRC, China had many achievements to be proud of in the health field. It had a universal coverage healthcare system, and created a low-cost, wide-coverage primary healthcare model, despite China's low income per capita at the time. In urban areas, public hospitals provided free or very cheap healthcare services for everyone, in addition to preventative strategies. In rural areas, barefoot doctors provided healthcare to farmers at minimal cost. Barefoot doctors were considered to be one of the great

successes of the Mao era in China. China's health status had improved significantly, with some indicators reaching the level of developed countries at that time. The life expectancy of the population increased from around 35 years in 1949 to 68 years in 1978; higher than that of some countries which were richer than China. The infant mortality rate declined from 250 per 1000 live births per year to less than 50 per 1000 live births per year during the same period.

When China began its economic reforms in the early 1980s, the old system ended as the country attempted to switch to a market-oriented healthcare system. After 30 years of economic reforms, China has achieved an economic miracle. The annual growth in gross domestic product (GDP) is 9.8%,<sup>1</sup> but China's healthcare system has not improved as much as the economy. Instead, it has deteriorated in many aspects in both rural and urban areas. In terms of quality, efficiency and equity of healthcare, China's healthcare system is far behind the current level of economic development and people's demands. The improvement in life expectancy slowed down, especially compared with other countries such as Australia, Hong Kong, Japan, Malaysia and Sri Lanka.<sup>2</sup>

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Medical costs (but not health outcomes) escalated rapidly, and relationships between doctors and patients deteriorated. The healthcare sector has been one of the areas in China's social system receiving the most complaints.

The reasons for the above problems in China's healthcare system are mainly due to government failure and market failure. The failure of the Government to insure people's basic healthcare needs led to breakdown of the public health service system; the lack of government regulations exacerbated market failure; and some hospitals and doctors induced too many unnecessary healthcare services, which not only increased the costs for the patients but may also have damaged their health. The Government reduced the budget in line with market principles, and people were paying for more and more medical costs out of their own pocket. Total health expenditure has increased nearly 90 times over the last three decades, much faster than the growth in GDP. It now accounts for 5% of the GDP, and most is out-of-pocket payments. By 2000, around 60% of health costs were paid for out-of-pocket.<sup>3</sup> In addition, even the more affluent people who were able to pay for care were unable to access satisfactory healthcare services due to the number of patients. The tertiary hospitals have a daily outpatient load of over 10,000 people.

The other important factor is health inequality. Health inequality slows down health development. In China, there is huge income disparity. The poorer rural population accounts for over 70% of the total population, but only uses 20% of the total resources. A national health survey in 2003 revealed that around 73% of people in rural areas who were advised by physician to be hospitalized chose not to do so because of concerns about the high costs.<sup>4</sup>

The severe acute respiratory syndrome (SARS) outbreak in 2003 was the turning point for China's healthcare system reforms. It not only focused the Government's attention on the deficiencies of the public health system, but also on the need for balanced economic and social development. The Government realized that if attention is only paid to economic growth, an epidemic such as SARS could completely slow down or even stop that growth, and the Government should take responsibility to protect people's basic health needs. The China Central Political Bureau Committee workshop on 23 October 2006 marked a milestone for China's healthcare reforms when Chinese President Hu Jintao acknowledged that the Government would shoulder more responsibility for strengthening the health system: the Government will reform the healthcare system and build a safe, effective, convenient and inexpensive healthcare network covering both urban and rural residents. The goal is for everyone to enjoy a basic healthcare service.

Since then, the Government has set healthcare reforms as one of its top priorities, and work has commenced on the healthcare reform plan. The Chinese Government put forth a global open bidding for different healthcare reform plans to be submitted, and groups from around the world were asked to participate such as the World Bank, the World Health Organization, etc. Healthcare reforms are hotly debated and highlighted by the media on a daily basis. On 6 April 2009, the State Council issued China's healthcare reform guideline and promised to spend 850 billion Yuan (123 billion US dollars) by 2011 in addition to the current regular expenditure to

provide universal primary medical services to the country's population of 1.3 billion people.

The general framework and the long-term goal for the reforms is to build up a universal health security system, not just a healthcare system, which recognizes the impact of the environment, lifestyle and socio-economic circumstances on health. Within this framework, the current healthcare reform guideline is a very comprehensive reform plan aiming to co-ordinate all the related systems including the health financing system, the public health system, the healthcare delivery system, the management and regulation system, the drugs and equipment supply system, healthcare personnel training system and other supporting strategies to ensure that people can access the best care.

The long-term reform plan aims to establish a universal healthcare system by 2020. In the short term (up to 2011), five key tasks have been identified to make primary health services available, affordable and accessible for everyone (Box 1). The first is to expand the coverage of health insurance by 2010. At least 90% of the population will be covered. An essential drug system will be created, including a catalogue of the main drugs needed by the public. This will mainly be through development of the primary healthcare network. The Chinese Government has used the economic stimulus plan to build another 5000 clinics at the township level, 2000 hospitals at the county level and 2400 urban community clinics over a 3-year period. They have also promised to provide equal public health services for both urban and rural residents. The last task in the first 3-year period is to push forward the pilot reform of public hospitals, the main supply of health services. Currently around one-half of hospitals are private and the other half are public (non-profit) in China, but the vast majority of hospital beds are in public hospitals. This is the largest challenge we are facing and no consensus on reform measures has been reached to date. The 16 cities pilot project for hospital reforms has been set up to try new models of medical care delivery.

**Box 1** Five key tasks of healthcare reforms in China up to 2011.

1. Expanding the coverage of health insurance in both rural and urban areas.
2. Establishing a basic/essential drugs system.
3. Improving capacities of primary healthcare network.
4. Promoting equitable access to public health services.
5. Pushing forward with the reform trial in public hospitals.

Currently, the delivery system has no incentive to control the costs and they need to make money to pay staff salaries and to buy equipment. At the same time, health insurance coverage is expanding rapidly and could potentially make the problems worse. The Government has spent a lot of money buying insurance for rural and urban populations, but medical fees are also rising quickly. More services are now provided and more drugs are prescribed with more medical tests, leading to

oversupply. If we use an analogy and consider that the fully-government-funded public hospitals in the premarketization era were like a nice cat, during the market-oriented economic reforms when the Government cut funding to hospitals as part of its market approaches, the cat was put outside and told to feed itself. The cat had to find ways to survive in the market and managed to do this successfully. Now, the cat has grown up and become a tiger. When the Government calls it back and says, 'I have the money. I can support you', the tiger says 'No, I don't want to come back because the food you give me is not good enough'.

This is a huge challenge, especially to improve the management of public hospitals. However, it is also an opportunity, as new technology has created new ways to solve problems that could not be solved previously. One example is the national public health information system; a direct reporting system for infectious diseases and public health emergencies in China. After SARS, the Chinese Government developed this population-based public health information system. Now at the township level, it is possible to report directly to the Central Government and the Government can respond quickly. The second example of achievements through the use of information technology is in Dongcheng District in Beijing, where an integrated community health network has been established. There is integration between the 126 healthcare centres, 82 general practitioner workstations, community healthcare centres and the hospitals. The network provides lifetime monitoring of people's health statuses with a comprehensive health record which links to management as well as performance evaluation of the doctors, who are paid according to their workload and the quality of their performance. Online consultation is also available. The individual health records can also link to family health records. If a family has a problem with hypertension, a general practitioner or nurse will visit the household and give some dietary advice (e.g. salt intake).

Shanghai Min Hang District also has an integrated information system for health management, which has successfully combined individual health status information with diagnostic and treatment information in the local hospital. A regional integrated health network has been set up with software packages which help to manage non-communicable diseases and enhance early detection. This system can also support remote consultation, and patients can assess doctors' performance which is one of the key performance indicators of doctor's pay. This system has been proved to decrease the total costs of the healthcare system.

As these examples show, the developments in information technology can help to restructure the entire healthcare system, and to integrate health delivery across public health and primary care to the secondary and tertiary services.

In conclusion, a lifetime seamless health maintenance system needs to be created. China has 1.3 billion people and is facing an ageing society. China's disease pattern is increasingly similar to that of developed countries. Cancer is the main cause of death. However, the per capita GDP in China is only around US\$3000 which is not sufficient to set up a disease care system; a healthcare system is needed. China will spend the limited resources on maintaining people's health, reducing the risk of getting ill and providing maintenance from birth to death. Currently, the healthcare reforms are pushing forward smoothly, and ordinary people are already benefiting from the changes. With government determination, public support and the help of information technology, China's healthcare reforms will provide universal healthcare coverage to the whole population in the near future, and create a low-cost, efficient healthcare system.

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#### **Competing interests**

None declared.

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