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Letter to the Editor

Strengthening public health governance for disease control: experience from China's approach to managing the COVID-19 pandemic



The COVID-19 pandemic has caused many countries to re-evaluate their health systems and led to huge investment in building health infrastructure, including building health facilities, scaling up laboratory, and medical equipment, purchasing medical supplies, training additional staff, strengthening public health surveillance systems, and so on.¹ However, the surge of COVID-19 cases in some countries with excellent health infrastructure and looking at the experience of China suggest that a successful response should go beyond strengthening the health infrastructure.

China was the first country severely hit by the novel virus and one of the first countries that successfully contained the threat of the virus with regained economic vitality.^{2,3} Close examination of the approach taken by China reveals that besides health infrastructure, it is critical to build strong national commitments to public health grounded in five core principles of public health governance. These principles include strong leadership, clear accountability, swift social mobilization, high levels of public trust, and effective communication.

Strong national leadership is evident among most countries that have successfully tackled the COVID-19 pandemic.^{4,5} As soon as COVID-19 was identified as a national threat, the Chinese central government quickly established a clear line of coordination and communication channel that reached out to all levels of government. Chinese President Xi Jinping initiated the process through a series of urgent meetings on COVID-19 that reached 170,000 officials from central agencies to county governments. The response, led by Vice-Premier Sun Chunlan, was centered in Wuhan where she led a team of dozens of government officials from central agencies in response to China's epidemic. At the core of the response was a series of policies used to mitigate both the health and economic shock from COVID-19. These policies included free coronavirus testing, free medical care for COVID-19 patients, and tax cuts for small businesses. The success of these policies was dependent on a unified plan guided through strong leadership informed by public health practice.

Prioritization at the central level made leadership at all levels accountable for implementing COVID-related policies and achieving their desired outcomes. The pandemic also served as a test of the responsiveness and capacity of local officials to emergencies. Those who performed poorly in the emergency were ousted from their positions. To further enhance transparency and accountability, local governments held multi-sectoral public daily briefings on COVID-19 for their citizens during the height of the pandemic. Such measures created a system of local accountability that

substantially accelerated the implementation of essential disease control measures and enhanced the trust of citizens in local governments.

The top leadership also stressed a whole of society approach, a critical lesson learned from the SARS outbreak in 2003. Individuals at all levels of government and non-government organizations were quickly mobilized. Scientists decoded the genomic sequence of the novel virus and developed diagnostic test kits. At the same time, doctors and nurses started treating and caring for patients on the frontlines. More than 40,000 medical doctors, nurses, and other health professionals were rallied from all over the country to fill a need for medical personnel in Hubei province and Wuhan. The level of commitment from the government also served to ensure the continuation of essential activities with minimal interruptions, including adequate food supplies for residents, sufficient medical supplies for health professionals, and needed treatment for patients. These efforts were supported by thousands of volunteers who, for example, served as social workers in hospitals and truck drivers to transport medical supplies and food. The comprehensive system of neighborhood associations woven into China's urban areas was also mobilized to deliver food and conduct temperature checks on residents.

The success of the implementation of the whole of society approach was underpinned by the Chinese's high level of trust and support for the central government. High levels of public trust have been documented in China⁶ and this was maintained during COVID-19,⁷ which facilitated the collaboration and compliance in implementing government policies. This was particularly crucial since the outbreak occurred right before the Chinese New Year when millions of people had plans to travel around the country. The government instituted a travel ban just as the holiday was beginning. The established level of public trust helped transform Wuhan, a city of 11 million people, into a silent 'empty' city with little traffic, practically overnight. This public trust also fostered the government's ability to test 11 million residents in Wuhan for the virus within two weeks.

Last, but not least, well-established internet infrastructure played an important role in disease control. Messages communicating prevention measures (e.g. wearing masks) and places to seek help were disseminated through mobile devices to ease the panic among the public. Digital technology was also widely used. A nationwide mobile-based Health Code system was used for contact tracing, and many hospitals set up telemedicine networks to minimize COVID-19's disruption of essential medical activities.⁸

The use of digital technology substantially enhanced the efficiency and effectiveness of disease control interventions.

China's response to COVID-19 has certainly not been perfect. There was a likely initial delay in detecting the disease and the weak primary health system limited patient treatment at the beginning of the epidemic. Nevertheless, China's swift and decisive actions to contain COVID-19 saved lives and paved the way for a quick economic rebound,⁹ and sheds light on the essential elements of the public health governance. As the world faces yet another surge of COVID-19 and the pandemic hits the one-year mark, bolstering national capacity for preparedness and response to COVID-19 and future pandemics should prioritize strengthening public health governance along with a coordinated execution of a whole of society approach supported by national investment in health for all.

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