DOI: 10.1111/resp.14093

LETTER FROM ASIA-PACIFIC AND BEYOND

COVID-19 situation in Pakistan: A broad overview

Respirology

WILEY

The coronavirus disease 2019 (COVID-19) pandemic has ravaged Pakistan, the most populous country in the Eastern Mediterranean Region. It has a significant population of age 50 years and above (30 million) and one of the worst health indicators in the world. With such poor numbers, the pandemic is further testing the capacity and capabilities of the country's fragile health system.

Pakistan reported its first severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) case on 26 February 2020—a traveller from Iran—almost 2 months after the first case in Wuhan, China. Currently, the number of cases has reached 804,939 with 17,329 deaths with a case fatality ratio of 2.2% ranging from 0.9% in Islamabad to 2.8% in Azad Jammu and Kashmir, Khyber Pakhtunkhwa and Punjab.¹ There is widespread community transmission throughout the country with 87,794 active cases. However, the country could not ramp up its testing capabilities and currently it is standing at 160th position in the world with just above 50,000 COVID-19 tests per million population. Therefore, Pakistan is in dire need to enhance its testing capacity for timely detection and response to the outbreak.

The initial Pakistani response to the pandemic was swift as the government pre-emptively closed its land, sea and air borders on 13 March 2020. In our earlier work, we found that a significant proportion of quarantined international travellers (10%) tested positive and most of them remained asymptomatic (unpublished observations). Thus, the country was able to trace many potential carriers of the virus at its border. Also, a nationwide lockdown was implemented in the third week of March 2020. All the educational institutions, government offices, markets, business centres, parks, etc., were closed down to reduce the spread of COVID-19. During the first wave, all the elective health services were halted, and human resources for health as well as equipment and logistics were directed towards the COVID-19 pandemic containment. Rapid response teams comprising primary healthcare doctors, nurses and paramedics were trained for COVID-19 surveillance and contact tracing for the rapid identification of cases. Similarly, quarantine and isolation centres as well as COVID-19 high-dependency units and intensive care units were established for managing patients. Provincial and National COVID-19 Command and Control Centers (PCOCs and NCOCs) have been established to guide and support the District COVID-19 Command and Control Centers.

In early April 2020, the country was testing about 5000 people daily. Later, all the provinces worked towards increasing their testing capacity reaching 30,000 by late June 2020. According to NCOC, the positivity rate during the

first wave ranged from 18% to 23%. The first wave peaked on 14 June 2020 and the cases and the positivity rate started to decline afterwards. By 30 August, the country was performing only 18,017 tests to confirm 213 cases. However, soon the cases started to increase and in late November 2020, the NCOC declared the second wave of pandemic.¹

During this second wave, the positivity rate ranged between 8% and 11% with the daily number of cases ranging from 2500 to 3000 in the country.¹ This time, instead of complete lockdown, a smart or partial lockdown strategy was implemented in localities with a higher positivity ratio. All the hospitals, offices and business centres remained open during the second wave under the new COVID-19 standard operating procedures. The cases started to decline in January and February 2021 and the national positivity declined to about 3%–5% during these months. However, in early March 2021, cases started to increase again, and the positivity surged to about 10%-11% which is declared by NCOC as a third wave.¹ In response to this latest wave, the local as well as the provincial administration are continuing the smart lockdown strategy even though the average positivity rate has reached to 12%. In districts with high burden of cases, the bed occupancy in COVID-19 wards has reached to 50%-80% during the current surge. It is this wave which is testing the capacities of the country's healthcare system and, apparently, the system is experiencing pandemic fatigue.

Pakistan started rolling out COVID-19 vaccination in early February 2021 throughout the country. The country has received Sinopharm and Cansino vaccines from China and will also receive vaccines as a part of the COVID-19 Vaccines Global Access (COVAX) initiative. As of 27 April, about 2 million doses are administered in the whole country. Currently, the vaccines are only provided to over 50 years of aged people and healthcare workers. The combined number of vaccine doses administered per 100 people in the total population is 0.9 in Pakistan.

By looking at the second and third wave experiences of India and Britain, Pakistan needs to be alert more than ever. The country needs to improve contact tracing of positive patients to detect and respond to localized outbreaks rapidly. Similarly, the infection prevention and control measures within the healthcare settings need to be followed to prevent the frontline healthcare workers from contracting COVID-19. Furthermore, genetic sequencing of the virus to detect mutation is critical, but unfortunately it is an ignored aspect in the country. Health authorities need to ramp up genetic sequencing to map any new variants of the virus to tailor the response accordingly.² In addition to these measures, the health authorities also need to focus on risk communication and community engagement to deal with the misconceptions regarding COVID-19. Pakistan is lagging behind the neighbouring countries in the vaccination drive and merely relying on international aid for vaccination will not serve the purpose. The country will need to invest properly and increase the pace of the vaccination to reach the threshold for herd immunity.

In a developing country like Pakistan, which is already facing serious challenges related to security, economy and political instability, disease outbreaks seriously challenge its already fragile health system. Lack of political will, ineffective health policies, weak governance and an indifferent attitude of the public towards general protective measures are adding insult to the injury. It is high time for the country to reset its priorities and work towards improving the health system to effectively manage health challenges.

KEYWORDS

COVID-19, Pakistan, SARS-CoV-2 positivity

CONFLICT OF INTEREST

The authors have nothing to disclose.

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REFERENCES

- Softnio. COVID-19 Health Advisory Platform, Ministry of National Health Services Regulations and Coordination, Government of Pakistan. 2021. https://covid.gov.pk/. Accessed 29 Apr 2021.
- Umair M, Ikram A, Salman M, Khurshid A, Alam M, Badar N, et al. Whole-genome sequencing of SARS-CoV-2 reveals the detection of G614 variant in Pakistan. PLoS One. 2021;16:e0248371. https://doi. org/10.1371/journal.pone.0248371.

How to cite this article: Imran M, Khan S, Khan S, Uddin A, Khan MS, Ambade P. COVID-19 situation in Pakistan: A broad overview. Respirology. 2021;26: 891–892. https://doi.org/10.1111/resp.14093