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## The challenges brought by the COVID-19 pandemic to health systems exposed pre-existing gaps



The COVID-19 pandemic has brought new challenges to bear on health systems worldwide. No less important, it has exposed many of the existing failures of health systems and exacerbated their negative impact on the health of populations. For example, the pressures over health professionals in regions with inadequate staffing have increased even more, resulting often in burnout or poorer quality of care [1,2]. Furthermore, the effects of the pandemic widened disparities in access to services and health outcomes across populations and widened the gap between the rich and the poor [3–5]. While these effects were measured in all health systems, their impact was much greater in health systems with limited resources and infrastructures, which had already been facing challenges in their functioning and performance [6].

As a result of challenges faced by health systems in many low- and middle-income countries (LMICs), as well as the response of rich countries to the pandemic that tended to forgo global commitments in favor of local responses, the COVID-19 pandemic has also widened the gap between rich and poor countries in terms of resources, infrastructures, and workforce. Consequently, LMICs' health systems have struggled even more to attain their goals such as of improving population's health, being responsive to populations' expectations, and improving efficiency of service provision, while protecting the population from financial burdens [7]. Access, or lack thereof, to vaccines were a clear example of these global inequities [8], as well as global travels bans initiated by Western countries affecting the economies and freedom of movements of whole continents.

The articles in this special issue of *Health Policy Open* address the COVID-19 pandemic from multiple angles, regions, and countries, exploring the impact of the pandemic on health systems and the resulting policies. In particular, this special issue showcases two types of challenges that health systems faced during the pandemic: unknown challenges that the pandemic exposed; and previously known challenges and gaps that were exacerbated by the pandemic.

These challenges are well exposed by Hossaim et al., [9] who highlight how the insufficient supply medical products such as oxygen and and vaccine doses in LMICs raise the likelihood of death of COVID-19 patients. Insufficient supply of medical products and workforce to provide care is not new in LMICs but was exacerbated during the pandemic.

Haldane et al. [10] suggest that Uruguay's early success relative to other Latin-American countries in responding to the pandemic was related to rapidly implementing a suite of economic and social measures, instead of strict border closures and restrictions on movement. They conclude that incentives can be more effective than prohibitions

in supporting adherence to public health interventions by ensuring that effective social and economic safety net measures are in place to permit compliance with public health measures.

Along similar lines, Velez et al. have also analyzed national COVID-19 pandemic response, focusing on preparedness planning documents from a sample of seven (of the eleven) countries in WHO [11]. While plans described the required resources during the COVID-19 pandemic, none presented a clear description of the priority setting (PS) process (e.g., a formal PS framework, and PS criteria). Most of the plans were incomplete and included only a limited number of quality indicators for effective PS, which highlights the need for further research on how countries operationalize PS.

The case was different in the Eastern Mediterranean Region (EMR), where Razavi et al. found that national pandemic plans documented value of explicit priority setting in health system decision-making. However, it may not be at the top of the agenda for decision- and policymakers when responding to health emergencies and public health crises [12]. Health system fragmentation is exacerbated during conflict and contributes to COVID-19 inequities experienced across the EMR. Limited prioritization of vulnerable groups like refugees and migrants in planning documents have long-term health implications and exacerbate the burden of COVID within these groups.

Inequities and priority setting were also examined by Aiona et al. [13] who assessed the impact of the age-based COVID-19 vaccine prioritization by ethnicity in Denver, Colorado, and found that this prioritization decisions systematically disadvantaged communities of color irrespective of COVID-19 risk. In addition, in the first three phases of the vaccination rollout, 40% of hospitalizations and 16% of deaths occurred among those meeting age and long-term care facility criteria, and could have been averted.

Through an online survey and thematic analysis of public documents and chats, Lotta et al. illustrate how the pandemic added to existing vulnerabilities (mental health and burnout) and created new problems and imbalances in the work of community health workers in Brazil [14]. They conclude that the pandemic not only deteriorated community-health workers' working conditions, but also their relations with other health professionals (nurses and physicians), and of their ability to carry out their essential work in the public health system.

Glass et al. explore the possibilities enabled by cross-border agreements in the EU model and their applicability in the North American context. In the context of the COVID-19 pandemic, the authors explore the potential benefits and challenges of such agreements for both

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patients and healthcare systems and open the door for long-term cooperative policy planning [15].

The workforce shocks of the COVID-19 pandemic and the measures put in place to cope with them are used by Timmons and Morris to address the potential of licensing reforms [16]. An example of a "building back better" reflection, the authors review six alternatives considered to address shortages in primary care professionals – a shortage that existed long before the pandemic but was exacerbated by it.

While much of the efforts were focused on health systems, health and welfare of populations were affected by other determinants as well. In their study of household food security in Burkina Faso Traoré et al. addressed pattens of food insecurity during the pandemic and identified weak household (those headed by women, farm-depended households, and the poor) to be exposed to the risk of food shortages [17]. However, while these weaknesses predated the pandemic the authors also expose the risks faced by urban households that were more vulnerable to food shortages during the pandemic. This example of preexisting weaknesses compounded by new challenges, lead the way to forward policy planning that accounts for old and new shocks.

Looking at the actors participating in the health policy arena before and during the pandemic, Meessen and Perazzi point to the importance of existing mechanisms of participation in policy making [18]. Examining the role of national hospital associations in health system governance, the authors highlight the importance of plurality of actors in health policy forums, and their contribution to policy making post-pandemic.

Lastly, Faruk et al. address the seminal role of Social Network Sites (STS) in the process of coping in responding to the COVID-19 pandemic [19]. In their study in Bangladesh, the authors examined STS use patters as information sources during the pandemic and found that the absolute majority of their respondents (90%) have relied on STS for up-to-date news and pandemic information. And while social networks have played a significant role as sources of information, they have also been seen as sources of panic and misconceptions, pointing to the important role played by STS and the need of policy makers to address them as both a positive tool, and a negative force to be regulated.

While the discourse surrounding the pandemic tended to focus on the direct impact of the pandemic, on health systems, the studies in this special issue highlight that what appeared to be "pandemic-related new challenges" were the very same deficiencies that predated the pandemic. No less important, and as the special issue papers illustrate, many of the challenges that were framed as caused by the pandemic, were in fact, pre-COVID-19 challenges exacerbated by the pandemic. It would be misleading to address these shocks as new, surprising and unpredictable. Rather, they are an expression of long-term systemic failures. The papers in this special issue share a common message that while these shocks disrupted health systems, they bear potential lessons on how to mitigate these long-term failures.

While the COVID-19 pandemic did not create many of these problems, it has highlighted and exacerbated many of their impacts, particularly inequities. Health inequities – in and between countries – have long been the grounds for the call to address the social determinants of health as well as the need to strengthen health systems functions and performance. And, while many health systems are still recovering from the damage done by the pandemic, both directly due to the high demands and burden on infrastructure and workforce, or indirectly due to limitations on activities during lockdowns, movement restrictions and redirection resources [20], health systems shocks can also serve as catalysts for long-term policies and planning. Mitigating long-term failures does not mean responding to emergencies or single shocks. Rather, planning for the long-term and investing in shortcomings previously known from routine times by training workforce, building infrastructure and medical products, eliminating inequities, building strong governance, improving access to high-quality care, to name a few. No less important, the pandemic highlighted the crucial

role of reliable and timely data as they are the foundation of long-term planning and evidence-informed policies. Such policies will encourage "building back better" to create resilient health systems able to cope with challenges in both routine times and emergencies [21].

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Anat Rosenthal

Department of Health Policy and Management, School of Public Health, Faculty of Health Sciences, Ben-Gurion University of the Negev, Israel E-mail address: anatros@bgu.ac.il

Ruth Waitzberg\*

Department of Health Care Management, Faculty of Economics & Management, Technische Universität Berlin, Germany

The Smokler Center for Health Policy Research, Myers-JDC-Brookdale Institute, Jerusalem, Israel

\* Corresponding author.

E-mail addresses: Ruth.waitzberg@tu-berlin.de

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