

IMPACT OF COVID-19 PANDEMIC ON HEALTH SYSTEM IN SOMALIA

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Abstract

Somalia is one of the least developed countries in Africa with a fragile and unstable status, experiencing protracted conflicts, long-running wars and political unrest, all of which lead to a weakening of the country's health care system. In Somalia, the first case of COVID-19 was found in March 2020; at that time the country was facing two other challenges, which were the attack of desert locusts and flooding (river and flash floods) in 2019. In March 2020 after the first verified COVID -19 pandemic, Somali health institutions took extraordinary precautions such as; closing borders and schools, restricting travel, and banning most group events. The total confirmed cases in Somalia have reported 26.675 cases with 1,361 deaths in June 2022. According to the distribution of Somalia regions, Somaliland become the region that was reported the most cases and deaths. Somalia has grappled to control and successfully take action against the COVID-19 epidemic on its own due to the country's poor and underdeveloped health care system. In this manner, the WHO Country Office (WCO) in Somalia began the preparations for COVID-19 in January 2020, even before the first case was verified on March 16, 2020. Also, the Federal Government of Somalia, in cooperation with the United Nations and others, has established a toll-free contact center, water points to wash the people their hands with soap, providing the people with personal protective equipments (such as masks and gloves), screening travelers, increase vaccination coverage and etc. to limit the extend of COVID-19.

Keywords: Covid-19, Health system, Somalia.

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Somali'de Covid-19'un Sağlık Sistemi Üzerindeki Etkisi

Öz

Somali, kırılgan ve istikrarsız bir statüye sahip olan Afrika'daki en az gelişmiş ülkelerden biridir, ülkenin sağlık sisteminin zayıflamasına yol açan uzun süren çatışmalar, uzun süren savaşlar ve siyasi huzursuzluk yaşamaktadır. Somali'de, ilk COVID-19 vakası Mart 2020'de bulundu, o sırada ülke 2019'da çöl çekirgelerinin saldırısı ve sel (nehir ve sel baskınları) olan iki zorlukla daha karşı karşıya mücadele ediyordu. Mart 2020'de ilk doğrulanmış COVID -19 pandemisi sonrasında Somali sağlık kurumları sınırları ve okulları kapatmak, seyahatleri kısıtlamak aynı zamanda çoğu grup etkinliğini yasaklamak gibi olağanüstü önlemler aldı. Haziran 2022'de Somali'deki toplam onaylanmış vaka sayısı 26.675 vaka ve 1,361 ölüm olarak bildirilmiştir. Somali bölgelerinin dağılımına göre Somaliland en çok vaka ve ölüm bildirilen bölge olduğunu tespit edilmiştir. Somali, ülkenin zayıf ve az gelişmiş sağlık sistemi nedeniyle COVID-19 salgınını kendi başına kontrol etmek ve başarılı bir şekilde harekete geçmek için mücadele etti. Bu kapsamda, Somali'deki DSÖ Ülke Ofisi (WCO), ilk vaka 16 Mart 2020'de doğrulanmadan önce bile Ocak 2020'de COVID-19 hazırlıklarına başladı. Somali Federal Hükümeti, Birleşmiş Milletler ve diğerleri ile işbirliği içinde COVID-19'un kapsamını sınırlamak için ücretsiz bir iletişim merkezi kurdu, insanların ellerini dezenfektanla yıkamak için su noktaları, insanlara kişisel koruyucu donanım sağlamak (maske ve eldiven gibi), yolcuları taramak ve aşı kapsamını artırmak gibi önlemler almışlar.

Anahtar Kelimeler: Covid-19, Sağlık sistemi, Somali.

1. INTRODUCTION

Somalia is one of the least developed countries, with a population of 15 million people and a 3% yearly population growth rate. Somalia has been plagued by military war, murder, and a sequence of environmental and man-made calamities since the late 1990s, resulting in a long, drawn-out, and thorough the collapse state. As a result, the healthcare system is unstable, divided, and inadequate. Aid workers are frequently attacked because they perform life-saving humanitarian work. The country's ability to avoid, identify and react to the changes and emerging health dangers has been severely harmed (WHO, May 2020).

In Somalia, the first case of COVID-19 was reported in March 2020; at that time the country was facing two other challenges, which were the attack of desert locusts and flooding (river and flash floods) in 2019. This is compounded by elevated levels of susceptibility: seven out of ten Somalis live in scarcity. There are significant gender inequalities, and repeated challenges. As a result, the public authorities have been functioning hard to progress the country's health care system, move closer to universal health coverage (UHC), and improve preparedness by developing a National Action Plan for Health Security. In March 2020 the first verified COVID -19 pandemic later, Somali health institutions took extraordinary precautions such as; closing borders and schools, restricting travel, and banning most group events. (de Clerq, P. & Valbuena, B. , 2020).

Somalia has grappled to control and successfully take action to the COVID-19 epidemic on its own due to country's poor and underdeveloped health care system. In this manner, the WHO Country Office (WCO) in Somalia began the preparations for COVID-19 in January 2020, even before the first case was verified on March 16, 2020. In addition to this, Somalia has recently experienced a number of complicated humanitarian crises, including drought, flood, and starvation, as well as outbreaks of infectious diseases such as polio, cholera, and measles (WHO, 2021).

2. HEALTH CHALLENGES IN SOMALIA

Somalia had a vital public health system prior to the overthrow of the national health institution in early 1991, which was acceptable by African standards. Over the past 30 years, civilian and military governments had systematically expanded this structure. Although

regional medical officials had some authority, the Ministry of Health governed the organizational and administrative framework of the sector. By the time of this administration, the Somali health system was functional, with wide disparities in access to health facilities in Mogadishu and rest of the country. Access to healthcare has improved, with better health services being provided in Mogadishu funded by the international community. Overall, the impact on the health-care system has been extremely positive. Health professionals were the only source of better treatment for people from rural and metropolitan areas in the late 1980s, as stability and the economy improved. At the time, the Somali health system was reliable on all aspects (Barroy, H. & et al, 2019).

In 1991, when the Somali civil war broke out, the civil war devastated the infrastructure of the country, especially health services. Somalia's modest health infrastructure was destroyed or severely damaged during the devastating civil war. Land squatters, internally displaced persons, and armed clan militias have looted, destroyed, or taken possession of most health facilities. Many medical professionals, qualified nurses, midwives, and experienced health technicians were murdered or forced to leave the country. An estimated 90% of the people did not have access to rudimentary healthcare in 1992-1993. Non-governmental organizations, emergency aid agencies, and the commercial sector swooped in to fill the void left by the state-sponsored healthcare system's destruction (Barroy, H. & et al, 2019).

Private entrepreneurs, local governments, local non-governmental organizations, and global non-governmental organizations have all worked together to build healthcare providers of various quality throughout the country. Despite the fact that these programs have greatly increased the availability and accessibility of basic healthcare services, the majority of Somalis, particularly in rural and nomadic areas, still lack access to healthcare. Somalia has become one of the world's maximum protracted humanitarian calamities, negatively impacting health and development over the past three decades. As a result of the long civil conflict, the Somali population's health has deteriorated significantly. Military war has damaged health infrastructure, resulting in limited access to critical health facilities, putting a previously disadvantaged people at risk of sickness and hunger (Warsame, 2020).

For more than 30 years, the community health system in Somalia has not been functioning. Humanitarian non-governmental organizations play a critical part in filling gaps in health facilities in an almost exclusively private sector. In Somalia, there are health facilities which

reach 846, including 17 referral hospitals, 27 region hospitals, 248 maternity and 10 child health clinics, and 544 health posts. Nevertheless, most of these health-care institutions are understaffed and poorly disseminated, owing in part to the historical attentiveness of health-care services in metropolitan regions. Now Somalia is a country with a poor income. In terms of health, the population's greatest concerns are communicable diseases and respiratory infections, and Somalis have limited access to basic health care. Only 6% of Somalis are protected from health emergencies and infectious diseases, according to the International Health Regulations Index (Warsame, 2020).

3. EFFECT OF COVID-19 IN SOMALIA

Globally, in 17 June 2022, as WHO reported there have been 535,863,950 confirmed cases of COVID-19, including 6,314,972 deaths, hitting predominantly the United States, India, and Brazil, although numerous nations generally unaffected during the 'first wave' observed significant rises in cases (Gonzalez, T. & et al., 2020). Due to an absence of accessibility, insufficient capacity, and poor availability of healthcare systems, international health experts alerted of the ability for devastating COVID-19 outbreaks in low- and middle-income settings (LMIS), and even though affirmed cases across the African continent, including in Somalia, have remained generally low (Abdirahman Said & et al., 2021).

In Somalia, there have been 26,675 total confirmed cases of COVID-19 with 1,361 deaths as WHO reported in 17 June 2022 (WHO, 2022).

Table 1: Distribution of COVID-19 in Somalia

Regions	Confirmed cases	Death cases
Somaliland	9,577	577
Benadir	7,925	507
Puntland state	5,903	134
Jubbaland state	1,431	73
Galmudug state	638	30
Hir-Shabelle state	633	12
Southwest state	568	17

Source: OCHA COVID-19 Response in Somalia.

The above table describes the distribution of confirmed and death cases of COVID-19 among Somalia regions. As the table indicates the most confirmed cases were reported in Somaliland region with 9,577 cases which locate in the north of Somalia. The second most confirmed cases were informed from the capital city of Somalia known as Benadir region with 7,925 cases. Puntland, Jubbaland, Galmudug and Hir-shabelle states come after Benadir region with 5,903, 1431, 638 and 633 cases respectively. The region which reported the least cases was southwest state with 568 cases.

The table also displays that Somaliland become the region which has the highest number of deaths with 577 cases. The Benadir becomes the next region that has the most deaths with 507 cases. As we see in the table Puntland, Jubbaland, Galmudug and southwest states come after the Benadir region with 134, 73, 30 and 17 death cases respectively. After that the Hir-Shabelle region has the lowest number of deaths with 12 cases.

4. EFFECT OF COVID-19 ON HEALTH SYSTEM

Somalia is one of the least developed countries in Africa with a fragile and unstable status, experiencing protracted conflicts, long-running wars and political unrest, all of which lead to a weakening of the country's health care system. Somalia's health-care system is very different and at sometimes seems like complicated. The global COVID-19 pandemic has swamped and seriously stressed the health systems all over the world; however, the social and political setting of Somalia has provided particularly unusual difficulties in maintaining the country's progress toward universal health coverage (UHC). Due to decades of civil war and periodic environmental shocks such as severe droughts, floods, and cyclones, Somalia has been in a complicated humanitarian emergency scenario with impaired security and vulnerable health systems for the past 30 years (Global Financing Facility & World Bank Group, June 2020).

In 2021, World Bank reports indicate that the health system of Somalia became one of the most weak in the world. Decades of civil conflict, lack of security, and disease outbreaks, as well as environmental disasters such as droughts and floods, have destroyed the country, caused depletion the quality of the health outcomes. The pandemic happened at a period when the country's public sector lacked ICU beds, ventilators, and a central supply of

medical oxygen. In general, the health system in the country is underperforming, with disorganized and low-quality delivery of the services, restricted equal access, and an unequal availability of the health staff. The country's disease monitoring system is primitive and ineffective, making it difficult to recognize, manage, and respond quickly to any epidemic (Cocciolo, S. & et al , August 2020).

4.1. Testing capacity in Somalia

Somalia did not have PCR testing capacity at the start of the outbreak, therefore samples were transferred to the Kenya Medical Research Institute in Nairobi; is a WHO and US Centers for Disease Control (CDC) center which supported Somalia the laboratory to test the samples. Many tests came back positive as WHO proceeded to transport samples for testing from other parts of the country. While the disease is rapidly spreading throughout the community, also there is a need to isolate and treat the cases so the WHO increased testing capacity quickly by establishing 3 testing laboratories in Mogadishu, Garowe, and Hargeisa. The 3 molecular testing laboratories for COVID-19 were functioning by April 30, 2020. (Herring, E. & et al, 2020).

Due to the seriousness of the COVID-19 pandemic, this support became an extraordinary achievement for WHO and partners. UN agencies and foreign partners moved in to give cash for PCR apparatus and other laboratory materials, as well as aircraft to transport the equipment, particularly the Italian Development Cooperation, the UN Humanitarian Air Services, and the UN World Food Program. Furthermore, WHO sent two virologists from Ethiopia on a UN special plane to support with the skills and capacity required to manage these laboratories? The Puntland Forensic Center, with cooperation from the Swedish government and the UN Population Fund (UNFPA), has offered staff to help with COVID-19 testing. The WHO intends to put up testing labs in everywhere of the other states in the country. Due to the immensity of the country's geography, samples are now being transported by air to various testing locations (Herring, E. & et al, 2020).

4.2. Availability of Oxygen in Somalia

As Covid19 spreads without control, Somalia has been forced to rely completely on oxygen cylinders from private merchants, who are mostly based abroad, and on artificial cylinders, reducing supply continuity. WHO's Emergency Preparedness Unit collaborates with Ministries of Health in Somalia, donating 200 oxygen cylinders to meet local needs and provide a more sustainable and self-sufficient oxygen supply. As well as by helping COVID-19 patients, World Health Organization expanded their activities of offering oxygen assistance. It is also already helping to treat other diseases, resulting in a stronger health system generally (Agency, March 2021).

The government attempted to react to the pandemic as just a result of the growth of the Covid-19 and the lack of oxygen and other medical facilities, also removed some of its important highly qualified personnel who were currently involved in the overall performance effort. During the pandemic's onset, the Covid-19 led to the deaths of numerous health-care employees who were performing their duties. As a result, many HCWs were unable to fulfill their tasks efficiently since they had lost their teammates (Agency, March 2021).

4.3. Monitoring of Covid-19 in Somalia

Somalia's condition of fragile and the existence of civil war in the country have long been associated with inadequate health systems and weak health outcomes for the most of its citizens. People rely on relief agency services, such as health supplies, are directly or indirectly influenced by transportation limitations, and to manage COVID-19 by emphasizing on health system improvement, protective equipment supply, and Risk Communication and Community Engagement (RCCE). Training on COVID-19 observation, casework, and risk communication and community engagement (RCCE) was provided by international and national charitable organizations, which also improved research and testing capacity and constructed health and (underutilized) isolation institutions. Awareness was carried out by Community Health Workers (CHWs), who visited communities to detect cases, track down contacts, and raise awareness. Nevertheless, on April 28, 2020, some cases were confirmed in an Internally Displaced Persons (IDP) camp on the borders of Mogadishu (Gregory J. Wilson & Sarah Redd, October 2020).

The WHO country office (WCO) has taken on a significant technical advising role for public health officials, assisting in the development of the country pandemic prevention and intervention strategy as well as the incident management system team within the Federal Ministry of Health and Human Services. Close connections with the European Union (EU) Delegation, World Food Program (WFP), and UN Humanitarian Air Service to Somalia formed as a result of WHO's promoted collaboration with UN agencies and international donors (UNHAS). Each supplied WHO including in flying support for the shipment of critical equipment that allowed for the installation of testing laboratories as well as the distribution of life-saving supplies to sustain vital health services functioning. Furthermore, as a result of WHO's involvement in coordinating among partners, Somalia continued to collect samples for testing both during and after the lockdown (Ahmed Mohammed AM, & et al , 2020).

In contrast, WHO has stepped up its case management efforts, educating health-care professionals in casework and infection-control procedures, and subsequently donating a number of important hospital and health materials to Mogadishu's medical center. WHO is giving personal protection equipment and medical supplies to 18+ new isolation sites across the country, as well as educating health care staff. Isolation centers can be found all around the country (Gregory J. Wilson & Sarah Redd, October 2020).

5. AWARENESS OF COVID-19 IN SOMALIA

The Federal Government of Somalia, in cooperation with the United Nations and others, has established a toll-free contact center to limit the spread of COVID-19. Medical staff at the contact center offer free phone consultations to the general population. Every day, about 3,000 calls from all around Somalia are made to the free number 449. During COVID-19 pandemic, Somali authorities have launched a nationwide awareness campaign using both old and new ways methods to reach people. For example, radio, televisions and outdoor posters are being used to inform and warn people about the characteristics of the coronavirus, as well as social media networks to provide preventative measures and instructions (United Nation , April 2020)

The federal and regional governments of Somalia, in collaboration with numerous groups, have taken several steps to stop the transmission of COVID-19. These efforts include establishing water points throughout the country where tourists and locals can clean their hands with soap and water, and checking people on the overcrowded transit route between Somalia and Kenya for possible virus carriers. Donors, such as the German government, play a critical role in COVID -19 awareness and training plan. WHO Works with the Federal Government of Somalia and UNICEF to increase vaccination coverage and use all available resources to reach all Somalis who need to be vaccinated against COVID -19 (United Nation , April 2020).

The governments of France and the United States supplied 410,400 vaccine doses COVID -19 to Somalia in August 2021 through the COVAX facility. These dose donations are an immediate, short-term, and urgent option to increasing the country's equal and fair access to safe and inexpensive COVID-19 vaccines. In mid-August 2021, only 1.85 percent of Somalia population has received full COVID-19 vaccination. With Germany's help, Somalia can step up efforts to ensure that more Somalis who are eligible for life-saving immunizations get them. Only by working together it is possible to eradicate diseases such as COVID-19, which originated in Somalia. The country had received 652 886 doses as of October 25, 2021. So far, 289 925 (1.85%) persons have received full COVID-19 vaccinations, while 362 961 (2.32%) have received partial vaccinations (WHO, 2021).

WHO and UNICEF assisted the Ministry of Health in the safe and equitable distribution of vaccines by helping to manage the cold chain, vaccine training, and vaccine utilization monitoring. Social mobilizers continue to be sent into communities to facilitate vaccination and promote adherence to key preventive behaviors such as hand washing, mask wearing, and spatial segregation (WHO, May 2020).

6. CONCLUSION

Despite the fact that Somalia has faced serious health problems over the past three decades, the country has recovered. Since its recognition as a federal government, Somalia has built strong ties with a number of countries that support and promote all government agencies. Donors have contributed significantly to the country's health system and have also provided

humanitarian assistance. The health care system in Somalia is highly variable and at times complex. People who rely on the services of aid agencies, such as medical supplies, likely to be severely impacted by mobility constraints, and manage COVID-19 by focusing on improving the health system, providing protective equipment, and RCCE. The global COVID-19 pandemic has overburdened and severely stressed health systems. However, Somalia's social and political background has created very particular hurdles to sustaining the country's progress toward universal health coverage (UHC).

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REFERENCES

- Abdirahman Said, & et al. (2021, may 05). One more of life's difficulties: the impacts of Covid-19 on livelihoods in Somalia. Retrieved from Supporting Pastoralism and Agriculture in Recurrent and Protracted Crises: <https://www.sparcknowledge.org/news-features/features/one-more-lifes-difficulties-impacts-covid-19-livelihoods-somalia>
- Abdulahi, U., Kusow, A. A., & et al. (2020). Somalia's Education Sector: Fostering Skills through a Demand-Driven Education System. Mogadishu: Heritage Institute for Policy Studies and City University of Mogadishu., DOI: 10.4236.
- Abdulkadir Abdi, & et al. (2021). Preliminary findings of COVID-19 infection in health workers in Somalia: A reason for concern. *International Journal of Infectious Diseases*.
- Agency, A. (March 2021). COVID-19: WHO donates 200 oxygen cylinders to Somalia. Retrieved from Anadolu Agency: <https://www.aa.com.tr/en/latest-on-coronavirus-outbreak/covid-19-who-donates-200-oxygen-cylinders-to-somalia/2164678>
- Ahmed Mohammed AM., & et al . (2020). Evidence for significant COVID-19 community transmission in Somalia using a clinical case definition. *Int J Infect Dis* .
- Barre, A. G. (2020). Somalia Education Sector COVID-19 Response Plan. <https://planipolis.iiep.unesco.org/en/2020/somalia-education-sector-covid-19-response-plan-6926>.
- Barroy, H., & et al. (2019). Leveraging public financial management for better health in Africa: key bottlenecks and opportunities for reform. Health Financing Working Paper No.14. Geneva: World Health Organization.

- Cocciolo, S., & et al . (August 2020). Global survey highlights challenges and opportunities for public procurement during the Covid-19 pandemic'. World Bank blog,.
- de Clerq, P., & Valbuena, B. . (2020). 'Introduction: DS momentum in Somalia' Knowledge Matters, Special issue: durable solutions in Somalia. DS momentum in Somalia.
- Elhadi M., & et al. (2020). Assessment of healthcare workers' levels of preparedness and awareness regarding Covid-19 infection in low-resource settings. . Am J Trop Med Hyg .
- Gele AA, & et al . (2020). COVID-19 in Somalia: adherence to preventive measures and evolution of the disease burden . Pathogens .
- Gele , A., & et al. . (2017). Beneficiaries of conflict: a qualitative study of people's trust in the private health care system in Mogadishu, Somalia. . Risk Manag Health Policy. , 10:127–35.
- Global Financing Facility , & World Bank Group. (June 2020). Resource mapping and expenditure tracking n Somalia:. preliminary findings.
- Gonzalez, T., & et al. (2020). Influence of COVID-19 Confinement in Students Performance in Higher Education. Retrieved from <http://arxiv.org/abs/2004.09545>: <https://doi.org/10.35542/osf.io/9zuac>
- Gregory J. Wilson, & Sarah Redd. (October 2020). Strengthening Somalia's health systems: emerging stronger from Covid-19. Humanitarian Policy Group.
- Herring, E., & et al. (2020). Covid-19 and sustainable development in Somalia/Somaliland: lives, livelihoods and inclusion. . University of Bristol and Transparency Solutions. .
- Lancet. (2020). COVID-19: protecting health-care workers. . Lancet .
- MoECHE, & FRS. (2020). Somalia Education Sector COVID-19 Response Plan. Ministry of Education, Culture and Higher Education, Federal Republic of Somalia.
- MoEHE, & PSS. (2020). COVID-19 GPE Accelerated Funding Program Document. Ministry of Education and Higher Education, Puntland State of Somalia.
- UNESCO , & IESALC. (April, 2020). COVID-19 and Higher Education: Today and Tomorrow. Impact Analysis, Policy Responses and Recommendations. . Iesalc, , No. 9, 1-46.
- UNHCR. (2020). COVID-19 Response Somalia. Geneva: United Nations;.
- United Nation . (April 2020). Somalia braces for COVID-19. United Nation.
- Warsame, A. (2020). Somalia's healthcare system: a baseline study and human capital development strategy. Heritage Institute and City University of Mogadishu.
- WHO. (2021). COVID-19 response in a fragile setting: leveraging a challenge for UHC in Somalia. Retrieved from World health organization : <https://www.who.int/about/accountability/results/who-results-report-2020-mtr/country-story/2020/covid-19-response-in-a-fragile-setting-leveraging-a-challenge-for-uhc-in-somalia#>

- WHO. (May 2020, may). COVID-19: WHO's Action in Countries WHO Somalia: working with an expanded network of national and international partners to address COVID-19. COVID-19: WHO's Action in Countries.
- Yusuf, F. I. (2020). The Impact of COVID-19 on Higher Education in Mogadishu. Governance Brief 08 Examining.