

The COVID-19 Pandemic and Non-communicable Diseases—A Wake-up Call for Primary Health Care System Strengthening in Sub-Saharan Africa

Journal of Primary Care & Community Health
Volume 11: 1–3
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DOI: 10.1177/2150132720946948
journals.sagepub.com/home/jpc


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Abstract

Strengthening Primary Health Care Systems is the most effective policy response in low-and middle-income countries to protect against health emergencies, achieve universal health coverage, and promote health and wellbeing. Despite the Astana declaration on primary health care, respective investment is still insufficient in Sub-Sahara Africa. The SARS-CoV-2019 pandemic is a reminder that non-communicable diseases (NCDs), which are increasingly prevalent in Sub-Sahara Africa, are closely interlinked to the burden of communicable diseases, exacerbating morbidity and mortality. Governments and donors should use the momentum created by the pandemic in a sustainable and effective way by pivoting health spending towards primary health care.

Keywords

primary care, NCDs, COVID19, health system, Sub Sahara Africa

Dates received 16 June 2020; revised 8 July 2020; accepted 8 July 2020.

Non-communicable diseases (NCDs) such as hypertension, diabetes, COPD, cardiovascular disease, and cerebrovascular disease are major risk factors for severe disease and mortality in patients with COVID-19.¹ These risk factors are increasingly prevalent in Sub-Sahara Africa (SSA). According to the WHO disease burden and mortality estimates the proportion of all deaths in the WHO Africa region that are attributable to NCDs have increased from 22.8% (2.2 million) in 2000 to 34.2% (3.0 million) in 2016.² This may exacerbate the impact of the SARS-CoV-19 pandemic in a region challenged by weak primary and tertiary health care systems and lack of enough qualified health workforce.³ Currently, reliable data on infections, hospital admissions, and mortality from Sub-Sahara Africa is scarce with about 3100 deaths registered across the continent in May 2020.⁴ At the same time the restrictive measures introduced in most countries (eg, lockdowns) will likely worsen health in people living with NCDs due to reduced physical activity, reduced access to healthy foods, mental health burden and hindered access to health services.⁵ In large parts of SSA these indirect consequences of the SARS-CoV-19 pandemic are even more severely felt as many depend on

subsistence farming, extended families and day labor to afford food and health care. In many countries in SSA health care systems, specific health programs and thereby much of the health care expenditure is still directed towards the co-existing communicable diseases, in particular HIV, tuberculosis and malaria.⁶ Further to behavioral risk factors (tobacco use, physical inactivity, the harmful use of alcohol,

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and unhealthy diets), environmental and socio-economic factors such as air pollution, climate change, trade agreements, and aggressive marketing of unhealthy products are accelerating the NCD epidemic.⁷⁻¹⁰ The Coronavirus pandemic comes as a wake-up call to tackle these interrelated health challenges in Sub-Saharan Africa in a sustainable manner.

Strong primary health care systems have time and again proven their key role in ensuring population health in low- and middle income countries.¹¹ Correspondingly, primary health care is one of the main programmatic engines to achieve the World Health Organization's strategic objectives of (1) protecting against health emergencies, (2) achieving universal health coverage, and (3) promoting health and wellbeing.¹² Their important role in health emergencies is again being demonstrated during the SARS-CoV-2019 pandemic, where strong primary health care systems have helped countries to respond faster, more effectively and with better health outcomes for their populations.¹³ In addition to their capacity to play an important part in a "test, trace and isolate" public health strategy, strong primary health care systems also maintain essential health services to communities including reproductive, maternal and child health care; HIV/AIDS, TB, and malaria services; mental health, and treatment for chronic diseases. In addition, primary health care systems ensure that NCD patients continue to access care and healthy diet to reduce their risk of severe COVID-19 disease and mortality. Countries with a well-developed telemedicine infrastructure (eg, able to offer video consultations) were able to respond faster to new situation.¹⁴ Here, the SARS-CoV-2019 pandemic could serve as an important accelerator for the evolving but still limited eHealth and digital telemedicine infrastructure in most of Sub-Saharan Africa.¹⁵ The second objective of universal health coverage is defined as ensuring that all people have access to needed health services of sufficient quality to be effective while also ensuring that the use of these services does not expose the user to financial hardship, which is not only a moral obligation but is the best long term strategy to ensure more productive lives and reduced impoverishment. The most cost-efficient way to ensure access to both health care for communicable and non-communicable disease are horizontally integrated primary health care systems that involve the community (eg, community health workers).¹⁶ In particular the third pillar of the strategy to ensure population health, promoting health and well-being, touches upon NCDs as those can only be controlled in a sustainable manner by employing primordial, primary and secondary prevention strategies. Due to its holistic nature, community-focus, and core values, PHC aligns well with the needs of the NCD epidemic, reflecting the challenges of chronic conditions that require long-term treatment and community-based prevention.¹⁷ The SARS-CoV-2019 pandemic reminds us once again of

the interrelated breadth of health challenges and how they can amplify each other. We also know that a powerful antidote to this crisis is strong primary health care systems.

In the *Abuja declaration* the members of the African Union in 2001 pledged to set a target of allocating at least 15% of their annual budget to improve the health sector and urged donor countries to scale up support.¹⁸ According to the World Bank countries in Sub-Saharan Africa are only spending about 5% of their gross-domestic product on health compared to a world average of about 10% and official development assistance for health systems strengthening has not been able to fill this financing gap.¹⁹ In 2018 primary health care strengthening was again made a priority by the global health community based on the Astana declaration.²⁰ Furthermore, a wealth of experience and evidence for improving PHC financing, governance and implementation exists that can facilitate PHC strengthening in low- and middle-income countries.^{16,21} Despite these developments, primary health care structures, as well as tertiary level critical and specialized care, are still inadequate and inefficient in large parts of Sub-Saharan Africa.¹⁵ A recent study found that across this region close to 30% of people cannot access emergency care within two hours of travel time.²² A recent estimate is showing that SSA countries may need about 3% of GDP, or 53 US\$ billion, of additional funding for prevention, treatment and surveillance of COVID 19 pandemic.²³ Over the last years evidence, policy and best practice examples have accumulated on how to make integrated primary health care systems in low- and middle-income countries a reality. When primary health care systems are (re-) built and strengthened they should become part of prevention, early detection, and mitigation of disease outbreaks. To ensure equitable access (tax-based) investments in Universal Health Coverage and PHC need to ensure primary care is free at the point of care. Development funding (official development funding) can be used to ensure integration of priorities (eg, HIV, maternal and child health, NCDs, preparedness and PHC) across health care systems. A sufficient number of appropriately-trained health care workers are a key element of any health care system. To ensure health needs are met effectively all professions need to be able to practice to the full scope of their abilities, including community health workers. Involving communities and users in the provision of their health care helps increase acceptance and efficiency of services. Data is the basis for sustainable decision making for health systems, which makes integrated surveillance and monitoring as well as research corner stones of health care strengthening. Digitalization can help facilitate these processes.¹⁶

Now it is up to national policy makers to ensure adequate financing, governance and implementation of PHC while providers of official development assistance and donors need to move their programmatic focus from vertical disease specific intervention to health systems strengthening.

Declaration of Conflicting Interests

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

Funding

The author(s) received no financial support for the research, authorship, and/or publication of this article.

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References

1. Wang B, Li R, Lu Z, Huang Y. Does comorbidity increase the risk of patients with COVID-19: evidence from meta-analysis. *Aging (Albany NY)*. 2020;12:6049-6057.
2. World Health Organization. *WHO NCDs Progress Monitor 2017*. <https://ncdalliance.org/resources/who-ncds-progress-monitor-2017>. Published 2017. Accessed May 9, 2020.
3. Mash R, Howe A, Olayemi O, et al. Reflections on family medicine and primary healthcare in sub-Saharan Africa. *BMJ Glob Health*. 2018;3(suppl 3):e000662.
4. Africa COVID-19 cases top 100 000. WHO | Regional Office for Africa. <https://www.afro.who.int/news/africa-covid-19-cases-top-100-000>. Accessed July 7, 2020.
5. Aebischer Perone S, Martinez E, du Mortier S, et al. Non-communicable diseases in humanitarian settings: ten essential questions. *Confl Health*. 2017;11:17.
6. Kushitor MK, Boatemaa S. The double burden of disease and the challenge of health access: evidence from Access, Bottlenecks, Cost and Equity facility survey in Ghana. *PLoS One*. 2018;13:e0194677.
7. Nyirenda MJ. Non-communicable diseases in sub-Saharan Africa: understanding the drivers of the epidemic to inform intervention strategies. *Int Health*. 2016;8:157-158.
8. NCDs | Tackling NCDs. WHO. <http://www.who.int/ncds/management/best-buys/en/>. Accessed March 19, 2020.
9. Townsend B, Schram A. Trade and investment agreements as structural drivers for NCDs: the new public health frontier. *Aust N Z J Public Health*. 2020;44:92-94.
10. Rother H-A. Controlling and preventing climate-sensitive noncommunicable diseases in urban sub-Saharan Africa. *Sci Total Environ*. 2020;722:137772.
11. Macinko J, Starfield B, Erinosh T. The impact of primary healthcare on population health in low- and middle-income countries. *J Ambul Care Manage*. 2009;32:150-171.
12. Thirteenth General Programme of Work 2019–2023. <https://www.who.int/about/what-we-do/thirteenth-general-programme-of-work-2019-2023>. Accessed May 20, 2020.
13. Dunlop C, Howe A, Li D, Allen LN. The coronavirus outbreak: the central role of primary care in emergency preparedness and response. *BJGP Open*. 2020;4(1):bjgpopen20X101041. <https://bjgpopen.org/content/4/1/bjgpopen20X101041>. Accessed May 20, 2020.
14. Sarbadhikari S, Sarbadhikari SN. The global experience of digital health interventions in COVID-19 management. *Indian J Public Health*. 2020;64(suppl):S117-S124.
15. Babalola TK, Moodley I. Assessing the efficiency of health-care facilities in Sub-Saharan Africa: a systematic review. *Health Serv Res Manag Epidemiol*. 2020;7:2333392820919604.
16. Kraef C, Kallestrup P. After the Astana declaration: is comprehensive primary health care set for success this time? *BMJ Global Health*. 2019;4:e001871.
17. Alessandro R, Demaio, Karoline Kragelund Nielsen, Britt Pinkowski Tersbøl, Per Kallestrup & Dan W. Meyrowitsch (2014) Primary Health Care: a strategic framework for the prevention and control of chronic non-communicable disease, *Global Health Action*, 7:1, DOI: 10.3402/gha.v7.24504
18. WHO. The Abuja declaration: ten years on. http://www.who.int/healthsystems/publications/abuja_declaration/en/. Accessed May 27, 2020.
19. The World Bank. Current health expenditure (% of GDP) - Sub-Saharan Africa. <https://data.worldbank.org/indicator/SH.XPD.CHEX.GD.ZS?contextual=max&locations=ZG-1W>. Accessed May 20, 2020.
20. World Health Organization. *Declaration of Astana*. Global Conference on Primary Health Care, Astana, Kazakhstan, October 25-26, 2018.
21. Baiden F. Making primary healthcare responsive to non-communicable diseases in sub-Saharan Africa. *Trans R Soc Trop Med Hyg*. 2020;114:229-231.
22. Ouma PO, Maina J, Thurairana PN, et al. Access to emergency hospital care provided by the public sector in sub-Saharan Africa in 2015: a geocoded inventory and spatial analysis. *Lancet Glob Health*. 2018;6:e342-e350.
23. Schneider P, Pivodic F, Jison Yoo K. How much health financing does Sub-Saharan Africa need to fight COVID-19 (coronavirus)? <https://blogs.worldbank.org/health/how-much-health-financing-does-sub-saharan-africa-need-fight-covid-19-coronavirus>. Accessed June 1, 2020.