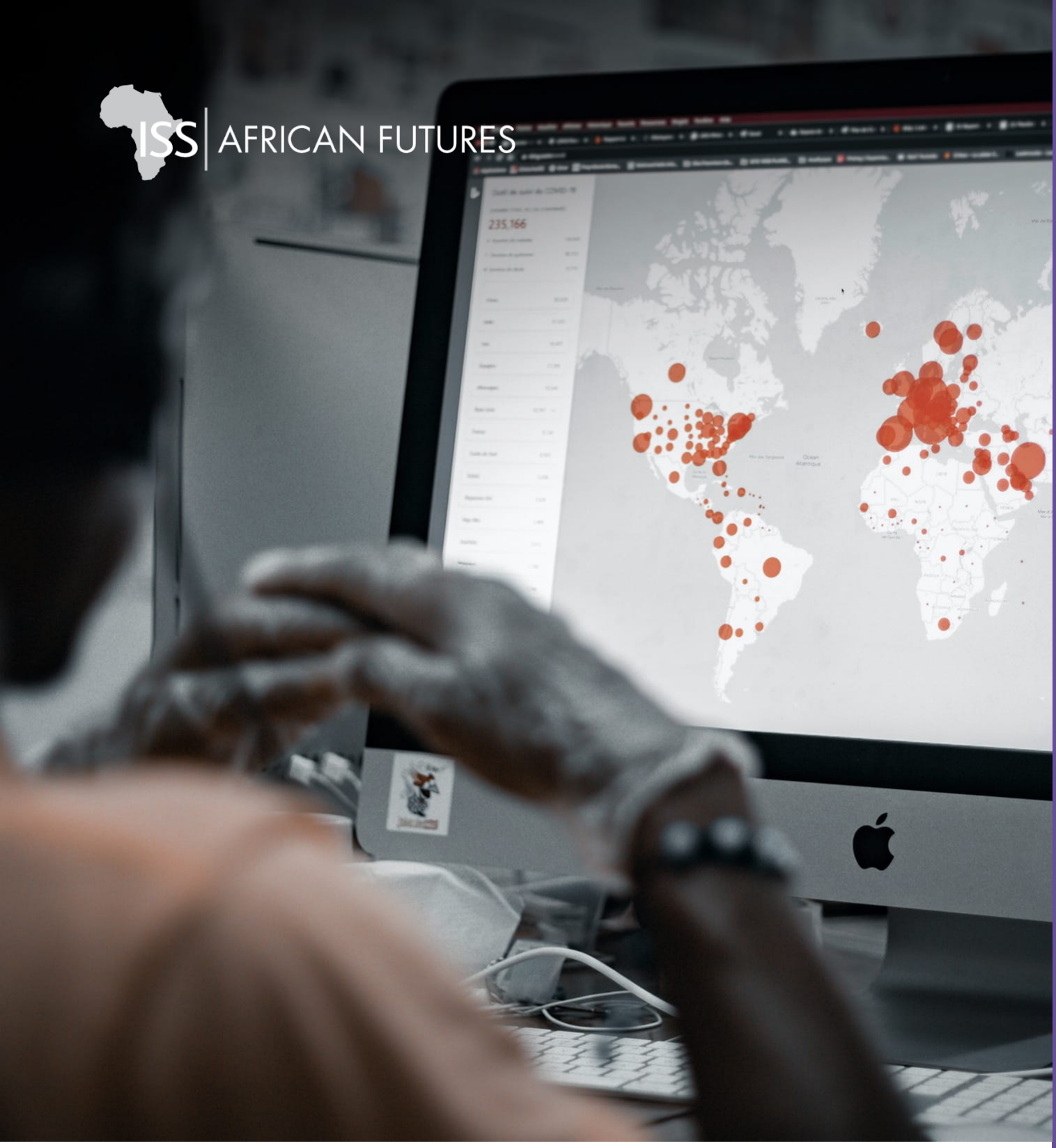

Impact of COVID-19 in Africa: A scenario analysis to 2030 (July 2020)

Lockdowns, testing and tracing

Jakkie Cilliers

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Lockdowns, testing and tracing

At first blush Africa appeared to many to be particularly susceptible to COVID-19, due to the continent's crowded informal urban settlements and the challenges these pose to the implementation of measures such as social distancing.

In addition, many African countries have relatively low levels of access to safe water, generally considered the first line of defence against COVID-19. They also have high levels of undernourishment, poorly funded health systems and underlying health conditions such as tuberculosis and HIV/Aids. The average percentage of the population in Africa with improved water access was 78% in 2019, compared to the average for the rest of the world of 96%. In Africa, only Mauritius, Algeria, Egypt, Tunisia, Cape Verde, Botswana, Seychelles, and São Tomé and Príncipe are above the average for the rest of the world.

Furthermore, countries in sub-Saharan Africa generally spend significantly less on health as a percentage of GDP compared to all other regions globally, except South Asia. [1] Many African countries adopted public health and mitigation measures taken by states that were more advanced in their response to the pandemic, such as China, and generally reacted rapidly despite limited resources and capacity. Countries closed their borders and some embarked on a comprehensive lockdown strategy, accompanied by contact tracing to map transmission clusters and isolate people suspected of being infected.

A number of countries, such as Uganda and South Africa, rapidly established expert panels to guide their pandemic response. Others, such as Ghana, decided against a full lockdown, opting instead for a partial one, backed by vigorous contact tracing and monitoring. Rwanda disinfected and decongested its food markets and provided sanitary facilities along key rural-urban public transport corridors, while Senegal established mobile teams that targeted their response to where the disease was reported. [2]

The intention was to flatten the rate at which COVID-19 infections increase, buy time for public officials to improve the capacity of health systems, and improve their readiness to deal with the anticipated full impact of the pandemic. The continent was able to benefit from the experiences gained from previous diseases such as Chikungunya. Some 41 African countries have experienced at least one epidemic, such as the Ebola epidemics of 2014-16 in West Africa and 2018-2020 in the Democratic Republic of the Congo (DR Congo), and recurrent Lassa fever epidemics in Nigeria. [3]

While some countries such as New Zealand have been able to reduce infection rates through a comprehensive set of interventions, some of these measures are difficult to implement effectively in much of Africa. This is due to low state capacity, widespread poverty, high levels of informality and the absence of adequate social safety nets on the continent.

Flattening the COVID-19 infection curve therefore might avert the collapse of a national health system but potentially have far-reaching impacts on the economy and livelihoods. In addition, with fewer hospital beds, physicians and intensive care facilities per million people than other regions, most African health systems will be unable to cope once infection rates accelerate, as is expected to happen in the latter half of 2020.

New medicines will help in responding to COVID-19. In mid-June the use of the well-known and relatively inexpensive steroid dexamethasone was hailed as the first major breakthrough in the treatment of patients who are severely ill with the coronavirus.

Dexamethasone is claimed to reduce deaths by one-third in severely affected patients in need of ventilation and by one-fifth in patients receiving oxygen only, but there was no benefit among patients who do not require respiratory support. [4] Other medical treatments will inevitably follow with important impacts on the mortality forecasts referred to

in this and other reports. Without effective medicine or a vaccine that can be manufactured and rolled out on a massive scale, COVID-19 will affect Africa for some time to come.

Countries such as Sweden, with much more health capacity than African states, experimented with an alternative approach. It opted not to institute a lockdown and allow for the development of herd immunity instead but is now moderating its policies. [5] Herd immunity would probably require that up to 80% of the total population becomes infected. There would be large health, economic, social and political uncertainties on the path to that level of immunity — bearing in mind that at current methods and levels of testing most countries are below infection rates of 10%

The potential health, economic, social and political impact of infection rates of 30%, 50% or 70% of a total population are currently unknown and a lot depends on the symptoms and severity with which people are affected. Our current limited insight and data about why the pandemic is spreading so unevenly in Africa may result in an outcome where COVID-19 settles into an endemic equilibrium, as is the case with seasonal flu.

Africa and the rest of the global community may learn to live with COVID-19. And, as we explore below, the current low transmission, fatality and infection rates in Africa indicate large uncertainties as to how the pandemic will ultimately affect the continent.

Endnotes

1. Average health expenditure in sub-Saharan Africa is roughly 2.6% of GDP. It is three times that in North America and in Europe.
2. Africa Center for Strategic Studies, African Adaptations to the COVID-19 Response, 15 April
3. A Otu, B Ebenso, R Labonte and S Yaya, Tackling COVID-19: Can the African continent play the long game?, Journal of Global Health, 10:1, 2020, 10339. Note: Chikungunya is a viral disease transmitted to humans by infected mosquitoes. It has been identified in over 60 countries globally, including most prominently in the DR Congo and Gabon. Lassa fever is an acute viral haemorrhagic illness caused by the Lassa virus. It is endemic in Benin, Ghana, Guinea, Liberia, Mali, Sierra Leone, Togo and Nigeria.
4. World Health Organization (WHO), WHO welcomes preliminary results about dexamethasone use in treating critically ill COVID-19 patients, 16 June 2020
5. R Haussman, Managing COVID-19 in the Americas, Africa and the Middle East, 29 May 2020

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Dr Jakkie Cilliers is the ISS's founder and former executive director. He currently serves as chair of the ISS Board of Trustees, head of the African Futures and Innovation (AFI) programme at the Pretoria oce of the Institute, and is an extraodinary professor at the University of Pretoria. His 2017 best-seller Fate of the Nation addresses South Africa's futures from political, economic and social perspectives. His three most recent books, Africa First! Igniting a Growth Revolution (March 2020), The Future of Africa: Challenges and Opportunities (April 2021), and Africa Tomorrow: Pathways to Prosperity (June 2022) take a rigorous look at the continent as a whole.

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