

By Cyrus Sinai and Rob Fetter

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**T**here's hope that some industrialised countries will achieve near-universal vaccination against COVID-19 in the coming months. Yet the effort to vaccinate even the most essential workers in developing countries has only just begun. By current estimates, achieving herd immunity (to current strains) will require at least 75% of the world's population to be vaccinated. Some developing countries haven't reached that level of coverage even for common vaccine-preventable diseases like measles and polio.

Many low-income countries will soon get vaccine access through the COVAX initiative. The first doses distributed in sub-Saharan Africa under COVAX were injected at the end of February. Around 30 million more doses are expected to arrive in March 2021.

But the success of national distribution efforts depends on a functional cold chain. This is an uninterrupted system of storage, transport and delivery of vaccines at low temperatures all the way from national warehouses to local clinics and into the arms of people.

Most vaccines must be stored between 2°C and 8°C. This is the case for polio and measles vaccines as well as the COVID-19 vaccines from Johnson & Johnson and AstraZeneca-Oxford. Others have temperature