COVID-19 Conversations

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Covid-19 & Vaccine Inequity in Africa

NAM–APHA Webinar
A Tale of Two Pandemics: COVID-19 & Global Vaccine Equity, 23 June 2021

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Covid-19 in Africa

- **5.1 million** cumulative cases (2.9% of global cases - up to 21 June 2021)
- **136,030** deaths (CFR: 2.7%; ~3.5% of global deaths in 15% of world’s population)

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**The New York Times**

Covid Surge in Africa Raises Fears of a Calamity Like India’s

The pandemic is worsening in Africa as more contagious variants spread, vaccinations lag and hospitals in some places are pushed beyond their limits.

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**Key: Country reporting COVID-19 cases**

- No Report / Only 1 wave
- 2 waves
- 3 waves

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- **14 (25%)** countries in a 3rd wave
  - 64% more severe

- **53 (96%)** countries had a 2nd wave
  - 74% more severe than 1st wave
Vaccine coverage: Africa’s 10-fold ↓ access to doses

- **Total vaccinations:**
  - World: 2.6 billion
  - Africa: 43 million (1.6% of all vaccinations)

- **10-fold difference in vaccine access**
  - World: 21.8 per 100 people
  - Africa: 2.4 per 100 people

- It is unconscionable that wealthy countries are vaccinating children (low risk) when Africa has not yet completed HCW vaccinations

"I understand why some countries want to vaccinate their children and adolescents, but right now I urge them to reconsider and to instead donate vaccines to Covax," ....warned that the vast global gap in vaccine access is not only a “catastrophic moral failure” but a threat to public health that could extend the pandemic by giving the virus new places to spread and mutate.

Tedros Adhanom Ghebreyesus, 15 May 2021
Why Africa suffers vaccine inequity:
1. Lack of local manufacture of vaccines

- Only 1% of all the continent’s vaccines are made in Africa
- No Covid-19 vaccines are being manufactured in Africa
- Africa depended on COVAX - joined back of the queue for doses

Current African manufacturers of human vaccines:
- Senegal (yellow fever)
- Tunisia
- Egypt (DTP and fill-finish)
- Ethiopia (Starting…)
- South Africa (Hib, Group B Strep and fill-finish)
Why Africa suffers vaccine inequity:
2. Lack of timely access to doses

Countries with highest % population vaccinated
(only countries with populations >5 million)

<table>
<thead>
<tr>
<th>World</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Canada</td>
<td>66.4</td>
</tr>
<tr>
<td>Israel</td>
<td>63.5</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>62.9</td>
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<tr>
<td>Finland</td>
<td>55.4</td>
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<tr>
<td>Belgium</td>
<td>54.1</td>
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<tr>
<td>United States</td>
<td>52.9</td>
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<tr>
<td>Italy</td>
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<td>Denmark</td>
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<tr>
<td>Netherlands</td>
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<tr>
<td>Germany</td>
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<table>
<thead>
<tr>
<th>Africa</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Morocco</td>
<td>25.4</td>
</tr>
<tr>
<td>South Africa</td>
<td>3.5</td>
</tr>
<tr>
<td>Cote d'Ivoire</td>
<td>2.7</td>
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US Vaccine Surplus Grows by the Day as Expiration Dates Loom
Lindsay Whitehurst and Leah Willingham, Associated Press
June 14, 2021

In Tennessee and North Carolina, demand for the COVID-19 vaccine has slowed down so much that they have given millions of doses back to the federal government, even though less than half of their total populations are vaccinated.

Oklahoma has not asked for new doses from the government for more than a month, spurning its 200,000-a-week allotment. Around the country, states...
Why Africa suffers vaccine inequity:
3. Variants have made vaccine choices difficult

Clinical trials in:

<table>
<thead>
<tr>
<th>Location</th>
<th>Vaccine</th>
<th>Substantial reduction in vaccine efficacy</th>
<th>Minimal reduction in vaccine efficacy</th>
</tr>
</thead>
<tbody>
<tr>
<td>USA / UK</td>
<td>AstraZeneca</td>
<td>70% (UK)</td>
<td>72% (USA)</td>
</tr>
<tr>
<td></td>
<td>NOVAVAX</td>
<td>89%-90% (UK, US)</td>
<td>91-95% (USA)</td>
</tr>
<tr>
<td>South Africa</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Beta variant (n)</td>
<td>AstraZeneca</td>
<td>10% (2,026)</td>
<td>64% (6,576)</td>
</tr>
<tr>
<td></td>
<td>NOVAVAX</td>
<td>43% (2,684)</td>
<td>100% (800)</td>
</tr>
</tbody>
</table>

Qatar real world efficacy = 75%

No clinical efficacy data on Beta variant available for Moderna, Sinovac, Sinopharm and Gamaleya

Africa’s highest vaccinated is the Seychelles, but cases increasing despite high vaccination

- **Population:** 98,340
- **Almost 100% of adults >18 years (68.2% of population) fully vaccinated**
  - AstraZeneca (all ages)
  - Sinopharm (18-60 years)
  - Sputnik V (only 1,000 doses)
- **80% of infections in current wave are among locals**
- **Beta variant predominant**
Overcoming the challenges: some thoughts….

1. Partnership for African Vaccine Manufacturing (PAVM) – an African CDC initiative on 13 April 2021

2. African Vaccine Acquisition Task Team (AVATT) secured 0.8 billion (mostly J&J – delayed) of 1.5 billion with Afrexim Bank & World Bank loans

3. No to vaccine diplomacy – piecemeal efforts by some to assist poor countries - political imperatives over-riding public health imperatives

4. Need to get Covax back on track doing what it was originally intended to do – foster vaccine equity

5. Low African vaccination coverage is not merely an African problem (leading to ↑ variants) but a global problem, requiring a global solution
Importance of global solidarity: from HIV → Covid-19

“The AIDS movement demonstrates that with a shared vision, shared responsibility and through global solidarity and leadership of people living with HIV, affected communities and individual action, we can change the course of history.” – UNAIDS 2015

- **Global solidarity** – essential for access to life-saving medication, e.g. Global Fund, UNITAID, PEPFAR

*Number of people receiving antiretroviral therapy, 2003–2020*

*Source: UNAIDS 2021*
“The pandemic has exposed the paradox that while we are more connected, we are also more divided….

“To come out of this crisis better, we have to recover the knowledge that as a people we have a shared destination. The pandemic has reminded us that no one is saved alone. What ties us to one another is what we commonly call solidarity. Solidarity is more than acts of generosity, important as they are; it is the call to embrace the reality that we are bound by bonds of reciprocity.”

- Pope Francis, head of the Catholic Church