



Webinar meeting report January 2021

Preparing the frontline for the COVID-19 vaccine rollout: Learning from the past



Introduction

It's a race against time to vaccinate the world. COVID-19 vaccines offer hope for countries within the Asia Pacific region but there are many challenges to a successful rollout including geographical barriers, limited resources and vaccine hesitancy.

As the first line of defence in the COVID-19 pandemic, frontline healthcare workers play a critical role in preventing the spread of disease. Under difficult conditions, they have also been responsible for continuing to provide service for patients with other illnesses. As the bridge between scientific information and patients, health professionals have a vital role to play in communicating evidence-based information to patients, carers, and the general public which can help dispel myths and misinformation about the pandemic.

A webinar, organised by the BMJ, Asian Development Bank and UNICEF, explored the valuable lessons to be learned from previous mass vaccination campaigns within the region and how they can be applied to the current COVID-19 vaccine campaign rollout at the national level. For example, Indonesia learned to move swiftly to get a COVID-19 vaccine approved as halal after the previous widespread refusal of the measles-rubella vaccine. And the Philippines is learning how to rebuild trust in vaccines after a controversy over the dengue vaccine.

Attendees from over 20 countries heard that an effective COVID-19 vaccine rollout needs sectors to work together with healthcare workers who are fully supported with the appropriate information, skills and training.

Challenges

Setting the scene, Dr Patrick Osewe, Chief of the Asian Development Bank's Health Sector Group, described the COVID-19 pandemic as one of the biggest challenges to ever face mankind. He laid out the six critical issues for rollout of the COVID-19 vaccine:

Prioritising populations - Deciding who will get the vaccine first. Most countries have prioritised healthcare workers and other vulnerable groups such as the elderly. However, there are some differences with some countries including frontline workers such as the police as a priority group and others, like Indonesia, focussing on younger people who are more economically active.

Allocating vaccines - Ensuring vaccines are allocated equitably throughout a country; both at a province and district level. Another issue is guaranteeing there will be sufficient second doses available for those who have received their first dose of vaccine.

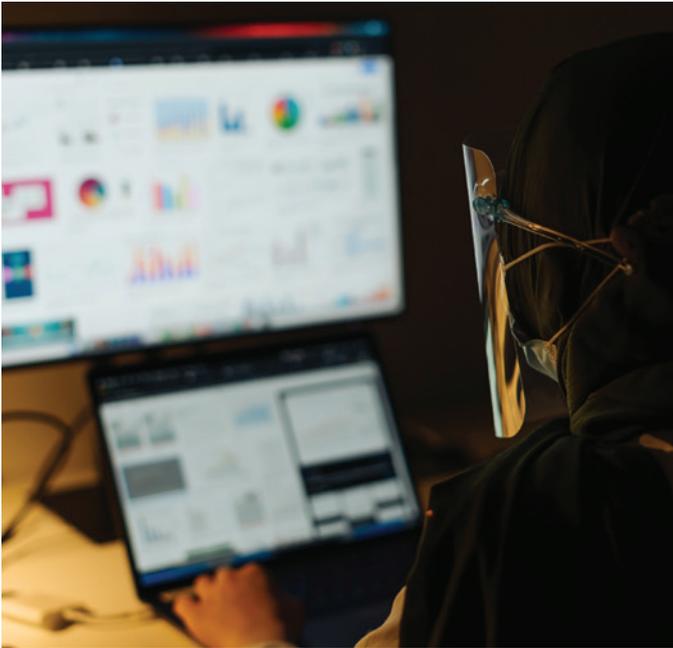
Distributing vaccines – Maintaining the cold chain can be difficult in many countries, particularly in remote communities. Countries such as Indonesia and the Philippines which are made up of 1000s of islands face particular logistical challenges.

Administering vaccines – Training sufficient people to give the vaccines can be a challenge. Some countries are using retired healthcare workers or medical and nursing students to help deliver vaccines, whilst others are using the military. Infrastructure is another vital issue – stadiums, schools and places of worship are being used as vaccination centres.

Ensuring uptake of the second dose – Tracking who has had their first dose of vaccine and reminding them to come for their second dose is vital.

Monitoring – Keeping track of the effectiveness and safety of the vaccine. Transparency and clear communication are important in order to deal with rumours and disinformation.

Dr Osewe emphasised that for a successful COVID-19 vaccine rollout there needs to be training, leadership, clear policies and significant coordination between sectors.



Learning from Indonesia

Indonesia, a country of 270 million people, has learnt many lessons from their experience of rolling out the measles-rubella vaccine. Between 2017 and 2018, children aged 9 months to under 5 years were targeted for immunisation, with the country committed to achieving the target of eliminating measles by 2020. The first phase with 34.9 million children vaccinated on the most populated island of Java was a major success with almost 100% coverage. Phase 2 in the rest of the country in 2018 achieved 72% coverage, giving an overall coverage of 87%. Lulu Ariyantheny Dewi, an epidemiologist at Indonesia's Ministry of Health, told the audience there had been a number of challenges including vaccine refusal, the spread of negative messages, hoaxes about the vaccine and geographical barriers. She also identified a number of strengths including strong political commitment and good cross-sector collaboration.

Vaccine refusals

Indonesia faced widespread vaccine refusal when they started the phase 2 measles-rubella childhood vaccine campaign in 2018. Although the Indonesian Ulema Council stated that the vaccine is permissible for the greater public health good, the fact that it was haram still impacted the campaign. The country has learnt a key lesson from this experience ensuring the Sinovac's COVID-19 vaccine was safe as well as halal. The health sector has also worked with religious and community leaders to respond to vaccine hesitancy and dispel negative messages. She added that the president, the head of the military and head of police as well as other local leaders were all vaccinated first in order to instil confidence in the vaccine.

Real-time monitoring

Indonesia's success in the measles-rubella programme was partly down to real-time coverage analysis, said Dewi. RapidPro, a mobile health monitoring tool that uses SMS or WhatsApp, allows healthcare workers to submit daily reports which are then uploaded to a dashboard. This data which can be displayed on a map or as a graph shows which province, district and community health centres are hitting vaccination targets and allows the identification of areas to target for mop-up programmes. Healthcare workers can now send reports on daily vaccinations much more easily and quickly. This system has improved the accuracy of data which is vital in tracking who has had doses of the COVID-19 vaccine.

Learning from the Pacific Islands

The 14 Pacific Island countries and territories are home to 2.3 million people living on more than 660 islands and atolls stretching across an area equivalent to the combined size of Canada and the United States of America. Wendy Erasmus, Child Survival and Development Chief for UNICEF Pacific Islands, spoke about the challenges of delivering vaccination programmes in the region including the small volumes of vaccine needed, cash flow, global credit ratings and regulatory issues, combined with the high cost and limited options of transport to small island nations. The solution has been the Vaccine Independence Initiative with pooled procurement, bridge financing and a regional cold room vaccine hub based in Fiji. There are very few or no cases of COVID-19 on the islands and there have only been two deaths in total in Fiji. Nevertheless, some countries are seeing enormous economic effects of the pandemic because of lockdowns, border closures and the resultant decrease in tourism. Erasmus warned that the COVID-19 pandemic could reverse progress on reducing child deaths in the region. She said preserving routine childhood vaccine supply chains is imperative.

Cold chain storage

UNICEF has been building on existing systems in preparation for a COVID-19 vaccine programme. This includes doubling the capacity of the regional cold chain storage, working with national immunisation coordinating committees and improving vaccine forecasting. Erasmus said there were many logistical challenges particularly in the last mile of delivery. In the past vaccine delivery has had to be innovative; for example, collaborating with the Royal New Zealand Air Force to fly in vaccines during a recent measles outbreak. They have also been trialling the use of drones to deliver vaccines to small, hard to reach communities.

Learning from the Philippines

There are long-standing low immunisation rates in the Philippines and the percentage of fully immunised children has been steadily declining. This is partly due to a controversy surrounding the dengue vaccine, Dengvaxia, which was approved in early 2016 at the height of the election season. One year later, the manufacturer Sanofi announced new findings that show that the vaccine increases the risk of severe dengue and the vaccination programme was suspended. The episode led to increased mistrust of government officials and healthcare workers and accusations of a lack of transparency. However, a measles outbreak in 2018 seems to have reversed many peoples' attitudes about vaccines.



Building trust

Dr Gideon Lasco, Senior Lecturer at the University of the Philippines Diliman's Department of Anthropology and Research Fellow at the Ateneo de Manila University's development studies program, told the audience that the dengue controversy showed what distrust towards individuals such as politicians and institutions can do. "Vaccine mistrust is not irreversible, but trust has to be earned." He emphasized the importance of bringing in experts from a trusted institution, such as the Philippine General Hospital, to take the lead in communicating the case for vaccines rather than politicians. He said it is important to build trust through consistency, accountability, transparency and inclusivity in communications. He warned that if something goes wrong with the COVID-19 vaccine rollout it could affect the take up of other vaccines but if it proves decisive in ending the pandemic it would help build broader support for vaccines.

Understand vaccine concerns

Governments should understand people's concerns and not dismiss them outright, said Dr Lasco. It was also important to understand "local vaccine culture" and sources of mistrust. He said it was important to consult primary care workers, midwives, nurses for their concerns and experiences and engage with local religious groups and community organisations to help improve communication about vaccines.

Detailed questions can be found in Appendix 1



Moving forward

All the speakers emphasised that vaccine rollout must be a collective effort, with the health sector taking the lead. National and local politicians, community and religious leaders, the private sector, the military, the energy sector and social care sector all have valuable parts to play. Wendy Erasmus summed it up in two words – partnership and perseverance. "A lot of collaboration is needed. If we keep at it and put our heads together we will find a way through."

Key themes:

Attendees from all around the world posed valuable questions to the panel on strategies to enhance deployment, encourage vaccine acceptance and work in partnership to reach communities at scale.

- Prioritising populations
- Vaccination deployment partners
- Vaccine efficacy
- Vaccine safety
- Vaccine hesitancy
- Rollout schedules

As part of the BMJ and ADB partnership, more webinars will take place and cover the critical issues faced by frontline healthcare workers working in the pandemic.

Attendees:

Over 900 people from 23 countries signed up to the webinar. Attendees ranged from doctors, community health workers, immunisations leads, health policy experts, civil society, World Health Organization, UNICEF and Ministries of Health.

Countries

Indonesia, India, Philippines, Myanmar, Uganda, Azerbaijan, Georgia, Fiji, Pakistan, Bangladesh, Brunei, Malawi, Geneva, UK, Libya, Sri Lanka, Malaysia, Uzbekistan, Bhutan, China, Thailand, Australia and New Zealand.

About the BMJ and ADB partnership

BMJ and the Asian Development Bank (ADB) launched the **COVID-19 (Coronavirus): ADB Information Centre** to support frontline health professionals manage patients with COVID-19, its relevant differential diagnosis and common comorbidities in real-time, at the point of care.

The Information Centre provides free access to digital health tools such as clinical decision support from BMJ Best Practice, accredited e-learning courses from BMJ Learning as well as patient information leaflets and procedural videos. Evidence on COVID-19 is rapidly changing and frontline healthcare professionals can benefit from trusted, evidence-based and continually updated international guidelines.

Appendix 1 Audience questions

Prioritising populations

- Why is Indonesia prioritizing its working population rather than the elderly?

Vaccination deployment partners

- Is UNICEF mostly looking to procure vaccines that can be kept in the 2-8 degrees range? Do they have the capacity to procure and distribute those that can be stored under 2 degrees?
- What roles do NGOs/CSOs have in vaccination programs?
- What is the role of WHO and agencies such as UNICEF to ensure vaccines get to people all over the world?

Vaccine efficacy and safety

- What is the impact of the emerging new strains of COVID in the strategy for rolling out the initial vaccines available as well as managing it?
- If someone has already had COVID-19 and recovered, does he or she still need to be vaccinated again?
- We know natural infection gives us 5 months of immune protection, so is it better to receive a second vaccination after 5 months?
- What are the recommendations for those who recently suffered from COVID and have recovered? Do they still need to be vaccinated and how if so how long a gap should there be?
- Is any agency planning comprehensive research on the effectiveness of vaccination of COVID-19?
- Is the vaccine recommended for autoimmune patients?
- Can an asymptomatic patient who may be COVID positive be given the vaccine?
- What assessments are needed before vaccinating elderly people?
- Is autoimmune thyroid disease a contraindication to vaccination? Does the level of the anti-thyroid antibodies matter?
- Can a patient with a past history of cancer but completed a course of treatment and cured be given the vaccine? If so, how long after treatment can such a patient be given the vaccine?

- Will COVID-19 vaccines interact with corticosteroids, DMARDs or Biologics used for the treatment of autoimmune diseases?
- As there are now large enough numbers of vaccine recipients all over the world can we see published data on adverse reactions (mild, moderate and severe) so that healthcare workers and patients are forewarned of what to expect and the chances of side effects?

Vaccine hesitancy

- Do you see trust issues as the biggest barrier for the vaccination campaign?
- Will an information campaign prior to administering the vaccine be an effective means of gaining trust over the vaccine?
- What are the best ways to engage local communities? And will it help to fight misinformation?
- How do you think the perception has changed among people in the Philippines, after the response to the 2019 Polio campaign? One of the challenges in the Philippines has been the low level of science literacy among the public + the accessibility of resources as most are written in English. How do we address these as we go about vaccine safety communication in the coming months?
- How do you think the use of the military for vaccine deployment will affect public trust and perception? And how can this be handled?
- Should there be laws compelling all citizens to take the COVID-19 vaccine as anti-vaxxers may sabotage the vaccination programme?

Rollout schedules

- The elderly population are at the highest risk of severe disease and death from SARS-CoV-2 and are the target group for vaccination in many countries. What is the biggest challenge of switching from childhood vaccination to risk group vaccination?
- Do you have an indication of how much of the Pacific can be vaccinated against COVID-19 by the end of 2021?