Achieving Equity in Immunization through Reaching Every Community

A UNICEF Initiative
Great progress with global vaccination coverage, but more needed in some regions
Vaccination coverage is highest and correlated with country income

Immunization Vaccines and Biologicals, (IVB), World Health Organization.
194 WHO Member States. Date of slide: 28 July 2014.
The expansion of vaccination coverage

UCI
Rapid scale-up in coverage

Consolidation
Stagnating coverage (in %)

Launch of GAVI
Modest coverage gains, and focus on new vaccines

Reach the fifth child
Coverage improvement, portfolio expansion, and integration with broader disease control

Adapted from: L. Brearley et al. Vaccine 31S(2013) B103-B107
Focusing on the un-reached, where there are inequities in wealth…

DTP3 Coverage among lowest and highest wealth quintiles, selected countries

- Yemen: 2006
- Viet Nam: 2010
- Pakistan: 2012
- Nigeria: 2011
- Mozambique: 2011
- Madagascar: 2008
- Liberia: 2007
- India: 2005
- D.R. Congo: 2010
- Chad: 2004
- Centr Afr Rep: 2010
Inequities in Immunization take many forms

Immunization inequities by population characteristics, Madagascar, 2011

Source: MDG survey, 2013; CI refers to 95% confidence interval; OR = Odds ratio
Why Equity & Immunization Matter

“Disease burdens tend to be disproportionately concentrated in more marginalized populations, reaching more people will not only achieve a greater degree of equity, but will also achieve a greater health impact and contribute to economic development”
UNICEF – ideally placed to address immunization inequities

“In everything it does, the most disadvantaged children and the countries in greatest need have priority”
UNICEF’s Reaching Every Community Strategy

1. **Identify children** who suffer from immunization inequities & describe their social/gender/geographical characteristics

2. **Micro plans** that reduce inequities by ensuring every community is accounted for & receives immunization sessions appropriate to people served

3. **Innovative solutions** (including new technologies) that overcome problems of inequities including social distance

4. **Systems to monitor disadvantaged** community immunization status

5. **Commitment & allocation of resources** to reduce immunization inequities at the level they can be overcome, within Health Centres & communities
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1) Identifying children & inequities

Mozambique – children in remote areas

Geographic inequities

- Zambezia Province
- Maputo Province
- Illiterate mother
- Mother with secondary education
- Rural
- Urban
- Boys
- Girls

Vaccination coverage Pentavalent3 (DTP3) (%)
1) Identifying children & inequities

Liberia – children in poverty

- UNICEF supported immunization equity analysis in May 2013
  - Children in poorest households found to have lowest coverage
  - 1/3 of children were in the national capital esp. urban poor communities

- UNICEF has developed an urban immunization strategy and is supporting the MOH with implementation
1) Service delivery bottlenecks, Atsimo Andrefana region, September 2013, Madagascar

Source: DTP3 coverage: MDG survey 2013; Other data: Health Facility study, UNICEF 2014
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2) Micro plans inclusive of all children

Madagascar

- UNICEF assessments found lack of quality micro planning at health facility level
- UNICEF has developed micro planning tool that focuses on equity gaps, including budget calculator
2) Micro plans inclusive of all children

Cambodia

- UNICEF and WHO supported using measles SIA to assess community immunization coverage through card checks

- Updating HF micro plans to prioritize these communities & link to GAVI HSS funds for outreach
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3) Innovative solutions to overcome inequities and social distance

Mozambique - UNICEF supported:

- 200,000 people reached through **Multimedia Mobile units** in media dark areas with debated video sessions promoting access to basic services and healthy behaviours

- **Community Radios**: weekly FFL programmes produced in 10 community radios in Zambezia

- Approx. 70,000 people engaged in **participatory community theatre sessions** in 4 high priority districts
3) Innovative solutions to overcome inequities and social distance

Uganda –

- **mTrack** is an SMS-based disease surveillance and medicine tracking system at all 5,000 health facilities and through 8,000 health workers

- e.g. SMS poll for feedback on:
  - *Awareness of new vaccine introduction (PCV)* – 3500 response in 24 hours (cost 150 USD)
  - *Cold chain functionality* – 1862 health facilities within 48 hours (cost 150 USD)
  - *Vaccine stock outs* – 1700 responses with 52% reporting stock outs of current vaccines

- Can also be used for community reporting model to improve **accountability**
3) Madagascar’s response to lack of access: Days of Intensified Routine Immunization (JIVR)

Source: Service de Vaccination
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4) Monitoring community immunization status

- Immunization systems measure coverage at provincial/district/HCs
  - Fail to recognize inequities in underserved communities
  - Children in underserved communities usually unregistered, therefore rarely accounted in aggregate data
  - Need simple mechanism used by health care workers to measure inequities in immunization at community level
  - Monitoring of full immunization status of children in underserved communities as part of routine reporting

Chad 2013 - Are these extra children vaccinated the most vulnerable?
4) Monitoring community immunization status

Cambodia

- UNICEF supported trial based on LQA & card check in high risk communities

- Integrates both child and mother immunization status

<table>
<thead>
<tr>
<th>M18 Given To Child Aged 18 To 23 Months</th>
<th>Child Name</th>
<th>Mother Name</th>
<th>Penta 1 Record On Card</th>
<th>Penta 2 Record On Card</th>
<th>Penta 3 Record On Card</th>
<th>M9 Record On Card</th>
<th>IMMUNIZATION STATUS CHILDREN AGED 18 TO 23 MONTHS AND THE MOTHER OF THE CHILD</th>
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<td>DATE</td>
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<td>*Full Immunization = All doses M9, Penta 1, Penta 2, Penta 3 recorded on yellow card</td>
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<td>**Partial immunization = Missing 1 or more doses of: M9, Penta 1, Penta 2, Penta 3.</td>
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Increasing Commitment & resources for Health Centres & Communities

- A rapid assessment approach to identify financial bottlenecks to the flow, use and tracking of immunization funds.

- Improve predictability and targeting (ring-fencing) of funds to implementing routine immunization services.

- UNICEF has carried out proof of concept testing in Madagascar, Indonesia, Uganda, as well as preliminary work in Mozambique.
Financial bottlenecks contribute to poor implementation & low coverage, e.g. Madagascar

• Some preliminary results Madagascar (2014)
  1. Disbursements to health centers are in cash; **no formal banks available.**
  2. Disbursed budget at times is **lower** than planned or approved budgets
  3. Immunization funds **not protected**/ring-fenced and get used for other purposes

• Some impacts
  – **Low compliance** with approved immunization plans and budgets.
  – Funding **delays** impact outreach  ➔ **the unreached stay unreached**
  – Resource **use** does not follow microplans
  – **Fragmented** resource availability: not all funds available at same time
  – **Poor tracking** reduces managers’ ability to know what funds actually ‘buy’.
Financial bottlenecks contribute to poor implementation & low coverage, e.g. Madagascar

- Some solutions:
  - **Rapid SMS** to alert district/province/nat’l level if outreaches can’t occur as planned due to lack of fuel, funds, vaccines, AND staff
  - **Community registers** that must be signed by outreach staff, as quality/equity check to ensure at risk communities receive outreach
  - High level **political advocacy** (with partners) to agree on PoA to increase predictability of routine immunization financing
Summary

• Tackling inequities is key to increasing immunization coverage.

• An equity approach will require using more “granularity” in identifying unreached children, and in defining strategies.
THANK YOU