# Strengthening Vaccination Programs in Haiti's Urban Communities to End Vaccine Preventable Deaths

As of 2017, 59 percent of Haiti's population lived in urban areas, and 70.1 percent of those urban populations lived in slums. As Haitians continue to migrate from rural areas to densely populated urban areas there is a higher potential for transmission of vaccine preventable diseases, particularly among crowded slums. Within this context, to meet the coverage and equity targets of the Global Vaccine Action Plan (GVAP), Sustainable Development Goals (SDG) and Universal Health Coverage (UHC), the needs of the urban poor must be better understood and addressed. In addition, outdated vaccination delivery approaches, designed 40 years ago based on rural models, must be adapted to respond to these shifting demographics.

JSI's efforts to strengthen urban immunization programs in Haiti focused on the Cité Soleil– a very poor urban commune located within the Port au Prince metropolitan area with a past history of violence. From January-September 2017, JSI Research & Training, Inc. (JSI) collaborated closely with the Directorate of the Expanded Program on Immunization (DEPI), key stakeholders, and Gavi, the Vaccine Alliance, to investigate reasons for low immunization coverage in Cité Soleil and to develop practical, low-cost strategies to strengthen immunization services and improve coverage in urban areas.

## **OUR APPROACH**

JSI conducted a situational and landscape analysis in Cité Soleil to better understand the social and cultural context, assess available resources, estimate immunization coverage rates, and identify potential reasons for low coverage rates in this area (see "Strategies for Improving Vaccination Coverage in Urban Poor Settings" for more information on all interventions proposed). Our analysis examined organization of existing immunization services, vaccination data, cold chain equipment in health facilities, supply and management of vaccines, human resources (community engagement and views of the community members and other stakeholders The initial results of the analysis found that vaccination coverage was low as a result of problems mainly within the immunization system, such as unreliable vaccine supply, long wait times, poor interpersonal and client relations, poor data quality and reporting, gaps in knowledge about the target population, and insecurity. There were some concerns on the side effects of the vaccines and some lack of awareness of the benefits of immunization particularly amongst younger mothers. These challenges were discussed with the DPEV, stakeholders (including the mayor's office), and partners through a participatory process, and a number of strategies and activities to improve Haiti's immunization program were collaboratively identified along six pillars: governance, human resources, organization/service delivery, logistics and supply of vaccines, community engagement, and health information system and monitoring. These interventions were categorized into short-term and long-term approaches.

The initial short term interventions focused on low cost management actions to improve service delivery:

- 1. **Weekly monitoring of vaccine** stock using mobile technology, for early detection of low stock levels and timely resupply to facilities;
- Establishing a fast line/triage system to improve waiting time for caregivers who come to the facility for vaccination services and ensure an efficient flow of clients;
- Posting new signage to clearly indicate the location and operating hours of vaccination services;
- Creating or updating designated vaccination spaces in health facilities to present health area vaccination data, including health area mapping, population tables, data on vaccination coverage and dropout rates;
- Working with health facility managers to mentor workers and build the capacity of lower-level Directorate of the Expanded Program on Immunization (DEPI) managers using a 'learning by doing' approach.

PARENTS ARE NOW MORE MOTIVATED SINCE VACCINES ARE AVAILABLE, AND THE SERVICES HAVE IMPROVED. MOTHERS REPORTED BEING SATISFIED WITH THE SERVICES, BECAUSE THE VACCINES ARE AVAILABLE AND THERE IS A SPECIAL LINE FOR VACCINATION IN THE ROOM."

- HEALTH WORKER, ROSALIE RENDU HEALTH FACILITY

#### **KEY LESSONS LEARNED**

Strategies should be identified based on the context of a specific health zone/catchment area and developed within the context of a country's policy framework, and in consideration of its financial and technical constraints to ensure sustainability. It is important that both short- and long-term interventions are implemented, including hiring of additional staff, community engagement, and infant tracking, which we were not able to do in the timeframe of the technical assistance without appropriate funding.

Small but effective management actions to improve immunization service delivery can have a big effect when put in place immediately. A few of the promising-practices we observed within the six pillars are:

#### Governance

· Early, consistent and strong engagement and advocacy with EPI lead-



# ▼ SITUATIONAL ANALYSIS, ROOT-CAUSE ANALYSIS, CONTRIBUTIONS FROM STAKEHOLDERS ▼



ership and decisionmakers within the Ministry of Health is essential to ensure commitment to, and investment in strategy implementation;

 A committee with clear terms of reference should be established early on to oversee the implementation of the activities, given the stakeholder that need to be involved beyond immunization. Members of the committee should represent the DEPI/MPHP, the regional Department of Health, members of partner organizations, civil society, community leaders and City Hall officials.

#### **Organization of Services**

In order to extend immunization hours in the urban areas, a compen-

sation system should be established for health workers to provide evening and weekend vaccination services;

- Additional vaccination sites should be explored and discussed with with State officials collaborating with private sector and NGOs;
- CCHWs should be deployed to provide essential health services, including immunization outreach within urban areas that are particularly densely populated and do not have nearby services.
- Key messages about the importance of immunization and same-day immunization services should be integrated into antenatal visits, child health visits and all services that have contact with eligible children in order to reduce missed opportunities.

#### **Human resources**

- Focusing on mid-level MHPH/DEPI managers is critical, as they have lower turnover rates and can maintain institutional knowledge and expertise to ensure the interventions are sustained;
- Long-term efforts must be made to strengthen the managerial capacity and coordination of DEPI managers;
- The distribution of CCHWs should be reviewed to ensure that they are specifically deployed in urban areas with the highest number of unvaccinated children;
- Training needs of staff should be documented during supervision visits and a systematic capacity building plan should be developed to train them on an ongoing basis;
- Train staff on the use of current data tools and forms and the updating and analysis of vaccination data to support planning and decisionmaking.

#### **Community Engagement**

- Local radio stations should be used to raise awareness of the importance and benefits of full immunization;
- Concerns of side effects must be included in community meetings with particular focus on the benefits of immunization;
- NGOs and other programs working in the urban slums, such as WASH andHIV/AIDS should integrate immunization messages;
- Young mothers need to be specifically targeted through religious groups and schools with key messages on immunization;
- Community leaders should be engaged in of immunization activities, including maintaining representation on the municipal committee and monitoring.

#### **Logistics and Supply of Vaccines and Cold Chain**

- Best practices for vaccine logistic management (accurate estimate of needs, weekly monitoring of stocks, etc.) are critical to improve coverage, and must be in place for the successful implementation of other strategies;
- Weekly calls to health facilities in Cité Soleil, including following up on vaccine stocks and early detection of the minimum stock and resupply are low-cost interventions that helped avoid stock outs;
- Given the uncertain target population, increasing faster access to adequate vaccines stocks through installment and use of nearby solar refrigerator will be important
- Introducing technology such as mobile technology can support effective reporting and monitoring the levels of vaccine stocks and increase access.

#### **HMIS and Monitoring:**

- Establishing accurate baseline data –including target population through micro-census, LQAs and coverage surveys and ensuring quality data reporting and use is critical for planning and performance monitoring;
- Every effort should be made to ensure that all tools are available in sufficient quantity and monthly reports can be regularly analyzed, and



Caregivers of children waiting for immunization – as they are waiting in the designated area for vaccination



Clearly marked vaccination room

used for decisionmaking at the institutional, municipal, and departmental levels;

## THE RESULTS

The results and observations from the first nine months of 2017 (when the model was designed and piloted) compared to the same period in 2016 reveal significant initial progress. Continued focus on effective interventions that prioritize areas with the highest numbers of unimmunized , engaging a wide-range of health and non-health stakeholders to improve service delivery, building credibility with quality technical assistance, and coaching health professionals can and should be adapted and scaled up in other municipalities with low coverage to improve routine immunization systems in poor urban areas.

It is important for long-term interventions to be adequately resourced and put in place to achieve and sustain high coverage; however, we were able to identify some effective, low-cost management strategies that can be implemented with minimal resources which can improve immunization service delivery . The initial results of the pilot have shown high-level improvements in key areas, such as:

- Overall improvements in data quality, including availability and completeness.
- An increase in the number of children vaccinated for almost all antigens when compared to the same period last year (see figure 1). For the first time in years, Cité Soleil reached a DPT3 coverage rate of 45% as of September 2017. In addition, data reporting timeliness increased from 31% in 2016 to 65% in 2017, and completeness from 58% to 84%.
- Improved vaccine supply chain management, including more consistent availability, better stock management, reduced stockouts, improved forecasting of vaccine needs, and improved timeliness of resupply.

#### **Acknowledgments**

JSI would like to thank the Haiti's Ministry of Public Health and Population, The Direction of the Expanded Program on Immunization, the Health Department of the West, the Health Department of Artibonite, the Commune of Cité Soleil, the Commune of Gonaïves, the members of the pilot implementation committee, WHO/PAHO, Unicef and Gavi, the Vaccine Alliance, for the great collaboration on the development and testing of the Urbain Immunization Model. Please visit www.jsi.com for additional resources and information on strengthening routine immunization, particularly in urban poor settings.