THE VITAL ROLE OF COMMUNITIES

Experience from Human Papillomavirus Vaccination in Tanzania

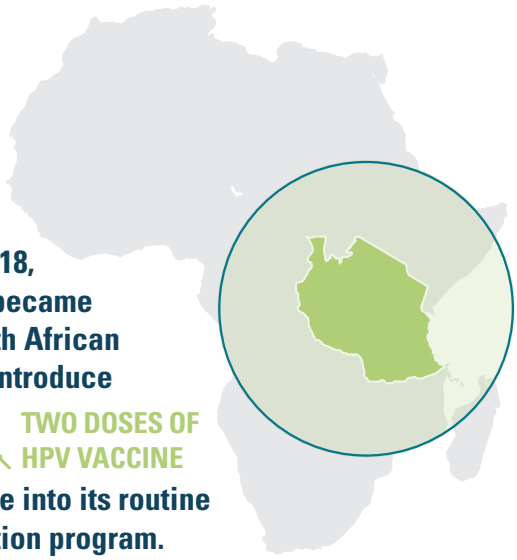
East Africa has one of the world's highest burdens of cervical cancer, with Tanzania having among the highest incidence and death rates on the continent.[1] The highest risk for cervical cancer is infection by human papillomavirus (HPV), and the global health community has endorsed vaccination of girls aged 9–14 years as a primary prevention measure. To reduce incidence, morbidity, and mortality from cervical cancer, the GoT launched an initiative beginning in 2014 to introduce HPV vaccination and early detection and treatment of cervical cancer.

From April 2018 through December 2019, the Tanzania's Ministry of Health, Community Development, Gender, Elderly and Children (MOHCDGEC) and Immunization and Vaccine Development (IVD) unit achieved national administrative coverage of the first dose of HPV vaccine (HPV1) at 79% coverage and second dose of HPV vaccine (HPV2) at 50%. This milestone was achieved through coordinated support with partners, including the Ministry of Education, World Health Organization (WHO), the United Nations Children's Fund (UNICEF), the Clinton Health Access Initiative (CHAI), Jhpiego, PATH, and JSI Research & Training, Inc. (JSI). From May 2017 through July 2020, JSI supported IVD with comprehensive planning and national rollout and monitoring of HPV vaccination, including its use as part of the country's routine immunization system.

Community buy-in for HPV immunization has been essential for uptake. This brief describes the process and JSI's technical assistance (TA) for HPV vaccine roll-out, community mobilization, training of stakeholders at all levels, and policy and planning activities.

LINKING COMMUNITIES AND SERVICES

Building community involvement in the HPV rollout involved a suite of activities to secure both "top-down" and "bottom-up" engagement. Working with the MOHCDGEC, IVD and other partners, JSI supported a series of capacity building activities. Major activities included the development of Information, Education, Communication (IEC) and training materials; capacity building for managers and HCWs; and sensitization of subnational level stakeholders, providers, community health workers (CHWs), and local leaders. Capacity building included cascade training to reach stakeholders and participants at all levels (see Table 1). The training for health



In April 2018, Tanzania became the seventh African nation to introduce TWO DOSES OF HPV VACCINE nationwide into its routine immunization program.

TABLE 1
Training Cascade for HPV Introduction

40	National TOTs trained
182	Regional officials trained
1,288	District officials trained
6,131	HCWs workers trained
21,957	Teachers trained

1 World Health Organization, Regional Office for Africa. 2018. "Tanzania rolls out vaccination against cervical cancer…" Available at https://www.afro.who.int/news/tanzania-rolls-out-vaccination-against-cervical-cancer

Critical Components to Community Involvement in HPV Vaccine Rollout

- Building understanding of HPV immunization as an essential element of cancer prevention;
- Training HCWs and local leaders and enlisting their support with outreach and IEC activities;
- Securing community buy-in;
- Providing supportive supervision;
- Monitoring and analyzing program performance.

care workers (HCWs) provided basic information on the vaccine and its importance and included information on engaging with schools and communities to emphasize that girls receive both doses. Continuous monitoring and data analysis enabled JSI to adjust the training and build local capacity, notably to increase emphasis on community engagement and tracking of missed girls.

INVOLVING COMMUNITIES

Community buy-in is particularly important for HPV rollout because schools, caregivers, and community groups play a valuable role in advocating for uptake of the vaccine, identifying girls who are eligible for the vaccine, and tracking girls who are due for their second dose. Securing and sustaining community acceptance and uptake of HPV services requires continuous efforts, including the attention of the national level technical working groups (TWGs) and the advocacy, communications and social mobilization (ACSM) that JSI supported with IVD and partners. These efforts are described below.

Social mobilization and engagement of various stakeholders

Sensitization and advocacy with stakeholders, including communities and the media, is a continuous process that must be prioritized. JSI and the IVD unit, with the ACSM subcommittee, led the development of an HPV communication plan and created and pre-tested a range of IEC materials—banners, posters, fact sheets, and TV and radio spots. These were distributed at all levels of the health care system, including through a series of seminars to train representatives from community and media organizations on national HPV vaccine roll-out.

Lessons learned from each stage of the roll-out (HPV1, HPV2, and the subsequent annual continuation for each cohort of girls) have been incorporated into ongoing social mobilization, outreach, and sensitization activities. Adequate monitoring is needed to ensure these activities take place. For example, in early 2019, JSI visited regions with poor HPV vaccine coverage to discover that HPV ACSM activities were not sustained beyond the introduction period. In those regions, JSI leveraged existing and locally-funded stakeholders/ Primary Health Care (PHC) sensitization meetings to raise awareness for the health and education sectors on the HPV program. Through use of a sensitization package (see Figure 1), participants discussed challenges faced by the regional HPV program and identified solutions, including the roles they can plan in supporting reaching eligible girls. These platforms also allowed for HCWs and teachers to identify challenges and solutions in support of the HPV program together and encouraged continued ACSM activities to increase demand among communities. Following these interventions, HPV coverage in these regions increased, contributing to the overall increase in national coverage (see Figure 2).

Figure 1. HPV Sensitization Package

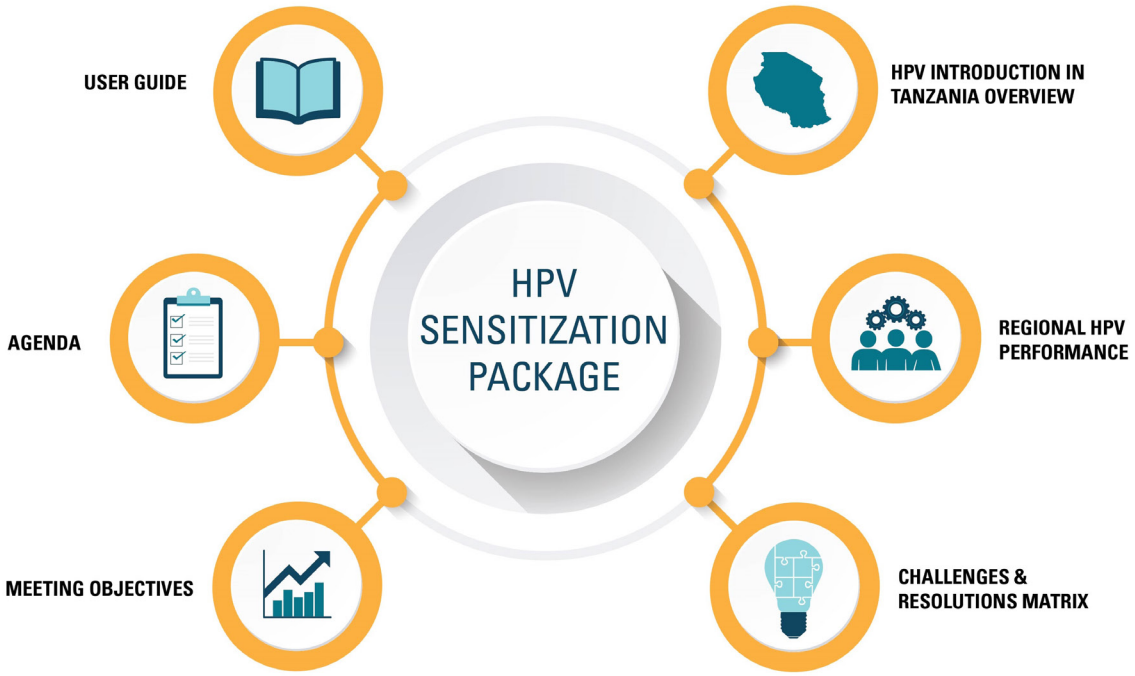
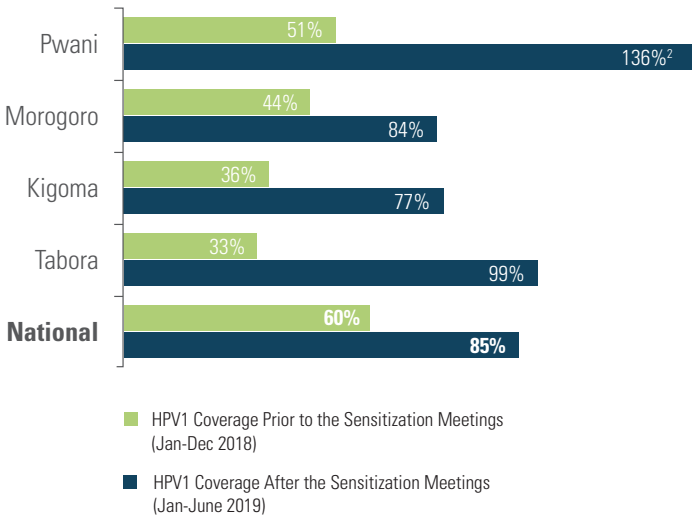


Figure 2. HPV1 coverage rates pre- and post-sensitization meetings supported by JSI in Pwani, Morogoro, Kigoma, and Tabora regions.



By project end, JSI supported 9 regions/ 63 districts to conduct sensitization meetings with health and education sector representatives on their roles and responsibilities in ensuring timely vaccination of eligible girls with HPV1 and HPV2.

JSI also worked with IVD and other partners to develop messages for mobile phones, social media, and other venues—to create demand for other vaccinations as well as for tracking of girls who missed the HPV2 dose. To complement the community-level mobilization, JSI provided TA at the regional and district levels. For example, JSI led the development of standard advocacy presentations so that officials from different areas could share experiences and strengthen coverage throughout their areas.

Community outreach

Continuous engagement with local community leaders throughout 2018 and 2019 proved crucial for building awareness and support for the HPV vaccine. Meetings with parents, local leaders, and religious leaders helped to increase demand for HPV vaccination while countering misperceptions about the vaccine and building confidence in its effectiveness. JSI also engaged key community stakeholders through existing health program platforms, such as during supportive supervision visits and extended stakeholders/PHC meetings, to facilitate community partnership and raise awareness for HPV vaccination coverage improvement.

Teacher and HCW engagement

Fully engaging communities required linking stakeholders across different community structures. JSI and IVD worked with facilities to ensure that they incorporated school outreaches as part of the HPV microplanning— which were then incorporated into the annual district health plans, called Comprehensive Councils Health Plans (CCHPs).[3] Regional and district-level work plans also included HPV outreach and ACSM within schools and communities—with teachers, CHWs, HCWs, and district officials included.

ADDRESSING CHALLENGES TO HPV PROGRAMS AT THE COMMUNITY LEVEL

- **Funding:** A variety of funding challenges delayed or impeded aspects of HPV vaccination roll-out, including community activities and outreach. To strengthen disbursement, JSI provided TA on the incorporation of the HPV vaccination into budgeting at all levels, building on previous experience with immunization funding flow in Tanzania. This process includes clarifying funds requested from national and international sources, and more timely disbursement of funds ahead of a planned introduction or activity. At the lower level, JSI used advocacy and sensitization meetings to strengthen stakeholders' understanding of the importance of planning, budgeting, and execution of outreach activities. JSI supported health facilities to incorporate HPV vaccination activities into their health facility plans and budgets, which were compiled into district CCHPs for funding approval.

2 Due to school closures for the winter holidays, some eligible girls were missed for HPV vaccination in November/December 2018. Efforts were intensified in several regions to vaccinate girls when the schools reopened in January 2019. This resulted in some catch up for girls from the 2018 target who were vaccinated with HPV1 and HPV2 in January and February (based on their eligibility) and therefore were calculated along with the 2019 targets (resulting in higher percentages for those months).

3 For more information about the CCHP process, see: Strengthening Comprehensive Council Health Planning to Increase Immunization Coverage: A Pilot Activity in Kagera Region, Tanzania.

Partnering with the Education Sector for HPV Roll-out

A key component of ensuring an effective HPV program is to include representatives from both the health and education sector in planning and implementation at all levels. To support this partnership at the regional and district levels, JSI emphasized the need to include both the health and education sectors at locally funded routine meetings, especially in poor-performing regions. Involvement of education sector in meetings in 11 regions and 65 districts revitalized collaboration between the two sectors, resulting in improved coverage through complementary implementation of agreed upon strategies.

For example, in July 2019, JSI supported the IVD to organize a meeting with Dar es Salaam Regional/Council Health/Education Managers with Ward Education Coordinators (WECs) to sensitize them to the HPV program and their roles in reaching eligible girls. All 112 WECs (one from each ward) attended the meeting and have since been connected via WhatsApp with the HCWs to further coordinate on future HPV vaccination. Prior to the meeting, data in Dar es Salaam for January-June 2019 showed coverage of 55% and 24% for HPV 1 and HPV2, respectively. Following the sensitization meeting on 19 July 2019, coverage increased. The January–August 2019 data from Dar es Salaam showed coverage raised to 85% and 25% for HPV1 and 2, respectively. Efforts continue to engage communities and educators, particularly on the importance of ensuring that girls receive both doses of HPV vaccine.

Funding shortfalls for ACSM activities also impeded continuous routine sensitization on HPV vaccination, threatening the sustainability of the overall HPV immunization program. JSI responded by helping the IVD to identify cost-effective routine platforms for circulating messages on HPV vaccination—such as immunization program meetings, professional association meetings, and use of social media.

- **Microplanning:** Facility microplanning was not well coordinated with schools and CHWs to ensure that all in- and out-of-school girls received HPV1 and 2. As part of the 2019 and 2020 microplanning, JSI reoriented HCWs, CHWs, teachers, and other community-level stakeholders about the importance of the completion of two doses of HPV. This included developing scopes of work and information sheets about HPV and the vaccine, ways to reach all eligible girls, guidance on registration of eligible girls in the registers and follow-up, and collaboration between health facilities, schools and CHWs in annual planning.

- **Coordination:** Coordination among facilities, teachers, and CHWs to identify in- and out-of-school eligible girls has enabled a reasonably accurate estimation of the number of local girls eligible for the HPV vaccine. However, lapses in coordination amongst all stakeholders has occurred. To counter gaps in coordination and follow-up, IVD (with JSI and partners) conducted several expanded stakeholders' advocacy and sensitization meetings, including both the health and education sectors. These meetings reoriented them on the importance of HPV vaccination, addressed bottlenecks, developed solutions for coverage improvement, and strengthened cross-coordination. Another challenge was the lack of coordination between the outreach plans and budgets of primary and secondary schools with those of health care facilities. This resulted in under-funding of school outreach activities, which did not happen as planned. JSI and IVD responded by re-sensitizing Regional and Council Health Management Teams on the importance of incorporating outreach plans and associated budgets into health facility CCHPs.

- **Documentation and Tracking:** Recording the number of eligible girls and the number of girls vaccinated with HPV vaccine proved challenging. Some stakeholders faced shortages of HPV registers and other data collection tools. Stakeholders took the temporary measure of printing and photocopying tally sheets and monthly report forms. Later, the MOHCDGEC, in collaboration with partners, developed booklets and other data collection forms and made them available at all facilities. During supportive supervision visits, these data collection tools were available and intact, unlike the temporary photocopies, which were easily misplaced or damaged.

CONCLUSION

While many countries have introduced new vaccines—pentavalent, rotavirus, PCV, and others—in the past decade, HPV vaccine introduction requires different approaches because it targets pre-adolescent/adolescent girls (and not infants). Key to HPV vaccine uptake are new approaches to communicating with parents, teachers, and girls about the importance of HPV vaccination as a tool to eliminate cervical cancer, and coordinating with partners that have not previously been involved with the Expanded Program on Immunization (EPI). These lessons learned not only apply to HPV vaccination but also offer a blue print for innovative approaches around community and partnership engagement for additional lifecourse vaccinations moving forward.

LESSONS LEARNED: LINKING WITH COMMUNITIES

The elements below summarize important considerations for ensuring community and partner engagement in support of a successful HPV vaccine program:

Develop a strong ACSM group: The multi-agency ACSM working group has played a critical role in designing and continuously updating effective advocacy communication and social mobilization strategies for reaching different target audiences from the national through the community levels.

Provide continuous advocacy and sensitization: Ensuring that information on the new vaccine is available to the population has been vital. Advocacy and sensitization, targeted at different groups and for different levels, is establishing and reinforcing understanding of and support for HPV vaccination program among all stakeholders—communities, HCWs, managers, and parents.

Build partnership between schools and health care facilities: Cross-communication and coordination has been essential to coordinate stakeholders in schools, facilities, and community outreach events —not only to ensure adequate funding, but also to balance supply and demand for services. CHWs are especially important for reaching eligible out-of-school girls. They collaborate with community leaders and households to register eligible girls at the beginning of the year and to track them for HPV vaccination. After registration, CHWs sensitize caregivers and girls who are due for the first and second doses of HPV vaccine through activities like household visits that encourage them to participate in routine community outreach sessions or go to health facilities for HPV vaccination.

Use various communication media: Establishing and sustaining awareness of and support for HPV vaccination (as well as other vaccines) has required continuous engagement and use of a variety of available resources – from local and religious leaders to paper-based, media-based, and electronic media.