

## BACKGROUND

- Index testing, including partner notification services (PNS), is a key strategy to identify and support those most at risk of acquiring HIV: sexual contacts, needle-sharing partners, and biological children of newly diagnosed HIV+ individuals.<sup>1</sup> Its implementation is critical to controlling the HIV epidemic and meeting the UNAIDS target that 95% of people living with HIV will know their status.
- Evidence from Cameroon, Kenya, Malawi, and Mozambique has demonstrated PNS is feasible, safe, and highly effective.<sup>2-6</sup> Additional data suggest PNS improves HIV prevention uptake, linkage to treatment, and sustained engagement in HIV care.<sup>7-9</sup>
- In December 2016, the World Health Organization issued guidelines recommending that PNS “be offered as part of a comprehensive package of testing and care offered to persons with HIV.”<sup>10</sup> PEPFAR has since supported efforts to bring PNS to scale across supported countries.

## I-TECH CAPACITY

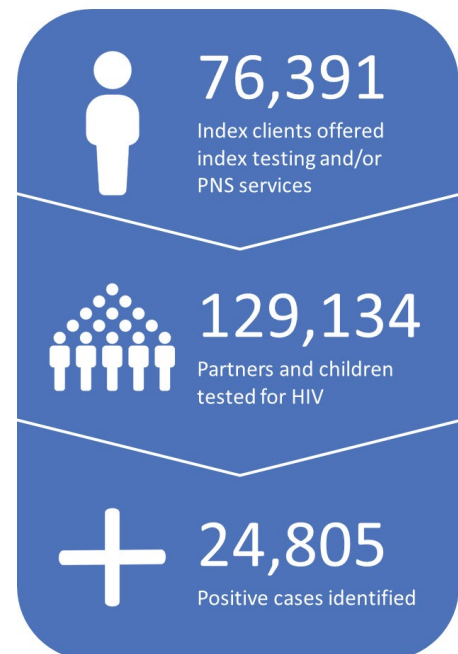
I-TECH and the University of Washington have extensive experience in index testing research and programming including **direct service delivery; quality improvement; training; policy and guideline development; and monitoring and evaluation.** I-TECH promotes evidence-based index testing strategies focused on reaching recent sexual contacts and all biological children, placing them at the forefront of HIV case identification programs to reach epidemic control.

### Direct Service Delivery

I-TECH offers index testing services in **Botswana, Namibia, Ukraine, Zimbabwe, and Mozambique**, including elicitation of sexual contacts and biological children, counseling on risk reduction and disclosure to sexual contacts, passive and active notification by health care workers, HIV testing and counseling, distribution of condoms, and linkage to pre-exposure prophylaxis (PrEP) and/or HIV treatment. In addition, I-TECH employs differentiated service delivery models for index testing including evening and weekend services to serve hard-to-reach populations. In **Botswana**, the use of a “warmline” provides further client support, including scheduling testing appointments, disclosure counseling, and counseling on intimate partner violence (IPV).

### Quality Improvement

Quality improvement (QI) is a central tenet of all I-TECH programs, using real-time data to inform program improvements and adjustments. I-TECH provides technical assistance (TA) for QI in **Botswana, Mozambique, Namibia, and Zimbabwe**, with the goal of ensuring index testing programs are responsive to on-the-ground context and implemented according to globally recognized best practices. In **Zimbabwe**, PNS health care workers from 20 facilities were trained to use QI methods, and plan-do-study-act (PDSA) cycle results and lessons learned were compiled into a change package and disseminated to supported facilities. At one facility in **Namibia**, QI processes resulted in an improved sex contact index of 1.2 to 1.7 over a six-week period.



## Training

Effective and sustained provision of index testing services requires a skilled and motivated health care workforce, and sustainable capacity building systems for training and ongoing support. I-TECH uses a systematic approach to build skills and knowledge, as well as foster attitude changes in testing staff in **Botswana, Mozambique, Namibia, Ukraine, and Zimbabwe**. In **Botswana**, I-TECH has trained and provided supportive supervision to more than 500 HIV testing counselors and trained 45 Government of Botswana “Master Trainers,” who will roll out PNS trainings across the country, including providing on-site mentoring and supportive supervision. In **Zimbabwe**, I-TECH developed and scaled a highly participatory five-day enhanced index case testing training to 220 facilities focused on improved counseling for partner elicitation and testing. In November 2018, I-TECH created an Index Testing Learning Collaborative to share resources and lessons learned among staff from six country programs in bi-weekly videoconferences via Zoom.

## Policy and Guideline Development

Ensuring that national policies and guidelines incorporate evidence-based approaches and reflect international best practices helps programs meet expected outcomes. I-TECH, through its Partnership Model, works closely with national governments, international experts, and stakeholders to support and lead the development of policies and guidelines that contextualize international best practices to local realities. In **Botswana**, I-TECH led the development of the National Partner Notification standard operating procedure in conjunction with the Ministry of Health and Wellness, CDC, and other implementing partners. The SOP provides guidance for health care workers on tracing partners of index clients, and outlines disclosure, referral, follow-up procedures, and proper documentation and reporting practices.

## Monitoring and Evaluation

In **Botswana, Mozambique, Namibia, Ukraine, and Zimbabwe**, I-TECH created innovative electronic monitoring systems to promote use of index testing data for strategic decision making by facility staff and program managers. In **Botswana**, a DHIS2 platform was developed for PNS data collection and reporting. The platform features intuitive forms for a handheld device, built-in data quality checks, and real-time data transmission into the national data warehouse. With this strategic understanding, I-TECH and its partners, including Ministries of Health, can determine which interventions best achieve targeted impact.

1. Golden M, et al. Partner notification for sexually transmitted infections including HIV infection: an evidence-based assessment. Sexually transmitted diseases. 4th edn. McGraw-Hill; New York, NY: 2007.
2. Brown LB, et al. HIV partner notification is effective and feasible in sub-Saharan Africa: opportunities for HIV treatment and prevention. J Acquir Immune Defic Syndr. 2011 Apr 15;56(5):437-42.
3. Henley C, et al. Scale-up and case-finding effectiveness of an HIV partner services program in Cameroon: an innovative HIV prevention intervention for developing countries. Sex Transm Dis. 2013 Dec;40(12):909-14.
4. Rosenberg NE, et al. Recruiting male partners for couple HIV testing and counselling in Malawi's option B+ programme: an unblinded randomised controlled trial. Lancet HIV. 2015 Nov;2(11):e483-91.
5. Myers RS, et al. Acceptability and Effectiveness of Assisted Human Immunodeficiency Virus Partner Services in Mozambique: Results From a Pilot Program in a Public, Urban Clinic. Sex Transm Dis. 2016 Nov;43(11):690-695.
6. Cherutich P, et al. Assisted partner services for HIV in Kenya: a cluster randomised controlled trial. Lancet HIV. 2017 Feb;4(2):e74-e82.
7. Myer L, et al. Family matters: Co-enrollment of family members into care is associated with improved outcomes for HIV-infected women initiating antiretroviral therapy. J Acquir Immune Defic Syndr. 2014 Dec 1;67 Suppl 4:S243-9.
8. Vreeman RC, et al. Disclosure of HIV status to children in resource-limited settings: a systematic review. J Int AIDS Soc. 2013 May 27;16:18466.
9. Walcott MM, et al. Facilitating HIV status disclosure for pregnant women and partners in rural Kenya: a qualitative study. BMC Public Health. 2013 Dec 2;13:1115.
10. World Health Organization. Guidelines on HIV Self-Testing and Partner Notification. 2016.
11. Han H, et al. Assisted HIV partner services training in three sub-Saharan African countries: facilitators and barriers to sustainable approaches. Journal of the International AIDS Society 2019, 22(S3):e25307.



### **For more information, contact:**

Matthew Golden, MD, MPH  
+1 206-744-6829  
golden@uw.edu

November 2019