HIV pre-exposure prophylaxis (PrEP) services amongst key populations in Sierra Leone: Early lessons from the country's first PrEP program

Background

Oral pre-exposure prophylaxis (PrEP) is a high-impact HIV prevention intervention in which antiretroviral drugs (ARV) are used to reduce the risk of acquiring HIV. PrEP for HIV prevention is currently recommended by the World Health Organization (WHO) and Sierra Leone's Ministry of Health and Sanitation (MOHS) for individuals at substantial risk for HIV, including members of key populations (KP) such as people who inject drugs (PWID), men who have sex with men (MSM), transgender individuals (TG) and female sex workers (FSW).

In 2020, MOHS included PrEP as a prevention strategy in its revised Consolidated Guidelines on HIV Prevention, Diagnosis, Treatment and Care, but prior to 2021, PrEP was unavailable in Sierra Leone, representing a significant gap in HIV prevention services that limited efforts towards epidemic control. With the support of the U.S. President's Emergency Plan for AIDS Relief (PEPFAR) through the U.S. Health Resources and Services Administration (HRSA) and the Global Fund for AIDS, TB and Malaria (GFATM), MOHS was able to launch the country's first PrEP program in 2021 with implementation support from ICAP at Columbia University.

UNITY FREEDOM JUSTICE

PEPFAR

HRSA Health Resources & Services Administration

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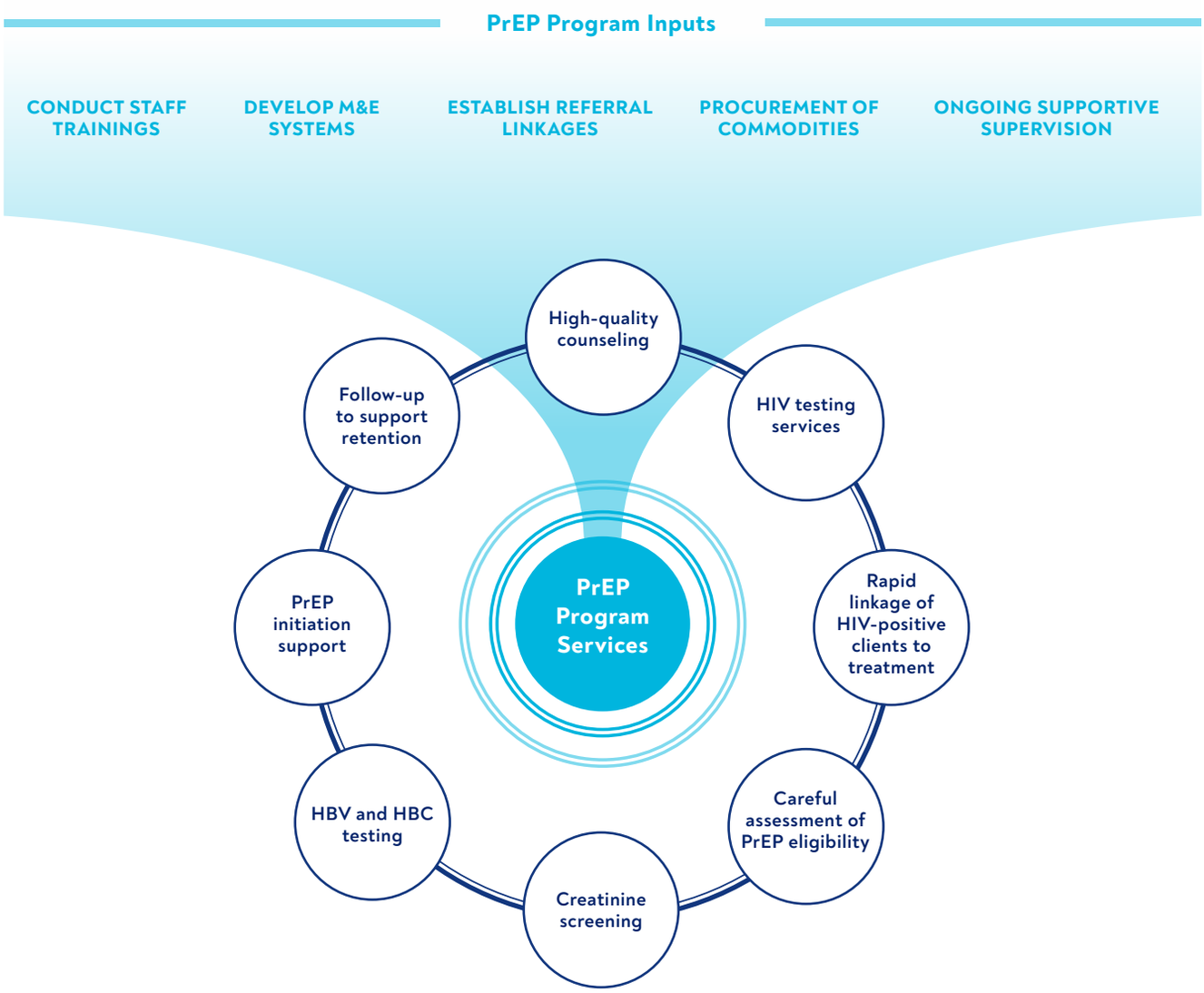
PrEP Program Design and Planning

To ensure national ownership of the PrEP initiative, ICAP provided technical assistance and support to MOHS, the National AIDS Control Program (NACP), the National AIDS Secretariat (NAS), and KP-led Civil Society Organizations (CSOs) to reactivate and strengthen the national KP Technical Working Group, and to develop and review national KP guidelines and policies.

In order to tailor PrEP service delivery, ICAP engaged with MOHS, NACP, NAS, UNAIDS, the AIDS Healthcare Foundation, Solthis, JSI and five KP-led CSOs [Social Linkage for Youth Development Child-Link, Women in Crisis Movement, Dignity Association, Rofunta Development Association, Society for Women and AIDS in Africa-Sierra Leone] to coordinate population size estimation and mapping, with an emphasis on FSW and MSM.

After the mapping exercise, ICAP collaborated with key stakeholders to determine the best approach to PrEP program design. The final decision was to provide PrEP services at community-based drop-in-centers (DICs) run by KP-led CSOs. Planning and preparation included consultation with DIC staff and beneficiaries, intensive DIC staff training and mentorship, establishment of referral linkages to local health facilities and laboratories, development of monitoring and evaluation systems, procurement of ARVs and commodities, and design of ongoing supportive supervision from ICAP and MOHS. This approach (Figure 1) enabled high-quality counseling, contextually appropriate HIV testing services, rapid linkage of those testing HIV-positive to treatment, careful assessment of PrEP eligibility for those testing negative (including creatinine screening for renal function and testing for hepatitis B virus), and support for PrEP initiation and retention.

FIGURE 1
PrEP Program Design



Preparing for PrEP Implementation

Following the rapid situational analysis and planning phase, ICAP supported the launch of the KP PrEP program in October 2020, providing technical assistance to MoHS, NAS, NACP & KP-led CSOs to:

- Develop an M&E plan and reporting tools, including an individual client form, a weekly reporting form, a monthly summary form, PrEP registers, health facility and DIC reporting templates, and standard operating procedures (SOPs) for data collection and management
- Develop a PrEP training curriculum tailored for the Sierra Leone context
- Develop information and education campaign (IEC) messages, SOPs, job aids, training slides and other materials in collaboration with the Health Education Division Unit to equip healthcare workers with relevant skills on ethical, safe, and confidential KP-friendly HIV services
- Complete minor repairs and refurbishment of 10 DICs to enhance a KP-friendly environment
- Develop an SMS client reminder model to enhance PrEP retention
- Add HIV health promotion, education and information to the National Emergence Call Center 117 toll free line platform.

Utilizing the PrEP training package, ICAP, MoHS and NACP trained:

- 8 National training-of-trainer (TOT) PrEP Trainers, 8 MoHS nurses from facilities within the DIC catchment areas, 8 DIC nurses, and 16 peer navigators and educators on PrEP services
- 32 candidates in PrEP service delivery and pharmacovigilance including staff from two DICs, the toll-free National Call Center, Pink-Power, Women Power Hour, HIV focal point persons from Bo and Kenema, and Health Promotion Officers

Additionally, 76 peer navigators and educators from 8 DICs were oriented and mentored on PrEP services. Twenty advocacy meetings with ~1000 potential KP beneficiaries in DICs were held to inform them about PrEP and promote retention.

With support from HRSA, ICAP provided stop-gap commodities and procured PrEP medications for the PrEP program roll-out. ICAP used the Enhanced Peer Outreach Approach to reach KPs including the following approaches:

- Moonlight HIV Testing, conducted between 6-11PM in priority hotspots & congregate settings for KPs.
- The “Nichoto” HTS Approach, in which KPs are invited to KP-friendly locations and offered HTS and integrated multi-disease screening

All HIV-negative KPs were referred for PrEP services and all HIV-positive KPs were referred to health facilities linked to the DICs to be initiated on ART.

PrEP Service Delivery

Overall, 3,141 KPs (63% FSW, 21% MSM, 16% PWID) were reached and provided with individual and/or small group-level HIV prevention interventions (condoms, lubricants, sensitization on prevention of HIV etc.).

Demand for PrEP services was high, and within 18 weeks after launch, more than 1,300 people had initiated PrEP:

- 1,450 KPs were counseled and screened for PrEP eligibility
  - 111 KPs not eligible for PrEP due to HIV positive status
    - 111 HIV positive clients linked to ART
  - 1 KPs not eligible for PrEP due to creatinine elevation levels
  - 30 KPs not eligible for PrEP due to signs of acute HIV infection and did not show up for retest
- 1,308 KPs were eligible for PrEP
- 1,308 KPs (83% FSW, 7% MSM, 10% PWID) initiated PrEP
- 1,308 KPs returned to care
- 1274 (97.4%) KPs retained in care
- No KPs sero-converted while on PrEP

FIGURE 2

KP PrEP initiation cascade across
8 drop-in centers, 5/5/2021 - 9/30/2021

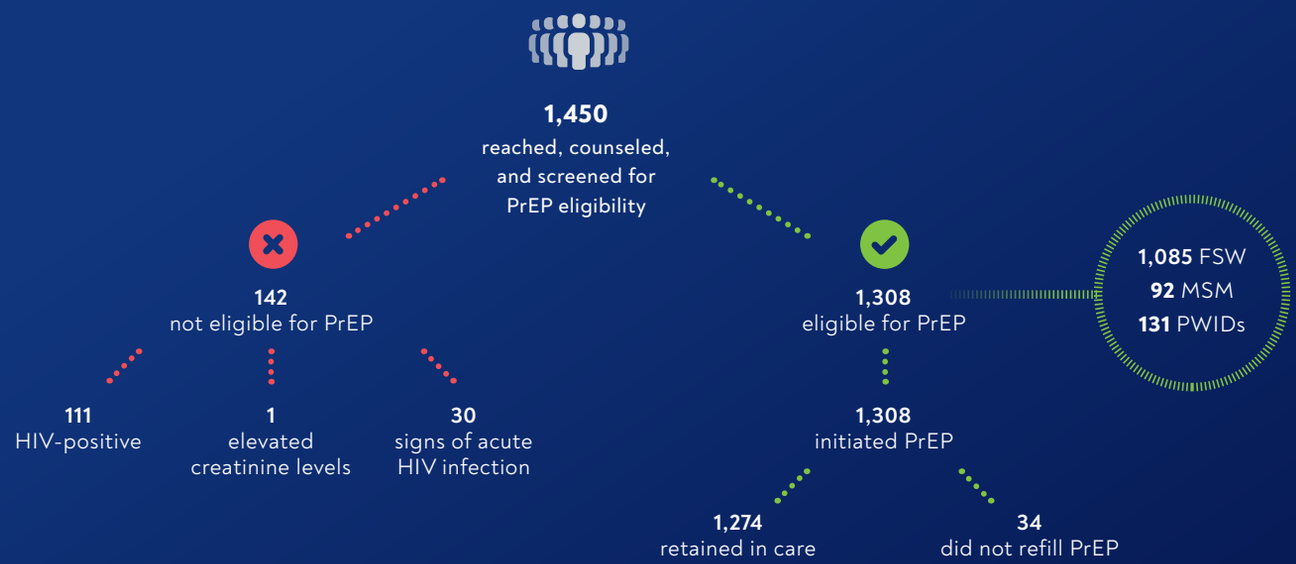


FIGURE 3

Best practices for PrEP implementation

Moonlight HIV testing

HIV testing is conducted between 6-11pm in priority hotspots and congregate settings for KPs. HIV positive KPs are linked to ART whilst negative KPs are linked to DICs for PrEP uptake

Nichoto HTS Approach

KPs are invited at KP-friendly locations and offered HTS and integrated multi-disease screening. HIV positive KPs are linked to ART whilst negative KPs are linked to DICs for PrEP uptake

Partnering with KP groups & CSOs

Partnering with KP groups and CSOs in Hotspot mapping, Moonlight and Nichoto HTS approaches outreaches enhanced HIV case identification among KPs and improved demand for PrEP services

SMS client reminder model

Used SMS texts for PrEP refills to enhance appointments and retention

WhatsApp groups for PrEP clients / PEs / PNs

WhatsApp groups for all PrEP clients, PEs/PNs, Nurses have been created to monitor the program

Use of locally designed slogans

Locally designed slogans; e.g. ***'Go tellyu Padi for cam take PrEP'*** *(Go and tell your friend to take PrEP)* is an effective strategy to create demand for PrEP

Integrated multi-disease screening

Combined multi-disease screening interventions with HTS *(malaria, hepatitis B&C serology tests, blood pressure check, and HIV testing)* improved PrEP service uptake among KPs

Using Pink Power tricycles (Keke)

To improve sub-optimal linkage of HIV positive KPs identified during Moonlight and Nichoto approaches to ART, escorted referrals are done using tricycles (keke) driven by peer educators

Integrated Next Step Counseling (iNSC)

To enhance PrEP adherence, HIV risk reduction, and motivation to remain negative, KPs are provided a comprehensive package of iNSC through small group sessions

Training & mentoring the healthcare workers

Improved PrEP service delivery and enhanced program ownership

Pharmacovigilance monitoring of side effects

Used a government department to monitor PrEP side effects

Conclusions

Demand creation and community-based delivery of PrEP via KP-led DICs supported by ICAP and by public-sector health facilities facilitated rapid PrEP roll out to a high-risk population. Close monitoring as the program matures will be important as MoHS and its partners scale up PrEP in Sierra Leone.

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