Rapid assessment of HIV risk behaviors, access to HIV prevention, care, and treatment services, and HIV and sexually transmitted infection (STI) positivity among people who inject drugs in Pemba Island, Zanzibar, 2023



Among people who inject drugs (PWID) in Pemba, the objectives of the rapid assessment (RA) were to:

- 1. Estimate the positivity of HIV, hepatitis B, and syphilis.
- 2. Identify and characterize basic risk behaviors.
- 3. Understand the context in which HIV risk behaviors take place.
- 4. Gather data to inform future surveillance activities.
- 5. Estimate the number of PWID.

Methods

Qualitative interviews with stakeholders

The RA team conducted key informant interviews with a total of 14 individuals including well-known recovered PWID and non-governmental organization (NGO) staff who provide services to PWID.

Qualitative interviews, quantitative surveys, and testing with PWID in four districts of Pemba

PWID were recruited from known hotspots defined as areas where PWID were known to meet and inject. A trusted peer educator identified a leader at each hotspot who helped recruit participants from within the hotspot to enroll in the RA. Data collection methods were qualitative and quantitative. A total of 110 PWID participated in:

- focus group discussions collecting data on characteristics of PWID in Pemba, common risk behaviors, knowledge of HIV prevention, and access to and utilization of health services.
- a quantitative demographic and risk behavior survey administered during an individual interview; and,
- testing for HIV, hepatitis B surface antigen, and syphilis antibodies using rapid tests.

Inclusion criteria for PWID participants

a) Injected drugs in the past 3 months; b) male or female 18+ years of age or mature minor, defined as a minor whose circumstances allow them to consent for themselves as per Zanzibar national guidelines, aged 15-17 years; c) lived in Pemba for the past 3 months; and d) willing and able to provide informed consent.

Population size estimation

The RA team and key stakeholders reviewed and interpreted data from several sources to generate a consensus estimate of the number of PWID in Pemba. Data sources included: wisdom of the crowds estimates from RA participants (stakeholders and PWID participants), HIV testing data from local organizations and service providers, previous rapid assessment reports, and census data.

Presentation of key findings

Findings from the quantitative survey are presented as unweighted percentages. Findings from qualitative interviews include data from both key informants and those who participated in the full assessment and are presented without percentages. Findings are representative of the RA sample and their perceptions of the PWID community in Pemba.

Indicator		2023
Age	35 years and older	74%
	Median participant age	40 years
Education	No formal education	9%
	Some or completed primary	19%
	Some or completed	54%
	secondary	
	Higher education	18%
Marital	Separated, divorced, or	50%
status	widowed	
	Never married	26%
	Married or living with partner	24%

Key findings

Characteristics of RA participants and perceptions of the PWID population

- i. All participants were men. They reported very few visible or known female PWID in Pemba.
- ii. The majority (75%) of participants were originally from Pemba and those not from Pemba reported living there for at least 20 years.
- iii. PWID have subgroups based on occupation, whether they use drugs openly, and duration of drug use.
- iv. PWID seem well-networked, reporting that they know at least 10 other PWID in Pemba, and they meet often.
- v. Participants reported a perceived increase in the number of PWID in the past few years, especially among younger men. However, only two individuals younger than 25 years participated.

Key findings

HIV risk behaviors among PWID

- i. The median age at first injection was 25 years and ranged from 15–34 years.
- ii. Nearly all PWID (98%) reported injecting heroin.
- iii. Participants reported a perceived decrease in sharing of needles and syringes among PWID; however, 20% of participants shared a needle in the past 3 months.
- iv. Participants reported the use of adulterated heroin.
- Qualitatively, engagement in sexual activities, including transactional sex, was reported to be limited among PWID and condom use was reported to be low.

Estimated number of PWID in Pemba Approximately 400 (350–600)

HIV knowledge

- Participants were asked standard UNAIDS HIV knowledge questions. On individual questions, 84%– 96% answered correctly. However, only 43% of participants answered all five questions correctly, defined as "comprehensive knowledge."
- ii. Most participants (93%) agreed that sharing needles increases the risk of HIV, but only 52% agreed that cleaning needles between injections reduces risk.
- iii. Just over half of PWID (54%) agreed that a person living with HIV who is on ART cannot pass HIV to a sexual partner once they are virally suppressed.

Experiences of violence and stigma

- Participants reported that stigma is common, including among health care workers when they access services. They also reported that PWID are seen as criminals and people who willingly inject drugs.
- ii. Almost every participant reported to have experienced physical violence from police or the wider community.
- iii. PWID reported being the victims of crime but not having anywhere to report such incidents as they are often disregarded when they do.

Access to HIV and harm reduction services

- i. All participants reported testing for HIV at least once in their lifetime, and 79% of participants tested for HIV in the past year.
- ii. PWID reported that NGOs provide them with HIV and hepatitis services (HIV testing; condoms; HIV, TB, STI, and viral hepatitis education) in all districts; however, only limited outreach services from other districts were available in Micheweni District.
- iii. Participants reported some availability of needles for purchase.
- iv. PWID cited the need for opioid agonist therapy (OAT) services (formerly known as medication-assisted treatment [MAT]) which were not available at the time of the RA, and more sober house services, which there was only one at the time of the RA.

HIV, hepatitis B, and syphilis positivity [N=110]

Indicator	2023
HIV positivity	n=3; 2.7%
Hepatitis B surface antigen positivity	n=2; 1.8%
Syphilis antibody positivity	n=1; 0.9%

Key considerations

- Ensuring that NGOs have sufficient resources and staffing to reach all PWID and strengthening the use of PWID
 networks could result in improved reach, coverage, and uptake of services. The RA was able to reach and recruit
 PWID who had not previously been reached by services targeting key populations by leveraging the networking
 within the PWID community.
- 2. Ensuring accessibility of sterile needles at a variety of outlets could reduce needle sharing and disease transmission among PWID. Sensitizing authorities on the importance of prevention services may help to increase the acceptability of making clean needles more widely available.
- 3. Strengthening education about HIV and benefits of cleaning needles may lead to increased HIV knowledge and prevention of new infections.
- 4. Strengthening collaboration with communities, law enforcement, and health care providers, and providing sensitization on addiction as a health issue and the importance of equitable access to health care could reduce stigma and discrimination. Including sensitization on the rights and appropriate treatment of PWID, including handling of PWID who report violence or mistreatment, could improve options for PWID to report and receive services when they are the victims of violence or crime.
- 5. Establishing OAT and expanding sober house services throughout the island would provide PWID with an option to enter recovery.

This project is supported by the US President's Emergency Plan for AIDS Relief (PEPFAR) through CDC under the terms of cooperative agreement #5NU2GGH002183. The findings and conclusions are those of the authors and do not necessarily represent the official position of the funding agencies.