

# HIV NATIONAL STRATEGIC PLAN

2023/24 – 2026/27



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MINISTRY OF HEALTH - ETHIOPIA

**HIV NATIONAL  
STRATEGIC PLAN**

**2023/24–2026/27**

**DECEMBER 2023**

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## ACRONYMS

ADE	Adverse Drug Event
AGYW	High-risk adolescent girls and young women
AHD	Advanced HIV disease
ALHIV	Adolescents Living With HIV
ANC	Antenatal Care
ARRA	Administration for Refugee and Returnee Affairs (ARRA).
ART	Antiretroviral therapy
ARVs	Antiretrovirals
AZT	Zidovudin
CBOs	Community Based Organizations
CCM	Country Coordinating Mechanism
CLHIV	Children Living With HIV
CLM	Community-Led Monitoring
CrAg	Cryptococcal antigen
CSOs	Civil Society Organizations
CSR	Corporate social responsibility
DATIM	Data for Accountability, Transparency, and Impact Monitoring
DBS	Dried blood samples
DHIS 2	District Health Information System 2
DICs	Drop In Centers
DNA	Deoxyribonucleic Acid
DOD	Department of Defense
DSD	Differentiated service delivery
DTG	Dolutegravir
DUE	Drug Use Evaluation
EDHS	Ethiopian Demographic Health Survey
EFDA	Ethiopian Food and Drug Authority
EFV	Efavirenz
EFY	Ethiopian fiscal year
EID	Early Infant Diagnosis
EMPTCT	Elimination of Mother to Child Transmission
EPHI	Ethiopian Public Health Institute
EPHIA	Ethiopia Population-based HIV Impact Assessment
EPSS	Ethiopian Pharmaceutical Supply Service
EQA	External Quality Assurance
ETORR	Expand the electronic requesting and result returning
FBO	Faith Based Organizations
FDRE	Federal Democratic Republic of Ethiopia
FP	Family planning

FSW	Female sex worker
GDP	Gross Domestic Product
GFATM	Global Fund for AIDS, TB and Malaria
GoE	Government of Ethiopia
GTP	Growth and Transformation Plan
HAPCLEO	HIV/AIDS Prevention and Control Lead Executive Office
HBV	Hepatitis B Virus
HCD	Human-centred design
HCMIS	Health Commodities Management Information System
HDI	Human Development Index
HEI	HIV-exposed infants
HEP	Health Extension Program
HIS	Health Information Systems
HIT	Health Information Technology
HIVST	HIV Self-Test
HLI	Higher learning institutions
HMIS	Health Management Information System
HPV	Human Papiloma Virus
HRAGYW	High-risk adolescent girls and young women
HRST	HIV risk screening tools
HSDIP	Health Sector Medium-Term Development and Investment Plan
HTS	HIV testing services
IBBS	Integrated Bio-behavioral Survey
ICT	index case testing
IDPs	Internally Displaced People
IGA	Income Generating Activities
IPLS	Integrated Pharmaceutical Logistics System
IPV	Intimate partner violence
KPPs	Key and priority population
KPs	Key Populations
LDD	Long-Distance drivers
LEO	Lead Executive Office
LF-LAM	Lateral Flow Urine Lipoarabinomannan Assay
LFTU	Lost to Follow Up
LIP	Local Implementing Partners
M&E	Monitoring and Evaluation
MAT	Medically Assisted Therapy
MCH	Maternal and Child Health
MMD	Multi-Month Dispensing
MMR	Maternal Mortality Ratio
MNCH	Maternal Neonatal and Child Health

MOE	Ministry of Education
MOH	Ministry of Health
MOJ	Ministry of Justice
MOR	Ministry of Revenue
MPI	Multidimensional Poverty Index
MSG	Mother support groups
NAC	National AIDS Councils
NASA	National AIDS Spending Assessment
NCD	Noncommunicable Diseases
NGO	Non-Governmental Organization
NHA	National Health Account
NVP	Nevirapine
OI	Opportunistic Infections
OST	Opioid Substitution Therapy
PBFW	Pregnant and Breast Feeding Women
PCR	Polymerase Chain Reaction
PEP	Postexposure Prophylaxis
PEPFAR	The U.S. President's Emergency Plan for AIDS Relief
PHEM	Public Health Emergency Management
PHPAI	Pediatric HIV Programme Acceleration Initiative
PITC	Provider-Initiated Testing and Counselling
PLHIV	People Living With HIV
PMIS	Pharmaceuticals Management Information
PMTCT	Prevention of Mother to Child Transmission
PNS	Partner Notification Services
POC	Point of Care
PPP	Public Private Partnerships
PrEP	Pre-Exposure Prophylaxis
PSP	Peer Service Provider
PT	Proficiency Test
PWID	People Who Inject Drugs
RAC	Regional AIDS Councils
RDF	Revolving Drug Fund
RHB	Regional Health Bureau
RHEF	Resilience and Equity Health Fund
RME	Results Measurement and Evaluation
RRF	Report and Requisition Form
RTRI	Recent Testing for Recent Infection
SBCC	Social and behavioral Change Communication
SDG	Sustainable Development Goals
SGBV	Sexual and Gender Based Violence

SI	Strategic Information
SMS	Short Message Service
SOP	Standard Operational Procedures
SRH	Sexual and Reproductive Health
STIs	Sexually Transmitted Infections
TAT	Turnaround Time
TB	Tuberculosis
TLD	Tenofovir, Lamivudine and Dolutegravir
TPT	TB Preventive Therapy
U=U	Undetectable = Untransmittable
UNAIDS	Joint United Nations Programme on HIV/Aids
UNODC	United Nations Organization on Drugs and Crime
VCT	Voluntary Counselling and Testing
VfM	Value for Money
VIA	Visual inspection with acetic acid
VL	Viral Load
VMMC	Voluntary Male Medical Circumcision
WHO	World Health Organization
WLHIV	Women Living With HIV

## FOREWORD



Ethiopia has achieved HIV epidemic control at national level. However, critical work is still required to ensure equitable access to HIV services by all ages, population groups and geographic locations.

The HIV National Strategic Plan 2023/24-2026/27 provides directions for addressing important programmatic gaps, particularly in reaching key and priority populations, eliminating vertical transmission, and enhancing HIV case finding. The Strategic Plan is informed by an external programme review and a wide stakeholder consultation. It is also aligned with the Health Sector Medium-Term Development and Investment Plan (2023-2026). The approaches and interventions adopted reflect the most

recent global strategies and guidelines. The NSP emphasizes the

importance of public sector collaboration with civil society organizations, affected populations, other sectoral ministries, the commercial sector, and development partners.

The goal of the Strategic Plan is to reduce new HIV infection and AIDS-related mortality below 1 per 10,000 population across all geographic localities and population groups. Realizing this goal requires strong political commitment and leadership at all levels of government. Furthermore, it is essential to have a strong engagement with all stakeholders including the community.

The Ministry of Health encourages all stakeholders involved in the HIV response to collaborate in the implementation of the Strategic Plan.

Lia Tadesse, MD, MHA  
Minister of Health, Ethiopia

## FOREWORD



Ethiopia has registered commendable successes in the HIV response, demonstrated by the decline in the number of new HIV infections and AIDS deaths. However, there are still a significant number of annual new HIV infections and AIDS deaths, which indicate that we should not be complacent; instead, we need to join hands to further accelerate the national HIV response.

In Ethiopia, we lag to reach the first 95 target, which alarms the need to enhance implementation of innovative HIV case finding strategies, as elaborated in this strategic plan. On the other hand, the country is on track in terms of putting PLHIV who know their HIV status on antiretroviral treatment, and in attaining viral suppression among those on treatment. However, inequalities are observed particularly among children who are still lagging in accessing HIV care and treatment services. Innovative strategies, described in the strategic plan, which

ensure child, adolescent and youth friendly HIV testing, treatment and psychosocial services need to be effectively implemented.

To progress towards the country's vision of achieving HIV epidemic control, the strategic plan prioritized impactful and cost-effective interventions and service delivery models through meaningful engagement and proactive participation by civil societies, the PLHIV, government and the private sector. Addressing social, economic, and cultural barriers including stigma and discrimination, gender-based violence and gender inequity, and updating important policy gaps aligned with the current nature of HIV epidemic and response are also emphasized in this strategic plan.

In addition, in the face of declining external resources, it is required that we implement the domestic and external resource mobilization strategies indicated in the strategic plan so that we can sustain the gains we have made so far.

Development of this National HIV Strategic Plan, 2023/24-2026/27 is informed by recommendations of thorough situational analysis and has incorporated important global recommendations. Effective implementation of the strategic plan enables us to expedite progress towards our goals and targets.

I, therefore, encourage all stakeholders to join hands in implementing this strategic plan with utmost commitment to ensure Ethiopia ends AIDS by 2030.

Fekadu Yadeta Muleta, MPH

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Ministry of Health, Ethiopia

## ACKNOWLEDGMENTS

The Ministry of Health would like to acknowledge the support and input provided by government sectors, Regional Health Bureaus, UN agencies, donors, development partners, and civil society organizations, including associations and networks of people living with HIV.

MOH recognizes the contribution of the various technical working groups and the consultant team that provided technical support to the country's effort in developing this HIV National Strategic Plan 2023/24-2026/27. MOH would like to thank WHO for the financial support on the consultative workshop and USAID/PSM for hiring the PSM consultant.

Special thanks go to UNAIDS for providing technical and financial support throughout the strategic planning process, including the hiring of international and national consultants, and covering the printing cost of the NSP.

## EXECUTIVE SUMMARY

### Background

Ethiopia has achieved epidemic control at the national level. In 2022, the number of new infections and AIDS-related deaths was <1 per 10,000 population and the incidence mortality ratio is <1. However, there are significant geographic and population variations. Closing such inequalities will be the country's most important focus during the new strategic period 2023/24-2026/27.

The Strategic Plan was informed by a national epidemiology and response analysis, national programme review, and wider stakeholder consultation. The process, led by the Ministry of Health, involved key stakeholders including government sectors, regional health bureaus, regional HIV prevention and control offices, UN agencies, PEPFAR, development partners, and civic societies, including PLHIV associations and networks and community representatives.

The guiding principles of the NSP are inclusiveness, gender responsiveness, value for money, multisectoral approach and partnerships. Central to the NSP is the recognition that communities are key partners in the response.

### Strategic goal and objectives

**Vision:** An AIDS-Free Ethiopia

**Goal:** To attain and sustain HIV epidemic control by 2027, by reducing new HIV infections and AIDS mortality to less than 1 per 10,000 population nationally, among subnational and subpopulation groups. Attainment of the strategic goal will be measured by the following indicators.

- The number of new HIV infections is reduced to less than 1 per 10,000 population in national, subnational, and subpopulation groups.
- HIV-related deaths are reduced to less than 1 per 10,000 population in national, subnational, and subpopulation groups.
- The incidence mortality ratio is reduced to less than 1 in national, subnational, and subpopulation groups.
- The percentage of child HIV infections contracted from HIV-positive women who delivered in the past 12 months is reduced from 12 percent in 2022 to less than 5 percent by 2027.

The following are the **strategic objectives** in this NSP:

1. Reach 95 percent of key and priority populations with targeted combination HIV prevention interventions by 2027.
2. Attain triple elimination of mother-to-child transmission of HIV, syphilis, and hepatitis B by 2027.
3. Enhance HIV case finding to attain 95 percent of people living with HIV knowing their HIV status and linked to care by 2027.
4. Attain 98 percent treatment coverage among PLHIV who know their status, and 98 percent of PLHIV on ART achieve viral suppression across all population groups and geographic areas.
5. Stigma, discrimination, and gender-based violence are reduced from 25 percent and 20 percent respectively to <10 by 2027.
6. By 2027, a large proportion of HIV testing, social enablers and HIV prevention services targeting KPPs in 300 priority woredas will be delivered by civil society, community, and faith-based organizations (CSOs, CBOs, FBOs) and PLHIV associations.
7. Enhance generation and utilization of strategic information for an accelerated evidence-based response.
8. Ensure resilient and sustainable systems for health and for an effective HIV response.
9. Mobilize resources and maximize efficiencies in allocation and utilization.

### **Geographic and population prioritization**

The NSP is built upon geographic and population prioritization. Accordingly, there are 300 priority woredas (265 high-incidence woredas with >0.03% incidence and 35 conflict-affected woredas). The population prioritization identifies three key populations (female sex workers, people who inject drugs, and prisoners) and seven priority populations (high-risk adolescent girls and young women, long-distance drivers, workers in hotspot areas, divorced and widowed men and women, seronegative partners of PLHIV, high-risk uniformed people, and people in humanitarian settings). In addition, special consideration is given to people with disabilities and street children.

### **Strategic interventions and service delivery models**

#### **Combination HIV prevention**

Combination HIV prevention interventions are tailored to the different key and priority populations. The interventions include social behavioral change communication, condoms and lubricants, pre-exposure prophylaxis, post-exposure prophylaxis, voluntary male medical circumcision, diagnosis and treatment of sexually transmitted infections, and harm reduction services for people who inject drugs.

The service delivery models at health facilities and community level include drop-in-centres, key and priority population-friendly clinics, the general HIV services of health facilities, adolescent and youth-friendly services, peer service providers, mentor-based services, and integrated services at prison, workplaces, universities, uniformed people training centres, and humanitarian settings.

Mapping will be conducted using standardized tools to identify and reach key and priority populations at woreda level. A self-administered digital risk screening tool will be used to identify high-risk adolescent girls and young women.

#### **HIV case finding**

HIV testing will be conducted at health facilities and community levels targeting high-risk groups, especially the key and priority populations. The strategies for HIV case finding include provider-initiated HIV testing and counselling, index case testing, social network services, and HIV self-testing. The risk screening tool will be validated and used at health facilities to identify high-risk groups.

#### **Triple elimination of MTCT of HIV, syphilis, and hepatitis B virus**

Triple elimination of MTCT of HIV, syphilis and hepatitis B virus services will be provided at health facilities across the country. The interventions include scale up of primary prevention for pregnant and breastfeeding women (risk screening, risk reduction counselling and education, condoms, diagnosis and treatment of sexually transmitted infections, pre-exposure prophylaxis and family planning); early initiation of antenatal care and universal screening of HIV, syphilis, and hepatitis; provision of optimized antiretroviral therapy regimen for HIV-positive pregnant and breastfeeding women and linkage to initiation of syphilis and hepatitis B prophylaxis/treatments; provide dual ARV prophylaxis for all HIV-exposed infants; early infant diagnosis and linkage of HIV-positive infants to HIV care and treatment. The programme will strengthen the mother and baby cohort follow-up and monitoring through mother support groups and improved data recording and reporting.

#### **HIV care and treatment**

HIV treatment will be provided for all HIV-positive people through differentiated service delivery models at health facility and community levels. The country will continue to implement differentiated service delivery models, including multi-month dispensing, fast-track ART refill, key population and adolescent differentiated service delivery model, community ART group, advanced HIV disease. Enhanced efforts will be made to improve access and quality of pediatric and adolescent HIV treatment. Pediatric and adolescent HIV treatment optimization will be strengthened to improve viral suppression. There will be improved access to treatment of comorbidities, including tuberculosis (TB), viral hepatitis B and C, cervical cancer, and mental health.

## **Human rights and community engagement**

The country will develop policy, strategy, and guidelines to enhance the efforts to reduce stigma, discrimination, and human right violations, targeting people living with HIV and key populations at health facilities, schools, prisons, and communities. Interventions to address gender inequalities and gender-based violence (GBV) include development of policy and guidelines, building capacity of the health sector, law enforcement, media, civil society organizations and other key sectors; provide health, social, and legal services for survivors of gender-based violence and empowerment of girls, women, and communities for prevention, reporting and management of gender inequalities and gender-based violence.

The country will strengthen the leadership capacity of people living with HIV, key and priority populations and affected communities in the HIV responses. Community-led monitoring will be scaled up to enhance policy, programme performance and service quality.

## **Strategic information and systems strengthening**

The country will update the HIV policy, legal frameworks, and guidelines to ensure efficient coordination and implementation of the National Strategic Plan.

Generation, analysis, reporting, and utilization of district health information system routine health service data will be strengthened through building the capacity of data managers, improving the interoperability of existing information systems, data quality monitoring, and ensuring availability of information technology infrastructure at all levels. Routine community service data will be collected, analyzed, and reported integrated in the DHIS-II platform. There will be annual and semi-annual joint supportive supervision and review meetings at national and subnational levels involving wider stakeholders. There will be mid-term and end-term evaluations of the Strategic Plan.

Survey and surveillance will be conducted periodically to generate population wide evidence that will guide strategic and operational plans and policies.

Human resources for leadership programmes and services will be strengthened at national, subnational and health facility levels through recruitment of additional staff, capacity building and retention interventions.

Pharmaceutical supply chain management system will be strengthened through capacity-building for forecasting, procurement, and supply chain management. This includes development of policy, strategy, guidelines and tools, recruitment, and training of staff, strengthening IPLS, and upgrading infrastructure.

The laboratory system will be strengthened through capacity-building of staff, availing newer technologies (point of care and multiplex testing), improving efficiency of integrated sample transport, scaling up laboratory quality assurance, and improved laboratory management information system. There will be regular HIV drug resistance monitoring.

## **Financing the NSP**

The NSP 2023/24-2026/27 reflects a prioritized and cost-effective response over the NSP period. The estimated resource need for the strategic plan period is \$1.1 billion (in US dollars), representing an average of \$275.2 million per year. Based on the current trend, the expected available funding for HIV over the NSP period is estimated to be \$918 million or \$230 million per year. The estimated resources needed will be mobilized from donors and domestic sources. The country will implement a sustainable and equitable health fund to mobilize domestic resources to finance the HIV and other health programmes.

# CHAPTER 1

## INTRODUCTION

### 1.1 Country context

Ethiopia is Africa's second most populous nation with an estimated population of 105.2 million, approximately 80 ethnic groups and languages, and a diverse geographic area of 1.127 million sq.km. About 77 percent of the population resides in rural areas. The country is characterized by rapid population growth (2.6) with a total fertility rate of 4.6 births per woman. Sixty-five percent of the population is under 25 years and 47 percent is under 15 years of age [1].

Ethiopia has an ethno-linguistic-based federal structure since 1991. The Federal Constitution was endorsed in 1994. There are 12 regional states and two city administrations. Each region is governed by its own Constitution and Regional Council and is endowed with significant administrative authority/autonomy over political, economic, and social policies. The Ministry of Finance allocates the annual budget based on formulaic principles. Regional Councils allocate their own resources towards the various sectors. Regions are further sub-divided into more than 1,000 woredas (districts) and 17,000 kebeles, the smallest local administrative unit.

Ethiopia has made substantial economic and social progress over the last 30 years. Between 2000 and 2020, Ethiopia's Human Development Index value increased by 76 percent from 0.283 to 0.498. However, the most recent survey data (2019) for Ethiopia's Multidimensional Poverty Index estimates that nearly 69 percent of the population is multidimensionally poor while an additional 18.4 percent are classified as vulnerable to multidimensional poverty. In 2021, Ethiopia's Gross Domestic Product (GDP) was US\$925.1 per capita, much lower than the average for other sub-Saharan countries of US\$1,553 [2].

In addition, in the last three years, multiple crises arising from the COVID-19 pandemic, widespread conflict and severe drought in various regions have adversely impacted the health and economic situations. At the macroeconomic level, shortages of foreign currency are a chronic foundational problem.

Ethiopia's Growth and Transformation Plan provides an overarching framework for national development across all sectors. The Health Sector Medium-Term Development and Investment Plan (HSDIP) 2023-2026 provides the framework for the health sector to support Ethiopia's overall growth and transformation and outlines several strategic directions. These include provision of equitable and quality comprehensive health services improved health emergency and disaster risk management, community engagement and ownership, access to pharmaceutical and medical devices and their rational and proper use, regulatory system, human resource development and management, informed decision-making and innovations, digital health technology, health financing, governance and leadership, health infrastructure, traditional medicine, health in all policies and strategies as well as private engagement in the sector [3].

Ethiopia has made significant progress in the health indices of the nation. Between 1990 and 2021 life expectancy at birth increased by 19.6 years to 65 years. Between 2000 and 2019 neonatal, infant and under-five mortality rates dropped from 49 to 30 per 1,000 live births, 97 to 43 per 1,000 live births, and 166 to 55 per 1,000 live births respectively [4]. Between 2000 and 2016 the maternal mortality ratio (MMR) declined from 871 to 412 per 100,000 live births. Seven in 10 pregnant women attend at least one antenatal visit but they often present late in pregnancy. Skilled delivery increased from 5 percent in 2000 to 50 percent in 2016 [4]. However, there are wide regional disparities for many health indicators.

Ethiopia has a three-tiered health system. The primary level care is provided at primary hospitals, health centres and health posts, while secondary and tertiary level care is provided at general hospitals and specialized hospitals respectively. The health centres in urban areas serve a catchment population of 40,000 population while in rural areas they are intended to serve a catchment population of 15,000-25,000. In rural areas, primary health units include one health centre with five satellite health posts, each serving a catchment population of 3,000-5,000. The health extension programme launched in 2003 has been a success in training and deploying more than 30 000 health extension workers in health posts at 17,000 kebeles across the country. Primary hospitals, general hospitals and specialized hospitals serve catchment populations of 60,000-100,000, 1-1.5 million and 3.5-5 million respectively. The number of primary health care facilities increased from 3,519 (356 health centres, 2,330 health stations, and 833 health posts in 2000 to 22,403 (18,277 health posts, 3,899 health centres, and 227 primary hospitals) in 2022 [5].

Over the past decade, considerable resources and efforts have been dedicated to training health workers but gaps remain. In 2020 Ethiopia had 1.04 doctors, 5.96 nurses, 1.74 midwives and 0.46 pharmacists per 10,000 population, giving an approximate rate of 0.92 health professionals per 1,000 population. This figure is much lower than the African average of 2.2/1,000, and five times less than the minimum threshold recommended by WHO of 4.45/1,000 to meet the Sustainable Development Goals health targets.

In the Ethiopian fiscal year 2014 (2021/22), the government allocated 13.8 percent of the total budget to the health sector [6]. The government's per capita allocation to health of \$36.6, including recent COVID funding (\$34 per capita without additional COVID funding) is well below the sub-Saharan per capita allocation of \$86 recommended by WHO.

Ethiopia's total health expenditure of 72 billion ETB (US\$3.1 billion) accounts for 4.2 percent of the country's Gross Domestic Product but remains lower than the expected average of 5 percent for low-income countries, and well below the global average of 9.2 percent [7]. The main sources of finance for Ethiopia's total health expenditure are government (32.2%), external donors (33.9%), and households' out-of-pocket payments (30.5%). The share of direct household payments to health facilities for services is considerably higher than the global recommended target of 20 percent [7].

Ethiopia has enshrined in its Constitution appropriate legal and policy provisions to promote the rights of women and girls. The country has ratified many of the international and continental agreements that promote and protect women's rights.

The Family Law, revised in 2000, entitles Ethiopian women to spousal property rights and gives women the right to access, use and control property, including land [8]. Labour law reforms ensure the equal participation and benefit of women in the labour force, prohibits discrimination based on sex and provides for extended maternity leave.

However, there has been limited enforcement of existing laws and policies on the rights of women. In the 2021/22 Human Development Index Report, Ethiopia ranks 129 among 191 countries in the gender inequality index. There are gender disparities in education and labour force participation: only 9.1 percent of girls versus 20.1 percent of boys have secondary education; female labour force participation is lower than males (70.2 % women, 83.6% men) [9]. Women's ability to access health services are limited by their low decision-making power at household levels [10].

The Penal Code, revised in 2005, criminalizes acts of violence against women, including child marriage and abduction. However, child, early or forced marriages continue to be common practices. Ethiopia has the world's fourteenth highest prevalence of child marriage (40), defined as marriage below the age of 18 years, although there have been impressive declines over the past decade [11].

In Ethiopia, violence against women remains a major challenge: among women aged 15-49, 23 percent have ever experienced physical violence and 10 percent have experienced sexual violence; 34 percent of ever-married women aged 15-49 have experienced spousal physical, sexual, or emotional violence<sup>7</sup>. The recent internal conflict in the country has led to an increase in people needing of GBV services, rising from 3.5 million in 2021 to 6.7 million in 2023. Nationwide there are few facilities, predominately in urban areas only, that provide comprehensive GBV services. In 2021, nearly 16,700 GBV survivors accessed or were referred to medical services. The majority were women and girls [12].

## 1.2 HIV epidemic context

### Current HIV situation

The HIV epidemic in Ethiopia is mixed, with substantial regional variations, concentrated in urban areas and in some geographic hotspots driven by key and priority populations. In 2022, the national HIV prevalence among adults (aged 15 years and above) is 0.91 percent, with the highest values in Gambella and Addis Ababa (3.7% and 3.47% respectively) and the lowest in Somali region (below 0.1%). An estimated 610,350 people are living with HIV (PLHIV), of whom 61 percent are women. Amhara, Oromia, and Addis Ababa account for 75 percent of PLHIV. In 2022, the number of new infections and AIDS-related deaths were estimated to be 8,257 and 11,322 respectively (Table 1) [13].

The national HIV prevalence among youth aged 15-24 years is 0.3 percent. The highest HIV prevalence rates are found in Gambella region and Addis Ababa (1.74% and 1.68% respectively). The number of new infections by age group shows that women aged 15-19 years were seven times more likely to be infected than their male

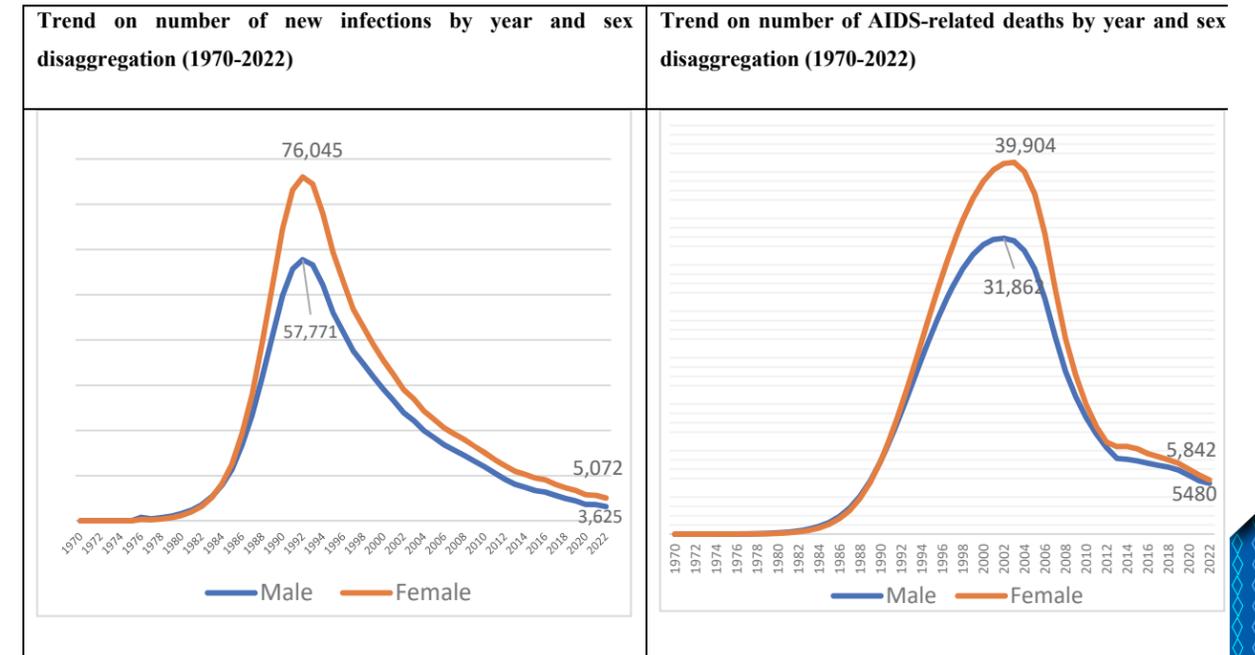
counterparts (819 compared to 116). Similarly, children of age 0-14 account for 24 percent of all new infections because of vertical transmission from mother to child [13].

**Table 1: Number of HIV population and HIV prevalence by regional distribution, 2022**

Region	HIV population	HIV prevalence		New infections	AIDS-related deaths
		Adult 15+	15-24 Age		
Addis Ababa	112,185	3.47	1.68	489	816
Afar	10,919	0.83	0.32	325	289
Amhara	165,955	1.09	0.34	1806	1,290
Benishangul Gumuz	6,249	0.74	0.28	128	71
Dire Dawa	11,096	2.90	0.88	244	187
Gambela	13,395	3.69	1.74	313	256
Harari	5,580	2.97	0.69	52	31
Oromia	158,152	0.64	0.2	2235	1,861
Sidama	24,306	0.78	0.31	1166	603
SNNP	47,716	0.43	0.14	673	660
Somali	7,079	0.18	0.08	250	262
Tigray	47,717	1.24	0.43	576	255
<b>National</b>	<b>610,350</b>	<b>0.91</b>	<b>0.28</b>	<b>8257</b>	<b>11,322</b>

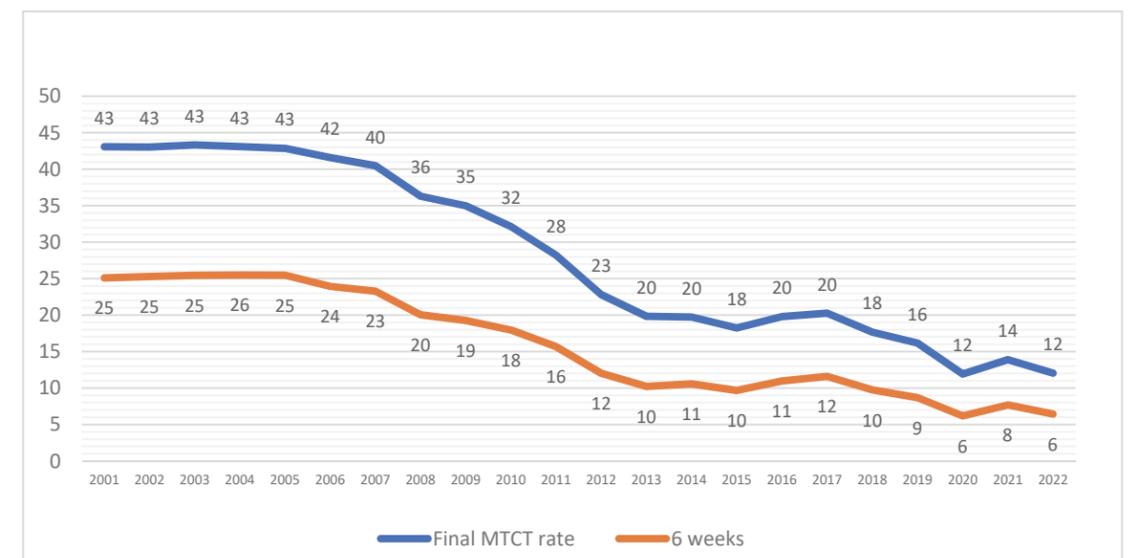
**Trends on new infections and AIDS-related deaths**

Over the past 20 years, both new infections and AIDS-related deaths have significantly decreased in Ethiopia. The number of new infections declined by 85 percent, from 133,816 in 1994 to 8,257 in 2022. AIDS-related deaths declined by 93 percent, from 71,766 in 1994 to 11,322 in 2022, which is largely attributed to introduction and scale up of ART programme. According to estimates, the HIV incidence to mortality ratio was less than one (0.73) in 2022 [14].



**Figure 1: Trend of new HIV infections and AIDS-related deaths by year and sex disaggregation (1970-2022)**

Mother-to-child HIV transmission has declined from 43 percent in 2001 to 12 percent in 2022 [13]. This decline is largely attributed to the introduction of ART and selection of Dolutegravir (DTG) as the optimal ART regimen for pregnant and breastfeeding women in 2019 (Fig 2).



**Figure 2: Mother-to-child transmission at six weeks and final MTCT including breastfeeding, 2022**

## HIV in Key and Priority Populations

Key and priority populations are disproportionately affected by the HIV epidemic and remain key drivers of the epidemic. Ethiopia defines three key populations (female sex workers, people who inject drugs and prisoners) and seven priority populations (high-risk adolescent girls and young women, long-distance drivers, workers in hotspot areas, divorced and widowed men and women, seronegative partners of PLHIV, high-risk uniformed people, and people in humanitarian settings). HIV prevalence among female sex workers (FSW) has declined from 23 percent in 2013 [15] to 18 percent in 2020 [16]. The HIV prevalence among prisoners is 4.2 percent in 2014 [17], 6 percent among people who inject drugs (PWID) in 2015 [18], 4.6 percent among long-distance drivers [15]. A survey among uniformed people in 2018 indicated an HIV prevalence of 1.2 percent [19]. The EDHS 2016 reported an HIV prevalence of 11.5 percent among widowed and of 2.9 percent among divorced men and women [4]. A survey conducted in 2018 among adolescent girls and young women in Addis Ababa and Gambella showed an HIV prevalence of 2.1 percent [20].

## HIV risks and vulnerabilities

In Ethiopia, HIV transmission is largely heterosexual and there is low comprehensive knowledge about HIV and STIs. High-risk behaviors include multiple sexual relationships casual and paid sex, low use of condom during high-risk sex, STIs, needle sharing among PWID, low male circumcision in pockets of communities in Gambella region, and alcohol and substance use. Gender-based violence and other gender-related and socioeconomic factors contribute to HIV risk and vulnerabilities.

According to the latest EDHS 2016, only 20 percent of women and 38 percent of men aged 15-49 years had comprehensive knowledge about HIV. Only 20 percent of women and 51 percent of men who had a non-cohabiting partner in the past 12 months reported using a condom during last sexual intercourse with this partner.

The situation is similar for young people aged 15-24 years. Only 24 percent of women aged 15-24 and 39 percent of men aged 15-24 have comprehensive knowledge of HIV. Among girls, 9 percent had their first sex before the age of 15 years and 40 percent before age of 18 years. Condom use at last sex with a non-marital, non-cohabiting partner is 24 percent among young women and 55 percent among young men [4].

In 2020, the second round IBBS reported that the majority (95 percent) of FSWs used a condom at last sex with a paying client. However, only 26 percent of these FSWs used a condom at last sex with non-paying partners [16].

About 4 percent of adults aged 15-49 years reported at least one STI symptom in the 2016 EDHS [4] and only one third sought treatment.

Similarly, the second round IBBS revealed that 16.5 percent of FSWs had had an STI symptom over the previous 12 months, with only 64 percent of them seeking care from a health professional [16].

Gender inequality and gender-based violence contributes to increased risk of HIV in Ethiopia. EDHS 2016 indicated that 20 percent of women had experienced physical and/or sexual intimate partner violence in the last 12 months [21].

Gender and economic inequalities drive some women to engage in transactional sex and sex work, which bear a high risk of violence and HIV. Just over 21 percent and 13.3 percent of FSWs have experienced physical and sexual violence respectively. More than a quarter of FSWs had ever experienced sexual assault [16].

Male circumcision is a traditional practice in Ethiopia, with 91 percent of men aged 15-49 having been circumcised [4]. However, the rate of male circumcision was 72 percent in Gambella, where HIV prevalence is the highest, and 84 percent in some SNNP districts, where HIV prevalence is relatively low [4].

Most PWID (79%) reported access to safe needle and syringe mainly from pharmacies [18]. About a third (18 %-30%) of the PWID reported ever sharing needles and syringes [22].

## 1.3 HIV/AIDS response

### Combination HIV Prevention

Combination HIV prevention has been at the core of HIV response in Ethiopia. Combination prevention interventions implemented at both health facility and community levels include social behavioral change communication, condom promotion and distribution, pre-exposure prophylaxis, post-exposure prophylaxis, voluntary male medical circumcision, diagnosis, and treatment of STIs, harm reduction for people who inject drugs, and prevention and management of GBV.

More than five million youth and KPPs were reached with social behavioral change communication in 2022. SBCC used a mix of approaches: targeted peer-to-peer and one-on-one education for KPP, public meetings, community dialogues, distribution of print and electronic SBCC materials, and broadcasting documentaries and TV/radio spot messages.

However, the peer education multi-session SBCC and demand creation interventions targeting KPPs were of limited scale and quality. There was limited use of social and electronic media. Implementation within the school curriculum of sexual and reproductive health and HIV education was scattered, with bits and pieces of information provided in different subjects.

Therefore, school HIV education has been limited due to a lack of comprehensive HIV/SRH/life skills stand-alone subjects, lack of leadership commitment, budget, trained teachers, and support. There has been little support for school clubs and media activities [23].

Condoms are predominantly procured and distributed through free (59%) and social market approaches (40%), while the private market contributes only 1 percent. Free condoms are distributed targeting KPPs. The social marketing programme and private sector reach the general population and KPPs in all woredas across the country. The country developed a condom strategy and guidelines in 2021 [24]. However, the strategy and guidelines were not implemented. The condom programme is challenged by a recurrent shortage of condoms. Only 80 million of the 220 million male condoms planned for 2022 were procured and distributed [23]. The shortage of free condoms was largely related to bottlenecks with procurement procedures. There is a need to expand condom distribution through non-traditional outlets in hotspot areas and during night hours [23].

Ethiopia started rolling out PrEP in late 2019 targeting female sex workers and HIV serodiscordant couples. In 2022, PrEP service was provided to 21,684 individuals at high risk of acquiring HIV, to 2,014 HIV-negative partners of PLHIV, and to 19,670 FSWs [5]. The gaps in PrEP include less than optimal coverage for the currently eligible populations (FSWs and discordant couples) and limited target groups. Oral PrEP is distributed in ART clinics and is not yet largely integrated into FP/SRH/MCH clinics and community-based distribution. Stigma, discrimination, and pill burden hinder PrEP service uptake and retention. Post-exposure prophylaxis is restricted to medical exposure and rape. People with non-medical exposure lack access to PEP [23].

Harm reduction targeting PWID was included in the HIV NSP 2021-2025, but the programme was not fully implemented. There have been efforts to provide HIV services, including HIV testing and peer education, to PWID. In Ethiopia, needles and syringes are sold over the counter without prescription. Most PWID obtain needles and syringes from private pharmacies. However, the majority of PWID repeatedly use needles and syringes. About a fifth of PWID ever shared needles and syringes [22]. Methadone and naloxone were not on the National Essential Drug List [25] and there was no opioid substitution therapy.

The VMMC programme has been implemented in the Gambella region, where HIV prevalence is the highest and the circumcision rate is the lowest in the country. PEPFAR has been supporting the programme, which conducts some 25,000 to 30,000 circumcisions a year [5]. However, the programme is run vertically and lacks integration with routine primary health care services. In addition, strong social and cultural barriers against circumcision require strong community mobilization with community and religious leaders. The recent internal armed conflicts have led to increased military recruitment. PEPFAR previously supported VMMC programmes targeting military personnel, but this stopped a few years back.

STI services are integrated in all inpatient and outpatient services in public and private health facilities. STI services use a syndromic approach with the purpose of expanding access to effective treatment, even at health facilities with limited diagnostic capacity. In the 2014 EFY 309,029 STI cases were diagnosed and treated at different health facilities. Of these cases, 89 percent were tested for HIV and 6,057 (2.2%) were identified as HIV-positive [5].

However, many STIs go unreported. The STIs guideline is outdated and there is no recent STI drug resistance study to revise the guideline. Although patients with diagnosed STIs are targeted for HIV testing, there are missed opportunities as well as shortages of STI treatment kits. Most health facilities implement partner notification and treatment services for partners of STI cases, but this is problematic. Many clients refuse to notify partners for fear of violence and adverse outcomes [23].

The FSW programme is one of the best performing KPP programmes. However, the FSW population is not homogenous. Hence the programme needs segmentation to better target the most affected FSW groups, such as new entrants, younger FSW, and FSW working from home or through virtual platforms [23].

High-risk adolescent girls and young women have been defined as one of the priority populations. However, programmes targeting high-risk AGYW have been limited. There was no nationally validated risk screening tool to identify high-risk AGYW and no defined package of interventions and service delivery models to reach them [23].

Long-distance drivers divorced and widowed men and women, workers in hotspot areas, and serodiscordant couples are other vulnerable groups defined in the NSP. Programmes for these vulnerable groups have been scarce due to a shortage of funds and a lack of skills and guidelines on how to map, estimate the size, identify, and reach these populations.

Recent findings showed that in 2022 the proportion of recent infections among HIV-positive test results was highest for uniformed people (13.7%) and for AGYW (waitresses 13.3%) [26]. However, the HIV prevention programmes targeting high-risk uniformed people have been limited.

Over the past three years, widespread armed conflict has affected the western and northern parts of the country, especially the Tigray, Amhara, and Afar regions. The conflict destroyed and disrupted HIV services [27]. Hundreds of thousands of people were displaced and there have been reports of rising cases of SGBV. Internal population displacement increases the vulnerability of people. There has been a very limited response to comprehensively address the increased risk of people in conflict-affected settings.

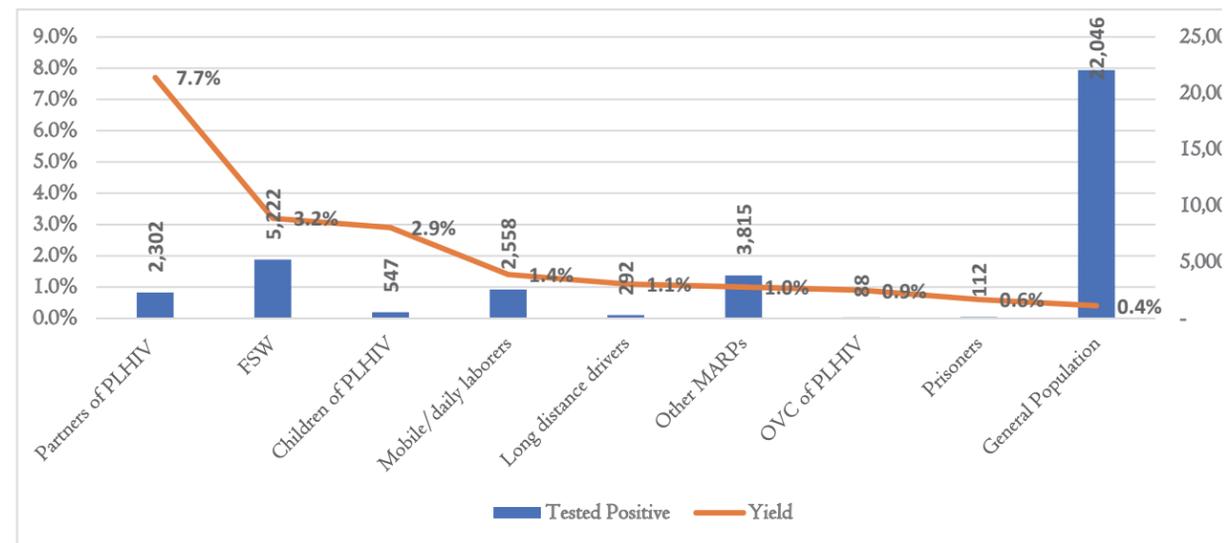
The KPP-friendly clinics are located within public health facilities, DICs, and in hotspot areas. Outreach programmes and peer service providers link KPPs, especially female sex workers, with services. DICs have been effective in reaching FSWs but there are only 65 DICs in the country, most supported by PEPFAR. A nationally defined standard for ART and non-ART DICs is lacking while the package of services and quality varies significantly. The effort to expand low-cost, government-led DICs, as outlined in the NSP 2021-2025, was not realized due to lack of government-owned houses in hotspot areas and a lack of commitment from town administrations. The outreach programmes were hampered by a shortage of funds and low engagement of CSOs. The peer service programme lacks defined standard training, service, and incentive packages [23].

### HIV testing services: Case finding.

HIV testing services are offered through the index case testing and partner notification services (ICT/PNS), voluntary counselling and testing and provider-initiated testing and counselling in outpatient departments, TB, family planning, maternal and child health clinics (ANC, delivery, postnatal services), inpatient departments, specialty clinics, KPPs/youth-friendly clinics and other health service delivery points, as well as through the option for HIV self-testing. The PITC service uses a standardized risk screening tool for better yield and effectiveness, but this was used inconsistently [23].

According to MoH EFY 2015 report, an overall 6.6 million HIV tests were conducted, with a test yield of 0.5 per cent and considerable regional variations. The test yield was 0.6 per cent and 1.6 per cent for Harari and Addis Ababa respectively, and 0.3 per cent, 0.3 per cent and 0.4 per cent for Oromia, Sidama and Somali regions respectively.

More targeted testing through ICT (76,369) provided a yield of 9.4 per cent. Through VCT, the yield was 0.8 per cent. Testing among KPPs showed consistently higher yields, but the number of tests performed through ICT was relatively low.



**Figure 3: Testing and yield by population groups (Annual Performance of 2015 EFY, 2022/23)**

Index case testing has been a high yield testing modality, although the number of index cases elicited and tested was low. Clients refuse or provide wrong addresses of contacts due to lack of disclosure, stigma, and discrimination. Providers also fear violence from contacts when elicited.

General provider-initiated testing and counselling has low yield. The risk screening tools have not been validated and providers apply these tools inconsistently in the inpatient and outpatient departments.

The engagement of CSOs and community-based programmes in targeting KPPs has been limited. HIV self-testing for KPPs has been underutilized and there is a gap in the report back of self-test results.

*HIV Case Reporting and Recency Testing:* Case-based HIV surveillance started in 2018 to better focus prevention services and identify hotspots of new infections. HIV case reporting with recent testing for recent infection (RTRI) is now integrated with the existing public health emergency management (PHEM) system. The proportion of recent infections among the total number of tests performed annually has halved, from 16.5 percent in 2019 to 8.6 percent in 2022. Of the people tested in 2022, respectively 10 percent of females and 7 percent of males were recent infections. The proportion of recent infections was higher among adolescents aged 15-19 years (19%) and among youth aged 20-24 years (14%). The proportion of recent infections was highest for people in uniformed services, and for waiter/waitresses and for Female sex workers 14 percent, 13 percent and 11 percent respectively [28].

### Virtual elimination of mother-to-child transmission of HIV, syphilis, and hepatitis

Currently, comprehensive PMTCT services are available in over 2,865 health facilities in an integrated one-stop approach that uses the maternal neonatal and child health (MNCH) platform. The national ANC first and fourth attendance was 95 percent and 74 percent respectively in 2015 EFY but many women attend late in their pregnancies, and regional disparities exist. In 2021/2022, among the 3,608,240 expected pregnancies, 89.8 percent (3,059,999) pregnant women were tested for HIV. Among the 17,636 estimated HIV-positive pregnant women, 14,008 (89.3%) received ART for PMTCT [6].

Ethiopia being a large, predominantly rural country with low national HIV prevalence presents programmatic challenges towards elimination of MTCT. Many health facilities are in rural or semi-urban areas. Because the number of HIV-positive pregnant women seen per month is low, health workers may find it difficult to maintain their skills in providing ART services for them.

Although Ethiopia integrated syphilis elimination in its HIV programme in 2017, based on current WHO guidelines for dual syphilis and HIV testing, the gap in syphilis testing (69.8%) against a much higher HIV testing (89.8%) is yet to be addressed [6].

In line with WHO guidelines, the 2021 updated national comprehensive and integrated PMTCT guideline endorses the DTG-based regimen as preferred first-line ARVs for PBFW and women of childbearing potential. The country has adopted the provision of enhanced postnatal prophylaxis (NVP+AZT) for the first 6 weeks and NVP alone for the following 6 weeks for all HIV-exposed infants (HEI). However, the MOH annual report for 2021/22 noted that only 47 percent of HEI had received enhanced ART prophylaxis [6].

The early identification of HIV-positive infants is critical for their survival. Testing of HEI can take place at several potential points. Even though birth testing has not started yet, EID test should be done for HEIs at 4-6 weeks and again at nine months for those with a negative result at six weeks.

Most health facilities collect and send dried blood samples (DBS) for a DNA polymerase chain reaction (PCR) test but the turnaround time for results ranges from two to three months. In 2021-2022, only 61.6 percent (9,657) of HIV-exposed infants had a PCR test. Gaps exist in linking HEI to care immediately after birth [6]. Other challenges are failure to implement quality improvement interventions, weak maternal and HEI cohort monitoring analysis, shortage of supplies and reagents, and lack of trained staff.

In 2023 there are 498 GenXpert machines in the country with another 300 under procurement. Of these, 180 machines have TB and EID platforms and 51 can measure TB, EID and VL [29]. Optimizing the multiplex platform capacities of the GenXpert machines in Ethiopia is crucial.

Mothers support groups operate in most high-volume public health facilities. However, the majority of MSG are donor-funded, which weakens their sustainability when donor funding ends. Some regions have incorporated these peer mothers into their budget. A key recommendation from the programme review is the expansion of MSG managed by civil society and PLHIV associations.

### Care and treatment

In Ethiopia, free ART services have evolved since starting in 2005, from CD4-based eligibility to “Treat All” HIV-positives combined with re-testing prior to ART initiation, and later to rapid ART initiation since November 2016. ART services are provided in more than 1,500 public, private and NGO health facilities within a strong programme with good referral and registration systems. Ethiopia has achieved the second and third 95 targets nationally, but gaps appear when disaggregated by adults and children (Fig. 4). Of the 84 percent of estimated PLHIVs who know their status, 98 percent are on ART, and 98 percent of PLHIV on ART are virally suppressed. In addition, once diagnosed as HIV-positive, PLHIV benefit from good linkage and adherence to treatment [29].

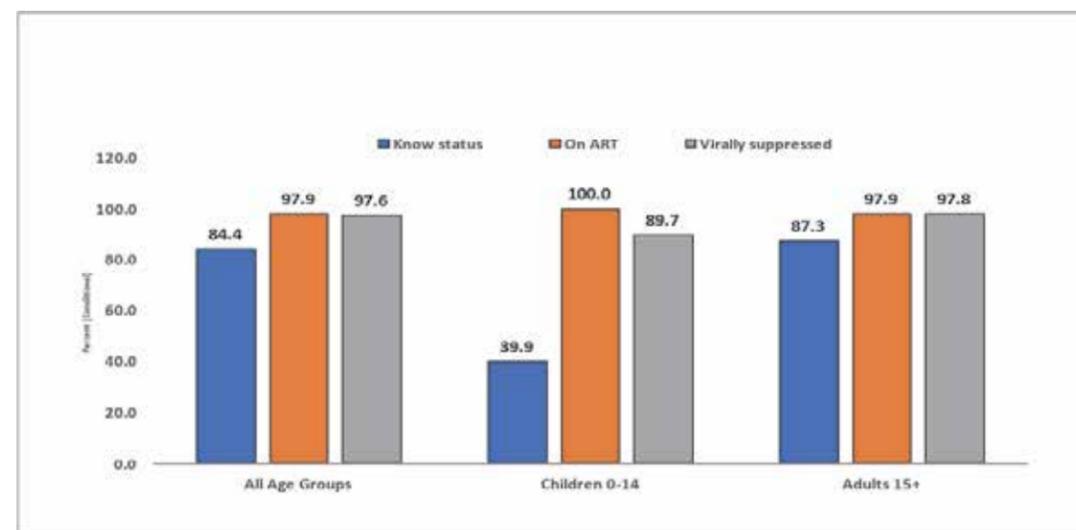


Figure 4: Progress to reach 95-95-95 treatment targets, 2022 (Spectrum estimates, 2023)

Viral suppression among children 0-14 years is suboptimal. Viral suppression is 90 percent for all children under 15 years of age but 84 percent for children under 5 years of age [30]. (Fig. 5).

To address this inadequate performance, the MOH launched a surge campaign, the Pediatric HIV Programme Acceleration Initiative [31]. Currently 103 health facilities are involved in this initiative. It is too early to assess its results, but PHPAI has alerted care providers they must rigorously follow all testing opportunities to identify CLHIV, minimize missed opportunities, and effectively link children to treatment. RHBs have increased their monitoring and supervision. In addition, the Spectrum estimates of the number of CLHIV must be revisited.

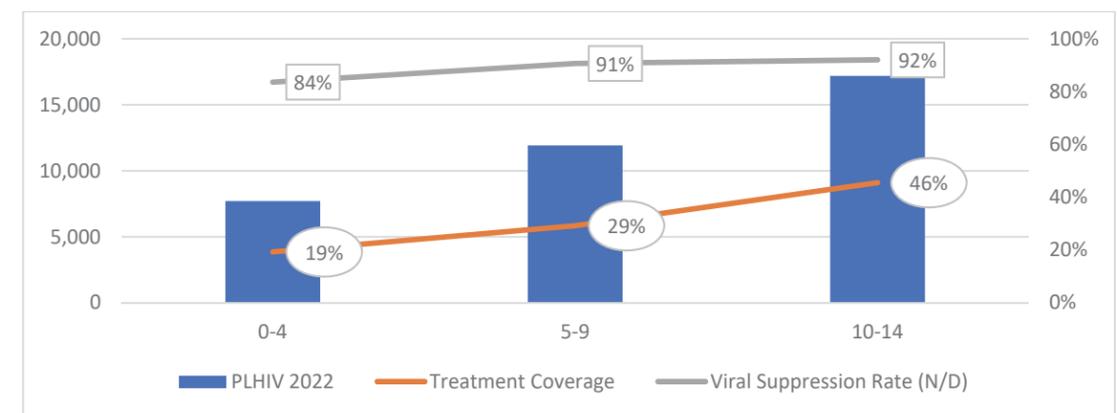


Figure 5: Treatment coverage and viral suppression among children, 2022 (PEPFAR-supported sites)

Most ART services are provided by the public sector. Accompanied referrals have been effective at improving linkage into care and treatment. Community-facility referral is progressing because of ongoing audit practices of linkage performance. Case managers, peer navigators and adherence supporters significantly assist the ART services by promoting treatment literacy and adherence, and tracing patients lost to follow-up. In several regions, excellent relationships exist with PLHIV associations and other CSOs.

Private health facilities, especially in urban areas, provide free ART drugs and viral load testing through sample referral, with physician consultation provided on a fee basis. However, many private health facilities lack an adequate number of trained staff, case managers and adherence supporters, as well as strong links to the community. Private health facilities often do not get adequate technical support, may lack drugs to manage opportunistic infections, have weak systems for tracing patients and are not adequately involved in monitoring and review meetings [23].

There has been continued expansion of differentiated service models. Nearly universal 6-month and 3-month multi-month dispensing of ARVs has been crucial in maintaining the treatment cohort during the COVID pandemic and the recent complex humanitarian emergencies and conflict, [29]. The last two and a half years of conflict brought major population displacement, considerable disruptions to health services, inconsistent drug supply and loss of medical records.

The widespread adoption of MMD (with 82 percent of HIV-positive adults enrolled in 6-MMD) mitigated treatment interruption. In addition, some clients were able to get emergency refills at facilities near internally displaced camps.

Other less widespread differentiated service delivery models include fast-track refills, community ART groups, peer-led ART distribution, and DSD models for adolescents, KPs and PBFW.

Ethiopia has a large refugee population. Refugee camps and their services are managed by the Administration for Refugee and Returnee Affairs. ARVs for the refugee population have always been incorporated into the national forecasting quantities.

The national treatment cascade masks disparities among different KPP populations and geographic variations. The pivotal role of cadres such as case managers, adherence supporters and mother support groups remain predominantly donor supported. However, the MOH is planning to develop competency standards for these cadres with a gradual absorption into the regular budget as resources allow.

### **Comorbidity screening and management**

- Tuberculosis: There is 100 percent screening of PLHIV and LF-LAM testing is available for diagnosis of TB in advanced HIV disease. Increased access to and updated TB prevention regimens are available.
- Mental health has been integrated in the updated policy guideline, training materials, and monitoring tools [32]. A pilot implementation of mental health services is taking place at selected health facilities and community sites.
- Cervical cancer screening and treatment are available in 602 health facilities. Screening has reached 60 percent of eligible women [33].
- Viral hepatitis: prevalence of hepatitis B and C among PLHIV is 6.5 percent and 4.9 percent respectively. PLHIVs are among the identified high-risk groups for systematic screening and treatment of viral hepatitis B and C. Services have been introduced for the management of hepatitis B at ART clinics and referral for hepatitis C.
- Nutritional support is integrated into HIV services. Over 81,000 PLHIV received nutritional support in the first nine months of 2015 EFY [29]. However, there are reports of insufficient nutritional support in some areas.
- Shortages persist of cryptococcal antigen (CrAg) reagents to screen and drugs to treat for cryptococcal disease as well as other drugs to treat opportunistic infections.

### **Human rights and gender response**

The Government of Ethiopia has ratified key global charters and conventions on women and children. The Constitution and the national legal frameworks, including the revised family law, recognize the rights of women and girls. However, implementation and enforcement of such laws have been a challenge [34].

Free legal services are offered at selected federal, regional and woreda level courts for survivors of GBV and women and girls who need such services. The Women's Affairs offices provide counselling and legal support in coordination with police and family courts.

With support from partners and donors (UNFPA, PEPFAR, and the Global Fund) the health sector provides free of charge, first-line, and comprehensive one-stop GBV services at health facilities. The comprehensiveness and quality of these services, however, are variable.

Stigma and discrimination towards PLHIV and key populations have been high in Ethiopia. Almost a quarter (24 %) of PLHIV report facing some form of stigma in their social environment because of their HIV status. Women (26 %), less educated people (32 %), and key populations (32 %) are more likely to face externalized stigma [35]. A considerable proportion of PLHIV reported at least one form of stigma and discrimination in health-care settings, seeking HIV (30%) and non-HIV services (42%). Female PLHIV and KPs living with HIV were more likely to face stigma and discrimination in health-care settings [35]. Self-stigma among PLHIV in Ethiopia is high. Over three-fourths (76%) of PLHIV surveyed reported at least one form of self-stigma and 38 percent reported self-discrimination in the 12 months preceding the survey. Females (79%), those aged 18 to 24 years (90%) and KP (83%) were more likely to experience self-stigma [35].

Efforts to address stigma and discrimination have been inadequate. This reflects in the little progress achieved between the Stigma Index Surveys 2011 first-round and 2020 second round [35]. The health and education sectors lack solid legal frameworks and zero stigma policies to prevent and mitigate stigma and discrimination in health facilities and school settings. Anti-stigma media campaigns have been minimal over the past five years. PLHIV and KPs have little access to legal services and legal literacy training.

The HIV policy issued in 1998 is outdated and has not been revised to address the current epidemic context, service delivery models, and issues. Therefore, it fails to adequately cover new HIV testing options, new treatment modalities, age of consent for HIV testing services (HTS), partner notification, school HIV programmes, social network services, workplace HIV testing, HIV mainstreaming, and key and priority populations [36]. The MOH has opted out to revise the policy and address issues within the MoH Health Act that is being drafted.

### **Community-led services and monitoring**

Civil society organizations, community-based and community-led organizations, including PLHIV associations have an essential role to play in the HIV response at all levels.

It is critical to ensure the involvement of CSOs, CBOs, and affected and infected communities in the policy and strategy formulation, planning, implementation, monitoring, and evaluation of the response at all levels.

The capacity and engagement of CSOs/CBOs in the national HIV response have been limited. PLHIV association and networks receive some support and are represented in the national and regional coordination platforms. However, CSOs have been fragmented and lack the ability to make meaningfully influence programmes and policies.

CSOs are engaged in HIV service delivery, including HIV testing, social enablers, prevention, and adherence support but there is no data to accurately quantify their contributions. In addition, CSOs do not have strong mechanisms for monitoring and reporting HIV programme activities at community level. For lack of standard guidelines and coordination structures that involve KPPs, PLHIV and affected communities, the few existing community-led monitoring (CLM) activities focus on service quality. CLM activities have not been designed to identify, track and address policy and programmatic barriers, and lack digital platforms and applications to collect, warehouse, analyze, and report CLM data.

### **Strategic information**

Ethiopia implemented the HMIS/DHIS2 to collect key health sector indicators and collect, process and report data from all health facilities, from local to national level, through an electronic platform. Strong monitoring and evaluation systems are in place, but concerns exist about the quality of HIV data, especially the ART and ANC/PMCT data in terms of completeness and timeliness. The weak quality of data affects national and subnational HIV estimates, projections, planning, and timely action. When the data is generated, there is still a lack of analysis and utilization of the data for decision-making. Hence, it is important to improve data quality and data use at different levels through annual national and regional workshops, as well as supporting and involving HIT's, data managers, and monitoring and evaluation officers. As part of HIV monitoring and evaluation (M&E), the country regularly holds joint supportive supervision and joint review meeting to monitor the performance of HIV services.

Community-level HIV programme data collected through MRIS was very weak, with low coverage and quality. Data visualization tools and dashboards are underutilized for real-time tracking of key performance indicators. The indicators for community-based HIV services must be integrated into the DHIS2 platform.

Ethiopia has identified key and priority populations but there is sparse data on size estimations of these groups, except for a recent survey on FSWs. Hence, there is a need to conduct integrated biological and behavioral assessments among AGYW, long-distance drivers, workers in hotspot areas and prisoners to make evidence-based informed decisions. A survey to assess STI prevalence and STI drug resistance has not been conducted in a long time and is essential to provide accurate data to update guidelines and implement programmes.

## **Health systems strengthening**

### **National HIV policy, strategy, and coordination systems**

The national HIV response is coordinated under MOH, whose regional, zonal, and woreda health offices and health facilities execute its mandate to coordinate and deliver services. There are national health and HIV/AIDS policies, strategies, guidelines and standard operating procedures for programmes and service delivery. However, there are inadequate governance and coordination structures for the multisectoral response at key non-health sectors at national and subnational levels. Within the national governance structure, relevant programme management staff are in place at all levels to coordinate the response.

### **Pharmaceutical supplies and logistics systems**

The existing procurement policies and guidelines for pharmaceuticals and the implementation of procurement framework agreements have contributed to the reduction of lead time and prices. Most of the HIV programme commodities are procured through agreements renewed every three years. Local capacity to procure large volumes of commodities that meet the national demand is in place, but some bottlenecks in the procurement process result in frequent stockouts of some commodities. An annual forecasting and quarterly supply-planning exercises are conducted for HIV programme commodities. Problems with the quality of data (consumption, diagnostics, service, and morbidity data) affect the forecasting exercise and the inventory management system. The poor quality of data results in low forecast accuracy and contributes to wastage due to expiration and frequent stockout of commodities.

The Ethiopian Pharmaceutical Supply Service has the capacity to deliver programme commodities in an integrated manner to all health facilities, either directly or through woreda health offices. The number of direct delivery sites, currently at 70 percent of health facilities, is steadily increasing [34]. The national Integrated Pharmaceutical Logistics System guides storage and distribution practices, but the decade-old inventory system needs updating.

There is a functional Health Commodities Management Information System for monitoring the supply chain; manual records (bin cards) complement the electronic system. The introduction of an electronic inventory management (Dagu) at some facilities is a positive step to ensure end-to-end visibility, although its coverage is limited and not fully functional.

### **Laboratory system**

A significant achievement was realized through the Global Fund investment in building a strong and responsive laboratory system and service that supported the three disease programmes in the previous grants. Nonetheless, gaps still exist in the EID and VL service uptake and turnaround time (TAT).

## 1.4 The NSP development process

The development of the HIV NSP 2021-2025 took place under the leadership of the Executive Officer of the HIV/AIDS Prevention and Control Lead Executive Office (HAPCLEO) in the MOH. A concept note was developed to guide the process, outlining approaches and timelines. Various defined coordination platforms were established, and international and local consultants were hired to facilitate the NSP revision process. The programme review was undertaken at this time in order to assess the impact of the multiple events happening in Ethiopia over the past two and a half years. In addition, the timespan of the NSP was extended from 2025 to 2026/27 in order to align with the Global Fund for AIDS, TB and Malaria (GFATM) funding cycles.

The development process has considered updated epidemiologic and programme performance data through document review of HIV epidemiology and programme performance, information gathered through field visits to health facilities and community services, key informant interviews, and outputs from a 3-day participatory appraisal workshop, supplemented by programme performance data. Teams visited 10 regions and city administrations in the country - Afar, Amhara, Oromia, SNNP, Sidama, Southwest Ethiopia People's, Gambella, Harari regions and Addis Ababa and Dire Dawa City Administration - and interviewed 203 people, using a qualitative guided questionnaire. Twenty-four health facilities comprising of government and private hospitals, public health centres and nine drop-in centres were visited [23]. The programme reviews findings contributed to the revision of the NSP at a three-day workshop, with participants from the MOH, civil society, and unilateral and bilateral donors. This NSP was finally validated in a two-day multistakeholder workshop.

## CHAPTER 2 STRATEGIC FRAMEWORK: VISION, GOAL AND GUIDING PRINCIPLES

### **Vision: An AIDS-free Ethiopia**

**Mission:** To institute effective HIV/AIDS prevention and control programmes; to coordinate the national HIV/AIDS response; and to strengthen health systems, programmatic and social enablers to ensure sustained epidemic control in the foreseeable future.

**Goal:** To attain and sustain HIV epidemic control by 2027, by reducing new HIV infections and AIDS mortality to less than 1 per 10,000 population nationally, and among subnational and subpopulation groups.

#### Expected impact results:

- 1) Number of new HIV infections reduced to less than 1 per 10,000 population in national, subnational, and subpopulation groups.
- 2) HIV-related deaths reduced to less than 1 per 10,000 in national, subnational, and subpopulation groups.
- 3) Incidence mortality ratio reduced to less than 1 in national, subnational, and subpopulation groups.
- 4) Percentage of child HIV infections from HIV-positive women delivering in the past 12 months reduced from 12 percent in 2022 to less than 5 percent by 2027.

### **Guiding Principles**

The NSP will be implemented with adherence to the following guiding principles:

- **Multisectoral:** A multisectoral approach and partnership that builds on HIV being the responsibility of all sectors and constituencies.
- **Inclusiveness:** An inclusive and people-centred approach that recognizes different prevention options that an individual may choose at different stages of their lives.
- **Community-led:** Recognition that communities are pivotal and key partners in the HIV response.
- **Gender responsiveness:** A gender-sensitive approach that caters for the different needs of women, girls, men, and boys in accessing HIV information and related services.
- **Value for Money (VfM):** The NSP will be delivered through a Framework that defines how to maximize and sustain equitable and quality health outputs, outcomes and impacts in a constrained economic and financial environment. The VfM Framework comprises five dimensions: equity, economy, effectiveness, allocative and technical efficiencies, and sustainability, which will be applied during the design, execution and evaluation of HIV programmes included in this NSP.

## CHAPTER 3 COMBINATION HIV PREVENTION

**Strategic Objective 1: Reach 95 percent of key and priority populations with targeted combination HIV prevention interventions by 2027.**

Result 1: Comprehensive knowledge about HIV and AIDS will reach 50 percent by 2027 for key and priority populations.

Result 2: Condom use among key and priority populations engaged in risky sexual behaviour in the past 12 months will reach 90 percent by 2027.

Result 3: 95 percent of key and priority populations will know their HIV status by 2027

### 3.1 Population and geographic prioritization

#### 3.1.1 Geographic prioritization

The country has about 1,076 woredas. Based on HIV incidence estimates from the Naomi model in 2020 and recent programme data from regions (Annex 4), woredas are categorized into three geographic priority areas:

**High (265):** Woredas with HIV incidence of  $\geq 0.03$  percent among people aged 15-49.

**Medium (326):** Woredas with HIV incidence of 0.01- 0.029 percent among people aged 15-49.

**Low (485):** Woredas with HIV incidence of  $< 0.01$  percent among people aged 15-49.

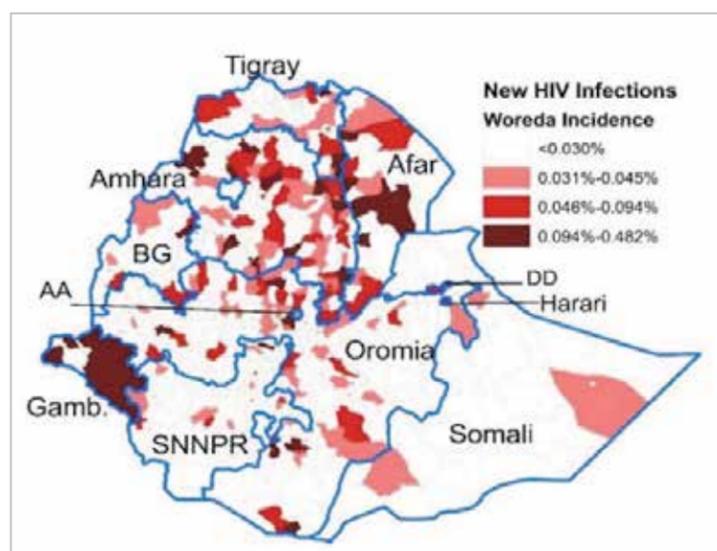


Figure 6: Woreda level HIV incidence (Spectrum estimates 2019)

In addition, 35 woredas affected by conflict, which were not included under high-incidence woredas, will be selected from Afar, Amhara, Benishangul Gumuz, Oromia, and Tigray regions and considered as high-priority woredas to be supported by donor programmes, including the Global Fund.

These additional woredas are considered hotspots due to risk factors that can lead to increased new HIV infections:

- high number of IDPs, refugees and returnees.
- disruption to livelihoods as a result of conflict, leaving women at greater risk of transactional sex as a means of survival.
- high incidence of sexual gender-based violence during the conflict.

The selection criteria for 35 additional priority woredas from the conflict affected regions of Afar, Amhara, Benishangul Gumuz, Oromia, and Tigray regions will be applied stepwise as follows:

- First, woredas affected by conflict that were medium incidence woredas based on the 2020 Naomi estimate will be selected.
- Second, woredas with an incidence rate closer to higher incidence (incidence 0.02 percent -0.029 %) will be selected.
- Third, woredas with the highest estimated PLHIV population, with IDPs and a longer duration of conflict will be selected.

Thus, a total of 300 woredas will be considered as high priority woredas. These woredas will be reached through comprehensive HIV prevention interventions targeting KPPs. The low-burden areas will be reached through integrated and sustainable HIV prevention interventions mainstreamed in the health and non-health sector programmes and through media and community initiatives. Medium burden woredas, in addition to the services listed for the low burden areas, will also have some of the HIV services for the key and priority population groups integrated into sustainable service delivery models. Based on evidence, woredas may shift from one category to the other, and the response will also be tailored accordingly. Special consideration and high priority will be given to conflict-affected regions, especially Tigray region, due to the impact of sustained and long period of conflict, disruption of supplies and services and unmatched recovery efforts.

**KEY POPULATIONS**

- Female sex workers
- Prisoners
- People who inject drugs

**PRIORITY POPULATIONS:**

- Widowed and divorced men and women
- Long-distance drivers
- Workers in hotspot areas
- High-risk adolescent girls and young women
- Seronegative partners of PLHIV
- People in humanitarian settings
- High-risk uniformed men and women

**POPULATIONS WITH SPECIAL NEEDS:**

- People with disability
- Homeless and street-based children, adolescents, and youth

There will be studies/assessments to understand the current epidemic, response context and impact of the conflict. HIV services will be integrated with recovery efforts.

### 3.1.2 Population prioritization

#### Defining Key and Priority Populations and other Special Populations

The following population groups are defined as Key Populations, Priority Populations, and other Special Populations, taking into consideration local epidemiology, HIV prevalence, high-risk behaviors, increased morbidity and mortality or higher vulnerabilities.

#### Key Populations (operational definitions)

**Female sex workers** are defined as women who regularly or occasionally exchange sex for money in drinking establishments, night clubs, local drink houses, khat and shisha houses, on the streets, around military and refugee camps, construction sites, trade routes, red-light districts, and at their homes. A sex worker can be self-identified or identified by others as a sex worker.

They can be further categorized by where they work as:

Venue-based: female sex workers stationed in hotels and bars.

Street-based: female sex workers who are mobile or street based.

Home based: female sex workers stationed at home, or at areque, tella, khat' and shisha houses.

Phone/SMS/social media based: female sex workers who can be contacted and accept sexual appointment through telephone calls and social media.

The non-paying clients of FSWs will be addressed as part of the HIV programme that targets FSW.

**Prisoners** are all people detained in a criminal justice and prison facility, including adult and juvenile males and females, during the investigation of a crime, while awaiting trial, after conviction, before sentencing and after sentencing.

**People who inject drugs** are men and women who, because they use injectable drugs, are at high risk of acquiring HIV infection. They require special arrangements to access HIV and harm reduction services.

#### Priority Populations

**Long-distance drivers** are obliged to regularly travel on the road that involves overnight stay out of their home. This group includes heavy/medium truck drivers, bus drivers, and tour car drivers.

**Widowed and divorced men and women** are those whose spouses have died and who have not remarried. Divorced men and women are those who have legally dissolved or terminated a marriage under the rule of law of the country and have not remarried. High-risk widows are sexually active, have multiple sexual partners, are involved in petty trade and selling local drinks.

**Workers in hotspot area** are those employed in workplaces with a workforce larger than 500 people, in areas that have a high HIV burden (if data is available >3 %) and a high number of FSWs nearby, where workers have poor access to HIV and other health services, and many are far from home.

This includes large construction projects, industrial parks, factories/industries, commercial farms and sugar plantations, dry ports, mega-projects (i.e., electric dams), mining, and other investment and infrastructure development projects. People working in these sites are likely to be migrant laborers away from their homes and have some disposable income. These sites will therefore attract female sex workers. These conditions result in the potential for risk behaviors associated with the acquisition and spread of HIV. Surveys will be conducted to inform HIV programming in these workplaces.

**HIV seronegative partners of PLHIV:** are HIV negative people who have sexual relationships with PLHIV, including spousal and non-spousal partners.

**High-risk adolescent girls and young women (HRAGYW)** are defined as females aged 10-24 years who are sexually active (defined as having sex at least once in the past 12 months) and who met one or more of the following characteristics in the past 12 months:

- Have multiple sexual partners or sex with non-regular partner.
- Are involved in transactional sex or are victims of sexual exploitation (irregular exchange of sex for money or materials).
- Are involved in substance abuse (heavy use of alcohol, or other illicit drugs).
- Have a history of sexually transmitted disease, unintended pregnancy, or abortion.

This group of adolescents and young women are found in higher learning institutions, high school, and night schools. They work as waitresses or domestic workers, or are out of school, including those unemployed, those who are working (coffee sellers, petty traders) or living on the streets.

**People in humanitarian settings:** humanitarian settings include drought-affected areas, conflict and post-conflict areas, and areas affected by both natural and human-made disasters. Humanitarian setting population groups include:

*Internally displaced people* are persons or groups of persons who have been forced to flee or to leave their homes or places of habitual residence, due to armed conflict, natural disasters, etc.

*Refugees* are populations who have been forced to flee their country because of persecution, war, or violence.

*Returnees* are those populations who returned to their residential places in large numbers, both from abroad and internally.

**High-risk uniformed men and women** are those on active/frontline duty and new military and police recruits. A 2018 Department of Defense (DOD) study showed an HIV prevalence of 1.2 percent [19]. In addition, the case-based surveillance results show 13.73 percent of the newly identified HIV-positive men and women with uniform had recent infections. In recent years, conflicts in Ethiopia have led to a huge influx of youth into the uniformed services, which often lack adequate HIV prevention services.

### Population with special needs

*People with disabilities*, especially youth, adolescent girls, and young women, have increased vulnerabilities to HIV and GBV. They also have limited access to HIV prevention information and services and unaddressed SRH needs. This NSP will give special consideration to making HIV and SRH services more accessible to people with disabilities. It is recommended that studies are conducted to inform the national HIV response regarding the special needs of these vulnerable populations.

*Homeless and street-based children, adolescents and youth* are those for whom it is not possible to live in a safe environment with a relative and who have no other safe alternative living arrangement. They live on the streets in urban areas and are vulnerable to HIV/STI infection and GBV. Illicit drug use is common among them (khat, sniffing additive glues, alcohol, etc.). These populations have not yet been targeted within the HIV response. Because national surveys and surveillances have missed these groups, there is no well documented data to understand the size of this population, their HIV burden, and their access to HIV/SRH services.

### Size Estimation of Key and Priority Populations

There are major data gaps in estimating the size of key and priority populations. The following estimates of the size of the various KPPs was done using existing scanty data and assumptions.

**Table 2: Estimated size of key and priority populations**

KPP	HIV Prevalence	Size Estimation	
		2020	2027
Female sex workers	18.7% [16]	210,000	240,000
Prisoners	4.2% [37]	86,500	86,500
People who inject drugs	6 % [18]	11,000	9,000
Widowed, divorced men and women	11% widowed and 2.9% divorced [4]	956,475	1,114,931
Long-distance drivers	4.6% [15]	65,000	85,000
Workers in hotspot areas	1.3% of workers tested in 2021 were HIV-positive [38]	840,000	1,050,000
HIV-negative partners of PLHIV	3.9% of PLHV partners tested in 2021 were HIV-positive [38]	206,841	234,599
High-risk adolescent girls and young women	2.1% [20]	338,341	378,134
High-risk uniformed services	1.2% [19]	TBD	TBD
People in humanitarian settings	Data not available*	TBD	TBD

There is an urgent need to carry out both quantitative and qualitative surveys for people in humanitarian settings and high-risk uniformed people.

### 3.2 Strategic interventions

During the period of 2023/24-2026/27, packages of combination HIV prevention will be delivered through differentiated service delivery platforms to the different key and priority populations. Table 3 summarizes the integrated packages of services along the continuum of care for key and priority populations.

**Table 3: Summary of integrated service packages by population group, venue, and geographical prioritization**

Population group	Integrated service package (WHAT)	Venue/ service delivery platform (HOW)	WHERE
Female sex workers (FSW)	<ul style="list-style-type: none"> <li>• SBCC including peer-based and small group learning.</li> <li>• Condom promotion and distribution, including lubricants for FSWs.</li> <li>• Pre-exposure prophylaxis</li> <li>• Post-exposure prophylaxis</li> <li>• Screening and treatment of STIs</li> <li>• SRH services</li> <li>• HIV testing (PITC, ICT, SNS, HIVST)</li> <li>• Screening/management for hepatitis B and C</li> <li>• GBV services</li> <li>• ART</li> <li>• U=U messaging</li> <li>• Viral load testing</li> <li>• Economic empowerment</li> </ul>	<ul style="list-style-type: none"> <li>• Drop-in Centres</li> <li>• KP-friendly clinics</li> <li>• Targeted outreach to streets, bars, hotels, brothel houses and FSWs group homes, etc. including moonlight outreach.</li> <li>• Peer service providers (trained FSWs)</li> <li>• FP/SRH clinics for SRH, STIs, PrEP and PEP services</li> <li>• ART clinics</li> <li>• PMTCT clinics</li> <li>• Virtual safe spaces</li> </ul>	300 high-incidence woredas
People who inject drugs (PWID)	<ul style="list-style-type: none"> <li>• Medically assisted therapy including opioid substitution therapy</li> <li>• Drug overdose treatment</li> <li>• Clean needle and syringe through private pharmacies and social marketing</li> <li>• SBCC including peer-based and small group learning.</li> <li>• Condom promotion and distribution.</li> <li>• Pre-exposure prophylaxis</li> <li>• Post-exposure prophylaxis</li> <li>• Screening and treatment of STIs</li> <li>• HIV testing (PITC, ICT, HIVST)</li> <li>• Screening/management for hepatitis B and C</li> <li>• Hepatitis B vaccination for negative PWID</li> <li>• SRH services</li> <li>• GBV services</li> <li>• ART</li> <li>• U=U messaging</li> <li>• VL testing</li> </ul>	<ul style="list-style-type: none"> <li>• Drop-in Centres</li> <li>• Public and private health facility, mental health units, addiction rehabilitation services</li> <li>• Peer service providers (trained PWIDs)</li> <li>• KP-friendly clinics</li> <li>• FP/SRH clinics for SRH, STIs, PrEP and PEP services</li> <li>• ART clinics</li> <li>• PMTCT clinics</li> <li>• Virtual safe spaces</li> </ul>	Addis Ababa and 4 hotspot towns
Prisoners	<ul style="list-style-type: none"> <li>• SBCC, including peer-based and small group learning.</li> <li>• HIV testing</li> <li>• Screening and treatment of STIs</li> <li>• Screening/management for hepatitis B and C</li> <li>• TB screening</li> <li>• Screening and treatment of mental illness</li> </ul>	<ul style="list-style-type: none"> <li>• Prison clinics HIV referrals to health facility HIV services</li> <li>• Public health facility – SRH, STIs, HIV testing, PMTCT, and ART services</li> </ul>	Correctional facilities across the country

	<ul style="list-style-type: none"> <li>• Referral for ART</li> <li>• Condoms on release from prison</li> </ul>	<ul style="list-style-type: none"> <li>• Peer service providers (trained prisoners)</li> </ul>	
High-Risk AGYW	<ul style="list-style-type: none"> <li>• SBCC peer based, small group learning.</li> <li>• Condom promotion and distribution</li> <li>• Screening and treatment of STIs</li> <li>• Psychosocial peer support</li> <li>• SRH services</li> <li>• HIV testing (ICT, SNS, HIVST)</li> <li>• Screening/management for hepatitis B and C</li> <li>• GBV services</li> <li>• Post exposure prophylaxis</li> <li>• ART (either on site or through referral)</li> <li>• U=U messaging</li> <li>• Viral load testing</li> <li>• Economic empowerment</li> </ul>	<ul style="list-style-type: none"> <li>• Adolescent friendly-clinics/spaces in public health facilities</li> <li>• Drop-in Centres</li> <li>• KP-friendly clinics</li> <li>• Targeted outreach to streets, hotels, cafes, broker houses, night schools, etc.</li> <li>• Peer service providers (trained HRAGYW)</li> <li>• FP/SRH clinics for SRH, STIs, PrEP and PEP services</li> <li>• Universities clinics HIV services</li> <li>• ART clinics</li> <li>• PMTCT clinics</li> </ul>	300 high-incidence woredas
Serodiscordant partners	<ul style="list-style-type: none"> <li>• SBCC including one to one counselling and group education.</li> <li>• Condoms</li> <li>• Pre-exposure prophylaxis</li> <li>• Post-exposure prophylaxis</li> </ul>	<ul style="list-style-type: none"> <li>• Public health Facility – SRH, STIs, HIV testing, PMTCT, and ART services</li> <li>• PLHIV association peer services</li> </ul>	Across the country
Widowed and separated men and women	<ul style="list-style-type: none"> <li>• SBCC (peer based, small group learning)</li> <li>• Condom promotion and distribution, including lubricants.</li> <li>• Post-exposure prophylaxis</li> <li>• Screening and treatment of STIs</li> <li>• SRH services</li> <li>• HIV testing (PITC, ICT, HIVST)</li> <li>• Screening/management for hepatitis B and C</li> <li>• ART (either on site or through referral)</li> <li>• U=U messaging</li> <li>• Viral load testing</li> <li>• Economic empowerment</li> </ul>	<ul style="list-style-type: none"> <li>• Public health facility – SRH, STIs, HIV testing, PMTCT, and ART services</li> <li>• Community outreach by community health workers</li> <li>• Peer service providers</li> <li>• Saving associations and groups</li> </ul>	300 high-incidence woredas
Long-distance drivers	<ul style="list-style-type: none"> <li>• SBCC (peer based, small group learning)</li> <li>• Condom promotion and distribution</li> <li>• Post-exposure prophylaxis</li> <li>• Screening and treatment of STIs</li> <li>• HIV testing (PITC, ICT, HIVST)</li> <li>• Screening/management for hepatitis B and C</li> <li>• ART (either on site or through referral)</li> <li>• U=U messaging</li> </ul>	<ul style="list-style-type: none"> <li>• Public health facilities – SRH, STIs, HIV testing, and ART services</li> <li>• Outreach/mobile clinics at Truck stops run by CSOs.</li> </ul>	The Ethio-Djibuti, Metema-Sudan, Addis-Mombassa and other long road corridors

Workers in Hotspot areas	<ul style="list-style-type: none"> <li>• SBCC including peer based small group learning</li> <li>• Condom promotion and distribution</li> <li>• Screening and treatment of STIs</li> <li>• HIV testing (PITC, ICT, HIVST)</li> <li>• Post-exposure prophylaxis</li> <li>• ART</li> <li>• PMTCT</li> <li>• GBV services</li> <li>• Screening/management for hepatitis B and C</li> </ul>	<ul style="list-style-type: none"> <li>• Public health facilities – SRH, STIs, HIV testing, and ART services</li> <li>• Workplace clinics HIV services</li> <li>• Outreach HIV services at hotspot workplaces</li> <li>• Peer service providers (trained workers to serve as peer providers)</li> </ul>	Hotspot workplaces
People in humanitarian settings	<ul style="list-style-type: none"> <li>• SBCC</li> <li>• Condom promotion and distribution</li> <li>• HIV testing (PITC, ICT, HIVST)</li> <li>• Post-exposure prophylaxis</li> <li>• Screening and treatment of STIs</li> <li>• GBV services</li> <li>• Mental health screening</li> <li>• Screening/management for hepatitis B and C</li> <li>• ART</li> <li>• PMTCT</li> </ul>	<ul style="list-style-type: none"> <li>• Refugee and IDP camp clinics HIV services</li> <li>• Public health facility – SRH, STIs, HIV testing, PMTCT, and ART services</li> <li>• Targeted outreach to humanitarian settings</li> <li>• Mobile clinics at humanitarian settings</li> </ul>	35 woredas affected by conflict
High-risk uniformed persons	<ul style="list-style-type: none"> <li>• SBCC including peer-based small group learning.</li> <li>• Condom promotion and distribution</li> <li>• VMMC</li> <li>• Screening and treatment of STIs</li> <li>• HIV testing (PITC, ICT, HIVST)</li> <li>• Post-exposure prophylaxis</li> <li>• Screening/management for hepatitis B and C</li> <li>• GBV services</li> <li>• ART</li> </ul>	<ul style="list-style-type: none"> <li>• Ethiopian Defense Force Services Federal/Regional police camps clinics/hospitals HIV services</li> <li>• Public health facility – SRH, STIs, HIV testing, PMTCT, and ART services</li> <li>• Peer providers in training camps and on mission (trained uniformed people to serve as PSPs)</li> </ul>	Uniformed people training centres and camps
High-risk HIV negative PBFW (in addition to PMTCT service package)	<ul style="list-style-type: none"> <li>• SBCC including one to one counselling and group education.</li> <li>• HIV retesting based on risk during pregnancy.</li> <li>• PrEP</li> <li>• Post-exposure prophylaxis</li> <li>• Condoms</li> </ul>	<ul style="list-style-type: none"> <li>• Public health facilities MNCH services</li> <li>• Community outreach – house to house services by HEWs.</li> <li>• Community services by Mother support groups</li> </ul>	Across the country

During the period of 2021-2027, combination HIV prevention interventions will be implemented in all woredas (high, medium, and low HIV incidence) as shown in Tables 4, 5 and 6.

**Table 4: For high-priority woredas (>0.03% HIV incidence, conflict-affected woredas, and humanitarian settings)**

Prevention interventions	Service delivery models
<ol style="list-style-type: none"> <li>1. Intensive social behavioural change communication and demand creation</li> <li>2. HIV education through print, electronic mass, and social media</li> <li>3. Condom promotion and distribution, including lubricants for FSWs.</li> <li>4. Pre-exposure prophylaxis</li> <li>5. Post-exposure -prophylaxis</li> <li>6. Strengthen U=U</li> <li>7. Voluntary medical male circumcision in selected geographic areas with high HIV prevalence and low circumcision rates</li> <li>8. Harm reduction, including opioid substitution therapy.</li> <li>9. Screening and treatment of sexually transmitted infections</li> <li>10. Blood safety and infection prevention practices at health facilities</li> <li>11. Prevention and management of gender- based violence</li> <li>12. Economic empowerment of women, especially high-risk adolescents, and girls.</li> <li>13. Empowerment of community implementers and KPPs</li> <li>14. Integration of HIV education into intra- and extracurricular school, HLI, uniformed people training centres</li> </ol>	<p>KPP-friendly clinics within health facilities</p> <p>Friendly services at the general HIV services</p> <p>Drop-In Centres</p> <p>Adolescent and youth-friendly clinics</p> <p>Peer service providers</p> <p>Medically assisted therapy</p> <p>Clinic for PWID</p> <p>Virtual safe spaces</p> <p>Integrated HIV services in prisons, workplaces, humanitarian settings, for uniformed people where they are deployed, and higher learning institutions.</p> <p>Integrated into other health services (mental health, TB, hepatitis, SRH)</p> <p>Targeted outreach programmes</p> <p>Social marketing (condoms, HIVST, STI packs), private sector and CSO service delivery outlets</p> <p>Health post and community activities of health extension workers</p> <p>HIV integrated into social and economic sectors (mainstreaming)</p>

**Table 5: For medium priority woredas (HIV incidence of 0.01-0.03%)**

Prevention interventions	Service delivery models
1. Social behavioural change communication and demand creation	Friendly services at general HIV services
2. HIV education through print and electronic mass and social media	Integrated HIV prevention services in prisons, workplace, and higher learning institution clinics
3. Condom promotion and distribution,	Adolescent and youth-friendly clinic
4. Pre-exposure prophylaxis	HIV interventions integrated into other health services (mental health, TB, hepatitis, SRH)
5. Post-exposure prophylaxis	Social marketing (condoms, HIVST, STI packs), private sector and CSO service delivery outlets
6. Strengthen U=U	HIV integrated in social and economic sectors (mainstreaming)
7. Screening and treatment of sexually transmitted infections	Youth centres
8. Blood safety and infection prevention practices at health facilities	Health post and community activities of health extension programme extension workers
9. Prevention of gender-based violence integrating with other sectors.	
10. Integration of HIV education into intra- and extracurricular school, HLI, uniformed people training centres	

**Table 6: For low priority woredas (HIV incidence <0.01%)**

Prevention interventions	Service delivery models
1. Demand creation SBCC through HEP and CCC	Integrated HIV prevention services (prison, workplace, and higher learning institution clinics)
2. SBCC through mass and social media	HIV interventions integrated into other health services (mental health, TB, hepatitis, SRH)
3. Condom promotion and distribution	Social marketing (condoms, HIVST, STI packs), private sector and CSO service delivery outlets
4. Screening and treatment of sexually transmitted infections	HIV integrated in social and economic sector (mainstreaming)
5.	Youth centres
6. Pre-exposure prophylaxis	Health post and community activities of health extension programme workers
7. Post-exposure prophylaxis	
8. Blood safety and infection prevention practices at health facilities	
9. Integration of HIV education into Intra- and extracurricular school, higher learning institutions, uniformed people training centres	

### 3.2.1 Social behavioral change communication and demand creation

Expected Result 1: Proportion of key and priority populations reached with HIV prevention programmes with a defined package of services increased to 95 percent by 2027.

Expected Result 2: Percentage of key and priority populations who both correctly identify ways of preventing the sexual transmission of HIV and who reject major misconceptions about HIV transmission increased to 60 percent by 2027.

Expected Result 3: Percentage of young women and men aged 15-24 who have had sexual intercourse before the age of 15 reduced from 9 percent for females and 1 percent males to 5 percent and 0.5 percent respectively by 2027.

Intensive behavioral change communication interventions will be implemented targeting key, priority populations in the 300 priority woredas. The SBCC will be mostly peer-based, facilitated small group learning, with at least 85 percent of the sessions conducted by community level implementers over two to three months.

Demand creation interventions will include any communication targeting KPPs, in-school youth and the general population through mass media (radio and television), mini-media, print media (leaflets, posters, magazines and newspapers), social media and interactive digital applications.

Creative social media and interactive applications will be optimized to reach large groups of KPPs and the general population (mainly youth) to create demand and raise awareness about HIV/SRH prevention, HIV testing, care, and treatment, consolidated through the integration and strengthening of community level implementers.

Integration of HIV prevention into the school curriculum will be implemented nationwide targeting adolescents and youth in school. All schools will implement curricular and extracurricular activities to educate adolescents and youth about HIV and safe sexual practices. Colleges and universities across the country will implement a credited course on HIV, SRH, life skills and gender as part of the first semester first year academic programme. Schools will have extracurricular HIV prevention education and activities through mini-media and clubs. Training centres, colleges and universities of the uniformed people will also implement HIV, SRH, life skills and gender education through intra- and extracurricular approaches, including mini-media and clubs.

Disability-friendly HIV education messages will be developed and distributed through various communication channels, including the mass media, electronic, print, and social media platforms.

Street-based children, adolescents and youth will be reached through CSOs with tailored and standardized HIV messages and educations.

### 3.2.2 Condom promotion and distribution

Expected Result 1: Percentage of adults aged 15–49 who used condoms during their last high risk sex act in the past 12 months increased from 20 percent for females and 51 percent for males to 50 percent for females and 70 percent for males by 2027.

Expected Result 2: Condom use among key and priority populations engaged in risky sexual behavior reaches 90 percent by 2027.

The ongoing and long-standing issues in relation to condom procurement, distribution and use will be addressed as follows:

- Assess the bottlenecks for the implementation of the condom strategy and address identified challenges across all levels.
- Revitalize the condom programme coordination platform, which includes MOH leadership, EPSS, EFDA, MOH/HIV LEO, and development partners.
- Develop and revise the condom procurement policy that balances price and quality of condoms.
- Ensure pre-shipment quality assessment of condoms in the procurement pipeline.
- Establish an option of innovative condom procurement mechanisms, such as pooled procurement by procuring agencies (through outsourcing to experienced procuring organizations/partners).
- Provide support and incentives for private sector engagement in the condom market.
- Build the national condom programme capacity, improve coordination and monitoring, including training programme people at national and regional levels. Implement the condom strategy and guidelines. Ensure coordinated condom procurement and distribution for HIV and FP programmes.
- Mobilize resources for free condoms
- Strengthen condom supplies management and tracking for real-time stock monitoring through the integration of condom distribution into the logistic management information system. This requires establishing a system of condom distribution between health facilities that receive condoms from the health sector and community implementers, in order to ensure access to free condom distribution for the KPP who may not come to health facilities.
- Reduce maldistribution through real time monitoring and re-distribution mechanisms.
- Widely disseminate the condom strategy and translate it into action.

The condom programme will be implemented through a total market approach. Free condoms will be distributed to KPPs. Social marketing and the private sector will reach the general population and KPPs in all woredas across the country. Condom-compatible lubricants will be distributed to FSWs through social marketing and private sectors.

Condom demand creation will be the central theme of all SBCC interventions targeting key and priority populations as well as the general population.

Free condom distribution to key and priority populations will be conducted through DICs, peer service providers, door-to-door distributions at hotspot areas, health workers outreach programmes, distribution at hotels and bars as well as hotspot workplaces, and truck stops. CSOs will be engaged in the distribution of condoms through non-traditional outlets.

### 3.2.3 Pre-exposure Prophylaxis

Expected Result: 15 percent of FSWs, PWID, high-risk PBFW, and 75 percent of serodiscordant couples (not attaining viral suppression) will receive oral PrEP at least once during the last 12 months by 2027.

Pre-Exposure Prophylaxis will be provided to people at substantial risk of acquiring HIV. In the Ethiopian context, these are female sex workers, HIV-negative partners of PLHIV who are not virally suppressed, PWID and high-risk PBFW. Among the subgroup of FSWs who are considered at greater risk of acquiring HIV infection, either because of non-consistent condom use or as victims of repeated gender-based violence, activities to increase PrEP will be undertaken through peer supporters and CSOs. Demand creation and service delivery will ensure that the HIV- negative partners of non-virally suppressed PLHIVs on AR, who are at substantial risk of infection, have the option to take PrEP.

PrEP will be integrated in ART, MNCH/PMTCT, family planning, DICs, medical assisted treatment and KPP-friendly clinics. In addition, community-based PrEP initiation and refill will be introduced as per the WHO simplified guidelines for PrEP.

Additional eligibility criteria and target population for PrEP will be defined in the service delivery guidelines and can be updated as appropriate.

Repackaging of the oral PrEP will be done either through the suppliers or in country to minimize stigma and discrimination due to the similarity of PrEP and ART bottles.

Expanded PrEP options will be made available in addition to oral PrEP, such as long-acting PrEP as these new options become more readily available and registered in the country.

### 3.2.4 Post-exposure prophylaxis

PEP will be offered and initiated for people with medical and non-medical accidental exposure and for victims of rape. Non-medical exposures include condom breakage, exposure to body fluids with a person of known HIV-positive or unknown HIV status. The detailed eligibility criteria for PEP will be described in the national comprehensive HIV prevention, care, and treatment guideline.

### 3.2.5 Harm reduction services

Expected Result 1: Percentage of PWID benefiting from two or more harm reduction prevention interventions increased from 0 percent to 60 percent by 2027.

Expected Result 2: Percentage of eligible PWID receiving opioid substitution therapy increased from 0 percent to 30 percent by 2027.

The revision process of the NSP has galvanized momentum towards getting this programme off the ground. A multisectoral approach will be used to address policy issues around developing a programme for people with injecting drug and illicit drug use. A national coordination mechanism (TWG) on PWID will be strengthened. It will be led by the MOH and consider a membership that includes law enforcement bodies, Ministry of Justice, United Nations Organization on Drugs and Crime, CSOs implementing PWID programmes and other relevant sectors. A national biobehavioral survey is currently underway to estimate the size of this population, including HIV and hepatitis prevalence as well as behavioral characteristics, in order to guide programme development and monitor progress. The MOH and partners will develop national PWID guidelines, providers training package, SOPs, and job aids. Advocacy will be conducted with MoJ, law enforcement bodies and other relevant stakeholders.

This will lay the groundwork for a step-by-step introduction of harm reduction programmes, including opioid substitution therapy. Combination HIV prevention/harm reduction services will be provided to PWID through community (DICs and peer service providers) in both public and private facility-based services. Initially, a pilot intervention in Addis Ababa will provide harm reduction service through CSOs community-based services. CSOs will train peers and providers on harm reduction (SBCC) and peer supporters will provide HIV prevention demand creation and linkage to HIV/OST services.

The service package for PWID, delivered by CSOs at DICs, will include condoms, HIV testing and treatment, STIs and viral hepatitis screening, diagnosis and treatment, PrEP, and PEP. In addition, hepatitis B vaccination should be offered to HIV-negative PWIDs. Those who are interested in rehabilitation will be referred to addiction centres for OST and detoxification. CSOs, through their PSPs and PWID champions, will use virtual safe spaces for demand creation. Public health facility KPP-friendly clinics will target PWIDs in places where DICs are not available. The opioid substitution therapy will be integrated in these selected mental health services and DICs through integrated efforts from governmental, non-governmental and civil society organizations. Selected government-owned mental health centres will be capacitated to pilot and scale-up OST. OST will be provided by trained providers with appropriate monitoring to avoid misuse.

Drugs used in substitution therapy and overdose management (methadone, buprenorphine, and naloxone) will be included in the national approved essential list of drugs.

In Ethiopia, the majority of PWID access clean needles and syringes from private pharmacies. Accordingly, mapping of pharmacies at PWID hotspot areas will be conducted. Orientation and training will be given to pharmacy experts to provide needles and syringes in the same way they are supplied to the general population. Pharmacists will be informed about nearby PWID programmes and will encourage linkage with these services.

The programme will implement prevention and demand reduction interventions that include targeted SBCC for the public/community, especially adolescents and youth, through mass media and school-based systems on substance abuse.

Multisectoral collaboration will assist in supply reduction, which involves controlling, tracking and controlled disposal of illicit drugs confiscated at all country points of entry and circulation. An intensified effort will be made to prevent the expansion, circulation, and use of illicit and injection drug use across the country, involving the Ministry of Health, regulatory agencies, law enforcement sectors, the transport sector and others.

### 3.2.6 Voluntary medical male circumcision

Expected Result: Percentage of males aged 15-49 circumcised at Gambella, selected woredas of Southwest and South Ethiopia regions increased from 72 percent to 90 percent by 2027.

Voluntary medical male circumcision will be implemented and integrated in primary health-care facilities as part of minor procedures within the surgical services. VMCC will target male infants and men aged 10-49 years in settings of high HIV prevalence and low circumcision prevalence (Gambella region, selected woredas in the Southwest and South Ethiopia regions). Primary health-care facility staff will be trained to perform routine male circumcision services at health facilities. The health facilities will be equipped with the required equipment and supplies.

A SBCC strategy will be designed to address male circumcision. The strategy will use community dialogue sessions, the engagement of influencers and tribal leaders, and promotion through clients' testimony.

VMMC will be reinitiated in military setups (uniformed men), especially among new recruits (in selected enrolment sites). The VMMC backlog will be cleared through a campaign-based modality.

Studies will be conducted to assess male circumcision coverage in Gambella and an HIV prevalence survey in the Southwest and South Ethiopia regions where the male circumcision rate is low. Civil society organizations will support community mobilization and demand creation at community level.

Regional health bureaus, woreda health offices and health facilities will lead and implement the services in collaboration with development partners. Civil society organizations will support community mobilization and demand creation at community level.

### 3.2.7 Screening and treatment of sexually transmitted infections

Expected Result 1: Percent of people aged 15-49 years with STIs treated increased from 17 percent to 75 percent by 2027.

Expected Result 2: Percent of FSWs with STIs treated increased from 64 percent to 95 percent by 2027.

Active screening and treatment of STIs using a syndromic approach will be provided to KPP, particularly FSWs, high-risk adolescent girls and young women and their partners, integrated through community and health facility level service delivery outlets. To build the capacity of HCWs on syndromic management, guidelines and manuals will be distributed to health facilities for all population groups.

Etiologic diagnosis and management of STIs will be introduced and scaled up through phased and mixed approaches via public-private facilities that have the diagnostic capacity. The national STI treatment guideline will be revised based on global recommendations and any emerging information from national surveys and surveillance, including drug resistance data.

STI diagnosis will also be scaled up through community (DICs) and facility (KP-friendly clinics) platforms. STI screening, diagnosis and treatment will be strengthened at youth development centres and prison settings.

STIs programme management will be strengthened with the assignment of focal persons at all levels, including health facilities. Resources will be made available to provide free STIs treatment kits for KPPs, as well as the development and distribution of communication materials, job aids and provider training.

### 3.2.8 Economic empowerment of vulnerable women

Economic empowerment interventions (job creation, vocational skills training and income generating schemes) will target disadvantaged women, especially adolescent girls, and young women in the 300 priority woredas, as a structural HIV prevention intervention integrated with economic empowerment initiatives of other key sectors.

HIV risk and status will be part of the criteria for selection of beneficiaries used by job creation bureaus (vulnerable women, FSW, high-risk AGYWs). Advocacy efforts will ensure the inclusion of vulnerable groups (KPPs) and vulnerable youth into transformative economic empowerment schemes, which are led by the private sector in collaboration with relevant government sectors (job creation) as an approach to developing Public Private Partnerships (PPP).

The scope of Community Care Coalitions will be expanded to address economic empowerment of vulnerable women and girls at selected hotspot areas and economic strengthening programmes through KP-friendly clinics. DICs will also be strengthened.

### 3.3 Mapping and identification of KPPs

Key to designing targeted and effective programmes is conducting mapping, identification, and size estimation of KPPs at woreda level in each of the 300 high incidence woredas. The objective of the mapping is to identify and locate the areas for interventions where key and priority populations concentrate (live or work), estimate the size of KPPs and ensure HIV services are available and accessible in that woreda. The mapping and size estimation will be used for targeted HIV prevention, care and treatment programme planning and implementation of community and facility-based interventions.

The MOH, in collaboration with partners will develop specific protocols and SOPs, and tools for mapping and identification of KPPs that will guide all actors at woreda level. Regional and woreda programme staff and CSOs will be trained on the SOPs and tools.

**Female sex workers:** Woreda health offices in collaboration with CSOs will lead mapping of FSWs. The mapping will locate the bars, hotels and night clubs, local drinking houses and streets and houses of FSWs. The mapping exercise will estimate the size of FSWs in the areas. In addition, web-based platforms that connect FSWs and their clients online in big cities should be identified and targeted.

**PWID:** Mapping and size estimation of PWID will be conducted by woreda health offices in collaboration with the CSOs and peer educators. The mapping exercise will employ a seed referral method to identify and map areas where PWID collect and use drugs. The mapping exercise will also identify PWID services available in the area.

**Prisoners:** Woreda health offices, in collaboration with CSOs and prisons, will determine the average number of prisoners in each of the correction facilities disaggregated by gender. In addition, the mapping will include data on availability of combination HIV prevention interventions for each setting.

**High risk adolescent girls and young women:** Woreda health offices, in collaboration with CSOs, schools/universities, health extension workers (HEWs) and peers will map high-risk adolescent girls. Mapping will be targeted to high-risk students at higher learning institutions, domestic workers, waitresses and cleaners at café and hotels, and girls on street carrying out petty trade and/or living in the streets. Mapping of these population groups should focus on areas where transactional sex takes place and include night schools, broker houses and other hotspots.

MOH in collaboration with development partners will develop and validate an android based digital self-risk screening tool for AGYW. The tool will score risk and link high risk AGYW to available services.

**Widowed or divorced women:** Woreda health office in collaboration with CSOs and health extension workers will map households in the community where high risk widowed and divorced women live.

This mapping will help identify those widowed or divorced women who are sexually active, have multiple sexual partners, are involved in petty trade and selling local drinks. The mapping should have clusters of houses by small geographic localities such as 'gotte', villages and kebeles.

**Workplace hotspot areas:** Woreda health offices in collaboration with CSOs and woreda administrations will map hotspot workplaces – housing, road, dam and other large construction projects, big farms (coffee, sugar, fruit, sesame, etc.), industrial parks and other mega-projects located in the woreda that attract large number of young workers (> 500 staff), where there are FSWs around the camps or workplaces, and HIV prevalence is high (>3 %) based on service records. The mapping will also describe the availability of combination HIV prevention interventions in each hotspot workplace.

**Transport routes and long-distance drivers:** CSOs will identify and map high risk transport corridors and truck stops. CSOs will map the hotels where distance drivers stay overnight. CSOs will estimate size and design interventions based on the mapping and size estimation.

**HIV-negative partners of PLHIV:** CSOs/PLHIV associations in collaboration with ART clinics and PLHIV associations to map, will estimate the size and identify HIV-negative partners of PLHIV.

Periodic surveys will be conducted for comprehensive KPPs size estimation and mapping.

### 3.4 KPPs service delivery models

A mix of client-centred service delivery models will be used to reach key and priority populations, include the following:

#### Key and priority population-friendly clinics

Some HIV/SRH clinics already exist within public health facilities that provide one-stop shopping HIV/SRH services for key and priority populations. There will be at least one KPP-friendly clinic in each of the 300 woredas, with minimum standards and defined service packages (for specific KPPs) to ensure the quality and friendliness of services.

The KPP-friendly clinics will provide comprehensive services (SBCC, counselling, condom, HIV testing, PrEP, STIs screening and treatment, family planning and referral linkages for treatment and PMTCT). The KPP-friendly clinic will integrate and serve FSWs, high-risk AGYW, PWID as well as other KPPs, based on their preference. KPP clinics serving PWIDs will have additional mental health professional support and should be closely linked with the nearby addiction rehabilitation treatment centres.

The infrastructure, human-resources, and capacity of the KPP-friendly clinics and their staff will be strengthened.

In order to offer conducive services for KPPs, the KPP-friendly clinic will be open during off working hours and weekends and will be linked with peer service providers and community mobilizers to create demand and mobilize KPP to use the services. Bi-directional referrals between communities and CSO and CBOs working in the community will be strengthened.

#### HIV services at health facilities

The HIV service delivery outlets of health facilities will be made friendly for KPPs through training of service providers to respond to the needs of KPP who prefer to use these general HIV services outlets. At least one health facility in each of the 300 priority woredas and in the medium incidence woredas will have KPP-friendly services delivered through the general HIV service delivery outlets. Health facilities will use risk screening tools at all outpatient and inpatient outlets to identify KPPs and provide or link them to combination HIV prevention services. Referral linkages with the peer service providers, community level services and KPP friendly clinics will be strengthened. A zero-stigma policy will be implemented in health facilities providing general HIV service delivery.

#### Drop-in-Centres

CSO-led DICs will provide comprehensive behavioral, biomedical, and structural interventions to key and priority populations, especially FSWs, high-risk AGYW and PWID at hotspot areas of selected towns. The DICs will be implemented by CSOs in partnership with government and development partners. DICs will have referral linkages to KPP-friendly health facilities. DICs will provide comprehensive HIV/SRH services (SBCC, counselling, condom, HIV testing, PrEP, STIs screening and treatment, PEP, family planning and provision of or referral linkage for treatment and PMTCT) and have a set of minimum standards for integrated services. In addition, DICs will link to social services available in the community or through development partners.

MOH and other development partners should build the capacity of the CSOs working with KPPs to enable them to lead HIV community programmes.

#### Targeted outreach programmes

DICs and KPP-friendly clinics will have regular outreach programmes to reach KPPs at nearby hotspots, schools, prisons, workplaces, and humanitarian settings. Targeted outreach HIV services will be led by health workers, peer service providers and community mobilizers. Civil society organizations and development partners will lead outreach services. Outreach programmes targeted to KPPs will be implemented in all the 300 priority woredas.

### **Peer service providers programme**

CSOs will recruit, train, assign and manage PSPs linked with DICs and KPP-friendly clinics. To standardize and enhance the community-based response, there will be at least 30 trained peer service providers per woreda working full time with a monthly standard incentive package in all the 300 priority woredas.

PSPs will deliver a standard package of services (SBBC, especially peer education, condom, HIV self-testing, information and referral for PrEP and referral linkage for other HIV prevention and treatment services). The PSPs will support health facilities, KPP-friendly clinics and DICs with adherence support and tracing patients.

### **Mentor-based programmes for high-risk AGYW and high-risk divorced and widowed women**

Mentor-based HIV prevention programmes will target high-risk AGYW and high-risk widowed and divorced women in the 300 priority woredas and in 50 higher learning institutions. The mentors will deliver a package of combination prevention interventions through one-to-one and small group settings. The MoH will develop a mentor-based service package, manual and guidelines for the prevention programme for high-risk widowed and divorced women. MOH, in collaboration with CSOs and partners, will train mentors on the mentor-based programme. CSOs will recruit, deploy, and monitor performance of mentors and mentor-based services for high-risk AGYW and widowed and divorced women. Mentors will deliver one-to-one and small group education, counselling, life skills, and services including condoms, PEP, HIVST, STIs, FP/SRH and referral linkage.

### **Social marketing and private sector services delivery**

Condoms will be distributed through social marketing and private sector outlets (pharmacies, shops, hotels, bars, and peer service providers) targeting the general population in all woredas. Lubricants for FSWs will be distributed through pharmacies, DICs and private facilities. Private pharmacists in PWID hotspot areas will be trained and engaged in counselling and linkage of PWID to harm reduction services at MAT clinics, DICs, KPP clinics, and private and public facility HIV services.

### **Integrated HIV services for prisoners**

Health facilities in prisons and juvenile correctional centres will have integrated HIV prevention services. Prison HIV and health services will be strengthened to deliver HIV and health services, including general medical examination, HIV counselling and testing, TB screening, STI screening, and treatment, viral hepatitis screening, diagnosis and treatment and hepatitis B vaccination for HIV-positive prisoners, and screening of other communicable and non-communicable diseases. There will be provision for treatment referral as indicated. In addition, condoms shall be provided upon release from prisons. The following interventions will strengthen integrated HIV services in prisons:

- Assess the HIV service delivery capacity of prison facilities.

- Conduct federal and regional level advocacy workshops with health offices, prison administrations and CSOs.
- Develop national health service delivery standards for prisons.
- Train prison administration focal persons on the health service delivery standards
- Train service providers from federal and regional prisons on comprehensive HIV prevention, care and treatment
- Provide communication and demand creation materials for federal and regional prisons including quarterly bulletins that entertain and educate prisoners in the 126 prison facilities. Print and distribute bulletins quarterly.
- Provide commodities, supplies, job aids and reporting forms for prison facilities to conduct STIs, HIV testing, treatment, and referral linkage to ART, TB screening and treatment, viral hepatitis screening, treatment and vaccination, and mental health screening and management.
- Conduct monitoring supervision and review meetings with prison facilities.

### **Integrated HIV services at hotspot workplaces**

A national assessment will map hotspot workplaces across the country. All hotspot workplaces with 500 or more staff shall have at least one clinic run by the employer that provides integrated health and HIV services. The package of services includes SBCC (peer-based and mini-media in multiple languages), condoms, GBV prevention, HIV counselling and testing, STI screening and treatment, screening for TB, hepatitis screening, diagnosis, and referral/treatment and SRH services. This is an opportunity to build upon the experiences of the malaria programme to expand prevention and screening services for both TB and HIV in seasonal hotspots that attract significant numbers of migrant workers.

Workplaces and projects will finance and manage integrated HIV and health services at workplaces. Opportunities for synergistic programmes with the malaria and TB programmes will be explored. CSOs, RHB/Woreda health offices and development partners will support and build capacity of the HIV programmes in hotspot workplaces. Advocacy with relevant sectors, including private employers, will be strengthened and an accountability policy framework will be put in place.

The following interventions will strengthen the integration of combination HIV prevention at hotspot workplaces:

- Conduct assessment of hotspot workplaces HIV service delivery capacity.
- Develop integrated health service standards for workplace HIV/SRH and health services.
- Conduct advocacy workshops at the national and regional level with employers and other stakeholders.
- Update the policy for workplace HIV programmes that require employers to provide comprehensive HIV prevention services.
- Train service providers from hotspot workplaces.
- Provide equipment, commodities, supplies and drugs for HIV/SRH and TB services including condoms, HIV testing and STIs treatment for hotspot workplaces clinics.

### **Integrated HIV services for uniformed people**

Uniformed people under the Ethiopian Defense Forces and Federal and Regional Police will be provided with HIV services integrated with their health-care facilities. The MOH will provide technical support, HIV/AIDS logistics, commodities, and supplies to health-care services of the National Defense Forces and the Federal Police. Partners and donors will provide technical and financial support for the Ethiopian Defense Forces and Federal/Regional police. The Uniformed Services HIV programme will focus on high-risk groups that include new recruits and those deployed away from home. Combination HIV prevention includes SBCC, condoms, HIV and hepatitis counselling and testing, VMMC, STI screening diagnosis and treatment, PEP, HIV, and hepatitis treatment services.

HIV/AIDS, gender, human rights, and health education will be part of the training curriculum for uniformed people.

### **Integrated HIV services in humanitarian settings**

People in humanitarian settings refers to people in areas affected by armed conflict, drought, and other natural and human-made disasters. Some may have been forced to move from their regular place of residence.

Leadership and coordination of the HIV response for people in humanitarian settings will be strengthened with the development of a policy framework, guidelines, training packages, SOPs, and job aids on HIV/GBV/VH prevention, care, support, and treatment.

The MOH will be represented in the national emergency taskforces at EPHI and other emergency coordination structures. HIV will be mainstreamed in the national emergency preparedness and response plan. Emergency preparedness and response teams will be established and trained on HIV response across regions and in humanitarian settings.

The impact of the conflict on the HIV programmes in the affected areas will be assessed. MOH collaboration with conflict-affected regions and partners will develop a rapid response plan to quickly expand and restore HIV services in these areas. The capacity of health facilities in or near humanitarian settings, including camps for internally displaced people will be supported with human resources, training, equipment, supplies, and drugs to provide comprehensive HIV/SRH/GBV services. Community outreach and peer service providers programmes will be strengthened, and the emergency response platforms will be used to deliver HIV/SRH/SGBV services.

### **Integrated HIV services in higher learning institutions**

HIV services at private and public higher learning institutions will be strengthened to provide combination HIV prevention services to young people, particularly high-risk AGYW. The following interventions will be conducted to strengthen integration:

- Conduct assessment of HIV services and curricular activities in public and private HLI.
- Conduct IBBS among higher learning institution students.
- Conduct high-level advocacy workshops with the leadership of public and private HLI to strengthen HIV services in clinics and curricular integration.
- Train HIV focal persons on HIV mainstreaming service packages and guidelines.
- Train health service providers from HLI clinics on the national comprehensive HIV prevention, care, and treatment guidelines.
- Provide a comprehensive package of HIV prevention care and treatment services at university clinics.
- Conduct curricular review and integration of the two-credit hour HIV/SRH/life skills course for freshmen students.
- Develop mentor based, high-risk AGYW discussion session guide.
- Develop mentors service package and SOP that defines their roles and package of services.
- Recruit, train, and deploy three mentors (female fresh university graduates) per HLI to screen, identify, and deliver a package of services for high-risk AGYW linked with the student clinics in both public and private HLI.
- Establish condom distribution outlets, including condom depots.
- Provide commodities and supplies, including condoms for public and private HLI.

### **HIV services integrated with social and economic sectors (HIV mainstreaming)**

MOH will identify strategic sectors for mainstreaming, develop a Mainstreaming Directive and conduct capacity assessment and high-level advocacy with strategic sectors. MOH will develop mainstreaming service packages and implementation guidelines and build the capacity of strategic sectors to implement HIV mainstreaming.

The strategic sectors will allocate up to 0.2 percent of their annual budget to HIV prevention programmes and implement HIV prevention interventions targeting KPPs and the general population. The HIV prevention interventions include SBCC, condoms and HIV testing services. Sectors will assign staff and facilities to implement these HIV prevention interventions. The strategic sectors can collaborate with civil society organizations and the private sector to implement HIV prevention interventions through social contracting arrangements.

### Integration of HIV in health facility and community level health services

Strengthening the integration of comprehensive HIV service in the different HIV service delivery outlets at health facility and community levels requires the development of implementation guidelines for integration of HIV services at health facility and community level, training programme people on the integration guidelines, orientation of providers at service delivery outlets, and monitoring of implementation of service integration.

- Strengthen integration of HIV risk screening, HIV testing, PrEP, PEP, hepatitis, STIs, and GBV diagnosis and treatment in FP/MCH clinics.
- Strengthen integration of HIV risk screening, HIV testing, STIs and GBV diagnosis and treatment in outpatient and inpatient services.
- Strengthen integration of HIV risk screening, HIV testing, PrEP, PEP, hepatitis, STIs, and GBV diagnosis and treatment in adolescents and youth SRH clinics.
- Strengthen integration of FP, cervical cancer screening and treatment, PrEP, PEP, hepatitis, STIs, mental health and GBV diagnosis and treatment, and non-communicable diseases screening in the ART clinic
- Strengthen integration of HIV testing, PrEP, PEP, hepatitis, STIs, mental health and GBV diagnosis and treatment, FP and SRH in outreach and community services for KPPs.

### 3.5 General population interventions and service delivery models

Expected Result: Percentage of women and men aged 15-49 who both correctly identify ways of preventing sexual transmission of HIV and reject major misconceptions about HIV transmission will increase from 20 percent for females and 38 percent males currently to at least 50 percent for females and 60 percent for males by 2027.

Although the focus of targeted prevention activities in the NSP is mainly on KPPs and the 300 high-incidence woredas, targeted HIV prevention services will also be integrated into existing service delivery models in the medium-incidence woredas. These include general HIV service outlets in health facilities and through health extension workers and Community Care Coalition programmes, mass, and social media, as well as school HIV programmes.

In the low HIV burden woredas, basic HIV prevention interventions will be implemented targeting the general population. Such interventions will be delivered through health facilities and community outlets by health and non-health sectors, and by community and civil society actors. These HIV prevention interventions targeting general population include:

- Social behavioral change communication and demand creation through mass media (national and local/regional, public, and private radio and television).
- Curricular and extracurricular activities in schools (mini-media, clubs) supported through the Ministry of Education, including the use of available school electronic platforms (radio and plasma screens).
- Use risk screening tools at HLI and high schools to identify high-risk AGYW and provide intensive behavioral change communication and condom as well referral linkage to health facilities.
- Revitalize and scale integration of a credited HIV/SRH/gender/life skills course in the higher learning institutions and revise the high schools' curricular HIV content to make it interactive and skills focused.
- Scale-up Community Care Coalitions and allocate funds to HIV prevention, especially SBCC.
- Develop both print and audiovisual information materials and use social media and interactive digital applications.
- Add the HIV programme to the performance monitoring scorecard of the health extension programme.
- Strengthen targeted HIV mainstreaming in key sectors.
- Use national events to create demand for combination HIV prevention services among the general population.
- Educate through the involvement of inter-religious councils and religious institutions.
- Condom distribution mainly through social marketing and private sector while free condoms are distributed to those who cannot afford to buy.
- HIV testing at public and private health facilities on a fee-paying basis.
- PEP services at public and private health facilities across the country.
- STIs diagnosis and treatment at public and private health facilities across the country.
- PMTCT services for all pregnant women through public and private health facilities across the country.

## CHAPTER 4

# TRIPLE ELIMINATION OF MTCT OF HIV, SYPHILIS AND HEPATITIS B

**Strategic Objective 2: Attain triple elimination of mother-to-child transmission of HIV, syphilis, and hepatitis B virus by 2027.**

### 4.1 Context

In the Ethiopian context, eliminating mother-to-child transmission of HIV, syphilis, and hepatitis B virus by 2027 presents significant challenges outlined in section 2.3 above. Several key changes have recently been introduced to improve MTCT outcomes. The DTG-based regimen was introduced in 2019 as a preferred regimen for pregnant and breastfeeding women and women of childbearing age. Ethiopia has adopted the provision of enhanced postnatal prophylaxis (NVP+AZT) for the first six weeks and NVP alone for the following six weeks for all HIV-exposed infants.

### 4.2 Strategic interventions and service delivery models

Expected Result 1: Mother-to-child transmission of HIV during pregnancy, childbirth and breastfeeding reduced to less than 5 percent by 2027.

Expected Result 2: Percentage of PBFW living with HIV who are on ART increased from 89 percent to 95 percent by 2027.

Expected Result 3: At least 98 percent of PBFW living with HIV are virally suppressed at labour and delivery by 2027.

Expected Result 4: Percentage of infants born to women living with HIV who receive a virological test for HIV within 2 months (and 12 months) of birth increased from 62 percent to 95 percent by 2027.

Triple elimination of MTCT of HIV, syphilis and hepatitis B requires early screening and the initiation of treatment among both pregnant women and their partners. The successful prevention of MTCT of HIV depends not only on primary prevention of HIV infection among girls and women of childbearing age, but on early detection of maternal infection, preferably before pregnancy, and initiating and sustaining lifelong ART treatment with viral load suppression, while also providing prevention and care programmes for male partners. Routine antenatal screening for syphilis and hepatitis B similarly provides opportunities for treatment of both conditions.

Strengthening the health system to address vertical transmission of HIV, syphilis and HBV also improves a broad range of MCH services and outcomes.

All infants and young children exposed to HIV, syphilis and/or HBV should receive prevention and care services, including early screening, appropriate prophylaxis, routine immunization, follow-up, and treatment where indicated.

In line with global guidance service standards, the PMTCT programme should include human rights in relation to equitable access to SRH services and ANC; pregnant women's autonomy in decision-making; informed consent for HIV, syphilis and HBV testing and treatment; respect for privacy and confidentiality; adequately addressing violence, abuse, and coercive practices; and ensuring meaningful participation of recipients of care in the design and delivery of programmes.

As Ethiopia moves towards the elimination of vertical transmission of HIV, the key is to examine where, along the continuum of pregnancy and breastfeeding, infection and transmission take place. Since women tend to attend ANC late in their pregnancy, detection of HIV infection prior to pregnancy and immediate initiation of ART is the most effective means of preventing MTCT. Spectrum estimates show that 80 percent of the estimated 1,985 HIV infections in infants arose from women who never started ART during pregnancy and breastfeeding, or who started ART late, or dropped off ART during pregnancy, or in mothers who became infected during breastfeeding. Approximately half of the current 12 percent MTCT rate occurs during the breastfeeding period. (See Fig. 21). This data indicates points of potential intervention to prevent MTCT among PBFW. Health workers must be adequately trained in comprehensive ART services and there must be enhanced implementation of continuous quality improvement and mentorship.

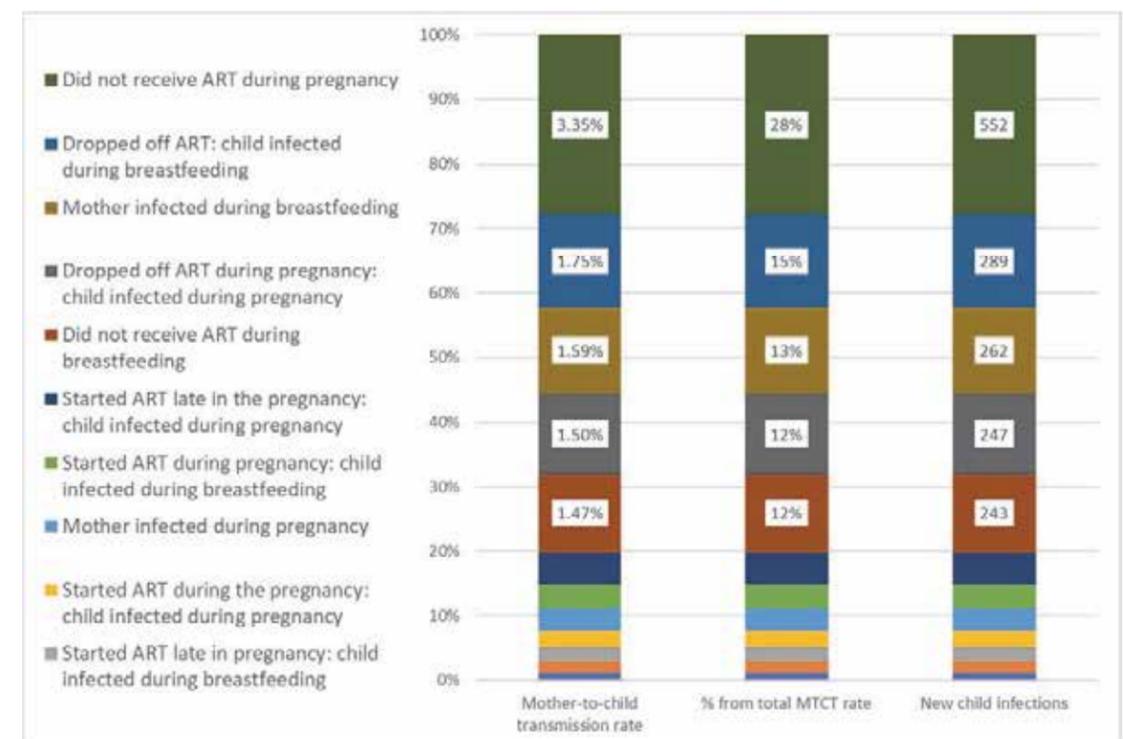


Figure 7: PMTCT cascade Spectrum 2022

The following strategies will be employed in PMTCT services and offered in more than 2,865 health facilities at MNCH clinics nationwide:

- Scale up primary prevention for PBFW through improved health literacy.
- Utilize HIV self-testing to reach PBFW at community level through the HEP and MSGs.
- Encourage the early initiation of ANC through demand creation through the HEP.
- Use a validated risk screening tool to identify high-risk HIV-negative PBFW and provide condoms, link to PrEP and repeat HIV testing.
- Enhance PrEP provision for serodiscordant partners at MNCH.
- Strengthen family planning services among HIV-positive women of reproductive age.
- Strengthen the roll-out of dual HIV and syphilis testing.
- Universal screening of pregnant women for HIV, syphilis, and HBV.
- Strengthen couples' counselling and disclosure.
- Strengthen index case testing in the PMTCT setting through self-testing for partner and biological children older than 2 years of age.
- Strengthen provision of optimized ART regimen for PBFW and linkage to initiation of syphilis and hepatitis B prophylaxis/treatments
- Linkage and retention support for HIV-positive pregnant and breastfeeding women (from PMTCT-only sites, ART sites and communities)
- Enhance community-led services and greater involvement of recipients of care to design person-centred differentiated services.
- Strengthen and sustain Mothers Support Groups to enhance adherence and retention in care at least in the high-burden geographic areas.
- Strengthen and scale up point of care (POC) viral load testing for pregnant and lactating mothers.
- Strengthen facility-community collaboration to improve the PMTCT continuum of care, and promote greater male involvement, partner testing and disclosure.
- Strengthen and scale up POC testing for early infant diagnosis for HEI; networking POC EID health facilities with other PMTCT sites, strengthen GenXpert connectivity, consider other POC EID and VL platforms in remote facilities, and improve sample referral transport and the timely return of results.
- Scale-up HBV birth dose vaccination for all infants as part of the national immunization programme.
- Strengthen the referral network between PMTCT and ART sites (linking HIV-positive mothers to nearby ART clinics after completion of lactation and infants for ART initiation)
- Provision of enhanced dual (AZT+NVP) and cotrimoxazole prophylaxis for all HEI for improved outcomes.
- Strengthen follow-up of PMTCT maternal and HEI cohort to monitor retention and outcomes.
- Reinforce nutritional support for eligible HIV + pregnant, lactating women and HEI.
- Transition of the PMTCT programme data from paper-based to an automated electronic medical record system such as EMR-ART.
- Enhance utilization of the PMTCT dashboard to review performance quarterly.

- Encourage greater involvement of ART/PMTCT services in private health facilities.
- Tailor maternal and HEI indicators disaggregation in DHIS2 and adjust denominators as per the global guidance.
- Undertake periodic ANC sentinel surveillance and evaluation of PMTCT programme.

As the MTCT improves over the course of this NSP, the country will apply for validation for the path-to-elimination. The already established Validation Committee will work to ensure a timely application and validation. Details on the roll-out and expansion of the national EMTCT of HIV, syphilis and HBV will be addressed through the EMTCT strategic plan.

### **Early infant diagnosis and management of HIV-exposed Infants**

In 2023, 27 polymerase chain reaction machines are working but not all are functioning to capacity. There are 498 GenXpert machines with the potential to expand their diagnostic platforms to include EID. Conventional PCR machines have the capacity to test for HPV, viral load, EID and hepatitis B and C on a batch basis, therefore with a longer turnaround time for results. Currently there are 180 GenXpert machines performing both TB and early infant diagnosis and 50 machines that additionally carry out viral load for PBFW and those patients on ART with suspected high viral loads. For sites without these diagnostic capacities, samples are transported either through the Ethiopian postal service or other alternate sample mechanisms. This leads to delays in getting results back to clients. There is a need for network optimization and to better understand how to reduce the TAT for results.

The protocol for enhanced postnatal prophylaxis for HEI was not routinely followed in all facilities. Among HIV-exposed infants, only 53 percent received ARV prophylaxis in 2022/23. Improving and monitoring ARV prophylaxis for HEI is critical.

During this NSP period, the following activities will be implemented:

- Expansion of EID services through both multiplex platforms and greater access to new POC technologies will result in an EID coverage of 95 percent. Consideration will be given to other WHO EID diagnostic POC platforms.
- Improve integrated sample referral transport and timely return of results.
- Ensure HIV-exposed infants receive dual prophylaxis (AZT+NVP) and cotrimoxazole syrup.
- Ensure linkage of mother-infant pairs to care and treatment.
- Adjustments in DHIS2 to track mother-baby pairs on ART treatment.

## CHAPTER 5 HIV TESTING

### Strategic Objective 3: Enhance HIV case finding to attain 95 percent of PLHIV knowing their HIV status and linked to care by 2027.

Expected Result 1: Percentage of women and men aged 15+ years living with HIV who know their HIV status will increase from 87 percent to 95 percent by 2027. And percentage of children aged <15 years living with HIV who know their status increase from 40% to 95% by 2027.

Expected Result 2: Percentage of HIV-positive results among the total HIV tests performed for case finding during the reporting period will increase from 0.9 percent to at least 2 percent by 2027.

Expected result 3: >95 percent of all people newly diagnosed with HIV infection will be linked to and initiated on antiretroviral treatment by 2027.

### 5.1 Context

HIV testing services will be available at both facility and community testing sites. In 2022 a total of 6.6 million HIV tests were conducted with an overall low-test yield of 0.5 percent (EFY 2015). The low yield is partly due to universal testing of pregnant women, which is in line with the national guideline (testing for prevention). Annually an estimated 3.5 million pregnancies are expected in the country.

Current data indicates that the primary hurdle to achieving the three 95s remains in case finding. High-yield case finding modalities such as index case testing, social network strategy, risk-based provider-initiated testing and counselling using a risk screening tool, and HIV self-testing have been adopted and implemented. Despite these efforts, there are notable quality and implementation gaps that hinder the optimization of case-finding.

Testing sites are available in health facilities and community settings. Adult, pediatrics, and adolescent HIV risk screening tools (HRST) are in place with variable use. However, these HRSTs need to be validated. Validation will ensure whether the tools are appropriate in identifying, with adequate sensitivity and specificity, people who need HIV testing. The free and targeted HIV testing services will prioritize KPPs, children, at-risk adolescent girls and young women and pregnant women.

In addition to free HTS services at service delivery points within health facilities using a HRST, HIV testing services will also be available to the general public on a fee basis through voluntary counselling and testing service outlets at public and private facilities. This will be implemented by integrating the HIV test kits into the RDF modality of the public facilities and allowing private facilities to procure HIV test kits. SOPs will be developed to support a standardized national implementation for the fee-based HIV testing.

HIV self-testing will be expanded through community-based distributions at hotspots areas and workplaces, humanitarian settings, and through CSOs, DICs, peer service providers, social marketing outlets, and through health facilities integrated distribution (OPD, ART, KPP-friendly clinics, FP clinics and ANC).

### 5.2 Population and geographic priorities

To optimize HIV case finding, geographic and population prioritization approaches will be implemented using high-yield testing modalities such as index case testing, social network strategy for KPPs and risk-based testing among adults and children. Emphasis will be given to AGYW. Testing will also occur as follow-up for PrEP, for individuals undergoing VMMC, and for those attending TB and STIs clinics. Testing for prevention will be implemented for all pregnant women. A risk screening tool will be applied to identify and re-test high risk PBFW. For the eligible HIV-negative populations, linkage will be made to PrEP where appropriate.

The priority for HIV testing will be key and priority populations in the 300 high-burden woredas. These woredas will be provided with ongoing, intensive site support, supervision, and monitoring through the establishment of town/woreda/regional teams. Vigorous optimization in the rest of the country will rely on the utilization of a risk screening tool for both adults and children to be administered at various entry points within health facilities.

### 5.3 Case finding strategic interventions.

HIV testing and case finding will use the following interventions:

**Index case testing:** HIV testing will be offered to all index cases to elicit and test sexual partners and biological children of PLHIV. This will be supported with ongoing chart reviews to update the family tree and offer ICT services to new family members. ICT minimum requirements will be fulfilled by all ICT services at health facilities nationwide. ICT services offer an opportunity to engage and re-engage known HIV-positive contacts of index cases who have not started or might have discontinued ART.

Urban health facilities will utilize targeted community outreach by integrating with urban health extension workers to find and link elicited contacts of index cases. Moreover, inter-facility and facility-community collaboration with community implementing partners will enhance case finding through provision of ICT services at community level. Client level referral tracking, linkage and audit will be conducted in Catchment Area Meetings (CAMs) to minimize missed opportunities in testing of elicited contacts.

A system for cross-jurisdiction contact tracing and referral for ICT will be established to address contacts who reside in a different locality from the index case.

**Social Network Strategy** is a recruitment strategy that uses social network connections to locate individuals at the highest risk for HIV who are unaware of their HIV status and provides HIV counselling, testing, and referral services. SNS can be particularly useful in finding key and priority populations that have limited access to HIV testing. These target populations will include FSWs, PWIDs, and high-risk AGYW. SNS will be scaled up in the KP-friendly clinics and community DICs in the 300 woredas using a peer-led approach near KPP hotspots. Peer service providers will ensure linkage to health facilities for those testing HIV-positive. Regular monitoring, quality control and auditing will be conducted to minimize repeat testers.

**Provider initiated testing and counselling** is offered in all health facilities at various service entry points (e.g., inpatient, outpatient, TB and STI clinics, malnutrition, and postnatal clinics), based on the results of the application of the risk screening tool. The risk screening tools currently in use for adults, children and adolescents will be validated. Moreover, an assessment will be conducted to determine the implementation challenges of the risk screening tools utilization. Risk-based PITC will be strengthened by building awareness and ownership and by enforcing accountability as part of routine patient care in service delivery points.

**Voluntary counselling and testing services**, including premarital testing will be available on a fee basis to the general population at public and private health facilities. This will be implemented by integrating the HIV test kits into the revolving drug fund of public facilities and allowing private facilities to procure HIV test kits. SOPs will be developed to support a standardized national implementation and financial aspects. As demand creation activities are strengthened and HIVST is scaled up, clients who learn about their risk behaviour and clients who self-tested and need confirmatory testing may opt to come to the VCT clinics. Standardized implementation will be guided by SOP that will be developed through engagement of all stakeholders.

**HIV self-testing** will be available through free, social, and private market approaches to expand access. HIVST will be distributed without charge for KPPs at health facilities and in community settings. Self-testing will be scaled up at community level through outreach to hotspot areas and workplaces, DICs and humanitarian settings. In addition, community-based distribution of HIVST will be implemented to reach PBFW who are not attending or delay attending ANC and PNC services at health facilities. HIVST will be distributed at health facilities to sexual contacts of PLHIV and KPPs. Moreover, caregiver assisted HIVST will be scaled up to reach untested children aged 2 to 15 years of index cases. Tailored demand creation strategies will be implemented to enhance the uptake of HIVST.

**HIV testing integrated with MNCH** is offered to all pregnant and breastfeeding women with unknown HIV status who attend antenatal, labour, delivery, and postnatal care. In line with Ethiopia's strategy towards the triple elimination of HIV, syphilis, and hepatitis B, universal testing will be offered to pregnant women. Pregnant women will be tested at least once, with subsequent tests at labour, delivery and during the breastfeeding period, based on risk.

**Early Infant Diagnosis** for HIV-exposed infants will be expanded using both conventional and point of care platforms. HIV testing conducted at ANC clinics (testing for prevention) will be monitored separately from testing for case finding.

**Voluntary Medical Male Circumcision:** Voluntary HIV testing services will be available and offered to all individuals eligible for circumcision. HIV testing in VMMC settings will be done for prevention purpose, and not primarily for case finding. However, VMMC sites will establish relationships with ART sites to assure that immediate linkage to treatment is available for those who test HIV-positive. HIV-negative males at significant risk of acquiring HIV will be linked to other prevention services.

**Pre-Exposure Prophylaxis:** HIV testing will be offered and conducted for all eligible clients before starting PrEP and at every refill visit. If HIV seroconversion is detected among individuals on PrEP, the individual will immediately be linked to HIV treatment services.

In order to implement these optimized targeted testing approaches, health workers will be trained on the different HIV testing strategies (PITC, ICT, SNS, HIVST etc.), improved counselling techniques in ICT elicitation, and counselling of children and adolescents for HIV testing. To improve the quality and performance of case finding, capacity building activities through ongoing training, mentoring, on-site coaching, supportive supervision and review meetings will be conducted. Community-facility collaboration will be strengthened to enhance case finding and linkage.

**Table 7. HTS summary: Modality, target, and service delivery outlet**

Intervention	Target Population	Indicator	Service Delivery location/outlet
Index Case Testing	PLHIV, their sexual partners and their biological children <19 years	Proportion of sexual partners and biological children aged <19 tested for HIV	Health facility and outreach/community-based
Social Network Strategy	KPs	Number of KPPs tested through SNS	Health facility, DICs, and outreach
PITC	Clients receiving health services	Number of tests with disaggregation by age and sex	Health facilities – multiple entry points (TB, STI, inpatient, malnutrition wards)
VCT	General population	Disaggregation by population group, age, and sex	

Intervention	Target Population	Indicator	Service Delivery location/outlet
HIV self-testing	KPP, contacts of index cases	# of kits distributed	Public health facility-based distribution, social marketing, and private sector outlets
		# returning for confirmatory test	
<b>Testing for Prevention</b>			
Testing in PMTCT services	Pregnant women	Initial and follow-up tests, HIV-positive, ART initiation	Health facilities
Testing in VMMC services	Uncircumcised males in Gambella, selected areas in Southwest and South Regions	# Persons receiving VMMC service tested for HIV	Health facilities
Testing in PrEP services	FSWs, discordant couples, PWID, high-risk PBFW	# FSWs, discordant couples, PWID tested for HIV	PrEP-providing facilities

## 5.4 Linkage to care and treatment

The HIV testing cycle will only be considered complete when there is linkage of HIV-positive people to care and treatment immediately or within a maximum of seven days. The following strategies will be used to ensure linkage to care and treatment: a) accompanied referral for linkage; b) written referral; c) linkage tracking and auditing. Peer service providers, CSOs and CBOs have a critical role to play in linking people testing HIV-positive to care and treatment. Community education and demand creation, including education on minimizing repeat testing and addressing stigma and discrimination, are needed. Referral directories will be made available to all testers. Active involvement of PLHIV Associations is crucial. To monitor successful linkages, a closed loop and auditing system of incoming and outgoing referrals should be in place, with a quality assurance mechanism for monitoring and accountability.

## CHAPTER 6 CARE AND TREATMENT

**Strategic Objective 4: Attain 98 percent treatment coverage among PLHIV who know their status and 98 percent of PLHIV on ART to achieve viral suppression across all population groups and geographic areas.**

### 6.1 Context

Ethiopia has made excellent progress towards achieving the second and third 95s. As of December 2022, among the estimated PLHIV in Ethiopia, 84.4 percent knew their status, 98 percent of PLHIV who knew their status were on ART, and 98 percent of them were virally suppressed. However, this result masks inequities across regions, populations groups, and when disaggregated by age. The 2022 national HIV guidelines recommend universal rapid (preferably same day) ART initiation for all. In line with the latest WHO guidelines, ART regimens have been optimized with the introduction of fixed-dose combination tenofovir, lamivudine and dolutegravir (TLD), 10mg DTG, lower dose efavirenz (EFV), and phasing out of NVP.

Public facilities provide 96 percent of ART services while private facilities contribute 4 percent. Though private facilities have greater potential to support the national programme, they lack an adequate number of trained staff, case managers and adherence supporters, adequate technical support, and drugs to manage opportunistic infections (OI). Private health facilities are not adequately involved in monitoring and review meetings and do not have a strong system for tracing patients.

### 6.2 Strategic Interventions

#### 6.2.1 Improving adherence and retention in care

Viral suppression among adults on treatment remains high, suggesting that adherence to treatment is good. However, further improvements can be achieved by using the following approaches:

- Ensure delivery of person-centred care, including but not limited to extended working hours and weekend services.
- Ensure HIV care and treatment services delivery points are staffed with trained and skilled health-care providers.
- Maintain the involvement of case managers and adherence supporters within the system and devise ways to optimize adherence in private health facilities.
- Improve the quality of counselling services, using local languages at the time of ART initiation and ongoing counselling - a critical point during patient care- as well as encouraging disclosure of HIV status.
- Optimize the implementation of differentiated service delivery models and increase the model mix.

- f. Design and prepare service packages to retain clients in care in humanitarian settings.
- g. Improve documentation of patients' contact information (client's physical/telephone, address, and contact). Ensure patients understand the relevance of providing an accurate address.
- h. Enhance facility-community collaboration and trace LTFU.
- i. Greater involvement of PLHIVs and their associations.

**Pharmacovigilance**

- a. Sensitize health-care providers on early reporting of adverse events and side effects.
- b. Strengthen the collaboration between MOH and EFDA to take appropriate action on adverse drug events.

**6.2.2 Viral load coverage and suppression**

Ethiopia has gradually increased viral load testing coverage, currently standing at 82 percent, with a high VL suppression rate of 98 percent in 2022. However, there are disparities both in coverage and VLS rates across regions. Demand creation for viral load testing and client education on adherence are critical to maintain viral suppression. Over the period covered by this NSP the target is to attain at least 98 percent viral load suppression among all population groups in all regions.

Improvement is particularly needed to shorten turnaround time for viral load results by implementing:

- a) a more efficient sample transport system
- b) same-day high viral load result notification to expedite patient notification
- c) increasing access to POC viral load machines (e.g., GenXpert)
- d) expansion of electronic test order and result reporting

**6.2.3 Undetectable = Untransmittable (U=U)**

Undetectable = Untransmittable (U=U) or the Amharic equivalent “የማይታይ መጠን = የተገታ መተላለፍ (ዩ=ዩ) means that when an HIV-positive person who is on ART achieves undetectable viral load levels (<50 copies/ml) that are maintained for at least for 6 months, the risk of transmitting HIV through sex is significantly reduced.

U=U/ “ዩ=ዩ”/ can provide a strong additional reason for PLHIV to adhere to their ART and maintain an undetectable viral load to protect their sexual partner. However, there is a concern in communities that U=U/ “ዩ=ዩ”/ could be misunderstood as a cure or as a status that does not change over time according to the degree of adherence to treatment. Moreover, the irregular access to and practice of regular viral load testing is another concern against indiscriminate promotion of U=U/ “ዩ=ዩ”/ among PLHIV.

Therefore, the implementation of a comprehensive communication strategy and expansion of access to viral load testing will be critical to address this concern regarding U=U.

A promotion and communication strategy around U=U/ “ዩ=ዩ” will be implemented, using mainstream media (TV and radio), social media, digital applications and print media (leaflets and posters) and through health facility and community-based HIV services, mainly at the ART clinics. All U=U/ “ዩ=ዩ”/ communication and counselling will continue to emphasize safe sexual practices, including using condoms as a primary prevention measure among PLHIV and their sexual partners.

The capacity of health workers, media personnel and community leaders (PLHIV associations) will be strengthened through orientation and training sessions, guidelines, and communication materials.

The impact of U=U/ “ዩ=ዩ” communication on the PLHIV adherence to treatment, viral load suppression and condom use will be monitored through periodic assessments and operational research.

**6.3 Children and adolescents are lagging behind**

Expected Result 1: % of children < 15 years who are on ART will increase from 87 percent to 95 percent by 2027.

Expected Result 2: % of all children < 15 years on ART who are virologically suppressed will increase from 90 percent to 95 percent by 2027.

**Child Services**

Identification of HIV-positive infants and children and linkage into care and treatment for children and adolescents lag behind the progress made with adults. Although accurate data is difficult to find, based on MoH 2022 Annual Programme Report for Ethiopia, data showed that only 40 percent of estimated HIV positive children aged 0-14 years are on treatment. Viral suppression among children <15 years is 90 percent, but programme data indicates that VLS for children < 5 years is much lower at 84 percent [33].

To improve the inadequate performance of services for children under 15 years of age, the MOH launched a Pediatric HIV Programme Acceleration Initiative in November 2022 [31]. Currently 103 health facilities participate in this initiative. This activity has made care providers more aware of the need to rigorously follow all testing opportunities to identify CLHIV, minimize any missed opportunities and link into treatment. RHBs have increased their monitoring and supervision. However, here is also a need to revisit the Spectrum estimates of the number of CLHIV.

There are regional variations on treatment coverage for children and adolescents. This is the result of the interplay of various cultural, social, and economic factors, as well as health systems factors that include:

#### **Parents/caretakers/community**

- Children rely on their parents/caretakers to access HIV testing and treatment.
- Lack of or delay in disclosure of parental status and/or disclosure to the child.
- Parental sense of guilt concerns about inadvertent disclosure by the child, and fear of social rejection and isolation.
- Male decision-making roles that affect the utilization of health-care services for women and children.
- Cost of clinic visits as both a financial and time burden.
- Stigma and inadequate knowledge and information about HIV in children.
- Inadequate community-based support.

#### **Health system**

- Inadequate pediatric and adolescent-friendly spaces/clinics.
- Limited capacity among primary health-care workers to treat children and adolescents.
- Limited access and availability of pediatric formulations and regimens.
- Low EID coverage and delays in getting results back.
- Absence of nutritional support
- Sub-optimal linkage to treatment
- Gaps in age-appropriate disclosure practice

Based on the Spectrum modeling, which estimates the MTCT rate in 2022 to be 12 percent with a PMTCT coverage of 86 percent, 24 percent of all new infections occur in children <14 years. Apart from the obvious need to improve MTCT, early detection for at-risk children and early treatment for those living with the virus are crucial to saving lives.

Global data on reductions in AIDS-related deaths among children and adolescents are steepest among children aged 0 to 9 years (a 60 percent decline since 2010), reflecting both improvement in efforts to prevent new vertical infections and efforts to diagnose and treat children in the months following childbirth and during breastfeeding [39]. Specific data for Ethiopia indicates that the rates of mortality for PLHIV currently on treatment was 0.28 percent among adults, but for children <5 years the rate was 0.96 percent, and 0.12 percent for children between 5-15 years [33].

To further understand the specific factors leading to the poorer performance in the detection, care and treatment of children and adolescents, human-centred design (HCD), a problem-solving framework grounded in empathy and understanding, should be used.

Applying HCD specifically in pediatric HIV testing and treatment will provide a platform to recognize not only the types of experiences clients want but also how to design the delivery of their desired experience to improve pediatric outcomes along the entire continuum of care. The information collected will allow for more innovative communication and testing strategies for children and improve care and treatment service delivery.

Testing modalities will emphasize will index case testing, improved EID and targeted PITC at critical entry points where sick children are seen at health facilities. All HIV-positive children will be linked into care and treatment and initiated on optimized pediatric regimens in accordance with the latest WHO guidelines. Where possible, in facilities with larger patient loads, child -friendly clinics/areas will be created.

The procurement of pediatric formulations remains challenging due to global production constraints resulting in shortages of supplies. The Government of Ethiopia will explore, through the Global Fund, options such as pooled procurement.

In addition to improved case finding, strategies to improve pediatric outcomes will include:

- Family-centred care with harmonized appointment schedules especially when parents are enrolled for Differentiated Service Models.
- Specific pediatric and adolescent clinics/spaces with conducive working hours.
- Scaling up POC-EID with shorter TAT, preferably same day results.
- Optimization of pediatric regimens in line with WHO Guidelines.
- Parent/caretaker adherence education.
- Health worker capacity building (through training, mentoring, case conferences, etc.) for care and treatment of children and addressing disclosure.
- Emphasis on OI screening, prophylaxis, and treatment (TB Preventive Therapy/TPT and Cotrimoxazole Preventive Therapy
- Diversify options for differentiated service delivery models for children.
- Psychosocial support and peer support groups.
- Working with Community Care Coalition to reach OVCs and provide HIV care and support services.
- Education through audiovisual media outlets
- Adopting best global experiences

#### **Adolescent Services**

Although there has been, as noted above, a decline in pediatric mortality of 60 percent, progress among adolescents (aged 10–19 years) is slower. Girls and young women are disproportionately affected by HIV: 88 percent of new infections among 10–19-year-olds are among girls and 77 percent of new infections among 15–24-year-olds are among young women [13]. Several studies indicate significant mortality among ALHIV aged 10-24 years, with worse outcomes for those who enter into care at age 15 or older with non-perinatally acquired HIV infection versus those who were infected perinatally.

These large cohort studies point to the need to differentiate when HIV infection is acquired among adolescents and emphasize the need for prevention, early testing and entering into effective care and treatment [40, 41]. A recent Lancet review [42] found that the mental health burden for adolescents living with HIV is high and contributes to a low quality of life and challenges with adherence to antiretroviral therapy.

In sub-Saharan settings, where over 90 percent of adolescents living with HIV reside, mental health provision, infrastructure and skilled providers are scarce. Options for a combination of economic and social interventions and scalable delivery models include task sharing, primary care integration, strengthening families, and a pyramid of provision that differentiates between levels of need, from prevention to the care of severe disorders. If an adolescent is HIV-positive, there are additional triggers that can lead to feelings of anxiety, depression, and even possible suicide. Adequate training of health workers can facilitate their important role in identifying mental illness among adolescents living with HIV [43].

Ethiopia has few adolescent-friendly health facility services and health workers require additional training to address specific issues among adolescents with HIV, especially in relation to disclosure, mental health, and sexual and reproductive health services. Adolescents living with HIV do not like being seen with children or adults; they prefer their own space or clinic. Another obstacle is the provision of services that require parental consent. HIV testing can be provided to adolescents from 14 years of age without parental consent.

Although SRH services such as family planning are available, other barriers, including health workers' attitudes, limit access to services. A key sensitive point concerns when adolescents are old enough to transition to the adult clinic. The exact time for this transition should be discussed with the adolescent and not be entirely dictated by age alone. However, once in treatment, the most recent VLS rates are encouraging at 93 percent for 15–19-year-olds.

This NSP provides several options for health facilities and other stakeholders to improve outcomes for adolescent HIV care and treatment. These options include:

Adolescent HIV Clinic Day: ART clinics at selected health facilities in urban towns will dedicate one of the five working days and Saturdays as adolescent HIV clinic days.

- Specific day within the general HIV clinic setup when care and treatment are offered only to ALHIV.
- Operates within the same infrastructure as the adult clinic.

Adolescent HIV clinic:

- Health facilities that already have functional adolescent and youth-friendly clinics will integrate HIV care and treatment services for HIV-positive adolescents and youth to provide a comprehensive adolescent HIV/ART clinic.

Over the period of this NSP, there will be an increase in access and quality of adolescent services and compliance with the eight standards outlined in the WHO technical brief [44]: adolescent health literacy, community support, an appropriate package of services, providers' competence, equity and non-discrimination, data and quality improvement, and adolescent participation. The following is the minimum package of services to be delivered at adolescent and youth-friendly clinics or on adolescent clinic days:

- Health literacy, information on reproductive health issues, body, and environmental hygiene
- Counselling on sexual relations and safe sex
- Life skills education
- Condoms
- Treatment (ART) and adherence counselling
- Pregnancy testing
- Psychosocial support such as interventions that involve adolescents and their caregivers: family-based interventions to promote mental health and prevent negative behaviour (such as non-adherence) among adolescents with HIV. These interventions are designed to strengthen communication, problem-solving and negotiation skills for both adolescents and caregivers.
- Peer support and social networks are peer-driven interventions with multiple components, targeted to adolescents and young adults living with HIV, that aim to improve outcomes, including adherence to treatment, retention in care and suppression of viral loads; and digital means used to introduce new information and deliver behaviour change skills.
- Counselling on alcohol and substance abuse
- Counselling on mental health
- Counselling and management of sexual abuse
- Sexual reproductive health services (e.g., antenatal care, safe deliveries, postnatal care, STI prevention, screening, and treatment; family planning methods and post-abortion care)
- Referral and follow-up.
- Transition clinics to plan with adolescents as they transfer to adult care.

Better outcomes can be achieved by involving adolescents in the planning, delivery and monitoring of the services they receive. Additionally, HIV-positive adolescent support groups and adolescent peer service providers can play a critical role in providing adherence support, promoting positive living, facilitating access to services, identifying, and reaching key populations of adolescents in their communities and engaging in community participation and advocacy. These key complementary activities should be primarily provided through CSOs. The role of the following approaches and groups should also be examined, and promising experiences expanded:

- Adolescent and youth peer-to-peer support groups
- Involvement of adolescent (youth) ambassadors
- Adolescent adherence supporters
- Greater participation of associations of ALHIV

## 6.4 Management of coinfections and comorbidities

The screening of coinfections is an integral part of the care and treatment service package, as is nutritional assessment.

Coinfection screening cannot take place without an uninterrupted supply of key laboratory screening diagnostics and other supplies. This is of critical importance in the treatment of patients with advanced HIV disease (AHD). Results from EPHIA showed that 22 percent of patients were presenting with advanced HIV disease (CD4 <200 cells/mm<sup>3</sup>). Screening tests should include improved availability of CD4, CrAg, screening for TB (see section 4.2.4) and hepatitis B and C (see Section 4.4.6).

Treatment of diagnosed coinfections requires an uninterrupted supply of both fee based and free OI drugs. Options and criteria to create access to OI drugs without charge for PLHIV will be developed. Coinfections and conditions that require particular attention are:

### 6.4.1 Cryptococcal infection

- All adults and adolescents and children with CD4<100 cells/mm<sup>3</sup> will be routinely screened for cryptococcal infection with additional consideration given for screening those with CD4 <200 cells/mm<sup>3</sup>
- Those screening positive for CrAg will be provided fluconazole preventive therapy.
- Clients with confirmed cryptococcal disease will be provided with cryptococcal treatment according to WHO guidelines (e.g., fluconazole and liposomal amphotericin B)

### 6.4.2 Cervical cancer

In 2015, MOH introduced cervical cancer screening and treatment for all women between 30-49 years irrespective of their HIV status. However national scale up has been hampered by some key programmatic challenges. These include suboptimal demand creation at community; lack of awareness and knowledge among HCWs, coupled with the inability to maintain trained health workers at different levels of the health system; lack of capacity for preventive equipment maintenance and troubleshooting, resulting in frequent equipment failure; frequent shortage of medical supplies and accessories; lack of capacity to introduce new technologies; poor referral networking; lack of a system for mentorship, coaching and quality improvement, and stigma.

There has been significant scale up of screening and treatment since EPHIA in 2017-2018, which showed that in urban areas only 16 percent of HIV-positive women aged 30-49 years reported being screened for cervical cancer. MOH data indicates that cervical cancer screening is available in 1330 health facilities.

Of these, 505 are supported in PEPFAR maintained regions and 97 in regions being transitioned out of PEPFAR support. Cervical cancer screening uptake of WLHIV is 52.5 percent among maintained regions, 20 percent among transitional regions and 12 percent for the general population. Recent PEPFAR programme data shows that 60 percent of eligible WLHIV were screened with a VIA positivity rate of 6 percent, and 92 percent of women screened were treated [33].

To increase the uptake and treatment of cervical cancer screening services, community-based organizations (LIPs, PLHIV associations, etc.) will promote the use of these services and link HIV-positive women to the nearest health facility where this service is available. HSTP II aims to increase cervical screening among all 30–49-year-old women from 5 to 40 percent by 2026 [3]. The National HIV guidelines will align with WHO guidelines to screen all WLHIV aged between 25-49 and WLHIV over 50 years old who have never been screened. Efforts will be made to achieve the 2030 global target of reaching 90 percent vaccinated, 70 percent screened, and 90 percent treated.

### 6.4.3 Mental health

The increasing recognition of mental health conditions, especially depression among PLHIV, warrants to include screening, assessment, and management as part of the package of services offered in ART clinics. A recent meta-analysis of depression among PLHIV in Ethiopia found a prevalence of 37 percent [45]. Noting the increased risk of mental health conditions among PLHIV, the National HIV guidelines have included a basic screening tool, adapted from the New York State Department of Health AIDS Institute. The screening tool has been translated into several local languages [32] and some case managers and adherence supporters working in ART clinics have been trained to use it. The National HIV guidelines have included mental health training for ART providers with criteria for referral. However, capacity is very limited within the country. Efforts will be made to expand and strengthen these services.

Advocacy and resource mobilization activities are needed to provide nutritional supplies and therapeutic options for malnourished PLHIV. Linkages to existing community-based nutritional support services should be strengthened.

As the PLHIV cohort ages and remains on prolonged ART, screening and management of concurrent comorbidities becomes increasingly important. Opportunities to integrate the management of non-communicable diseases with ART clinics will be explored in high-volume sites.

#### 6.4.4 Tuberculosis coinfection

Result 1: Percentage of eligible people living with HIV newly enrolled in HIV care started on TB preventive therapy increased from 67 percent to 95 percent by 2027.

Result 2: % of PLHIV on ART who completed a course of TB preventive treatment among those who initiated TPT increased from 65% to 100%.

Interventions to optimize TB/HIV care include:

- Improve access to newer TB screening and diagnostic tests (programme data shows that yield from symptom screening among PLHIV currently receiving ART is around 1 percent), integrated sample referral systems, and functioning laboratory systems for more sensitive tests. Timely diagnosis of TB among PLHIV by improved turnaround time for test results and new POC diagnostic tests (XpertMTB/Rif Ultra, Urine LAM).
- Current data shows that HIV testing coverage among active TB cases is more than 90 percent. Efforts will be made continue this high level of HIV testing coverage among TB patients and link HIV-positives to ART.
- Adopt models of patient-centred care such as anti-TB and ART optimization, cotrimoxazole preventive therapy for TB patients who are HIV-positive, integrating TB case finding, TPT initiation and follow-up, and adherence support within the service delivery models.
- Strengthen TPT uptake and course completion by creating demand for TPT, boosting TPT adherence, patient follow-up and pharmacovigilance, and ensuring adequate and uninterrupted supplies of TPT drugs.
- Ensure adequate and uninterrupted supplies of TPT drugs, strengthen TPT uptake.
- Ensure TB infection prevention and control.
- Strengthening patient follow-up and pharmacovigilance.

About 20 percent of drug-resistant TB patients are co-infected with HIV with the risk of high mortality. Coinfection of non-drug resistant TB is around 4 percent. For those patients with drug-resistant TB and co-infected with HIV, a specific DSD model will be developed. The DSD model will help to maintain good treatment while decreasing out of pocket costs and other barriers, for example, co-infected patients having multiple clinic appointments at different facilities.

Building on the concept of value for money, synergies between the TB and HIV programmes include improved integration at health facility level, improved efficiencies within the laboratory diagnostic platform and integrated sample transport system, efficiencies within the supply chain, synergistic interventions at community level building on the HEP, PLHIV associations and peer supporters, and integrated programme planning, supervision, monitoring and evaluation (Fig. 27).

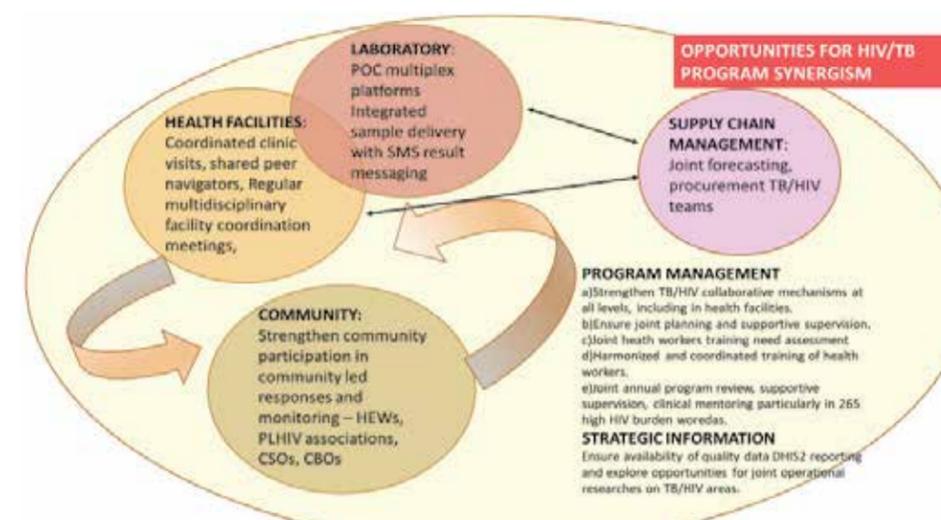


Figure 8: Opportunities for TB/HIV programmes synergy

#### 6.4.5 HIV and hepatitis B and C coinfection

HIV profoundly impacts on the course of hepatitis B and C virus infection, resulting in higher rates of chronic hepatitis infection, accelerated fibrosis progression with increased risk of cirrhosis and hepatocellular carcinoma, and higher liver-related mortality compared with people who do not have HIV. This NSP expands the integrated management of HIV and viral hepatitis infection with early diagnosis and treatment of both HIV infection and viral hepatitis infection.

A comprehensive approach, including engaging leadership at federal and regional levels, is required in managing HIV and hepatitis B and C coinfection, which includes:

- Integrating HIV, HBV, and HCV infection prevention interventions
- Scaling-up HBV and HCV screening/testing among PLHIV
- Provision of hepatitis B vaccination for non-immune HIV-positive clients
- Ensuring provision of tenofovir-based regimen for PLHIV who are co-infected with hepatitis B (provided there is no contraindication to tenofovir)
- Linking PLHIV who are co-infected with hepatitis C to viral hepatitis treatment services.
- Strengthen the monitoring of adherence to hepatitis treatment.
- Strengthen the integration/linkages between HIV services and viral hepatitis services.
- Integrate the diagnostic platforms and laboratory services used for other diseases (for diagnosis and treatment monitoring)
  - multi-disease serological rapid tests (HIV, hepatitis, syphilis)
  - multi-disease platforms for viral load testing (GeneXpert, conventional viral load testing machines)
- Ensure inclusion of key HIV and hepatitis indicators into DHIS-2 and improve data quality and use at all levels.

## 6.5 Advanced HIV disease

People with advanced HIV disease are at high risk of death, even after starting ART, with this risk increasing with decreasing CD4 cell count. Relying on clinical staging alone risks missing substantial numbers of people living with HIV with severe immune suppression. The most common causes of death are TB, severe bacterial infections and cryptococcal meningitis. The WHO AHD package has been adopted and detailed in the national guidelines for comprehensive prevention, care, and treatment. A separate AHD DSD implementation manual has also been developed along with AHD DSD recording and reporting tools.

A package of interventions including CD4 measurement and screening for CrAg, treatment and/or prophylaxis for major opportunistic infections, rapid ART initiation and intensified adherence support interventions will be offered to everyone presenting with advanced HIV disease. This should include those who are re-engaging in care after a period of interruption.

CD4 testing for eligible patients will be expanded but priority for prompt CD4 testing and evaluation for AHD and its management will be given to people newly initiating ART, those with treatment failure, and those returning to treatment after a period of discontinuation. In addition, all CLHIV under five years old are considered to have AHD at the time of diagnosis until they are virally suppressed and will be prioritized for CD4 testing and evaluation.

## 6.6 Models of service delivery

The integration of services is outlined in the National HIV Guidelines and defined by the provision of various service components in one physical locality. Family planning is offered in all ART clinics, screening for comorbidities and coinfections, screening, and treatment of TB, screening and management of cervical cancer in facilities. The development of chronic care clinics which also screen and manage NCDs (cardiovascular disease, diabetes, cancers, and chronic respiratory disease) currently in 10 hospitals, will be scaled up as the prevalence of NCDs is determined.

As national guidelines evolved to initiate ART for all people living with HIV regardless of clinical and immune status, differentiated service delivery has become a critical component of recognizing the diverse service needs of people. Differentiated service delivery takes into consideration how often patients need to come, where they need to come for services, who provides these services, and what the service package should comprise. Current models of care being offered to stable adult clients on ART include three- and six-monthly refills, fast track pharmacy refills, peer-led community ART distribution, community-based ART service delivery and differentiated delivery models specific for adolescents, KPs and PBFW. Over the period of this NSP, there should be improved data on the use, evaluation and costing of the different DSD models in order to better understand their effectiveness and efficiencies from both the service delivery aspect as well as client perceptions.

Private health facilities have a role to play in providing and complementing HIV care and treatment services, while receiving support to follow national guidelines and to comply with providing service reports into the health information system.

## CHAPTER 7 SOCIAL ENABLERS FOR HIV RESPONSE

**Strategic Objective 5: Stigma, discrimination, and gender-based violence will be reduced from 25 percent and 20 percent respectively to less than 10 percent by 2027.**

The multisectoral and social nature of the HIV epidemic highlights underlying critical social and programmatic situations and circumstances which, if not addressed, can diminish the reach and impact of Ethiopia's HIV/AIDS response.

### 7.1 Gender and gender-based violence

Expected Result: The percentage of women who ever experienced sexual and gender-based violence will decrease from 20 percent in 2019 to 10 percent by 2027

Gender inequalities and gender-based violence place girls and women at increased risk of HIV infection, as described in relevant sections throughout this NSP. Young women with disabilities face even higher risks.

The span and scope of addressing gender inequalities and gender-based violence is broader than the health sector. It requires multisectoral responses, investments, and gender-responsive programming and budgeting in the HIV response. This includes training of programme people on gender-responsive and gender-transformative HIV programming and implementation.

The following interventions will be implemented during the NSP period:

#### Through the health sector response:

- Training health workers on first line and comprehensive management of GBV.
- Build capacity of health facilities to provide comprehensive and age appropriate GBV services, including equipment, commodities, and supplies.
- Empowering women in health sector management, including assignment to leadership roles.
- Provide comprehensive services in health facilities for survivors of GBV that include but not limited to medico-legal examination, HIV, STIs and pregnancy testing, PEP, emergency contraception, STIs treatment, counselling, and referral for social and legal services.
- Ensure that youth-friendly clinics at health facilities can provide comprehensive post- violence care for adolescents and youth.
- Strengthen CSO-led DICs and girl-friendly SRH clinics and provide integrated services including psychosocial support, HIV, SRH and GBV services.
- Strengthen linkages between health, legal and psycho-social support services for GBV survivors.
- Establish gender-disaggregated indicators to track progress in service access, new infections and AIDS-related mortality.

### Through a multisectoral response:

- Establish national and regional task forces to coordinate the implementation of comprehensive GBV services, including prevention across all levels.
- Identify and assess bottlenecks that hinder the full enforcement of current laws and policies to design interventions that foster effective implementation and/or legal and policy reforms.
- Develop or reform laws and law enforcement practices on age of consent, domestic violence, sexual consent, and early child marriage.
- Conduct advocacy campaigns and sensitization to reduce HIV-related gender discrimination, harmful gender norms, and violence against women and girls in all their diversity.
- Implement interventions that address the underlying structural (social, cultural, and economic) causes of gender inequality, including harmful traditional practices and social norms that perpetuate gender inequality.
- Provide training for decision-makers, law enforcement bodies, media personnel, employers of hotspot workplaces, bar/hotel owners and civil society actors about the existing national policy and legal instruments to ensure gender equality and women empowerment, and to protect the rights of women and girls.
- Train and organize FSWs and high-risk adolescent girls to identify, prevent and respond to SGBV, including group help and justice for victims of SGBV.
- Build institutional capacity of women networks, associations and organizations of women living with HIV and most affected by HIV to ensure women's and girls' voices are heard. Define the meaningful participation of survivors of gender-based violence, including women living with HIV.
- Train and support paralegals and women lawyers' associations to provide legal services for women, high-risk AGYW, FSWs and survivors of SGBV.
- Strengthen girls' clubs in schools and youth centres.
- Build capacity of programme managers (training) at all levels to identify, analyze root causes and act on gender disparities in service access and HIV burden.
- Provide vocational skills and entrepreneurship training for vulnerable AGYW and provide start-up capital to establish IGAs.
- Establish and expand safe spaces for GBV victims or vulnerable women.
- CSOs/CBOs will organize community dialogues on promoting gender equality and reducing GBV.
- CSOs/CBOs will use community scorecards to monitor the GBV response in their community.
- Conduct a national survey on violence against women and disseminate its findings.

## 7.2 Stigma and discrimination

Expected Result 1: Percentage of PLHIV who experienced stigma and discrimination in social sphere in the preceding 12 months reduced from 32 percent in 2021 to 10 percent by 2027.

Expected Result 2: Percentage of PLHIV who experienced stigma and discrimination in health-care settings in the preceding 12 months reduced from 42 percent in 2021 to 10 percent by 2027.

The Ethiopia Stigma Index Survey carried out in 2021 indicated that 32 percent of people living with HIV experienced some form of stigma or discrimination in their social environment in the last 12 months. These included being forbidden from participating in public/social events, household chores such as cooking, eating together, and sleeping in the same room. The index of self-stigma and discrimination due to HIV status was high (38%) during the 12 months prior to the survey. Female respondents reported higher self-stigma and discrimination compared to their male counterparts (41%), youngest age group aged 18 to 24 years (47%) and Key Populations (43%). There is high stigma and discrimination by health-care facility staffs for clients seeking services on non-HIV related services (42%) and HIV care and services (30%) [35].

Interventions to decrease stigma and discrimination will include:

- Assess, strengthen, and enforce laws to mitigate stigma and discrimination. Train law enforcement bodies on the anti-stigma and discrimination laws and provisions.
- Assess policy and legal gaps and limitations of enforcing available laws and policies in addressing stigma and discrimination, human rights related problems and address the gaps accordingly.
- Conduct mass and social media campaigns to disseminate messages of anti-stigma and discrimination.
- Conduct Know Your Rights training for PLHIV and KPs to improve literacy regarding policy and legal issues, to help them cope with stigma and discrimination, and to mitigate its impact, including justice.
- Establish national and regional taskforces to coordinate the implementation of interventions to address issues of stigma and discrimination, human rights, and HIV/AIDS across all levels.
- Sector ministries (MOH/MOE) to develop and implement a Zero tolerance policy on stigma, discrimination, and HR violations in health facilities and schools. Health facilities to assign a focal person or a team to monitor, receive, investigate, and act on and stigma, discrimination, and human rights violations.
- Build the capacity of health facilities, schools, and community-level HIV service providers, as well as the relevant experts/teachers in schools and higher education institutes, to minimize stigma, discrimination, and non-consented disclosure and to support PLHIV if they choose to disclose their HIV status to people of their choice.

- Teach the necessary skills for coping with and responding to stigma, discrimination, and consented disclosure in all health services through counselling, peer-based and media education for PLHIV and KPPs.
- Integrate human rights, stigma, and discrimination issues in the activities of community actors, including the CSOs, peer groups, DICs and service providers.
- Build the capacity of PLHIV associations to ensure more effective advocacy, social and legal support to PLHIV, including the prevention and mitigation of the effect of stigma and discrimination.
- Establish, scale up and strengthen community-level support groups involving PLHIV associations and PLHIV in the KP groups.
- Expand peer support among PLHIV across all levels to foster mutual support and experience sharing. The aim is to improve disclosure with consent, particularly among females, enabling PLHIV to benefit from the positive effects of disclosure.
- Scale up adolescent PLHIV-friendly HIV services at community and health facility levels to address stigma and discrimination issues related to adolescent PLHIV, as well as other gaps in accessing HIV services.

### 7.3 Embracing a human rights approach to the HIV response.

Expected Result: Reduce the legal and policy barriers to KPP and PLHIV access to services by 2027

Human rights-related barriers include HIV-related stigma and discrimination; punitive laws, policies, and practices; gender inequality and gender-based violence. These barriers prevent people in need from accessing vital HIV services, but they can be overcome by implementing and expanding recognized, well-defined, evidence-based programmes. In partnership with CSOs and CBOs and other government sectors (e.g., Ministry of Women's Affairs, Human Rights Commission), the following interventions will be implemented to ensure human rights are respected and protected in HIV service provision and to reduce barriers to HIV services.

- Build health-care providers' capacity on human rights and medical ethics related to HIV by training health-care providers, including facility and non-facility based, health-care administrators and regulators. The training will cover non-discrimination, the duty to treat, informed consent, confidentiality, and violence prevention and treatment.
- Develop institutional policies and accountability mechanisms for health-care facilities to respect and protect human rights.
- Assess policy and regulatory challenges to address human rights in HIV services and service barriers. Revise policies and legal frameworks to better address human rights in HIV service provision and access.
- Conduct advocacy and dialogue on policy and regulatory frameworks that impede the realization of human rights in HIV services provision and access.

- Conduct community mobilization, advocacy, and community-led outreach campaigns to address harmful gender norms and stereotypes and other programme-related human right barriers.
- Conduct sensitization of law and policymakers and parliamentarians to advocate for better policy formulation that alleviates human right violations.
- Provide sensitization and training to law-enforcement agents, the General Attorney Office, judges, prosecutors, police, and traditional and religious leaders on legal, health, and human rights aspects of HIV, KPP including gender-and age-based discrimination, inequity on violence prevention as well as their relation to HIV.
- Conduct discussions to facilitate referral linkages among service providers and law enforcement bodies to support effective intersectoral referral linkages for different services (health, legal, psychosocial services).
- Train prison personnel in prisons for both women and men) on public health, human rights, HIV and HIV/TB responses.
- Ensure legal literacy ("Know Your Rights") among PLHIV and KPP.
- Conduct literacy training and education on legal and patients' rights for key and priority populations through mass media, social media, digital platforms, and integrated peer learning.
- Mobilize and empower KPP to ensure they demand and receive services through clubs, support groups, saving and credit associations, and contribute to their awareness, monitoring, and enforcing human rights principles in programmes and HIV services.
- Establish crisis response mechanisms to prevent abuse, including gender-based violence at workplaces, bars, and hotels as well as women groups in the community.
- CSOs/CBOs provide HIV-related legal services to PLHIV and KPPs.
- Provide legal information, referrals, advice through peer paralegal community support systems and institutional support mechanisms, including lawyer's associations, PLHIV associations, and KPP support groups /clubs.
- Provide legal services and counselling for women and girls and KPP through institutional and community arbitration and dispute settlement mechanisms.
- Support the establishment of various forms of community dispute resolution, including engagement of traditional leaders and customary law in support of KPP and people affected by HIV.
- Monitor HIV service delivery quality in terms of stigma, discrimination, and human right violations.

## CHAPTER 8

### COMMUNITY SYSTEM STRENGTHENING

**Strategic Objective 6: By 2027, a significant proportion of HIV testing, social enablers and HIV prevention services will be delivered by CSOs/ CBOs/FBOs/PLHIV associations.**

Civil society organizations and community-based and community-led organizations, including PLHIV associations, have an essential role to play in the HIV response at all levels. It is critical to ensure the involvement of CSOs, CBOs and affected and infected communities in the policy and strategy formulation, planning, implementation, monitoring and evaluation of the response at all levels. FBOs play a vital role in addressing major programmatic challenges to retain the clients already enrolled on ART, minimizing loss from the programme and growing the treatment cohort.

Community system strengthening has the following four pillars:

- Community engagement, leadership, and capacity building
- Community-led monitoring
- Community-led research and advocacy
- Community engagement linkage and coordination

#### 8.1 Community engagement, leadership, and capacity building

- Build the leadership capacity of CSOs, CBOs, affected and infected communities through training on HIV response policy, strategy, planning, service delivery, and monitoring.
- Ensure engagement of CSOs/CBOs/FBOs in the implementation of facility and community-based HIV prevention, care, and treatment interventions targeting PLHIV, CAYLHIV, key and priority populations.
- Ensure representation, participation, and engagement of community actors in high-level health advisory or governing bodies, oversight committees including NAC, RAC, TWGs, task forces, CCM, the management board and other decision-making forums.
- Support CSOs/CBOs/FBOs in the development of strategy, governance, and policy documents, such as human resource and finance policies, manuals and procedures, resource mobilization strategies and social dialogue strategies.
- Build CSOs/CBOs leadership, human resources, technical and financial capacity, including office space, human resources, and office utilities to run their operations.
- Develop and implement a social contracting policy and guidelines to facilitate the provision of small grants to CSOs/CBOs to increase their capacity in health service delivery.
- Organize and empower PLHIV and key and priority populations through associations, clubs, saving groups, and peer support groups with legal registration of community organizations.

#### 8.2 Community-led monitoring

Community-led monitoring (CLM) is an intervention through which communities systematically and routinely collect and analyse data at policy and strategy level, programming and service delivery levels. CLM collects data at policy, strategy, and programme levels to identify key bottlenecks and barriers. The CLM data collected at the policy and programme level will help to ensure accountability and address barriers. When implemented at the health facility level, community-led monitoring and research can provide deep insights on targeted action to improve patient experience and the overall quality of care, resulting in better health outcomes for individuals and the broader community. The strength of CLM rests in that it is owned and conducted by community and civil society organizations. The ability to continuously track unique community-generated data and report back on a set of indicators that matter most to service users is powerful.

In Ethiopia, community-led monitoring has been pilot tested to monitor the quality of services at KPP-friendly clinics. However, there was no standard guideline or coordination structure, and the pilot did not strongly involve KPPs, PLHIVs and the affected community. CLM was limited to monitoring service quality. It was not designed to identify, track, and address policy and programmatic barriers.

CLM will be complementary to national health management information systems (HMIS). Together, the data can inform national strategic and operational planning for HIV, programmes to improve overall implementation and mitigate programmatic risks. CLM data can also be compiled and triangulated with government data over time for a more comprehensive picture of service delivery.

The following activities will be implemented to strengthen community-led monitoring:

- Establish a CLM task force at national and regional level, chaired by national and regional PLHIV networks, that involves a range of CSOs, CBOs, KPPs groups, PLHIV, MOH, RHBs, health-care facilities, UN agencies, donors, and development partners.
- The CLM task force at local and national levels will oversee the conceptualization and design of the CLM and review and act on CLM findings.
- Develop CLM national strategy, guidelines, and data collection and compilation tools to monitor, identify and address policy, programme, and service gaps and barriers.
- Avail digital tools and equipment including appropriate technologies for data management and storage.
- Build community capacity on the use of appropriate new information communication and coordination tools and technologies, including digital tools.
- Provide human resource (staffing), technical (training), technological and financial capacity of CSOs, CBOs, KPPs, and PLHIV associations to implement CLM.
- Adopt, implement, and monitor a digital CLM platform.
- Establish a dedicated local project governance, field management, and operational and technical support to ensure the smooth functioning of the E-Monitor CLM platform.
- Co-create community response protocols and process. Implement and scale up a digital CLM platform that can be tailored to the local context.
- Provide technical assistance to CSOs leading CLM for the development of a data warehouse to bring CLM data from multiple sources such as facility surveys, scorecards, and other mobile and excel-based data sources.

- Provide a real-time CLM dashboard and response module for multiple stakeholders to take prompt action on the ground and to promote evidence-based decision-making.
- Perform an annual assessment of needs, issues, and impact of CLM activities.

### 8.3 Community-led research and advocacy

- Conduct qualitative, quantitative, and operational community-led research and assessments of programme implementation (e.g., shadow reports).
- Community-led mapping of legal, policy, and other barriers that hinder/limit community responses (including barriers that impede registration, and funding of community organizations).
- Provide technical support and training to build CSOs' capacity for policy, service access and quality advocacy.
- Conduct data-driven advocacy: support CSOs/CBOs community-led advocacy activities, such as using community-led monitoring data to influence decision-making around, laws, regulations, or policies that limit the registration and/or operation of community organizations, engagement, and representation in policy processes, accountability mechanisms, and processes and in the development of local, regional, and national health and disease-specific strategies and plans.
- Support CSOs production of advocacy materials including the production, publication, and dissemination of reports and communication materials based on the CLM and community-led research.
- Mobilize resources to implement CLM, community-led research, and advocacy.
- Consolidate learnings, develop case studies, advocacy, and policy documents.
- Conduct quarterly stakeholder meetings with national HIV programme managers, health facility managers, health providers, and other CLM implementers in the country to discuss CLM findings and address policy, programme and service-related bottlenecks and barriers.

### 8.4 Community engagement, linkage, and coordination

- Building community capacity on the use of appropriate new information communication and coordination tools and technologies, including digital tools.
- Community-led development/revision of strategies, plans, tools, resources, and messages for social mobilization.
- Mapping of community-led and community-based organizations and networks and their service packages.
- Creation and/or strengthening of platforms that improve coordination, joint planning and effective linkages between communities and formal health systems, other health actors and broader movements such as human rights and women's movements.
- Establishing or strengthening formal agreements between community-led service providers and health facilities or private health service providers, linkages with community health workers outreach activities and bi-directional referral mechanisms between health and community-led service delivery points.
- Representation, participation, and engagement of community actors in high-level health advisory or governing bodies.

## CHAPTER 9 MONITORING AND EVALUATION, SURVEILLANCE, AND KNOWLEDGE MANAGEMENT

### Strategic Objective 7: Enhance generation and utilization of strategic information for an accelerated evidence-based response.

This section describes the gaps and challenges within the M&E and surveillance systems and proposes strategies to address the identified issues.

### 9.1 Context

The MOH and its partners have made major progress in rolling out systems and tools to generate and manage strategic information. The rollout of the Electronic Medical Record System (EMRS) at higher volume health facilities has effectively supported the implementation of HIV prevention, care and treatment programmes. Viral load indicators have been integrated from EPHI's central electronic database for viral load and EID, which collects data from the VL testing centres in the country. The patient monitoring system remains a strong data source for monitoring HIV care and treatment service and has been integrated into the DHIS2. In addition, several HIV surveys and surveillance activities have been conducted, and stakeholders have deployed and trained human resources for M&E.

However, obtaining reliable and high-quality data for decision-making is still a challenge:

- Lack of unique patient identification and tracking systems
- Lack of interoperability between different data systems
- Parallel data system and reporting requirements (DHIS2 and DATIM)
- Lack of disaggregated routine programme data by age, gender, and population groups such as KPPs
- Lack of integration of community-level HIV prevention, care, and treatment data into DHIS2
- Limited data quality monitoring and improvement
- Incomplete transition to electronic data formats and incomplete reporting
- Limited capacity and interconnectivity of the data system at the facility level
- Scarcity of survey and surveillance data, particularly for key and priority populations
- Delayed publishing and dissemination of survey, surveillance, and programme reports
- Limited coordination and difficulty in accessing current data among the institutions generating data and programmes that rely on such data for decision-making
- Inadequate human resources for Strategic Information (SI) at lower levels

## Programme Objectives

The overall objective of strategic information, surveillance and knowledge management is to provide comprehensive, timely and accurate data to inform policy, planning, services delivery, and resource allocation for the NSP period from 2023/24 to 2026/27.

The monitoring, evaluation, surveillance, and knowledge management section has three primary objectives:

1. To track the inputs, outputs, outcomes, and impacts outlined in the NSP.
2. To ensure a systematic process for generating, collecting, analyzing, synthesizing, and sharing knowledge to inform the progress of the NSP.
3. To provide timely data to meet reporting obligations in line with national and international commitments.

## Target Population

The target audience for M&E includes the following:

- National HIV/AIDS programme officers
- Regional health management teams
- Development partners (bilateral and multilateral)
- Other key stakeholders from NGOs and academic institutions
- Other organizations responsible for planning and implementation of HIV prevention and treatment services

## 9.2 Strategic interventions

- Integrate the various data sources and systems.
- Ensure interoperability of different data systems and establish a data warehouse.
- Ensure disaggregated routine programme data (DHIS2) by age, gender, geographic, and population groups such as KPPs.
- Integrate community-level HIV prevention, care, and treatment data (MRIS) into DHIS2
- Strengthen data quality monitoring and improvement.
- Expedite the transition to electronic data formats and ensure complete reporting.
- Build IT capacity (computers and internet) and SI human resources at all levels, especially at facility level.
- Strengthen capacity and culture for improved data analysis and information use for decision-making.
- Conduct survey and surveillance including:
  - Ethiopian Demographic Health Survey- conducted every 5 years.
  - Spectrum modeling
  - Population-based HIV Impact Assessment
  - Burial sentinel surveillance
  - Integrated biological behaviour surveys in key populations
  - HIV case-based surveillance: HIV case reporting and recency testing

- HIV drug resistance survey
- STIs drug resistance survey
- Ensure timely publishing and dissemination of survey, surveillance, and programme reports.
- Strengthen coordination and ensure easy access to current data among the institutions generating data and programmes that utilize such data for decision-making.
- Establish unique patient identification and tracking systems.
- Regularly map hotspots to enable better segmentation of populations, granularity, and differentiation of service delivery.
- Improve compliance in reporting through increased timeliness, accuracy, and consistency/standardization of data.
- Enhance data analysis and use for patient care and data-driven decision-making, including data modelling, machine learning, and predictions.
- Engage private facilities in the implementation of the national health information system (DHIS2).

## Health Management Information System scale up and sustainability plan.

Stakeholders will collaborate to develop a Health Management Information System scale up and sustainability plan (M&E systems). Besides the integration of data and patient tracking systems (using unique identifiers for patient tracking,), computerization of the HMIS system will be expanded to all health facilities, and to private facilities with a large volume of patients, also linked to feed into DHIS2. This will involve a nationwide capacity-building process. Data and information-sharing systems will be created at all levels, based on the NSP Programme results coordination framework. An automated dashboard updating key indicators on a quarterly basis will be shared with all stakeholders through DHIS2. This dashboard will also be accessible on mobile phones, tablets, and computers.

## Integration of eMRIS into DHIS2

Using the HMIS scale-up and sustainability plan, e-MRIS will be integrated into the routine DHIS2 in collaboration with partners. This will require the MOH to address the following important issues:

- Selecting key indicators reportable at the community level
- Developing reporting tools
- Defining points of data collection and entry
- Identifying the required human resources
- Identifying options of integration with DHIS2 (through integrated app, separate instance on DHIS2, revising the existing DHIS2 to accommodate community indicators)
- Identifying other options like integrating the MRIS into e-CHIS

## **Health Management Information System integration with DHIS2**

The existing disparate HIS systems need to be integrated and interoperable with one another. The interoperability of systems requires the following key preconditions:

- Availability of master facility registry
- Implementation of unique identifiers like national ID and master patient index
- Availability of system interoperability standards

Linking records on the individuals from testing, care and treatment, laboratory services and pharmacy will generate the data set for granular site management across the entire clinical cascade, within and between facilities. More than 700 health facilities are using Electronic Medical Records (EMR ART) kept at ART clinics to capture patient enrolment and follow-up information. The EMR ART records are regularly updated at ART clinics.

As Ethiopia reaches HIV epidemic control, using accurate, de-duplicated and de-identified patient-level information is crucial for monitoring the performance of the clinical cascade and supporting longitudinal case-based surveillance.

### **Granular mapping and availing strategic information for key and priority populations**

Ministry of Health and EPHI will revise the HIV surveillance roadmap and follow the WHO recommendations to match with the current epidemic situation of Ethiopia. Surveys and surveillance activities will focus on key populations and identify any other at-risk groups. Biobehavioural surveys will include size estimations.

### **Build capacity and enhance data quality**

Ministry of Health will develop and implement data quality assessment, monitoring, and feedback strategies, and ensure capacity at various levels to improve the quality and use of data. Data quality assessment practices should be regularly implemented among stakeholders, including sector ministries, and implementing partners. Moreover, different data quality and performance review forums will be employed at all levels.

### **Integrating and digitizing data collection tools**

A standard set of data collection tools will gradually be expanded to be used by all stakeholders for routine monitoring purposes. The system will gradually evolve and transition into an electronic system. Data will increasingly be individualized through the expansion of EMR and DHIS2 to enable more accurate information collection and analysis for use in decision-making and programme improvement.

## **Enhanced data analysis, dissemination, and use**

Ministry of Health and all partners will work to improve data quality, analysis, and use at all levels. Reports will be analyzed and summarized monthly and quarterly. The regular monitoring information system will be complemented by targeted periodic performance reviews, supportive supervision, and mid-term and end-term programme reviews.

### **Human resource capacity and skills**

The Ministry will design a sustainable human resource strategy for M&E and Health Information Technology (HIT) officers in terms of structure/position and future career development. Moreover, continuous capacity-building activities will be employed to strengthen data analysis and information use culture at all levels. Among them,

- 1) Implement the revised human resources structure for M&E, considering donor funding. Request the integration of regional M&E positions into the government staff structure.
- 2) Strengthen collaboration between the Results Measurement and Evaluation (RME) and the epidemiology divisions. Identify synergies and areas for collaboration.
- 3) Implement a continuous and structured mentoring and training programme for M&E staff to enhance skills on data analysis and information utilization.

Data from routine programme performance from monitoring and evaluation findings will be timely disseminated to stakeholders using different channels. Survey and surveillance reports will be disseminated and shared in a timely manner to all stakeholders. Consideration will be given to the development of a data portal where all HIV programme, survey, and surveillance data will be shared with stakeholders and the public.

### **Results framework**

A Results Framework outlining baselines and annual targets, along with standardizing indicators for performance to be collected, is included in this plan. (See Annex 1)

### **Knowledge management**

- 1) Develop a systematic and structured way of analyzing, synthesizing, and sharing knowledge on the status of the HIV/AIDS epidemic in Ethiopia.
- 2) Create guidelines for the utilization of data and information at both national and subnational levels.

### 9.3 Monitoring and evaluation plan

The M&E Plan (Strategic Information) embedded in this NSP outlines indicator definitions, reference sheets and measurement, a description of data collection, analysis, and management processes, as well as the systems strengthening and resources required to monitor, evaluate, and report on the NSP during implementation. The ministries involved will roll out a systematic way of updating the M&E plans in line with programmatic adjustments and emerging data needs during the implementation of the NSP. Among other strategic information functions, the M&E plan will:

- Engage strategic plans for the collection, management, analysis, and use of non-routine information from the joint AIDS/TB programme reviews; evaluations, surveys such as EPHIA and DHS; IBBS and size estimation of FSW, LDD and other key and priority populations; HIV recency testing, community participatory reviews at federal, regional and woreda level, and partner reviews, among others.
- Provide guidance on continuous data quality assurance mechanisms and related supportive supervision and mentoring. The M&E plan will assess progress and performance including how information will be used to improve policies and future implementation.
- Strategically define how M&E systems will be coordinated within each strategic objective, ensure accountability for results at each level, and manage data flow through the HMIS and other database.
- Facilitate processes to identify corrective measures and feedback to communities, facilities, woredas, sectors and funders.
- Plan how monthly, quarterly, semi-annual, annual, and multi-year information products (reports, newsletters, dashboards, and others) will be disseminated. Define their intended purpose and use at community, woreda and national level to improve the performance of the HIV and other health programmes.

## CHAPTER 10 HEALTH SYSTEMS

### Strategic Objective 8: Ensure resilient and sustainable systems for health and for an effective HIV response.

Six building blocks underpin the national health system's efforts to address the HIV epidemic.

#### 10.1 Supply chain system

The supply chain management of HIV commodities has recorded several significant achievements. These include a logistics coordination platform both at national and regional levels; downstream supply chain coordination accomplished through technical working groups and cluster meetings; an increasing number of health facilities reached by EPSS hubs directly, and implementation of an Integrated Pharmaceutical Logistics System. Other achievements include:

- Regular annual forecasting and quarterly supply planning.
- Quantification and procurement are centralized, which helps the efficient use of programme resources.
- Availability of procurement policy and guidelines for pharmaceuticals and implementation of procurement framework agreements.
- Building local capacity to procure large volumes of commodities.
- A functional Health Commodities Management Information System, in addition to the manual records (bin cards).
- Implementation of Pharmaceuticals Management Information (PMIS) at health facilities to generate patient and medicine information. PMIS helps to track and reduce medication errors in health facilities and provides ART regimen data for the national quantification of ARVs.
- Implementation of ARV Drug Use Evaluation (DUE) in health facilities for relatively new ART regimens. DUE assesses and measures medication use practices to verify compliance with national treatment guidelines.
- Implementation of pharmacovigilance activities such as pharmacovigilance guideline and training materials, provision of training, and putting in place multiple safety reporting mechanisms (manual, mobile app, email, etc.). The manual ADE reporting form (yellow form) is printed and available in health facilities.

## Strategic interventions envisaged in this NSP

### A. Improve the availability of HIV pharmaceuticals at service delivery points

- Revitalize the coordination system and strengthen the collaboration and coordination between programme and supply chain stakeholders at all levels.
- Introduce a system to expedite clearance and quality control approval of HIV commodities at ports of entry.
- Put in place a national inventory system for medical equipment in the health system and develop a proper disposal system for obsolete medical equipment.
- Improve data quality for routine supply chain management decision-making and forecast accuracy through data quality assurance and regular monitoring of consumption and service data.
- Develop an incentive mechanism to enhance local pharmaceuticals production capacity.
- Strengthen market shaping activities and optimize the procurement and contract management processes.
- Ensure end-to-end data visibility of HIV pharmaceuticals by expanding the HCMIS and DAGU-2, improve quality of reports through RRF data analysis and feedback, mentorship, and supportive supervision.
- Strengthen capacity building activities including training, supportive supervision, and mentorship.
- Address the need for HIV testing kits for the general population by allocating a budget or introducing an alternate algorithm kit that can be supplied through commercial means.
- Enhance the collaboration and coordination between programme and supply chain personnel at all levels for efficient implementation of new initiatives and overall programme activities.
- Strengthen the implementation of the national pharmaceutical monitoring and evaluation framework.
- Expand access to ARVs by involving community pharmacies in the provision of ART dispensing services. This will require supportive policies and clear guidance on issues like dispensing fees, distribution of ARVs, referral system, LMIS, etc.

### B. Pharmaceuticals Management and Information System

Effective and efficient management of an HIV care and treatment programme requires continuous availability of up-to-date, accurate and reliable patient and product information. This can be achieved through the following key interventions, which are crucial for capturing, maintaining, and reporting data at all levels:

- Expand and reinforce PMIS implementation across health facilities through scaling up of ePMIS, promoting PMIS tool utilization, and enhancing data aggregation and use to ensure informed decision-making on routine patient follow-up.

- Enhance the generation of patient and regimen information and actual dispensed data of ARVs and related medicines.
- Introduce and strengthen data triangulation mechanisms for HIV RTK, viral load/EID, and other supplies utilization at service delivery points.

### C. Improve the rational use of HIV pharmaceuticals

- Establish systematic and regular monitoring of prescribing, dispensing and usage practices by conducting drug use studies, such as drug utilization evaluation.
- Strengthen pharmacovigilance of ARVs to generate the required level of information for the programme. This requires providing adequate financial support, training, supportive supervision, and timely acknowledgement of adverse drug event reports.
- Enhance antiretroviral treatment outcomes and adherence by providing separate rooms for privacy of the counselling service and assigning dedicated pharmacy professionals with the required capacity in all ART sites.

## 10.2 Laboratory system

Laboratory testing plays a crucial role in the detection and follow-up of disease progression in HIV-positive individuals. There has been significant progress in improving the laboratory system, including service level agreements for machine placement and maintenance, availability of integrated specimen transport system and backup laboratory services, establishing national, regional, and subregional external quality assurance (EQA) centres, and setting up the electronic database for VL/EID and the Laboratory Management Information System (LMIS).

Currently there are different multiplex testing technologies used for EID, viral load, TB, HPV, hepatitis, COVID-19 and other molecular tests, including CD4, clinical chemistry and hematology, for ART clients. Depending on the level of the health facility, testing services are provided on-site or through sample referral network in the geographic catchment area and referral laboratory. These improvements are bringing the HIV-related laboratory services towards reaching the third 95 target.

However, challenges still exist in some areas of HIV-related laboratory services, such as regional and population-related variations in viral load testing coverage, EID, EQA programme implementation, quality monitoring, programme coordination, waste disposal, supply chain, human resources, equipment maintenance, and sample referral and result returns.

This NSP 2023/24-2026/27 incorporates the following key strategic interventions to foster HIV related laboratory service provisions and to improve the qualities of laboratory services:

## Strategic interventions

- Rationalize placement of POC multiplex testing technologies for lower volume health facilities to facilitate one-stop shops for EID/VL, TB, HPV, and other HIV-related testing services.
- Strengthen the existing POC and conventional multiplex testing technologies for high- load health facilities through an integrated sample referral system.
- Improve viral load coverage by incorporating sample collection date with patient clinical visits and medication pick-up dates, promoting the concept of U=U, and implementing DBS/PCR viral load for children.
- Use SMS to remind clients of VL appointment dates and notify results directly to clients.
- Strengthen integrated sample referral with the TB programme using the appropriate cold chain, temperature monitoring and proper packaging. Explore alternative sample courier services for hard-to-reach sites, including the potential involvement of public private partnerships. Explore options for centralized EID testing at conventional sites as sample numbers decrease. Expand the electronic requesting and result returning (ETORR) system to improve the TAT of results with regular performance monitoring.
- Ensure uninterrupted laboratory testing services by providing reagents and supplies, optimizing the diagnostic network, and requiring vendors to perform machine maintenance as outlined in their service level agreements.
- Improve the laboratory data capturing, data quality and utilization for decision-making, synchronize POC data to the national data repository, and upgrade the national EID/VL database to accommodate other HIV-related indicators as needed.
- Improve programme coordination and alignment at all levels, including the lab/clinic interface. Incorporate teams from all thematic areas during mentorship, joint supportive supervision, and programme reviews.
- Strengthen ARV drug resistance surveillance as part of a regular programme monitoring, including early warning indicators of HIV drug resistance.
- Incorporate ARV drug resistance testing as part of routine patient monitoring.
- Reinitiate clinical chemistry and hematology services for patients with advanced HIV disease and procure the necessary reagents and supplies.
- Improve the quality of laboratory services by strengthening the national proficiency testing (PT) production. In addition, expand the capacity of EQA centres, improve EQA implementation practice, monitor EQA activities, and initiate lot testing and post-market surveillance.
- Implement proper waste management and disposal practices, including molecular waste, by investing on infrastructure, engaging other sectors through a multisectoral approach, and also exploring outsourcing to the private sector.
- Strengthen the lab infrastructure. Right-size skilled laboratory staff and sample couriers through mentorship, training, programme monitoring, and joint supportive supervision.
- Ensure availability of an alternative HIV test kit algorithm to prevent interruption of testing services, which could potentially happen due to problems with suppliers of the initial algorithm.

## 10.3 Policy, strategy, and guidelines

Ethiopia's apparent success in mitigating the impact of HIV is made possible by political commitment of leadership at the highest-level, and the meaningful contribution of various sectors, development partners, CSOs and CBOs. Such commitments were expressed, among other means, by issuing a National HIV/AIDS Policy, establishing the National AIDS Council to coordinate the response to the epidemic, and setting up governance and coordination mechanisms at national, subnational and community levels.

The national guidelines for HIV care and treatment are predominantly in line with WHO guidelines. The national guidelines encompass a broad range of protocols that include HIV testing services, linkage to treatment and care, the initiation, monitoring and follow-up of patients on ART, management of opportunistic infections affecting PLHIV, and guidance for service delivery.

Ethiopia issued its HIV/AIDS Policy twenty-five years ago, in 1988. Consequently, the HIV/AIDS Policy does not reflect the new programme initiatives adopted to respond to the current HIV and AIDS epidemic. The MOH plans to address these key HIV-related policy gaps through an integrated approach with the revision of the National Health Policy and a new Health Act.

To ensure that this new Health Act identifies and addresses policy barriers to HIV services and that these are reflected within the new legislation, an in-depth HIV policy analysis should be conducted. Issues related to HIV services that may require policy updates include:

- Stigma and discrimination in schools, health-care settings, employment, and workplaces.
- The minimum age of consent for HIV testing and disclosure of status.
- Parental refusal to disclose children's HIV status and initiate treatment.
- Provider protection from possible reprisals from a sex partner or index case while providing partner notification service.
- Index case client protection against intimate partner violence (IPV), particularly for female index cases during disclosure and partner notification
- A regulation on assignment of university entrant youth on ART.

HIV multisectoral responses have been in place since the beginning of the epidemic but lacked robust legal frameworks to support their implementation. Assessing the policy and legal environment and strengthening the policy and legal frameworks is essential for the effective implementation and accountability in the AIDS response in strategic sectors.

Furthermore, there is a need to examine gaps in the enforcement of relevant laws affecting gender, gender-based violence, stigma, discrimination, and human rights violations.

### Selected relevant policies and guidelines

- National HIV/AIDS Policy 1998
- National Policy on Women 1993
- Health Sector Transformation Plan 2021-2025
- Comprehensive HIV Prevention, Testing, Care, and Treatment
- Condom Strategy 2019
- National Condom Programme Implementation Guidelines
- Domestic resource Mobilization Strategy 2020
- Resilience, Health, and Equity Fund

## 10.4 Governance, leadership, coordination, and accountability

The National and Regional AIDS Councils (NAC/RAC), with multisectoral membership, are the highest national and regional bodies overseeing the country's response to HIV/AIDS. These structures have been either nonfunctional or weak in recent years because of leadership complacency. Revitalizing the councils is important to galvanize HIV response efforts, engage communities and ensure accountability at all levels.

The recent integration of FHAPCO into the MOH has consolidated the health sector and multisectoral responses. Some regions have already adopted a similar structure to that of the MOH. However, some regions did not align their HIV coordination structure with MOH. This could create challenges in communication and coordination with MOH. Consequently, aligning regional and national level coordination structures is very important. Strengthening the human resources and building the capacity of these national and regional coordination structures will enable them to respond to the epidemic effectively and efficiently.

There should be a nationally aligned plan, periodic joint review meetings, monitoring and evaluation, led by the MOH, to coordinate the HIV response between health and non-health sector actors. Moreover, the integration of the woreda-based and multisectoral planning and review process must be strengthened to ensure one plan and one monitoring framework.

Attention shall be given to strengthening the National Prevention Advisory Group and other technical working groups to ensure optimizing the quality of programming and coordination among the government, CSOs and development partners at federal, regional, subregional and community level.

The revitalization of partnership forums in line with current program initiatives will ensure coordination and synergy among different intersectoral actors at all levels. It is vital to engage PLHIV associations, KPPs, CSO, and CBOs in the planning, implementation, monitoring and evaluation of the HIV/AIDS response at all levels.

## 10.5 Human resources for health

Without adequate human resources there cannot be an effective HIV response. A coordinated human resource deployment plan is needed to effectively lead and coordinate the HIV response at all levels. This will involve co-opting identified lay cadres such as peer adherence supporters, case managers and MSGs, who play an important role in the linkage of newly identified HIV+ people and supporting their care and treatment. The MOH shall consider competency requirements for these lay cadres with the aim of absorbing them within the health sector structure as resources allow. To oversee the HIV prevention, care and treatment programme, there must be adequate staffing at the MOH and RHBs.

Subregional (zone and woreda level) structures will be strengthened with adequate staffing of the required academic background and experience for the HIV programme response. These personnel shall receive an incentive package similar with other parallel departments within the same office.

The health extension programme has defined HIV as one of the packages for health extension workers. However, health extension workers have been minimally engaged so far in the implementation of community-based HIV prevention, care and treatment services. Therefore, it is essential that the role of health extension workers in HIV response be strengthened through revision of the HIV modules and introducing accountability mechanisms.

Capacity building training will be conducted for programme staff at national, regional, and subregional levels, including familiarization with this HIV/AIDS Strategic Plan, management of HIV/AIDS programmes for general population and key and priority populations, and other key issues.

Training and support will be provided for health-care workers who deliver HIV/AIDS prevention, care and treatment programmes at facility and community levels. Health workers will participate in experience-sharing and benchmarking of best practices.

## 10.6 Multisectoral collaboration

The multisectoral HIV/AIDS response will be strengthened in strategic sectors that can have a significant impact on the HIV epidemic and response. In line with the current nature of the epidemic and with the focus of this NSP on the key drivers of the epidemic, it is essential that key sectors and their regional and subregional counterparts are engaged in the response. The key sectors are selected by the comparative advantages they bring to address HIV prevention interventions across segments of the general population and/or key and priority population groups.

The current lack of ownership and commitment by the leadership, poor planning, and investment of the allocated budget for interventions, lack of enforcing activities and inadequate accountability, monitoring and evaluation lead to the exclusion of populations for whom mainstreaming the HIV response is critical.

Sectors that have mainstreamed HIV must ensure meaningful planning on HIV, allocate a budget for the execution of the HIV plan, have in place a structure, and assign staff to carry out the HIV plan, conduct risk assessment, and monitor and evaluate the implementation of their HIV response.

MOH will identify and support strategic sectors to ensure leadership commitment as well as appropriate structure, staffing and budget for HIV mainstreaming. Mainstreaming in the strategic sectors will contribute to deliver HIV prevention and care to KPPs and affected communities within the mandates of these strategic sectors.

MOH will develop a mainstreaming policy and legal framework to ensure commitment and accountability by the highest leadership of the respective sectors at a level to assign staff, develop annual plans, allocate budgets, and implement HIV prevention and care interventions targeting KPPs and AGYW.

MOH will build capacity of strategic sectors in the planning, implementation and monitoring, evaluation and reporting of their HIV interventions. MOH will support strategic sectors to integrate HIV indicators in the routine information systems of key sectors and to use the existing reporting system.

## 10.7 Private sector engagement

The private sector plays a critical role in the implementation of the National HIV/AIDS Strategic Plan. The private for-profit sector delivers health services in the country, especially in urban areas. Therefore, support and coordination with the private sector at all levels will increase their involvement HIV prevention, care and treatment interventions at both health facility and community levels.

The private health sector has played a crucial role in the delivery of HIV services, but its potential has been underutilized and the HIV services delivered are under-reported. There is a need to assess and map private sector actors and identify challenges to their meaningful participation in the HIV response.

MOH will strengthen the coordination platforms of the private health sector and ensure their engagement in all national and subnational policy and technical coordination platforms. The private health sector will be engaged in the national and sub-national joint planning, monitoring, and reporting system.

Private health facilities will continue to deliver HIV prevention, care and treatment services. The private health facilities, including private pharmacies, will provide HTS to the general population on a free basis. Private health facilities will provide HTS and STIs service to KPPs, PMTCT, ART services, and TB and comorbidity, diagnosis, and treatment through public/ private partnership arrangements.

In Ethiopia most PWID access clean needles and syringe through private pharmacies. For this reason, private pharmacies will be entry points to care for PWIDs. Private pharmacists in hotspot areas will be trained and supported to facilitate entry to care for PWIDs.

Private and parastatal companies in key sectors should actively protect their workforce as well as the KPPs around the project areas. These private sectors include construction, flower farms, textile and other factories, and companies operating in emerging industrial zones. The Privatization and Public Enterprises Supervising Agency will be involved in any policy setting on the implementation of HIV mainstreaming across key private sectors.

All private entities should engage in initiatives to reduce stigma, discrimination, and gender-based violence.

The private sector will also be involved in domestic resource mobilization.

To capture data on the services provided by the private sector, private health facilities and pharmacies shall receive supportive supervision and training in reporting the delivery of HIV services. Additionally, the role of private employers will be captured as part of the measurement of the multisectoral response.

## CHAPTER 11 RESOURCE MOBILIZATION, ALLOCATION AND UTILIZATION

**Objective 9: Mobilize resources and maximize efficiencies in allocation and utilization.**

### 11.1 Context

Ethiopia has had an annual economic growth rate of 10 percent over the past 15 years and growth was projected to remain at around 7-8 percent for the foreseeable future. However, the country recently experienced a number of economic challenges, including the global economic downturn from the COVID-19 pandemic, internal armed conflict, natural disasters (drought and floods), the aftermath of Russia and of Ukraine war on commodity prices, and scarce foreign reserves. Real annual GDP growth fell to 5.3 percent in 2022 from 5.6 percent in 2021 but nonetheless remained above East Africa's average (4.7 percent in 2021 and 4.4 percent in 2022). Inflation rose rapidly to 33.8 percent for 2022 but is projected to decline to 28.1 percent in 2023 and 20.1 percent in 2024, following the peace dividend (African Development Bank Group, 2023). The macroeconomic and fiscal context points to a constrained fiscal space for increased government expenditure on health and HIV for the remaining NSP period.

Notwithstanding this economic context, Ethiopia has established ambitious goals for health spending and domestic resource mobilization as part of its Health Sector Transformation Plan IV 2020/21–2024/25. In recent years, Ethiopia has dramatically increased domestic government expenditure on health, primarily through increased allocations at the regional and local levels and a renewed focus on primary health care. Total health spending during 2016/17 was \$3.1 billion, a 45 percent increase in nominal terms from \$2.5 billion in 2013/14 [46], but still only 3.2 percent of GDP (2017), which is low compared to other East African countries.

A report on achieving sustainable health finance in Ethiopia prepared by the GoE and the Global Fund describes the significant needs of Ethiopia's health sector needs. At current levels of budgetary prioritization, government resources alone will leave a financing gap of as much as \$2.5 billion annually. This is more than half of the resource gap observed during the pre-COVID-19 period [48]. The report recommends increasing the resources allocated to health while emphasizing the “more health for the money” approach. This involves implementing strategies to achieve budget, allocative and technical efficiencies in the health sector.

### 11.2 Investment trends for the HIV programme

More than half (53.6%) of government spending on health goes to infectious and parasitic diseases (up from 46.5% in 2015, World Bank, 2016). According to the 2019/2020 National Health Accounts, HIV accounts for 13.2 percent of total health expenditure, which compares with malaria at 11.6 percent and reproductive health at 12 percent.

Most of the spending on HIV is sourced from external partners (comprising 80-90 percent of HIV funding), primarily PEPFAR and the Global Fund. This funding has been decreasing in recent years, following the international trend of declining donor investments in HIV [47] and the increased commitment of the GoE in domestic financing of health programmes. Funding from external partners declined by more than half from 2011 to 2017 (\$197 million in 2017) but has stabilized from 2017 to 2022 at approximately \$200 million per year.

Expenditure analysis for 2021 shows that approximately 80 percent (\$192 million out of a total of \$236 million) of the national HIV programme expenditure was financed through external partners, demonstrating the increasing proportional contribution domestic funding of the national HIV programme. Out-of-pocket expenditure accounted for 2 percent of total HIV spending in 2016/17. Donor funding primarily supports provision of antiretroviral therapy, which accounted for 60 percent of total PEPFAR and Global Fund financing for HIV in 2016 (PEPFAR, 2018). The Global Fund procures all antiretroviral drugs and nearly all rapid test kits, while PEPFAR is primarily focused on improving quality of clinical care and treatment, procurement of viral load monitoring and early infant diagnostics, community-based care, key populations prevention, targeted VMMC in Gambella, and support for orphans and vulnerable children.

### 11.3 Available funding for the HIV programmes

A resource mapping exercise was undertaken to determine current sources and levels of funding for the HIV response and to project expected funding for the upcoming period of the NSP.

PEPFAR funding for Ethiopia has decreased since 2017, when \$150 million was allocated. PEPFAR’s planned funding for 2023 is \$106 million. It is expected that funding from PEPFAR will stabilize from 2024/25 to 2026/27 at \$100 million per year.

The Global Fund’s average annual budget for Ethiopia was approximately \$81 million per year for the period from 2021 to 2024. A slightly lower allocation of \$80 million per year has been allocated by the Country Coordinating Mechanism for the period from 2025 to 2027, after a deducting an \$18 million contribution to resilient and sustainable systems for health (RSSH).

Other development partners also support the Ethiopia HIV response, including UNAIDS, WHO and UNFPA. These contributions have been aggregated and estimated at approximately \$6 million per year and are expected to remain stable over the NSP period.

Domestic resources for HIV comprise funding from the public sector (health and other sectors) and the private sector. Domestic funding for HIV is based on baseline public expenditure on HIV and a two percent contribution from the government sector offices, in alignment with the government’s co-financing commitment to the Global Fund for the period 2021-2023.

Domestic funding is forecast by the writing team to increase by 5 percent per year from 2024/25 to 2026/27, in line with the government’s commitment to increasing domestic resources for HIV.

The expected available funding for HIV over the extended NSP period is shown in table 6 below. Although fairly constant at an average amount of \$228 million per year, the available funding is significantly below the resources needed to achieve the coverage and impact targets of the HIV NSP.

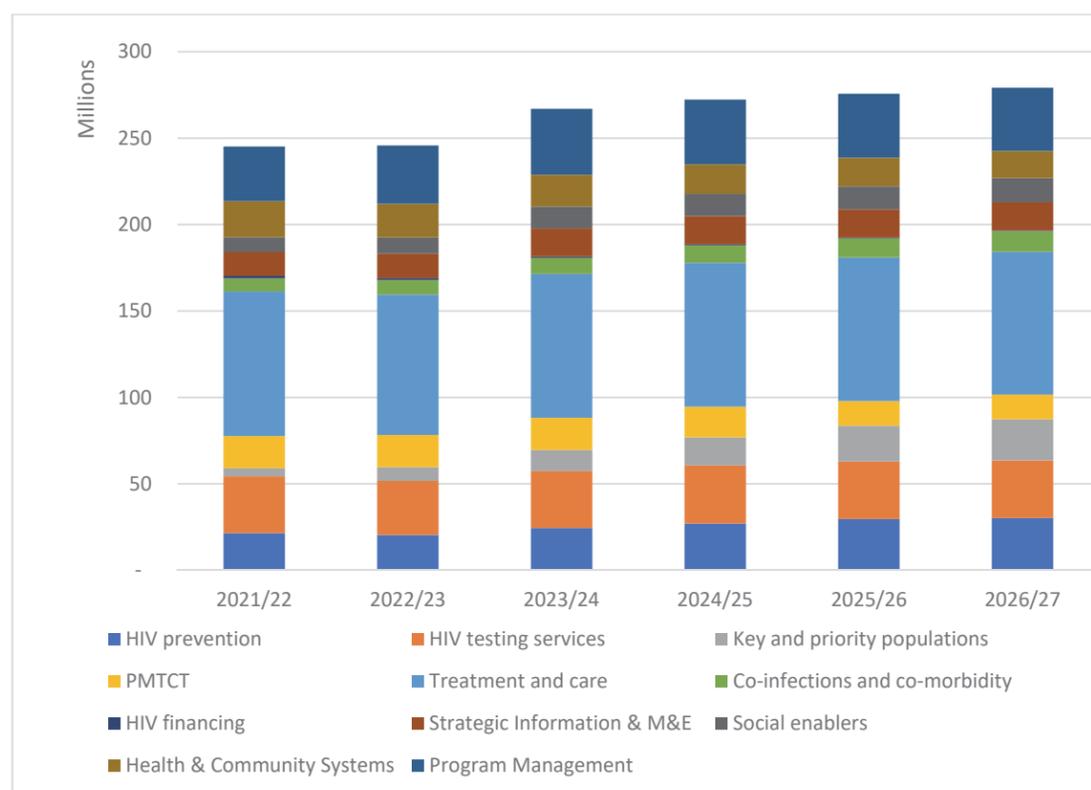
**Table 8: Projected funding (USD, millions) by source, 2021/22-2026/27.**

Source	2021	2022	2023	2024	2025	2026
Domestic sources	34	35	37	39	40	42
PEPFAR	91	98	106	100	100	100
Global Fund	100	83	86	84	80	80
Other external partners	5	5	6	6	6	6
<b>Total</b>	<b>230</b>	<b>222</b>	<b>234</b>	<b>229</b>	<b>226</b>	<b>228</b>

### 11.4 Resource needs to implement the NSP

The NSP 2023/24-2025/27 reflects a prioritized and cost-effective response over the NSP period. The resources required to achieve the NSP goals are calibrated to the latest investment case modelling for Ethiopia that used the Goals Model to guide a cost-effective and allocatively efficient response.

The Resource Needs Model was the primary tool used to estimate the financial costs of implementing the NSP. The costs for each intervention are estimated as the population in need of the service multiplied by the coverage (the percentage using the service) multiplied by the unit costs. Unit costs were calculated from a mix of sources, primarily published studies, MOH and development partner budgets, MOH procurement and expenditure data, and additional ingredients-based costing for some interventions. For some interventions, efficiency savings were factored into the unit cost computations to reflect planned technical efficiency interventions by government (for example, community-led delivery models for key and priority populations and efficiency gains in procurement and distribution of ARVs and condoms). Interventions for most social and programme enablers were estimated as annual fixed costs.



**Figure 9: Annual resource needs for HIV 2021–2026 (USD)**

The annual resource needs for the NSP increase from \$245 million in 2021 to \$279 million in 2026/27 (all years in 2023 prices). This annual increase is largely driven by expanding combination prevention services to key and priority populations, strengthening community and health system components, and maintaining PLHIV on treatment and virally suppressed.

Over the NSP implementation period, prevention interventions will account for 22 percent of financial resource needs, HIV testing for 12 percent, and care and treatment services for 31 percent.

The annual cost of prevention increases significantly over the six-year period (growth exceeding 50 percent) as coverage of combination prevention services for key and priority populations is rapidly expanded. Resource needs for HIV testing are relatively stable over the period as more targeted testing strategies to increase testing yields are implemented.

The resources required for care and treatment as a percentage of total resource needs decreases considerably in this NSP compared to previous NSPs due to the lower drug prices negotiated and the more efficient first-line regimen.

Additional increases in resource needs will be needed to scale up programmes to reduce stigma and address violence against women. The cost of support interventions for OVC decreases by 22 percent as the number of AIDS-related orphans is projected to decline.

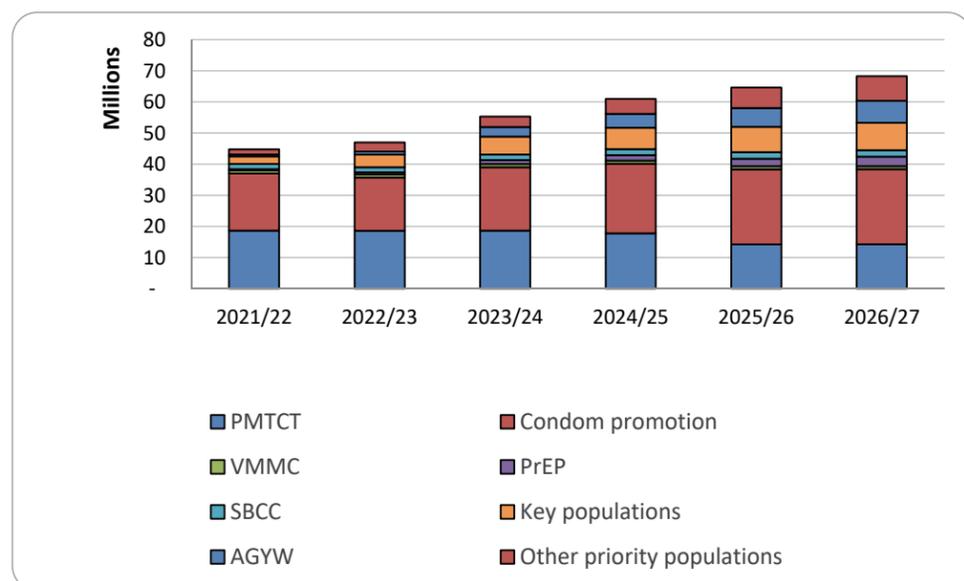
Resource requirements for diagnosis and treatment of coinfections, including hepatitis B and C and TB, as well as cervical cancer screening, increase from \$7 million in year 1 to \$11.8 million in year 6.

The NSP calls for greater investment in the five pillars of prevention, in particular combination prevention programmes for key and priority populations.

Biomedical prevention interventions, including PrEP, VMMC, condoms and PMTCT comprise 72 percent of the total prevention related resource needs. Combination prevention outreach to key population constitutes 11 percent of total prevention resource needs and AGYW and other priority populations accounts for 15 percent of total prevention resource needs.

**Table 9: Prevention interventions resource needs (USD)**

	2021	2023	2026
PMTCT	18,633.155	18,647.031	14,265.782
Condom promotion	18,369.156	20,365.333	24,105.333
VMMC	997,400	997,400	997,400
PrEP	370,513	1,290.152	3,040.571
SBCC	1,723,572	1,778.263	2,067,594
Key populations	2,364,400	5,781.050	8,837.463
AGYW	667.413	3,075.316	7,020.608
Other priority populations	1,635,779	3,381.151	7,946.484
<b>Total</b>	<b>44,761.388</b>	<b>55,315.695</b>	<b>68,281.236</b>



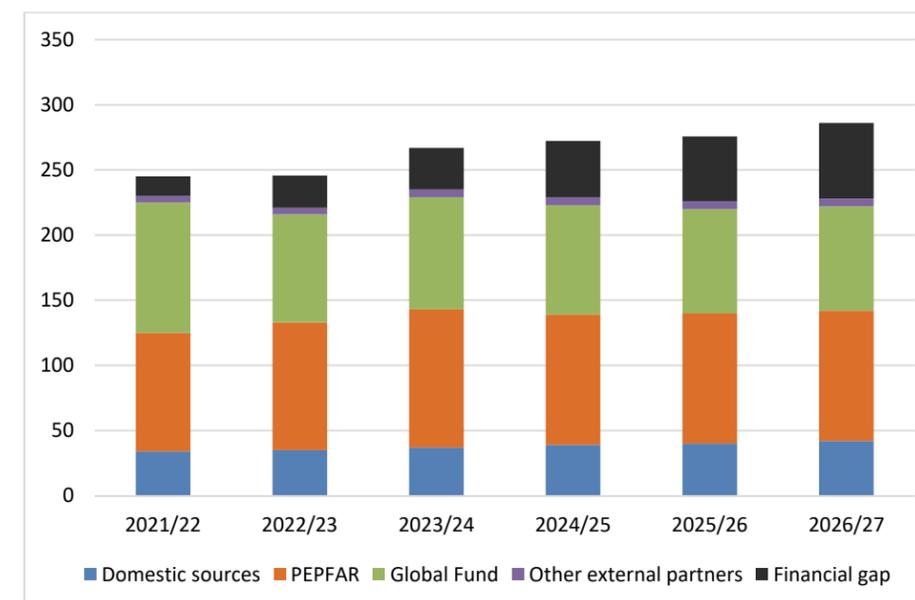
**Figure 10: Prevention resource needs for HIV 2021–2026 (USD)**

### Financial gap

The annual funding gap is calculated by comparing available funding with financial resource needs over the period of the NSP.

As Figure 11 below shows the financial gap rises steeply from \$15 million in year 1 to \$58 million in year 6. The increase reflects the effort to achieve universal coverage of KPPs through provision of services across the five pillars of prevention, and to sustain 95 percent of PLHIV on life-long ART.

However, if domestic resources are mobilized through the activities of the planned MOH Resilience and Equity Health Fund, this funding gap could be reduced. Moreover, a portion of service delivery/programme funding may be available but not fully captured in the HIV funding forecast because some resources for HIV are not readily identifiable in public primary health care or in central health-care worker budgets.



**Figure 11: Resource needs, available funding and gap (USD millions)**

### 11.5 Sustainable financing of the response

The financial gap analysis shows that the sustainability of the HIV programme hinges on the GoE’s ability to successfully achieve, and ideally exceed, its domestic resource mobilization targets. Concurrently, the development partners must continue to invest sufficiently and in a well-coordinated manner with GoE.

Meeting the challenge of fully funding the NSP within a severely constrained fiscal space will require a combination of approaches, namely:

1. Mobilize additional domestic funding for the HIV programmes from the planned MOH Resilience and Equity Health Fund (RHEF) through the following funding streams:
  - Funds collected from the sin (excise) taxes.
  - Resources mobilized from corporate social responsibility
  - Mainstreaming resources from sector ministries
2. Improve allocative and technical efficiencies in the HIV programme and the health system.
3. Support capacity building efforts for implementing agents to overcome the obstacles to full absorption of funds during budget execution.

These strategic approaches are further elaborated below.

### **Mobilize and prioritize the allocation of funding for the HIV programmes from the RHEF**

The RHEF will serve as a mechanism to mobilize additional resources for equitable health service provision and crucially compensate for diminishing external funds. The RHEF will operate as a trust fund, which is additional to the regular budget allocated to health. The funds will be used to enhance equity, provide exempted services including a package of care for HIV, and as a contingency for health emergencies. Resources will be mobilized from governmental sectors, private institutions, philanthropists, diaspora communities and other sources, as follows:

#### **1.1 Funds collected from the sin (excise) taxes**

If government commits to earmark a certain percentage of taxes collected from products and services that are harmful to both health and the environment, it will significantly contribute to fill the existing gap in fully financing exempted services, while promoting equity and building a resilient health system.

#### **1.2 Resources mobilized from corporate social responsibility**

Corporate social responsibility (CSR) can contribute to the RHEF through the establishment of a CSR levy. This levy will be added to all existing taxes and applied to pre- or after-tax income. The exact tax liability for each company or enterprise will be calculated by the Ministry of Revenue (MOR) or its regional offices based on each company's annual financial statement. The CSR levy will be collected by the MOR and transferred to RHEF.

#### **1.3 Mainstreaming resources from sector ministries**

For several years, the government of Ethiopia has been collecting 0.2 percent of the payroll of public sector employees for the AIDS Fund, amounting to some \$1 million per year generated from national, regional and woreda governments. The MOH and other stakeholders plan to enroll private sector employees into this effort and integrate the funds generated into the RHEF. It is estimated that the total value of resources mobilized through the AIDS Fund will be \$36 million from 2020 to 2025. Of this amount, \$21 million (59%) will come from the public sector and \$15 million (41%) from the private sector.

The plan is to enroll at least 40 percent of private sector employees by 2025. The annual revenue collection potential is estimated at around \$5.1 million from the private sector and \$7.4 million from the public sector starting in 2025.

### **Improve allocative and technical efficiencies in service delivery**

Allocative and technical efficiency are two dimensions of the VfM adopted by the NSP.

**Allocative efficiency** refers to allocating investments by intervention, geographic area, and population to maximize the cost-effectiveness and impact of the HIV programme.

The core programmes of HIV testing, treatment, VMMC, condoms and prevention services for key populations have shown the capacity to prevent substantial numbers of new infections and AID-related deaths when an appropriate enabling environment is in place. Modelling of the impact of implementing the NSP, as part of the Ethiopia Investment Case for HIV NSP 2021-2025 conducted in 2020, demonstrated that it could avert 31,000 new infections during the period, at a cost per infection averted (undiscounted) of approximately \$11,000. The modelling is unlikely to have changed significantly.

Testing and treatment are the most cost-effective interventions since their combined implementation will result in cost savings over the period from 2023/24 to 2026/27.

While treatment programmes are needed wherever there are PLHIV, prevention programmes will be more cost-effective in the high incidence woredas (defined as an incidence  $\geq 0.03\%$ ). These 300 woredas account for about one-third of all new infections. These woredas constitute a geographic core where prevention interventions should be scaled up first to attain maximum cost-effectiveness.

Using surveillance to strategically target high-value, high-impact interventions to woredas and priority populations where impact will be greatest will increase the allocative efficiency of the response.

**Technical efficiency** refers to the optimization of the delivery of each service to provide quality outputs at the lowest possible cost. Improving the efficiency of the delivery of HIV services will result in improved outcomes and, in some settings, financial savings that can be re-invested into NSP programmes.

Strategies that will be prioritized to achieve greater technical efficiencies and thereby improve the return on investments include more targeted testing, expanding differentiated ART, and establishing additional adherence clubs in facilities and communities. Table 11 below summarizes current efforts and opportunities for further technical efficiency gains in the national HIV programme.

- Support capacity building efforts of implementing agents to address barriers to full absorption of funds during budget execution.
- Strengthen partnerships: Collaborate with local NGOs, community-based organizations, and other stakeholders to leverage additional resources, including financial contributions, technical expertise, and in-kind support.
- Programme efficiency and optimization: Conduct a thorough review of programme implementation processes and identify areas where efficiency gains can be made.

- This may involve streamlining administrative procedures, reducing duplication of efforts, optimizing supply chain management, and implementing cost-saving measures without compromising the quality of services.
- Enhanced monitoring and evaluation: Strengthen monitoring and evaluation systems to improve data collection, analysis, and reporting. Accurate and timely data can help programme implementers demonstrate the impact of their interventions, justify resource needs, and identify areas for improvement. These efforts, in turn, can facilitate increased budget utilization.
- Programme innovation: Encourage innovation in programme design and implementation to maximize the impact of available resources. Explore new approaches, technologies, and interventions that can enhance programme efficiency, cost-effectiveness, and reach a broader population in need of HIV and AIDS services.

**Table 10: Initiatives to realize technical efficiency savings**

Population/ Service Area	Economy/ Technical efficiency intervention	Explanation
Scale up services for key populations	Flexible and efficient CSO-led models of delivery in communities	Fixed Drop-In Centres for KPs may be inefficient in areas that have lower demand. CSOs are better placed for demand creation, and linkage to care and adherence support, leading to increased productivity of resources and intervention outcomes. Moving towards universal access for key and priority populations would generate efficiencies through scale.
Scale up services for key and priority populations	Integration of HIV prevention into community activities	Integration of HIV prevention into Community Care Coalition activities, as well as into activities of community associations and religious structures.
	Strengthen public sector mainstreaming of HIV through civil society support	Ensure non-health sector interventions for HIV by other public agencies are optimized and more targeted through facilitation from experienced civil society partners
	Community-based adherence	PLHIV associations and networks to increase treatment literacy and support to increase the cost-effectiveness of ART
	Community-led monitoring	Community-led monitoring should reduce stock-outs, stigma, and discrimination, and increase targeted investments to improve effectiveness and impact of HIV programmes
PMTCT	Integrating PMTCT with MNCH services as well as PMTCT+ with ART.	Continue integration of PMTCT with other clinical HIV and MNCH services Universal HIV testing of pregnant mothers ensures a human rights approach to HIV prevention and care (In 2018, only 43% of facilities had 1 or more HIV+PW. Of those facilities, 65% had <10 cases).

Population/ Service Area	Economy/ Technical efficiency intervention	Explanation
PrEP	Scale up intervention in eligible groups	Efficiencies are expected through scale and integration with other clinical prevention services. Increase programme efficiency by enrolling those with substantial risk and using peer service providers for recruitment, screening, and adherence support.
VMMC	Integration	Transition from vertical programmes to integration into primary health-care services.
HTS	Index case testing Risk assessment screening tool	Scale up index case testing and partner notification strategy. Increase HIV yield through PITC with the rigorous use of a risk screening tool for all ages.
ART	Scale up the switch to most cost-effective first-line regimen (TLD)	Efficiency savings already achieved from unit cost reductions in drugs and commodities through higher volumes and better demand predictability provided by MOH to suppliers.
ART	Differentiated service delivery: Multi-month scripting Community pick-up points Appointment spacing model	Early experiences in Ethiopia and regional studies show a potential for reducing programme costs and out-of-pocket expenditure and improving quality of care [48].
Health system	Integration of services	Integration of TPT into HIV clinical care package. HIV testing integrated with TB/STIs/VMMC. Several studies show increased cost effectiveness and cost savings from integrating HTS, ANC, PMTCT, FP, HIV care, etc. although mostly at a pilot level or modelled [49].
Health system	Procurement and supply chain management	Continue the process to integrate pharmaceutical and logistics management, including RDT kits and condoms. Refine quantification assumptions and increase forecast accuracy. Expand long-term framework contracts for HIV commodities and medicines to prevent supply chain disruptions, reduce emergency procurement and minimize stock expiry
Health system	HRH optimization and productivity at PHC facility level	Levels of efficiency vary significantly across districts; a study showed that up to 50% may be inefficient [50]. For instance, absenteeism in the health sector in Ethiopia is around 10%, although lower than in other sub-Saharan African countries [51].
Health system	Improve budget efficiency	Strengthen co-ordination and joint planning with development partners to ensure optimal allocation and utilization of resources. Strengthen PFM to ensure that allocated funds are expended on the intended budget area. Routinize monitoring of VfM across interventions, at system level, and in management actions for bottlenecks and inefficiencies identified.

## 11.6 Coordinating strategic investments with external partners

The GoE is committed to increasing the domestic share of funding for HIV over the NSP period based on available fiscal space. Nevertheless, development partners should continue to play a pivotal role in investing in strategic areas of the HIV response to support Ethiopia in attaining and maintaining epidemic control. The Global Fund and PEPFAR are expected to continue playing an important, albeit diminishing, role in financing medicines, health commodities and laboratory reagents, while consistently supporting the expansion of prevention programmes for KPPs. The partners together with the Ministry of Health should ensure that there are no disruptions to HIV programmes due to economic shocks or sudden reprioritization decisions.

The MOH will play a central role in coordinating planning and investments between GoE and its partners to ensure that funding is efficiently allocated and spent.

The MOH will ensure that the appropriate structure and staffing are in place and tasked to mobilize and utilize both domestic and external resources. Through the structures of the RHEF there will be several tools to achieve sustainable financing of the HIV response, including robust monitoring and reporting systems, capable governance structures, and indicators to measure VfM across the dimensions of economy, efficiency, effectiveness, equity, and sustainability.

### Investing in financial systems and capacity

#### 1. Strengthen government capacity for financial management and sustainability management

The MOH, in coordination with other key partners, will strengthen capacity at all levels of government and across sectors to implement the RHEF and to monitor the sustainability of the response. High-level coordination, including with broader health financing efforts and donors, will be critical to ensure success of the strategy.

Advocacy and capacity building interventions to implement the RHEF will be conducted across various levels. Follow-up and feedback mechanisms will be standardized and implemented. The interface of the MOH/REHF resource mobilization structures with similar structures of health and Ministry of Finance and Economic Development at the regional and subregional level will be designed for more efficient implementation of the strategy.

#### 2. Promote transparency and accountability in financial management and improve resource tracking and monitoring.

In addition to NHA and NASA studies on health and HIV expenditure, the MOH will develop a standardized tool for routine tracking of HIV allocations and expenditures.

It will also develop an online dashboard and database for HIV financing and programmatic data and reporting, with analytic and data visualization capabilities.

Implementation of the domestic resource mobilization and sustainable financing strategies will be overseen by MOH and its partners. They will be guided by a supportive legal framework and an implementation roadmap that defines a set of activities and responsible parties to implement each initiative.

The initiatives to be pursued under this sustainability agenda will mark a critical step in achieving self-sufficiency and long-term sustainability for addressing the HIV epidemic in Ethiopia.

**Table 11: Public resource mobilization targets from the planned REHF (US\$ millions) [46]**

Finance source category	2022/23	2023/24	2024/25	2025/26	Total	Remarks
	AIDS Fund(s)	4.6	6.6	9.2	12.6	33.00
Targeted mainstreaming	5.6	6.3	7	7.9	26.80	Mainstreaming budget from sectors
Earmarked tax for CSR	16.8	18.5	20.4	22.5	78.2	Earmarked tax from selected for profit institutions with more than 100 ETB million revenue generation capacity per year
Earmarked sin tax from alcohol and tobacco <sup>1</sup>	310.33	372.40	446.88	536.26	1,665.87	Sin tax projection with 5-10% additional from alcohol and tobacco
<b>Total</b>	<b>337.33</b>	<b>403.8</b>	<b>483.48</b>	<b>579.26</b>	<b>1,803.87</b>	

<sup>1</sup> A medium scenario (20% annual increase in excise tax revenues) was used to estimate resources to be generated from excise taxes (See Annex tables for more details).

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**ANNEXES**  
**Annex 1: Ethiopia HIV NSP 2023/4 - 2026/27 Results framework**

ANNEX	Indicators	Disaggregation	Baseline	Data Source	Target	Target	Target	Target	Target
Level			2022		2023/24	2024/25	2025/26	2026/27	
Impact	Number of new HIV infections	(Further disaggregation by woreda - see incidence mapping)	8,300	Spectrum Estimates	7,300	6,500	5,600	4,800	
		Females 15+ Years	0.01%	Spectrum Estimates	0.008	0.007	0.006	0.005	
		Males 15+ Years	4,100	Spectrum Estimates	3,700	3,400	3,000	2,700	
		Children 0-14 Years	2,200	Spectrum Estimates	1,900	1,700	1,500	1,300	
		Number of new infections by region (all ages)	2,000	Spectrum Estimates	1700	1,400	1,100	800	
		Addis Ababa	489	Spectrum Estimates	325	300	250	200	
		Afar	325	Spectrum Estimates	325	275	250	200	
		Amhara	1,806	Spectrum Estimates	1,300	1,200	1,050	1,000	
		Benishangul Gumuz	128	Spectrum Estimates	70	65	60	50	
		Dire Dawa	244	Spectrum Estimates	325	300	250	200	
		Gambela	313	Spectrum Estimates	325	300	250	200	
		Harari	52	Spectrum Estimates	70	65	60	50	
		Oromia	2,235	Spectrum Estimates	1,350	1,200	1,100	1,050	
		Sidama	1,166	Spectrum Estimates	700	650	600	550	
SNNP	673	Spectrum Estimates	325	300	250	200			
Somali	250	Spectrum Estimates	160	145	130	100			
Tigray	576	Spectrum Estimates	325	300	250	200			

Percentage of people living with HIV (prevalence)	Disaggregated by age, gender, location and KPs (FSW, PWID)	0.91 (Adults 15+)	Spectrum Estimates	0.87	0.84	0.81	0.78
	Number of PLHIV	610,350	Spectrum Estimates	603,537	596,844	589,845	583,278
TB/HIV mortality rate per 100,000 population	FSW	18.7%	IBBS 2020, EPHI	18%	17%	16%	15%
	All	22	WHO Global TB Report 2018	19	16	15	11
Number of AIDS-related deaths	All	11,000	Spectrum Estimates	10,500	10,000	9,300	8,500
	Male	4,400	Spectrum Estimates	4,300	4,200	3,900	3,500
	Female	5,100	Spectrum Estimates	4,800	4,500	4,200	4,000
	Children (0-14)	1,500	Spectrum Estimates	1,400	1,300	1,200	1,000
Incidence Mortality Ratio (IMR)	All	0.75	Spectrum Estimates	0.70	0.65	0.60	0.56
% of people living with HIV in the reporting period with suppressed viral loads (≤1000 copies/mL)	Adults (15-64)	84%	Spectrum Estimates for 2022	84%	84%	86%	86%
	Children 0-14	36%	Spectrum Estimates for 2022	45%	55%	70%	86%
Percentage of people living with HIV and on ART who are virologically suppressed	All	98%	Spectrum Estimates for 2022	98%	98%	98%	98%
	Adolescents 15-24	93%	MOH Annual Report 2014 DHIS2	92%	93%	94%	95%
Percent MTCT past 12 months	Children 0-14	90%	Spectrum Estimates 2022; MOH Annual Report; EFY 2014 DHIS2	90%	93%	95%	95%
	All	12%	Spectrum Estimates	10%	8%	6%	5%

Strategic Objective 1: Reach 95% of Key and Priority Populations with targeted combination HIV prevention interventions by 2027

<b>SBCC Result: Comprehensive knowledge about HIV and AIDS reaches at least 70% by 2027</b>							
Outcome	% of women and men aged 15-49 who both correctly identify ways to prevent sexual transmission of HIV and who reject major misconceptions about HIV transmission	Adults (15-49): Male	DHS 2016	45%	50%	55%	60%
		Adults (15-49): Female	DHS 2016	25%	30%	40%	50%
Coverage	% ages 15-24 reached with HIV prevention programmes during the last 12 months (e.g. school/out-of-school SBCC including peer or life skills education)	Young people (15-24): Male	DHS 2016	45%	50%	55%	60%
		Young people (15-24): Female	DHS 2016	25%	30%	40%	50%
Coverage	Number of aged 15-24 reached with HIV prevention programmes during the last 12 months (e.g. school and out of school SBCC including peer or life skills education)	Males	DHS 2016	0.75%	0.65%	0.50%	0.50%
		Females	DHS 2016	7%	6%	5%	4%
Coverage	Number of aged 15-24 reached with HIV prevention programmes during the last 12 months (e.g. school and out of school SBCC including peer or life skills education)	Sex	Calculated based on MOH 2014 EFY Annual Report in absolute numbers	40%	50%	60%	70%
			MOH2014 EFY Annual Report	9 M	11.5 M	14 M	16.5 M

### Voluntary Medical Male Circumcision (VMMC)

Result: 90% of Men 15-29 in High HIV incidence settings (Gambella) are circumcised by 2027									
Outcome	% of males aged 15-49 circumcised at Gambella, and selected woredas of Southwest and South Ethiopia regions	Young men 15 - 29	72%	DHS 2016	83%	85%	90%	90%	90%
	Number of medically circumcised Men 10+ years	Adult men 15-49 (- 21% medically, rest traditionally)	72%	DHS 2016	80%	85%	90%	90%	90%
Coverage	Number and % of circumcised males experiencing adverse events	10+ Years	26,737	MOH 2014 EFY Annual Report	14,300	15,000	16,000	18,000	18,000
		Male infants circumcised medically	0.36%	PEPFAR Programme data	0.20%	0.15%	0.10%	0.10%	0.10%
<b>Condoms - Utilization and distribution</b>									
<b>Result: Condom use at last sex with non-regular sexual partner among general population reached at 50% % by 2025</b>									
Outcome	% of people who used condoms during their last high-risk sex act the last 12 months [3]	Adults (15-49): Females	20%	DHS 2016	35%	45%	50%	50%	50%
	Number of male and female condoms distributed annually	Adults (15-49): Males	51%	Population Survey	60%	65%	70%	70%	70%
Coverage		Male condoms	80.6 M	MOH 2014 EFY Annual Report	250 M	279.7 M	318M	362.7 M	362.7 M
		Female condoms	DNA		2M	2M	2M	2M	2M
<b>Pre-exposure Prophylaxis (PrEP)</b>									
<b>Percent of eligible people on PrEP by 2027</b>									

Coverage	% of eligible people who initiated oral PrEP during the reporting period	All	1%						15%
	Coverage	% and number of eligible people who received oral PrEP at least once during the last 12 months	Discordant couples (% of eligible partners of PLHIV who have not attained viral suppression N=10,350 in 2022 N=10,228 in 2027)	19%	Calculated from MOH 2014 EFY Annual Report	30%	45%	60%	75%
Discordant couples (number)			2014	DHIS2	3,250	5,000	6,900	8,800	
High-risk Pregnant And Breastfeeding Women (PBFW)			0%	Programme data	1%	2%	3%	5%	
High-risk PBFW number			0		810	1,620	2,430	4,050	
HIV-negative PWID: estimated at 9,400 in 2022/8,000 in 2027, 5% will be on PrEP			0%	No baseline (no PWID PrEP programme)	1%	2%	3%	5%	
PWID on PrEP Number			0	Programme data	90	173	250	400	
Coverage	FSWs (% of all HIV negative FSWs target HIV - Ve =182,040 in 2022 & 201,720 in 2027)	FSWs (number)	11%	Programme data (no recent size estimate)	12%	13%	14%	15%	
			19,670	MOH Annual Report 2014EFY	22,435	24,944	27,552	30,258	
<b>Key and priority populations results</b>									
<b>Result 1: Comprehensive knowledge about HIV and AIDS reached 50% by 2027 for key and priority populations</b>									
<b>Result 2: Condom use among key and priority populations engaged in risky sexual behaviour reached 90% by 2027</b>									
<b>Result 3: 95% for key and priority populations will be reached with defined package of prevention services by 2027</b>									

Outcome	% KPP members reached with a defined packages of HIV prevention services	FSW (Denominators: 228,000 in 2023 and 246,000 in 2027)	70.0%	IBBS 2020	75%	80%	90%	95%
					171,000	187,200	216,000	233,700
		Prisoners *(Prison Administration)	58%	Prison survey 2015	70%	80%	90%	95%
					60550	69200	77850	82175
		PWID [Denominators are 10,000 in 2023, 8,850 in 2027, 0.13% of adults in Spectrum population projection]	N/A	IBBS 2015	20%	40%	60%	70%
					2,000	3,850	5,500	,6200
		Long-distance drivers [Denominators: 77000 in 2020; 89,000 in 2027]	55%	IBBS 2013	60%	75%	90%	95%
					46,200	60,750	76,500	84,550
		Widowed and divorced men and women [Denominators: 1,046,000 in 2023 and 1,14180.0 by 2027]	24%	DHS 2016	40%	60%	80%	95%
		Workers in hotspot areas [Estimated at 840,000 in 2020 and 1,088,000 in 2027]	20%	DHS 2016	40%	60%	80%	95%

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Outcome					384,800	601,200	840,000	1,033,600
		High-risk adolescent girls and young women [Denominators: 358,550 in 2023 and 371,500 by 2027]	24%	DHS 2016	40%	60%	80%	95%
					143,417	218,967	297,036	353,000
		FSW condom use at last sex with paying and non-paying clients	Paying 95.3% Non-paying 26.4%	IBBS 2020	99%	99%	99%	99%
		LDD condom use at last sex with non-regular partner	84%	IBBS 2013	90%	93%	95%	95%
		Widowed and divorced men and women: condom use at last sex (15-49)	31%	DHS 2016	40%	50%	60%	70%
		Workers at hotspot areas: condom use at last sex with non-regular partner (15-49 men and women)	41%	DHS 2016	45%	50%	60%	70%
		High-risk adolescents and young women condom use at last sex with non-regular partner	22%	DHS 2016	40%	50%	60%	70%
		% of PWID who received at least two more harm reduction prevention	DNA		20%	30%	840%	60%
		% PWID receiving Opioid Substitution Therapy (OST)	DNA		0%	10%	20%	30%

	Number of PWID receiving OST					0	960	1840	2660
Coverage	% of KPP reached with SBCC or peer education sessions (cumulative)	KPP	NA		MRIS	40%	60%	80%	95%
Coverage	Percent of people 15-49 years with STIs treated	Adults 15-49	17%		Programme Report 2022 (MOH 2014 EFY)	30%	45%	60%	75%
	Percent of FSWs with STIs treated	Female sex workers	64%	303,994	Programme Report 2022 (MOH 2014 EFY)	304,000	560,350	861,500	1,177,400
		Number			IBBS 2020	75%	80%	90%	95%
		Number	22,733		IBBS	27,360	29,952	34,560	37,392
<i>Strategic Objective 2: Attain triple elimination of mother-to-child transmission of HIV, syphilis, and hepatitis B virus by 2027.</i>									
<b>Result 1: Mother-to-child transmission of HIV during pregnancy, childbirth and breastfeeding reduced to less than 5% by 2027.</b>									
<b>Result 2: Percentage of PBFW living with HIV who are on ART increased from 85% to 95% by 2027.</b>									
<b>Result 3: At least 98% of PBFW living with HIV are virally suppressed at labor and delivery by 2027.</b>									
<b>Result 4: Percentage of infants born to women living with HIV receiving a virological test for HIV within 2 months (and 12 months) of birth increased from 62% to 95% by 2027</b>									

Coverage	Percentage of infants born to women living with HIV receiving a virological test for HIV within 12 months of birth	All	62% (9,746)		MOH 2014 EFY Report	70%	80%	90%	95%
Coverage	Percentage of infants born to women living with HIV receiving a virological test for HIV within 2 months of birth	All	44.04%		MOH 2014 EFY Report	50%	55%	65%	75%
Coverage	Percentage of HIV-positive pregnant women who received antiretroviral therapy to reduce the risk of mother-to-child transmission	All	89%		MOH 2014 EFY Report	90%	92%	94%	95%
Coverage	% of expectant mothers living with HIV who are virally suppressed at labour, delivery and postpartum	All	98%		Spectrum estimate for adult women	98%	98%	98%	98%
Coverage	Percentage of pregnant women who know their HIV status	All	90%		MOH 2014 EFY Report	92%	94%	95%	95%
Coverage	Percentage of women accessing antenatal care services who were tested for syphilis	All	71.4%		MOH 2014 EFY Report	80%	85%	90%	95%

Coverage	Percentage of women accessing antenatal care services who were tested for HBV	All	59.0%	Program Data (DHIS2)	76%	81%	87%	90%
Coverage	% of HIV+ women aged 15-49 years who have their need for family planning satisfied with modern methods	All modern methods	41%	Ethiopian Mini-DHS 2019	50%	60%	70%	80%
Coverage	% of HEI receiving enhanced postnatal (dual) prophylaxis	All	47%	MOH 2014 EFY Report	60%	70%	80%	90%
<i>Strategic Objective 3: Enhance HIV case finding to attain 95% of PLHIV knowing their HIV status and linked to care by 2027</i>								
<b>DIFFERENTIATED HTS</b>								
<b>HTS Result: HIV testing and counselling services scaled up and at least 95% people who know their HIV status by 2027</b>								
<b>Result 3: 95% for key populations will know their HIV status by 2027</b>								

Coverage	Number of women and men who received an HIV test in the last 12 months and who know their results	Number	6,703,717	MoH 2015 EFY Report	7.36 M	7.46 M	7.57 M	7.04 M
Coverage	% of women and men aged 15-59 years living with HIV who know their HIV status	Adults (15-59)	87%	Spectrum Estimates 2023	88%	90%	92%	95%
Coverage	Percentage and number of key populations who received an HIV test in the last 12 months and who know the results	Young People (15 – 24):	85%	Spectrum Estimates 2023	88%	90%	92%	95%
		FSW	70%	IBRS 2020	75%	80%	90%	95%
		Prisoners	58%	Prisons report 2015	140 220	153 504	177 120	191 634
		PWID	N/A		70%	80%	90%	95%
		Long-distance drivers	55%		57 500	65 750	73 950	78 066
		Widowed, divorced men and women	24%		20%	40%	60%	70%
		Workers in hotspot areas	20%		1 880	3 610	5 189	5 834
		High-risk adolescents and young women	18%		70%	80%	90%	95%
					51 205	61 560	72 675	80 323
					40%	50%	60%	70%
			372 376	478 820	595 373	711 339		
			40%	60%	80%	95%		
			373 256	589 176	823 200	1 012 928		
			40%	60%	80%	95%		
			139 115	212 400	288 125	342 410		
	% of HIV-positive results among the total HIV tests performed in the reporting period	Gender, community testing (mobile testing, community VCT), facility testing (ANC and FP clinics, TB clinics, VCT centres, other)	0.50%	MOH 2014 EFY Annual Report	0.8%	1.2%	1.6%	2%
<i>Strategic Objective 4. Attain 95% treatment coverage among PLHIV who know their status and 95% of those on ART to achieve viral suppression across all population groups and geographic areas.</i>								

Result 1: At least 95% of Adult and Children living with HIV who know their status receiving antiretroviral treatment by 2025

		87-98-98	88-98-98	90-98-98	95-98-98	95-98-98		
Outcome	95-95-95	All	87-98-98	88-98-98	90-98-98	95-98-98		
	% of all people living with HIV who know their HIV status, % of all people with diagnosed HIV infection who received antiretroviral therapy (ART) and % of all people receiving ART who have viral suppression	Adults (15-64): Female Adults (15-64): Male Children <15 Children 0-4 years Children 5-10 years Children 11-14	89-98-97 85-98-98 40- 87-90 26% 46% 58%	Spectrum Estimates of all PLHV 2022	90-99-99 94-95-95 70-95-95 80-95-95 85-95-95 90-95-95	95-99-99 95-95-95 80-95-95 80-95-95 85-95-95 95-95-95		
	Percentage all of adults and children living with HIV infection receiving ART at the end of the reporting period (To be disaggregated by region) 95-90-86	(15-49, >15 & region)	84%	Spectrum Estimates 2022	90%	93%	95%	
	Outcome	Number on treatment	Numbers on ART (all ages)	461,194	527,371	532,335	543,601	
			Adults (15+)	448,278	509,968	514,768	525,662	
			26% for children 0-4		86%	87%	90%	95%
			Numbers, 1-4		1,880	1,183	986	2,528
46% for those aged 5-10 years				75%	85%	95%	95%	

Outcome	Percentage PLHIV on ART who are virologically suppressed	Numbers, 0-14	12,916	17,403	17,567	17,939	18,315
		58% for those 11-14		59%	67%	76%	86%
Outcome	Number	Gender, age	96.2%	98%	98%	98%	98%
		% of all PLHIV who are virologically suppressed		501,002	505,718	516,421	520,478
		% VL tests	81.1%	85%	90%	90%	90%
Outcome	Number VL tests	Gender, age (Including not VL tested)	80.0%	85%	90%	90%	90%
			366,915	488,600	528,872	539,623	449,013
Tuberculosis and Hepatitis							
TB deaths of people living with HIV reduced by 75% by 2027							
Outcome	% of HIV-positive new and relapse TB patients on ARV therapy during TB treatment	Adults (15+): Male and Female	59% (WHO,2021)	80%	90%	95%	100%
		All people	>95%	100%	100%	100%	100%

Coverage	% of estimated HIV-positive incident TB cases that received treatment for both TB and HIV	All	97%	TB Programme	98%	99%	99%	100%
Coverage	% of people on ART (newly mjim enrolled & already on ART) in HIV care started on TB Preventive Therapy	Adults (15+): male and female; children under 15	87%	(DHIS2)	90%	95%	95%	95%
Coverage	% of PLHIV on ART who completed any course of TB preventive treatment among those who initiated TPT	All	65%	Programme Reports; DHIS2/SMART CARE	85%	90%	95%	100%
Coverage	% People on ART who were screened for hepatitis B or/and C during the reporting period	Sex Age (<15 and 15+ years)	<1%	Programme Reports; DHIS2	20%	40%	65%	85%
Coverage	% people on ART tested positive for hepatitis B surface antigen (HBV) or/and hepatitis C surface antigen (HCV) infection	Sex Age (<15 and 15+ years)	<5%	Programme Reports; DHIS3	20%	40%	65%	85%
Coverage	Proportion of people co-infected with HIV and hepatitis C virus (HCV) starting HCV treatment	Sex Age (<15 and 15+ years) People who inject drugs	<5%	Programme Reports; DHIS2	20%	40%	65%	70%
<i>Strategic Objective 5: Stigma and discrimination and gender-based violence will be reduced from 25% and 20% to &lt;10% by 2027.</i>								

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<b>Reduce Stigma and discrimination &lt;10% and GBV &lt;10% by 2027</b>								
Outcome	% of PLHIV and KPP who reported at least one form of stigma and discrimination in the	Disaggregated for FSW, PWID and AGYM	32%	Stigma Index 2021	25%	20%	15%	<10%
Outcome	Proportion of women aged 15-49 who reported experiencing physical or sexual violence from a	Adult females (15-49)	19.8%	Gender link GBV Indicator - UN 2019	18%	15%	12%	10%
Outcome	Ethiopia Gender Inequality index (value)		0.52	Human Development Report 2021/22		0.3985		0.289 [5]
Coverage	% of PLHIV who report experiencing stigma and discrimination in the general	Disaggregated for FSW, PWID and AGYM	24%	Stigma Index survey 2020	20%	15%	10%	<10%
Coverage	% of PLHIV who report experiencing stigma and discrimination in a health facility in the last 12	Disaggregated for FSW, PWID and AGYM	42%	Stigma Index survey 2020	30%	20%	15%	<10%
Coverage	% of women and girls who experienced physical or sexual violence from an intimate partner.	Adult females (15-49)	33%	DHS 2016	20%	15%	10%	<10%
<b>75 % of PLHIV and orphans and vulnerable children (OVC), at risk of and affected by HIV and in need, benefit from HIV-sensitive social protection by 2027</b>								
Outcome	% orphans and vulnerable children 0-17 years in	Target is AIDS-related orphans supported. Denominator is total AIDS-related orphans	DNA (100%)	MOH 2014 EFY Report	90%	90%	90%	90%

	need who received basic external support (300,000)		317,079		270	270	270	270	270
Coverage	% PLHIV on nutrition support who are malnourished / undernourished	Nutrition status (severely) malnourished children and adults - at risk of morbidity or mortality; medically defined as "wasted". Targets are PLHIV on ART	26%	Alebel et al. FMOH/ UNICEF. BMC (2020)	25%	30%	35%	35%	35%
			123954		35,702	42,843	49,983	57,124	
Coverage	High-risk AGYW benefited from economic and other empowerment programmes in preceding 12 months	High-risk AGYW	10%	MOH 2014 EFY report	15%	20%	25%	25%	25%
			39,915.00		53,781	54,742	74,259	74,316	

*Strategic Objective 6: By 2027, a significant proportion of HIV testing, of social enablers and of HIV prevention services will be delivered by CSO/CBOs/FBO/PLHIV associations.*

Coverage	Percentage of HIV testing, social enablers and prevention services delivered by CSO/CBOs	DNA	DNA	(DHIS2)/ CHIS/ CLM Report/ PEPFAR	10-15-20%	15-20-25	20-25-30%	20-30-40%
Coverage	Percentage of community care coalitions that integrated a package of prevention interventions in their service	DNA	DNA	(DHIS2)/ CHIS/ CLM Report/ PEPFAR	65%	80%	90%	95%
Coverage	Number of CSOs/CBOs engaged in community led monitoring in high burden woredas	Woreda (At least 1 per highest incidence Woreda)	DNA	(DHIS2)/ CHIS/ CLM Report/ PEPFAR	150	200	265	265

*Strategic Objective 7: Enhance generation and utilization of Strategic Information for an accelerated evidence-based response*

Coverage	Completeness of facility reporting: Percentage of expected facility monthly reports (for the reporting period) that are actually received	All	88%	DHIS2	85%	90%	90%	90%	80%
Coverage	Percentage of health facilities timely submitting reports within DHIS2	All	63%	(DHIS2)	70%	75%	80%	90%	90%
Coverage	Percentage of planned surveys and surveillances conducted, and reports released on time (within 3 months of finalization)	All	<80%	Programme report (HAPCO/EPHI)	80%	90%	95%	100%	100%
Coverage	Percentage of Woredas that produce periodic analytical report(s) as per nationally agreed plan and reporting format during the reporting period	High burden, medium burden, low burden	DNA	Programme Reports; DHIS2	85%	90%	90%	95%	95%
Coverage	Percentage of facilities which record and submit data using the electronic information system	All	89%	DHIS2	95%	98%	98%	95%	95%

*Strategic Objective 9: Mobilize resources and maximize efficiencies in allocation and utilization*

Coverage	% of HIV Programme (NSP) budget funded by domestic sources	All	11%	NASA / NHA; Annual National Budget	13%	14%	15%	16%
Coverage	Proportion of population with large household expenditure (over 20%) on health as a share of total household expenditure or income (catastrophic spending on health)	All	>20%	NHA / NASA	<15%	12%	10%	<10%
Outcome	% in- country utilization of disbursed funds (i.e. in-country disbursement utilization)	Disaggregated by source of funding and implementer type (public or community)	70%	NHA/Programme Expenditure Report	90%	90%	95%	95%
Coverage	Proportion of community health workers who are trained on predefined package on HIV prevention and treatment	All	50% of 70000 (HEW, CHW)	MOH Health Extension Programme	70%	90%	90%	90%
Coverage	% of health facilities with tracer medicines for the three diseases available on the day of the visit or day of reporting	Main ARV regimens, AL, TB, and Azithromycin, COVID-19 test kits	100%	global health supply chain monitoring report. health facility, hospital	100%	100%	100%	100%
		HIV test kits	100%		100%	100%	100%	
		Viral load reagents	96%		100%	100%	100%	

## Annex 2: The investment case analysis

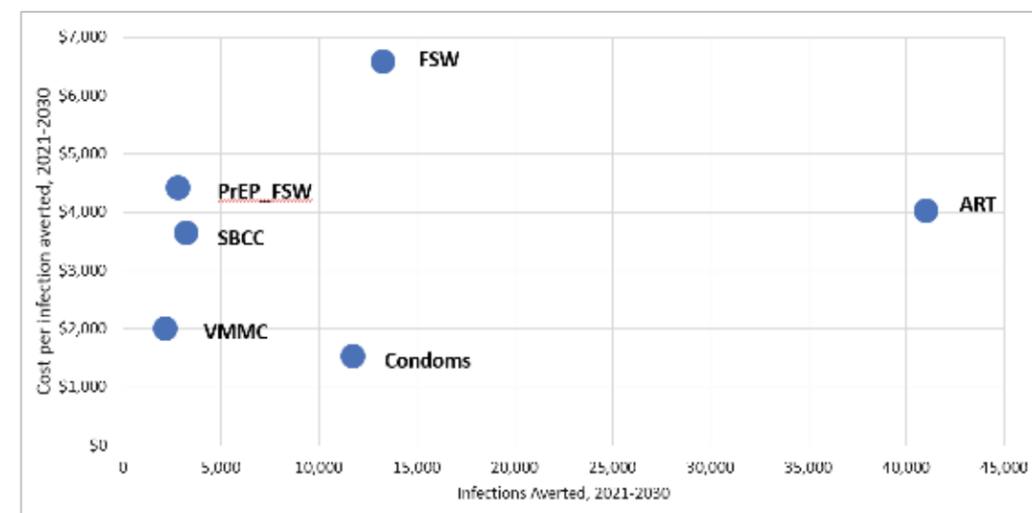
The NSP was informed by the Investment Case modelling produced by Spectrum Goals (Aviner, Ethiopia output, 2020) to prioritize the most cost-effective interventions while investing in critical social and programme enablers, including rights-based programming, **to achieve its objectives.**

**Table A: Selection of priority interventions and year 5 coverage targets in the NSP**

Intervention	Coverage: 2025
Key and priority populations targeted combination prevention	90%
High-risk AGYW targeted combination prevention	90%
Condom programming	254 million
VMMC	95%
PMTCT	95%
Differentiated testing	7.56 million
Treatment and care (PLHIV)	90%

The choices of investment strategies in this NSP are built upon evidence-based options using the GOALS modelling in Spectrum to estimate the cost, impact and cost-effectiveness of alternative HIV interventions (Fig A).

Interventions that demonstrated evidence to be most cost-effective, using the Goals model and other available evidence, were prioritized for scale up. These interventions included combination prevention interventions targeting female sex workers, PrEP, condoms, VMMC, SBCC and differentiated ART.

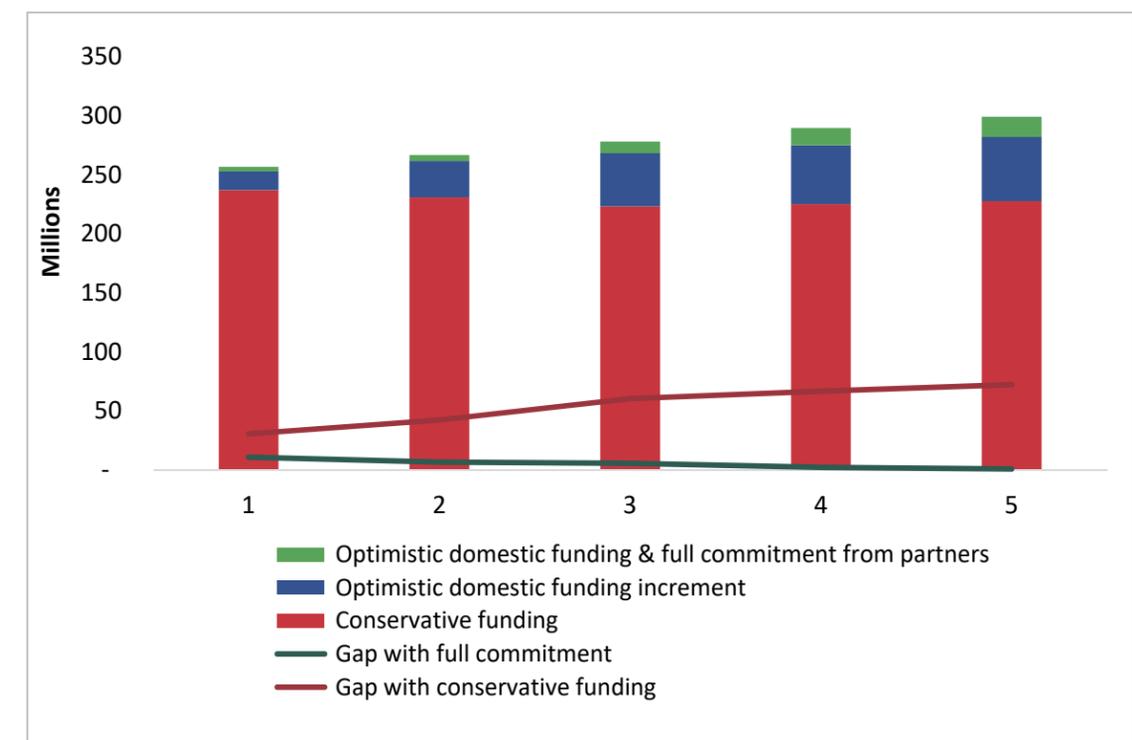


**Figure A: Cost per infection averted by intervention**

Moving forward, choices will need to be made on the optimum basket of interventions to achieve maximum public health impact within the available funding envelope. Results are based on the following funding scenarios, which were developed by building on a full costing of the NSP and an assessment of the funding landscape (Table B). The scenarios are shown graphically in Figure B.

**Table B: Funding scenarios**

Conservative funding	<ul style="list-style-type: none"> <li>Domestic finance constrained by COVID-19 but increases from 2% per annum (p.a.) to 5% growth p.a. by 2025.</li> <li>PEPFAR fund - 10% decline pa until 2025 and then remain constant.</li> <li>GF and all other partners fund will remain constant.</li> </ul>
Optimistic domestic funding	<ul style="list-style-type: none"> <li>Domestic finance constrained by COVID-19 but increases to 5% growth by 2025.</li> <li>PEPFAR fund - 5% decline p.a. until 2025 and then remain constant.</li> <li>GF and all other partners funds will remain constant.</li> </ul>
Optimistic domestic funding and full partner commitment	<ul style="list-style-type: none"> <li>Domestic finance constrained by COVID-19 but increases to 5% growth p.a. by 2025.</li> <li>PEPFAR, GF and other development partners constant at 2021 levels</li> </ul>

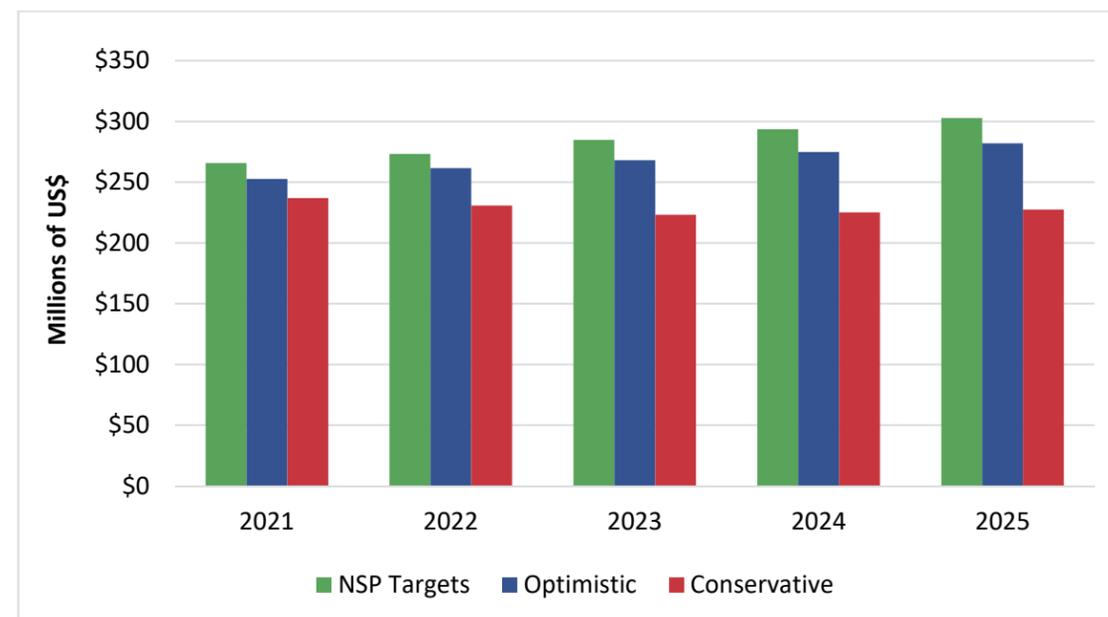


**Figure B: Resource needs, funding, and gap by scenario (USD)**

Interestingly, the funding gap is reduced by 72 percent with the additional funding from the optimistic domestic funding scenario and the NSP is almost fully affordable with optimistic domestic funding and continued donor support at 2020 levels. If the latter scenario is achieved, 9,842 HIV infections may be averted according to Goals modelling.

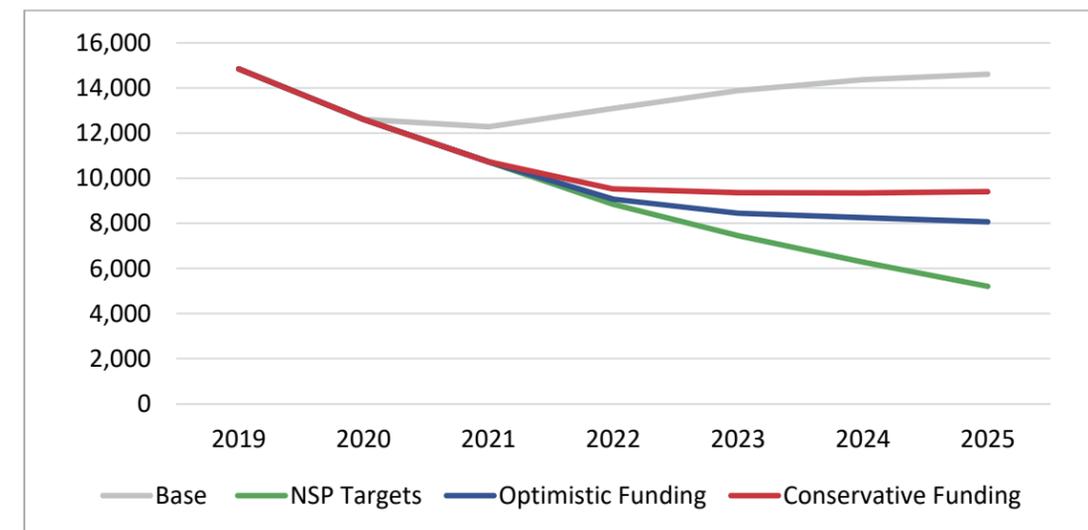
**Table C: NSP Funding required by scenario, 2021-2025 (in USD millions)**

	2021	2022	2023	2024	2025
Optimistic and full commitment	\$253	\$273	\$285	\$294	\$303
Optimistic	\$253	\$262	\$268	\$275	\$282
Conservative	\$237	\$231	\$223	\$225	\$228

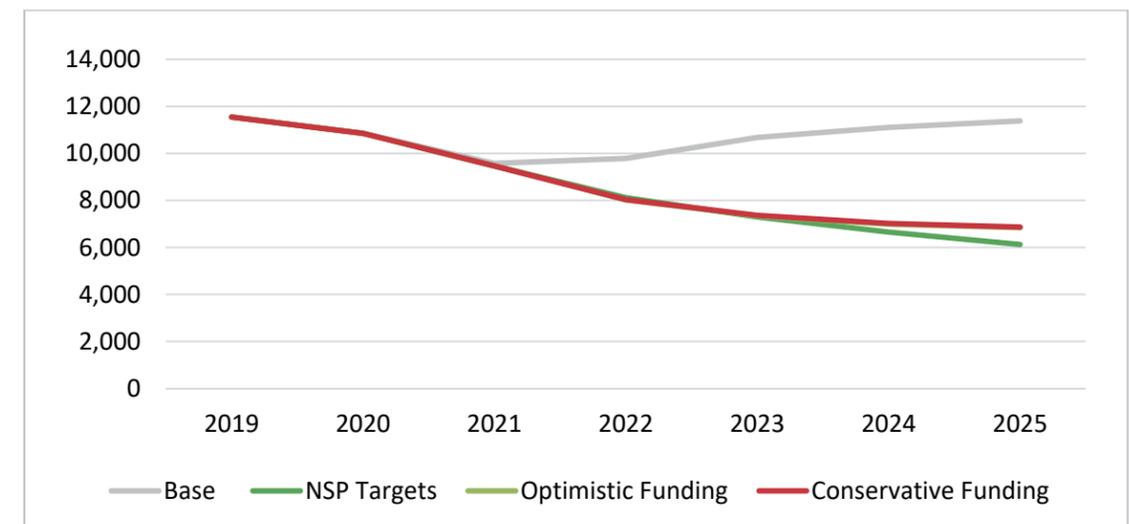


**Figure C: Funding available and required**

With Ethiopia so close to reaching epidemic control, sustained funding and the targeted focus outlined in this NSP will bring definitive results, as shown in Figures D and E below.



**Figure D: New infections based on funding scenarios**



**Figure E: The impact of funding scenarios on AIDS-related deaths**

This modelling exercise provides the foundation for optimizing interventions to achieve better results within constrained funding, contingent upon performance review and funding availability.

If the NSP programme has to be optimized further to align with reduced funding, the modelling suggests that in the Optimistic Funding scenario funding for VMMC, PMTCT and youth could be maintained with small reductions in treatment, testing and, condoms and SBCC, combined with a larger reduction in PrEP. In the Conservative Funding scenario, optimization suggests large decreases in funding for youth, KPPs, condoms, PrEP and SBCC and minor reductions in treatment and testing. U this scenario, there are slightly more people on ART because there are more new infections and people in need of treatment (Fig F).

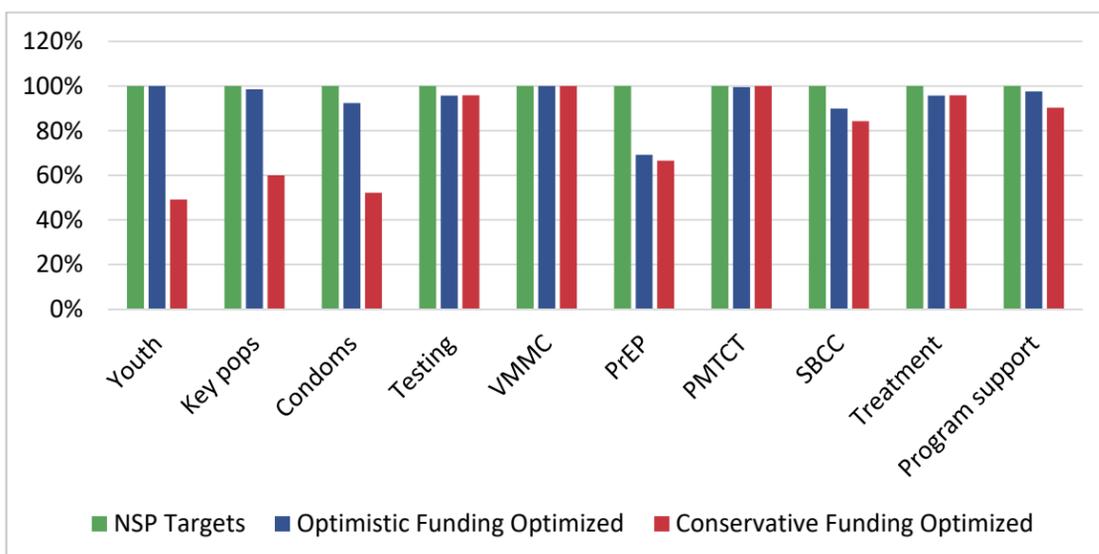


Figure F: Ratio of funding 2021-2025 by funding scenario

<sup>1</sup>HIV Draft Domestic Resource Mobilization and Sustainability Strategy 2020-2025 MOH, FHAPCO 2020

### Annex 3: Financial resource needs estimates for the Ethiopia NSP for HIV/AIDS 2021-2026

Intervention	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27
PMTCT	18,633,155	18,597,504	18,647,031	17,768,813	14,235,111	14,265,782
VMMC	997,400	997,400	997,400	997,400	997,400	997,400
Condom promotion (general pop. + KPPs)	18,369,156	17,086,333	20,365,333	22,373,333	24,105,333	24,105,333
Condoms and condom promotion	17,437,930	16,118,000	19,102,000	21,040,000	22,742,000	22,742,000
Female condoms	800,000	800,000	800,000			
Condom lubricant	131,226	168,333	463,333	533,333	563,333	563,333
SBCC (general population)	1,723,572	1,604,051	1,778,263	1,900,476	2,107,888	2,067,594
Mass media and BCC	1,040,628	915,752	999,002	1,082,253	1,248,753	1,165,503
HIV prevention: schools, universities, and priority populations with special needs	682,944	688,299	779,261	818,224	859,135	902,092
STI diagnosis and treatment	3,248,335	3,905,498	4,598,976	5,245,783	5,947,618	6,685,217
Testing Services	32,900,162	31,284,751	32,896,939	33,631,278	33,255,263	33,344,183
Testing: PITC (less ANC HTC)	4,437,515	4,467,161	4,524,976	4,279,271	3,154,471	3,209,467
Testing: Community level testing	19,105,234	20,018,917	22,316,350	22,958,340	23,814,096	23,916,634
Testing: RDT kits	8,291,074	5,039,051	4,970,005	4,903,816	4,369,481	4,407,950
Testing: Self-test kits	1,066,339	1,759,622	1,085,608	1,489,851	1,917,215	1,810,133
ART Treatment and care	83,643,257	81,165,748	83,196,072	83,217,783	83,075,134	82,657,544
Adult ART: first line ARVs	23,095,740	22,913,273	23,411,323	23,309,004	23,272,054	23,272,054
Adult ART: second line ARVs	7,758,829	7,686,714	7,878,616	7,869,052	7,869,052	7,869,052
Adult ART: third line ARVs	1,090,293	842,562	863,597	862,549	862,549	862,549
Adult ART: service delivery	30,426,780	31,200,000	31,978,920	31,940,100	31,940,100	31,940,100
Adult ART: laboratory testing	15,213,390	12,376,000	12,684,972	12,669,573	12,669,573	12,669,573
Pediatric ART: ARVs	3,253,879	3,316,489	3,378,959	3,468,995	3,379,098	3,125,752
Pediatric ART: service delivery	1,550,406	1,580,238	1,610,004	1,652,904	1,610,070	1,489,356
Pediatric ART: laboratory testing	610,766	569,843	580,577	596,047	580,601	537,071
Psychological treatment and support service	643,174	680,628	809,104	849,560	892,037	892,037

Opportunistic infections and comorbidities	4,287,013	4,504,983	4,792,526	4,971,642	5,104,864	5,116,745
TB Preventative Therapy	789,339	789,340	789,341	789,342	789,343	789,344
Cervical cancer screening and diagnosis	3,423,013	3,510,000	3,597,629	3,593,261	3,593,261	3,593,261
Hepatitis C - diagnosis and treatment	\$11,638	\$46,371	\$188,064	\$199,945	\$211,826	\$223,707
Hepatitis B - diagnosis and treatment	\$63,023	\$159,272	\$217,492	\$389,094	\$510,433	\$510,433
PrEP	370,513	712,143	1,290,152	1,790,893	2,435,467	3,040,571
PrEP - Sex workers	278,167	597,812	1,000,144	1,297,845	1,752,760	2,097,291
PrEP - PWID	-	-	18,397	50,174	58,537	83,624
PrEP - Discordant couples	92,346	114,331	217,423	334,496	461,605	588,713
PrEP - Pregnant and breast-	-	-	54,188	108,377	162,565	270,942
Key and priority populations	4,667,592	8,011,692	12,237,516	16,174,647	20,762,034	30,825,163
FSW services	1,744,225	2,987,793	4,602,816	5,038,872	5,814,084	6,290,515
PWID services	146,559	564,524	542,812	1,042,199	1,498,161	1,684,590
Prisoners	473,615	556,884	635,422	816,971	816,971	862,358
Long-distance truck drivers	143,804	306,666	442,907	582,393	733,384	810,557
Widowed/divorced	586,378	852,540	1,144,569	1,766,094	2,439,991	2,967,306
Mobile and resident workers	629,435	1,326,279	1,052,653	1,644,634	2,297,892	2,827,501
Discordant couples	276,163	463,880	741,022	846,882	1,143,145	1,341,119
Programmes for AGYW	667,413	953,126	3,075,316	4,436,602	6,018,407	7,020,608
SRH and family planning	123,690	175,906	518,095	791,017	1,073,043	1,275,213
Parenting/caregiver programmes	59,919	85,214	250,980	383,192	519,813	617,750
Educational subsidy	128,398	182,602	537,815	821,125	1,113,885	1,323,751
Economic empowerment	93,816	134,467	508,386	517,463	701,957	702,494
Peer-led prevention outreach	239,677	343,529	1,154,487	1,762,648	2,391,094	2,841,597
Community norms change	21,913	31,408	105,553	161,157	218,614	259,803
Social enablers (reduce stigma, discrimination and GBV)	2,881,640	3,049,447	3,653,489	3,836,163	4,027,971	4,108,531
Nutritional support	-	-	2,757,965	2,915,288	3,078,578	3,724,619
OVC	5,797,820	6,391,304	6,209,879	6,209,879	6,209,879	6,209,879
DRM and sustainable financing	1,388,340	1,103,755	676,877	463,439	463,439	463,439
Strategic information, research, and M&E	13,819,903	14,129,832	16,339,453	16,339,453	16,339,453	16,339,453
Programme enablers	20,805,737	19,457,167	18,373,934	17,010,512	16,546,631	15,641,804
Programme management	31,596,146	33,735,661	38,129,671	37,505,427	37,020,187	36,555,327
TOTAL	245,129,741	245,737,269	266,941,479	272,352,210	275,712,251	286,148,586

Notes for the Resource Needs Estimates of the Ethiopia NSP for HIV 2020-2026

Intervention	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27
HIV prevention	21,460,641	20,399,927	24,431,148	27,062,103	29,646,088	30,210,899
HIV testing services	32,900,162	31,284,751	32,896,939	33,631,278	33,255,263	33,344,183
Key and priority populations	4,667,592	8,011,692	12,237,516	16,174,647	20,762,034	30,825,163
PMTCT	18,633,155	18,597,504	18,647,031	17,768,813	14,235,111	14,265,782
Treatment and care	83,643,257	81,165,748	83,196,072	83,217,783	83,075,134	82,657,544
Coinfections and co-morbidity	7,535,348	8,410,481	9,391,502	10,217,425	11,052,482	11,801,962
HIV financing	1,388,340	1,103,755	676,877	463,439	463,439	463,439
Strategic Information and M&E	13,819,903	14,129,832	16,339,453	16,339,453	16,339,453	16,339,453
Social enablers	8,679,460	9,440,751	12,621,334	12,961,331	13,316,429	14,043,029
Health and Community Systems	20,805,737	19,457,167	18,373,934	17,010,512	16,546,631	15,641,804
Programme Management	31,596,146	33,735,661	38,129,671	37,505,427	37,020,187	36,555,327
	245,129,741	245,737,269	266,941,479	272,352,210	275,712,251	286,148,586
Prevention Interventions	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27
PMTCT	18,633,155	18,597,504	18,647,031	17,768,813	14,235,111	14,265,782
Condom promotion	18,369,156	17,086,333	20,365,333	22,373,333	24,105,333	24,105,333
VMMC	997,400	997,400	997,400	997,400	997,400	997,400
PrEP	370,513	712,143	1,290,152	1,790,893	2,435,467	3,040,571
SBCC	1,723,572	1,604,051	1,778,263	1,900,476	2,107,888	2,067,594
Key populations	2,364,400	4,109,201	5,781,050	6,898,042	8,129,215	8,837,463
AGYW	667,413	953,126	3,075,316	4,436,602	6,018,407	7,020,608
Other priority populations	1,635,779	2,949,365	3,381,151	4,840,004	6,614,412	7,946,484
	44,761,388	47,009,123	55,315,695	61,005,563	64,643,233	68,281,236

#### Annex 4: Illustrative list of 300 high priority woredas

The list below is based on the 2020 Naomi woreda incidence. A total of 300 high priority woredas (265 high incidence and 35 additional conflict woredas) used for the 2023/24-2026/27 NSP.

Region/City Administration	Number of High-Incidence Woreda	Selected 35 Conflict affected Woredas	Number of Zones containing woredas	Remark
Addis Ababa	48		10	All sub-cities of AA contain high incidence woredas
Afar	13	4	5	All zones in the region
Amhara	72	12	14	Zones and towns
Benishangul Gumuz	8		4	All three zones and Assosa town
Dire Dawa	6		N/A	The Naomi model considers Dire Dawa as one woreda. Thus, based on HTS yield during 2012 EFY, the highest 6 woredas were selected
Gambella	11		5	All 3 zones, Gambella town and Itang special zone
Harari	4		N/A	The Naomi model considers Harari as one woreda. Thus, based on HTS yield during 2012 EFY, the highest 4 woredas were selected
Oromia	54	10	28	From 18 zones, 9 towns and one special zone
Sidama	4		N/A	Two of them are considered from regional HB suggestion based on HTS yield
Central Ethiopia	5		N/A	Five woredas are prioritized and selected as high incidence based on regional HTS yield data
Southwest Ethiopia	4		N/A	
South Ethiopia	8		N/A	
Somali	5		4	Three zones and Jigjiga town
Tigray	23	9	7	Six zones and one special zone
Total	265	35		

