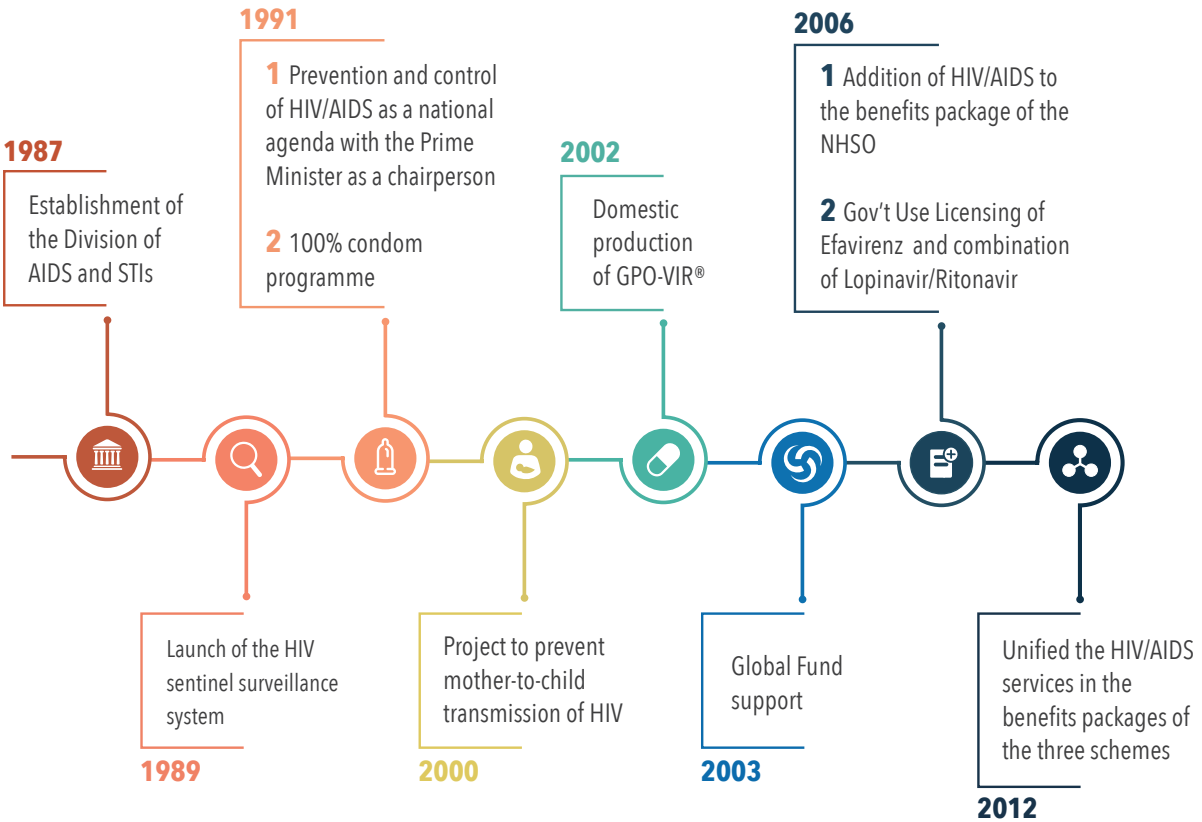
MANAGEMENT OF THE HIV/AIDS FUND

OF THE NATIONAL HEALTH SECURITY OFFICE

NHSO
National Health Security Office

THAILAND HAS RESPONDED ACTIVELY TO THE HIV/AIDS CHALLENGE SINCE THE BEGINNING

The first case of HIV/AIDS in Thailand was reported in 1984. Projections of the HIV epidemic in Thailand suggest that incidence peaked in 1992 with an estimated 115,000 HIV transmissions. The Thai public health system took action since the first case report and has evolved overtime as the situation changed.


1987
Establishment of the Division of AIDS and STIs
1989
Launch of the HIV sentinel surveillance system
1991
1 Prevention and control of HIV/AIDS as a national agenda with the Prime Minister as a chairperson
2 100% condom programme
2000
Project to prevent mother-to-child transmission of HIV
2002
Domestic production of GPO-VIR®
2003
Global Fund support
2006
1 Addition of HIV/AIDS to the benefits package of the NHSO
2 Gov't Use Licensing of Efavirenz and combination of Lopinavir/Ritonavir
2012
Unified the HIV/AIDS services in the benefits packages of the three schemes

GLOBAL FUND (GF) FUNDING SUPPORT

THAILAND RECEIVED FUNDING FROM THE GF IN THE FIRST TWO ROUNDS OF GRANTS.

1

FIRST ROUND

The first round of funding (2004-2008) earmarked extra funds for prevention among MSM and for ART. "Rolling Continuation Channel (1- RCC)" (2009-2014): emphasizes on outreach services and decentralization of control over HIV prevention resources.

2

SECOND ROUND

The Prevention of HIV/AIDS among Migrant Worker in Thailand (PHAMIT-1), which extended prevention services to the millions of migrant workers living and working in Thailand from Myanmar, Cambodia, and Lao PDR.

INCLUDING ARVS IN THE BENEFITS PACKAGE OF UCS IN 2006

1

In 2002, the Thai Government Pharmaceutical Organization (GPO) produced a generic fixed-dose combination of Stavudine, Lamivudine and Nevirapine, namely GPO-VIR®. The fact that users need only take one pill a day greatly improved the chances of treatment compliance and reduced the monthly cost of treating HIV infection from 10,000-20,000 baht to only 1,200 baht per month. The Thai government included ARVs into the UCS benefit package in 2006.

2

To help PLHIV access the drugs and remain compliant, hospitals formed patient support groups, which operated through Comprehensive and Continuous Care Centers (CCC) attached to government hospitals around the country.

3

In 2006/2007, Dr. Mongkol Na Songkhla (Minister of Public Health at the time) announced a measure to allow Government Use Licensing (GUL) for Efavirenz and the combination formulation of Lopinavir/Ritonavir. The effect of the GUL action was to reduce the cost of Efavirenz from 1,300 baht per month by half. The number of PLHIV who were taking Efavirenz increased to 17,959, resulting in 2,694 Quality-Adjusted Life-Years (QALYs) gained. During the same period, 3,421 PLHIV were able to access Lopinavir/Ritonavir.

INTEGRATION OF THE HIV/AIDS FUND

Three public health insurance schemes cover nearly all Thai citizens who need or want insurance. These are the Civil Servants Medical Benefits Scheme, the Social Security System, and the UCS scheme of the NHSO. In 2012, Thailand unified the HIV/AIDS services in the benefits packages of the three schemes to ensure that all PLHIV received the same standard quality treatment. Standardizing these three systems is especially important for HIV case management since treatment is lifelong, and PLHIV are likely to switch among the three schemes. There needs to be a seamless transition across schemes, providers, and localities to ensure uninterrupted treatment compliance. The NAP information system collects data on services and beneficiaries in all three government insurance schemes to monitor this alignment.

BUDGET TO PREVENT AND ALLEVIATE THE HIV/AIDS SITUATION INCREASED OVERTIME

The HIV/AIDS prevention and alleviation budget increased steadily from 5 million baht in 1988 to a peak of two billion baht in 1996. This enormous investment of the domestic budget for HIV prevention and alleviation was concrete evidence of the government's commitment to HIV/AIDS prevention and alleviation. Then, in 2003, the Global Fund (GF) joined the effort by providing grants to Thailand for the HIV prevention effort.

Over 85% of the national AIDS expenditure is from domestic budget sources. The international funding for HIV programs in Thailand, like the Global Fund, is also trending downward, especially as Thailand can cover most costs by itself and is transitioning out of middle-income-country status.

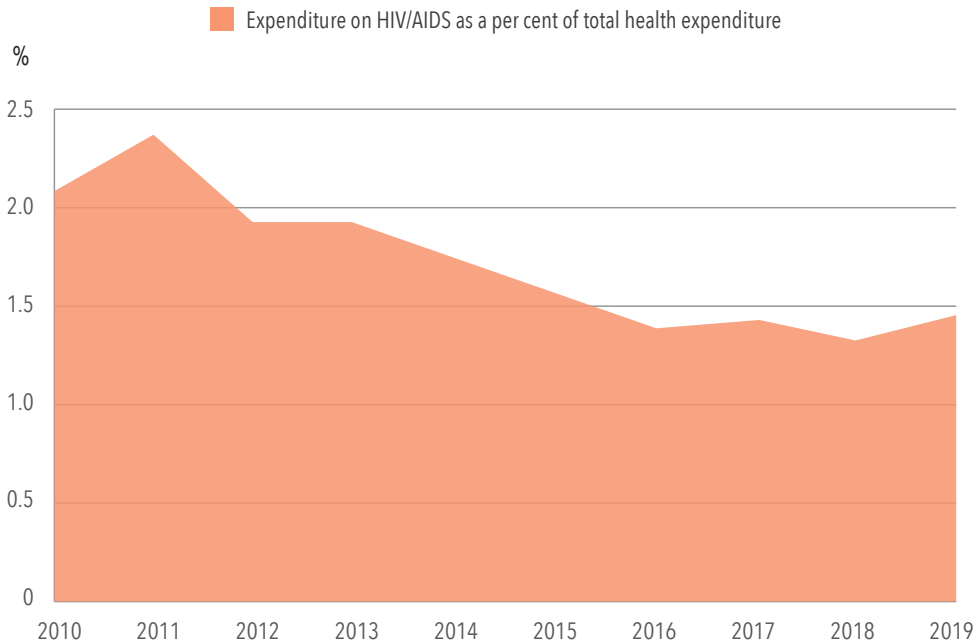


FIGURE 2: EXPENDITURE ON HIV/AIDS IN THAILAND AS A PERCENT OF TOTAL HEALTH EXPENDITURE: 2010-19
Source: NHSO

COST-EFFECTIVE USE OF HIV/AIDS EXPENDITURE

The expenditure of HIV/AIDS prevention and alleviation in the most recent decade (2010-19) has been relatively constant, year-to-year, at the level of 7 to 9 billion baht per year. Total health expenditure increased from 380 billion baht in 2010 to 660 billion baht in 2019.

TOTAL HEALTH EXPENDITURE

2010 ● 380 BILLION BAHT

2019 ● 660 BILLION BAHT

The data in figure 2 show that the proportion of HIV/AIDS expenditure of all health expenditures declined steadily from about 2% in 2010 and then plateaued at about 1.5%.

When compared against the steady progress toward the 90-90-90 targets, it can be asserted that Thai expenditure on HIV/AIDS has been cost-effective.

90
90
90

NATIONAL PREVENTION AND RESPONSE TO HIV/AIDS MECHANISM IN THAILAND

The prevention and alleviation of HIV/AIDS cannot achieve success without the participation and a sense of shared responsibility between the government, the private sector and the Civil Society. With the prime minister as a chairperson, the **National AIDS Prevention and Alleviation Committee (NAC)** was established to be the central mechanism to align the three sectors under a shared vision and mission to ending AIDS. The NAC members include representatives from all three sectors.

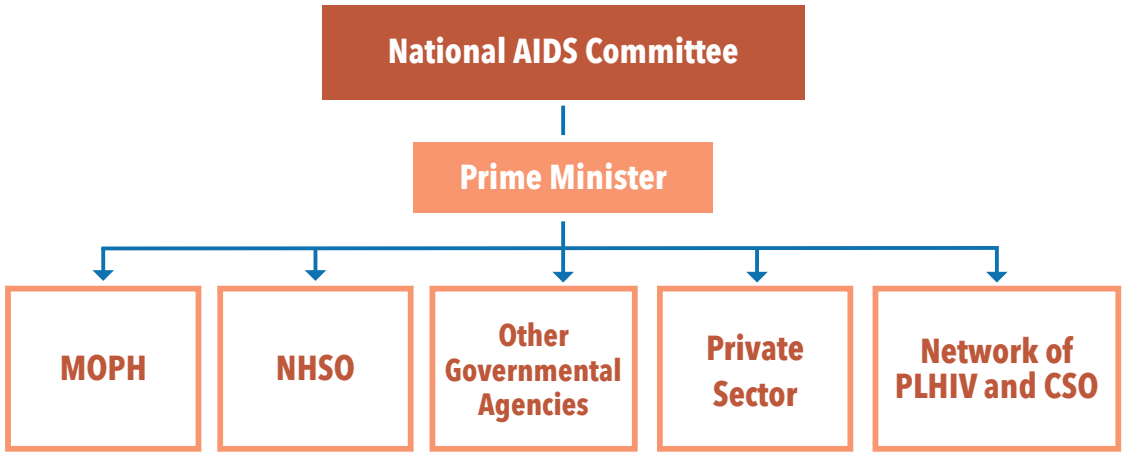


Figure 3: The National AIDS Prevention and Alleviation Committee Structure and Related Agencies

ROLE AND RESPONSIBILITIES OF PARTICIPATING AGENCIES

MOPH has the responsibility for defining standards and ensuring that service providers under the MOPH provide UCS beneficiaries with the services they are entitled to.

The NHSO is the mechanism to provide financial support and reimbursement for health services rendered. The NHSO also supports capacity building of participating service providers, volunteers, and PLHIV to provide treatment, health promotion, prevention, and disease control.

Civil society and network of **PLHIV** are critical in reaching and retaining the high-risk groups. The two sectors are instrumental in policy advocacy to ensure that ARV drugs were included in the benefits package of UCS beneficiaries and manage the Comprehensive and Continuous Care Center (CCC) network attached to hospitals that provide ART. The volunteers provide counselling to PLHIV on remaining healthy and resume active and productive lives in society. The volunteers conduct home visits to PLHIV to ensure treatment compliance and that their essential needs are met.

BENEFITS AND MECHANISM FOR SERVICE REIMBURSEMENT UNDER THE NATIONAL HEALTH SECURITY FUND

The NHSO allocates the budget for the care of PLHIV and operates a reimbursement mechanism for services rendered. The payment can be cash, pharmaceuticals or medical supplies/equipment according to the designated benefits package. There is also an add-on payment to encourage healthcare units to provide standard quality service to PLHIV and persons at risk of contracting HIV. However, the capitation is still set for health promotion and prevention activities, treatment of related complications, or general illness.

NHSO set up a special fund to support CSO and network of PLHIV as part of the UCS benefits package. In 2019, 200 million baht were allocated. Of this, 172 million baht was earmarked for RRTTR activities. The balance of 28 million baht was earmarked for operations of the Comprehensive and Continuous Care Center (CCC). This fund of the NHSO has increased each year and, as of Fiscal Years 2020 and 2021, the amount increased to 226 million baht and 235 million baht, respectively.

The reimbursement is divided into three categories:

1. Treatment and related services
2. Prevention
3. Support and promotion of services

TREATMENT AND RELATED SERVICES

SERVICES	MODE OF PAYMENT
ARV drugs and lipid-lowering medication	Medications
Laboratory examination	In cash reimbursement per service
Voluntary counseling and testing (VCT)	In cash reimbursement per service
Treatment and counselling for PLHIV	In cash reimbursement per service
Screening and diagnosis of hepatitis C infection (HEP C)	In cash reimbursement per service

PREVENTION AND RETENTION IN THE TREATMENT SYSTEM

SERVICES	MODE OF PAYMENT
Condoms	Condoms
Outreach (Reach, Recruit, Test, Treat, and Retain: RRTTR)	Capitation according to target groups and set of services
Comprehensive and Continuous Care Center: CCC	Capitation according to target groups and set of services
Pilot project for pre-exposure prophylaxis (PrEP)	Medications
Post-exposure prophylaxis (PEP)	Medications

SUPPORT FOR SERVICES

SERVICES	MODE OF PAYMENT
Improvement of quality of care	Add-on payment according to the performance quality criteria

Source: NHSO (2016 and 2020)

REIMBURSEMENT SYSTEM

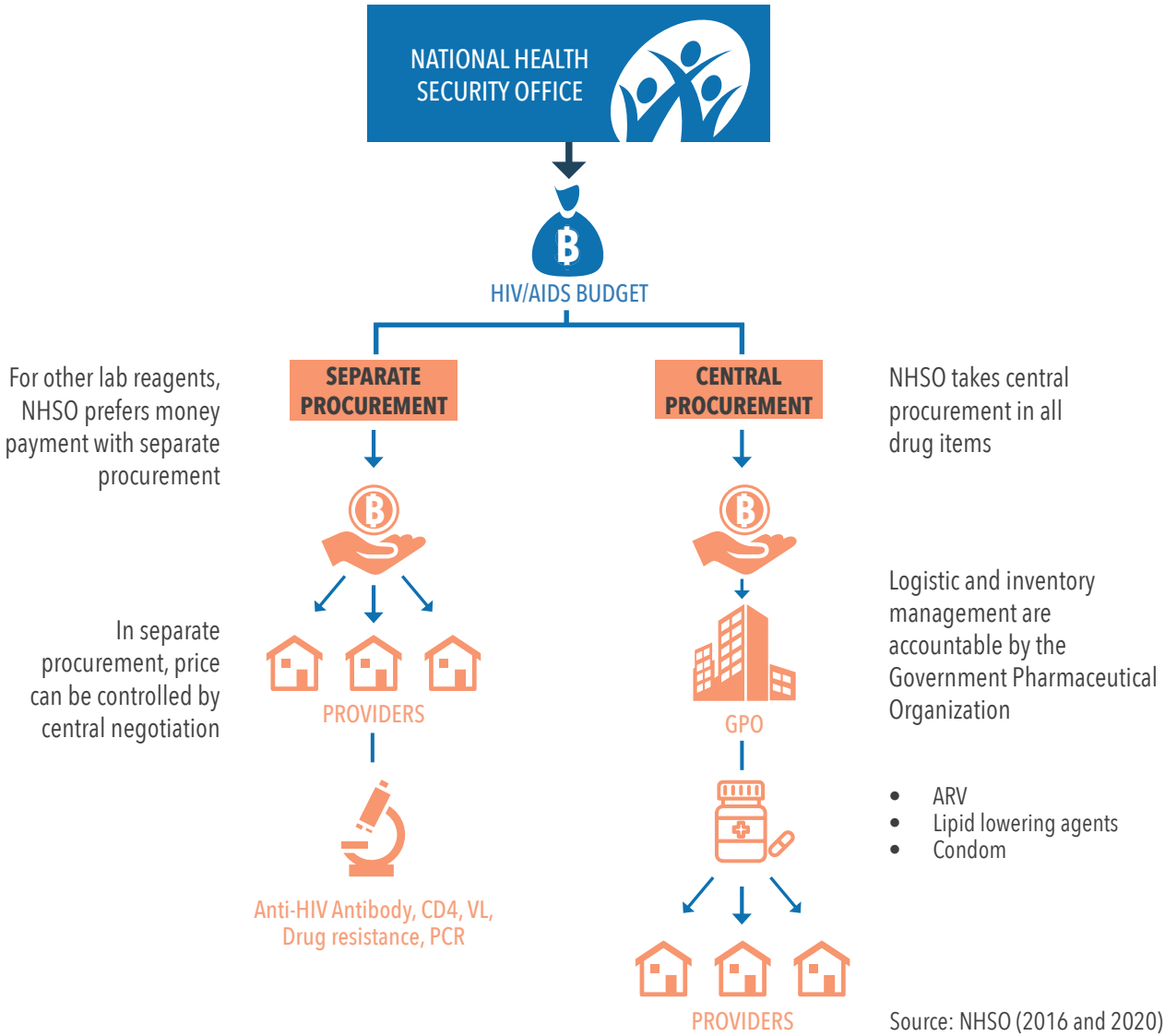
There are two models of reimbursement

1

Central procurement for all drug items. Logistic and inventory management are accountable by the Government Pharmaceutical Organization (GPO)

2

Separate procurement with central negotiation for other lab reagents. NHSO reimburse to service providers where price of the medical supplies is controlled by central negotiation.

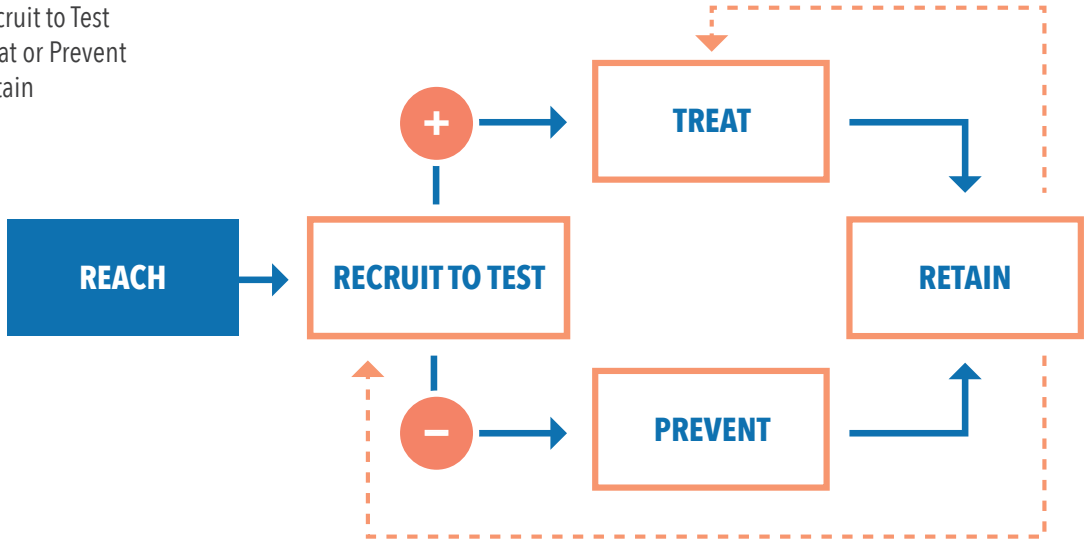


Source: NHSO (2016 and 2020)

OUTREACH SERVICES: REACH, RECRUIT, TEST, TREAT, AND RETAIN (RRTTR)

The outreach services to bring PLHIV into the service and treatment system under support from the NHSO can be classified as follows:

1 Reach
2 Recruit to Test
3 Treat or Prevent
4 Retain



Reach

This refers to the process of screening the target population proactively in the community or workplace. Reach also covers those who may be unwilling or unable to go for prevention support at the healthcare unit.

Outreach usually includes the distribution of prevention supplies even if the target individual has not yet decided whether to go to a clinic or hospital for services. These supplies are typically condoms (both male and female), sterile needles/syringes for injection drug users, and educational material to raise awareness of practice prevention.

Prevent

Those who show HIV-negative results will be enrolled in a prevention program in different forms.

- Pre-exposure prophylaxis (PrEP) for those who cannot easily avoid being exposed to the risk of transmission of HIV
- Post-exposure prophylaxis (PEP) for those who feel they may have recently been exposed to HIV
- HIV occupational Post-exposure prophylaxis (HIV oPEP) for clinical personnel who are accidentally exposed to the infection
- HIV non-occupational post-exposure prophylaxis (HIV nPEP) for other groups
- Prevention of mother-to-child HIV transmission (PMTCT) for HIV+ pregnant women.

Recruit to Test

After reaching the target population, the next step is to refer them to an HIV test. Those who have HIV+ can begin ART immediately. This step represents the bridge between prevention and treatment and is the crucial link in the chain to ending AIDS. A clear referral network is vital for quality of service.

Treat

If the HIV test result of an individual shows HIV-positive, then that person will be referred for relevant services. This has the dual effect of promoting the health of the newly diagnosed PLHIV and preventing transmission.

Retain

All PLHIV on ART must remain within the follow-up system, even when their VL is suppressed, and they feel perfectly healthy. Similarly, the HIV-negative contacts need to be retained in the prevention and follow-up system as long as they continue to have episodes of risk for HIV infection.

CENTRAL MANAGEMENT OF ARV DRUGS AT THE NATIONAL LEVEL

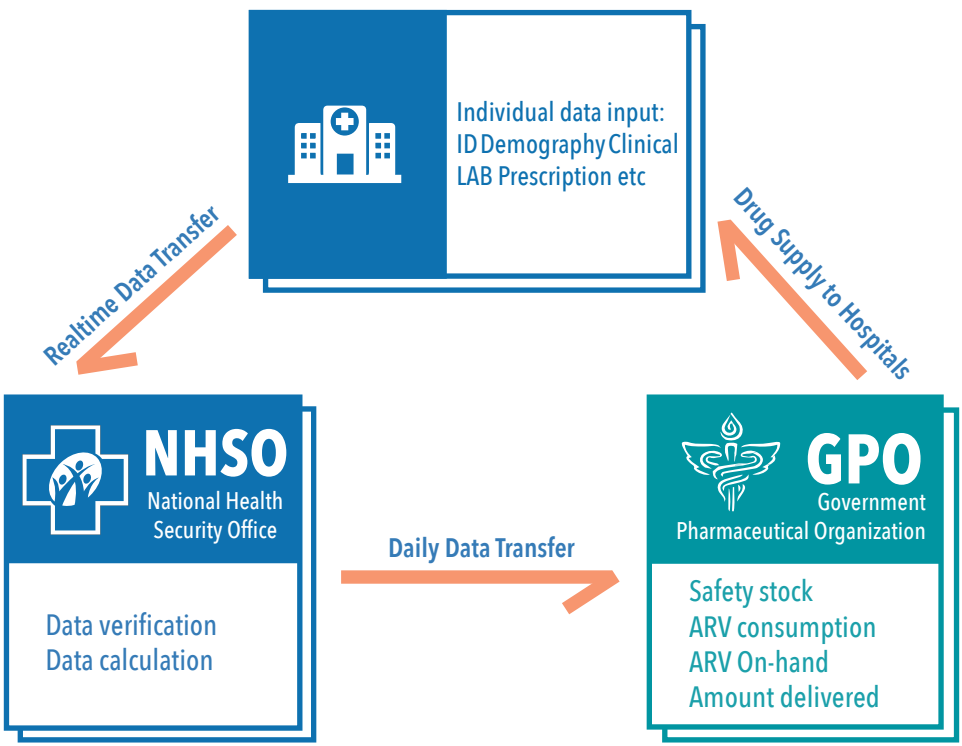
Q **Why the central management of ARV drugs is necessary?**

A

- To ensure the accessibility of patients to ARV drugs
- To prevent the healthcare unit to ask the PLHIV to pay for drugs
- To enable PLHIV to receive ART resupply from any participating provider in the country
- To ensure compliance with the regimen by making the ARV pill size, shape, and color the same for any outlet

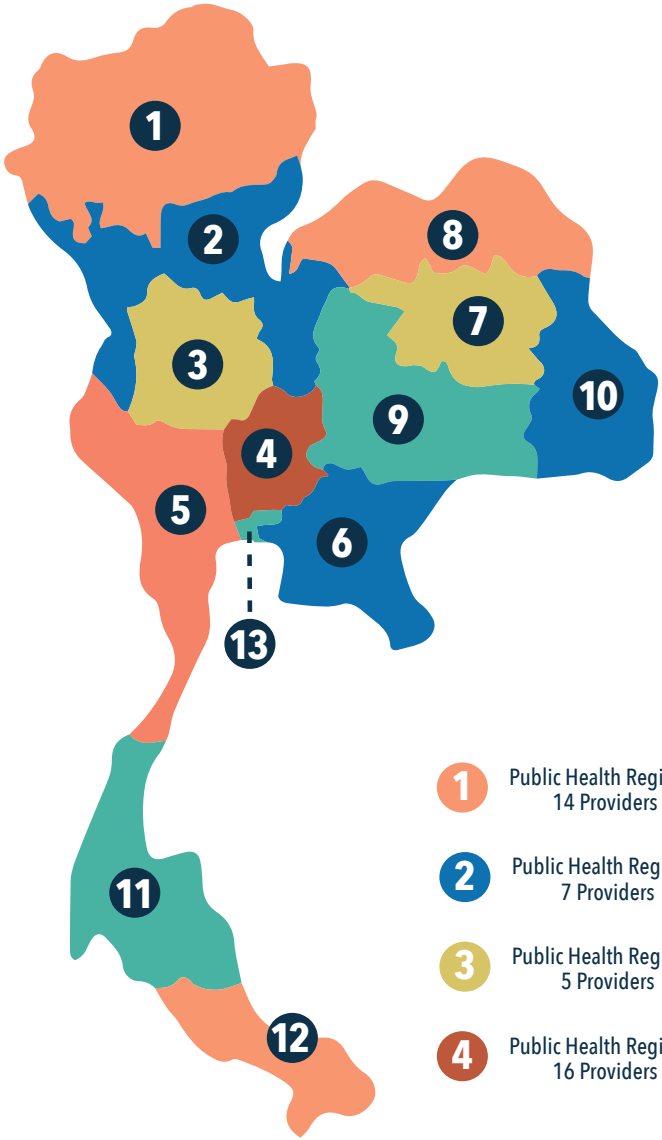
The process of dispensing ARV drugs to the healthcare unit starts by the healthcare unit submits a requisition for drug supply via the NAP information system. The NHSO assembles all the requisitions daily and refers these to the GPO for processing. GPO delivers ARV drugs to service providers according to the actual usage.

Process for stocking and Distribution of ARV Drugs



NUMBER OF SERVICE PROVIDERS OF 3RD-LINE ARV DRUGS

The service providers perform the broadest range of services, including screening, counselling, prescribing ART (1st-, 2nd-, and 3rd-line ARV drugs), and treating opportunistic infection. Providers who dispense 3rd-line ARV drugs need to have the approval of a supervising physician. At the time of this writing, Thailand had 143 sites with the capacity to provide 3rd-line ARV drugs, distributed in all health zones of the country.



1 Public Health Region 1
14 Providers

2 Public Health Region 2
7 Providers

3 Public Health Region 3
5 Providers

4 Public Health Region 4
16 Providers

5 Public Health Region 5
15 Providers

6 Public Health Region 6
15 Providers

7 Public Health Region 7
7 Providers

8 Public Health Region 8
9 Providers

9 Public Health Region 9
8 Providers

10 Public Health Region 10
7 Providers

11 Public Health Region 11
11 Providers

12 Public Health Region 12
11 Providers

13 Public Health Region 13
18 Providers

Source: NHSO (2016)

INFORMATION SYSTEM OF THE NATIONAL AIDS PROGRAM
(NAP INFORMATION SYSTEM)

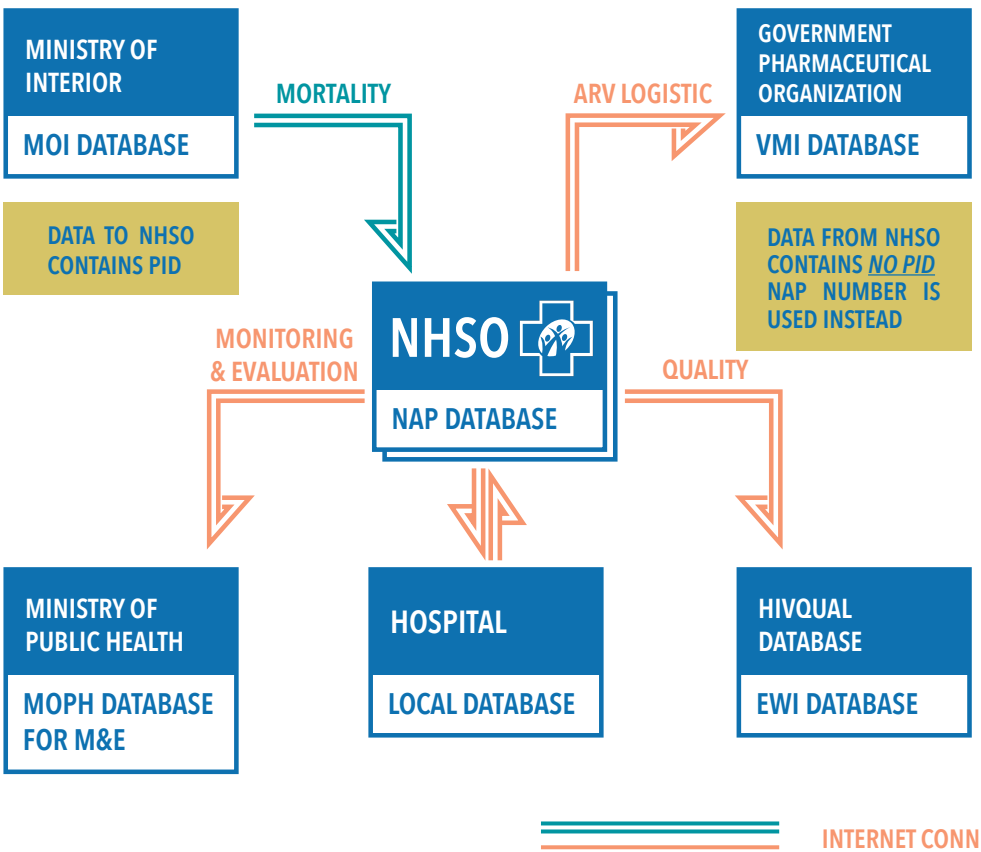
The NAP information system is an online system, which enables "real-time" measurements of the situation and trends. The database system is centralized to portray a picture of the national, regional, and provincial situations simultaneously. There are linkages between the NAP database and the Civil Registration, which allows tracking of births and deaths, along with the HIV/AIDS service statistics. The current NAP information system also includes information for all beneficiaries, regardless of the health insurance scheme they are covered by. Information on individual PLHIV is kept strictly confidential using the person's 13-digit national ID number for coding purposes. That number is then encrypted to ensure the anonymity of the data.

The Thai NAP information system also integrates the three HIV/AIDS databases, as follows:

- NAPHA
- AIDS-OIs, administered by the Bureau of Epidemiology of the DDC
- The Perinatal HIV Intervention Monitoring System (PHIMS)

These linkages make the NAP information system nearly comprehensive for all policy, planning, and programming needs. NAP information is crucial for ARV supply management, reimbursement, and monitoring/evaluation of the HIV program.

HIV/AIDS MANAGEMENT INFORMATION SYSTEM



Source: NHSO

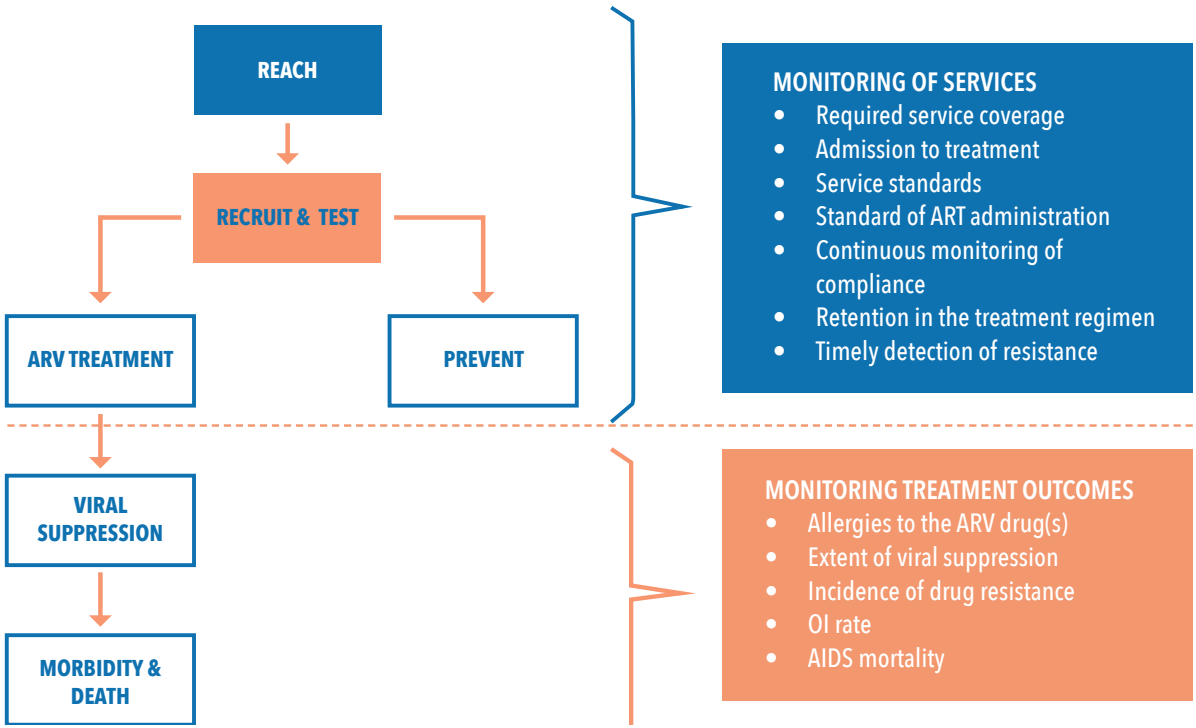
THE NAP INFORMATION SYSTEM COLLECTS THE FOLLOWING ESSENTIAL DATA

1. Record of the PLHIV
2. Record of VCT
3. PMTCT
4. Laboratory tests and results
5. Record on treatment and symptom monitoring, as indicated by the number of service encounters, starting with counselling, screening for OIs, and medicines dispensed by condition
6. Condom distribution statistics
7. Data on positive prevention for sero-discordant couples
8. Record of pre-exposure prophylaxis (PrEP) and post-exposure prophylaxis (PEP)

MONITORING AND EVALUATION (M&E)

The NHSO, in collaboration with the MOPH and Thailand MOPH-US CDC Collaboration (TUC), conducts M&E on HIV/AIDS to inform policy decisions, inform improvements in quality of services, track progress against indicator targets, assess treatment outcomes, and monitor case-finding. The NAP M&E framework covers services and outcomes from counselling, screening, ART, treatment outcomes (e.g., viral load), morbidity/mortality rates, and other services and outcomes related to HIV/AIDS. All of this information is collected and analyzed to achieve the goal to end AIDS.

FRAMEWORK FOR MONITORING AND EVALUATION



Source: Teeraratkul (2017)

THE M&E SYSTEM OF THE NAP RELIES ON THE FOLLOWING DATASETS

1

The NAP information database system (as previously described)

2

The ART Facility Annual Survey: This survey is conducted by the Bureau of AIDS, TB, and STIs (BATS) of the MOPH and has been done annually since 2011. The purpose of the survey is to assess the level and quality of care for PLHIV, dispensing of ARV drugs, and lab work related to HIV.

3

HIVQUAL-T annual survey: This is an annual facility-based survey to assess the quality of hospital services according to the standard guidelines. There are five indicators including:

1 CD4 screening
2 Retention of ART
3 Opportunistic infection prevention
4 Screening of co-morbidity
5 Health promotion activities.

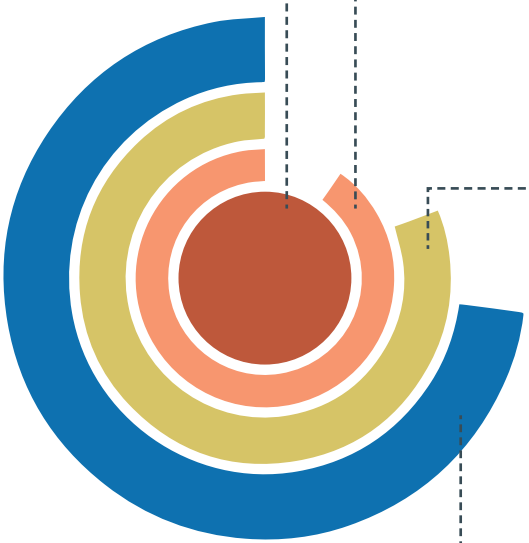
4

Sentinel surveillance: This survey is conducted annually or bi-annually by the Bureau of Epidemiology and BATS to monitor the status of high-risk populations with elevated risk for HIV, and to monitor the incidence and prevalence of ARV drug resistance.

GLOBAL COMMITMENT TO "ENDING AIDS" BY 2030

Many countries worldwide have endorsed the goal of "Ending AIDS", which was first proposed as a political declaration at the 2016 High-Level Meeting on AIDS in New York to end the AIDS epidemic by 2030. As a preliminary step, Thailand set the target for achieving the three 90s by 2020 (90-90-90 Treatment Cascade). The three 90 targets refer to the following:

90-90-90 HIV TREATMENT TARGETS



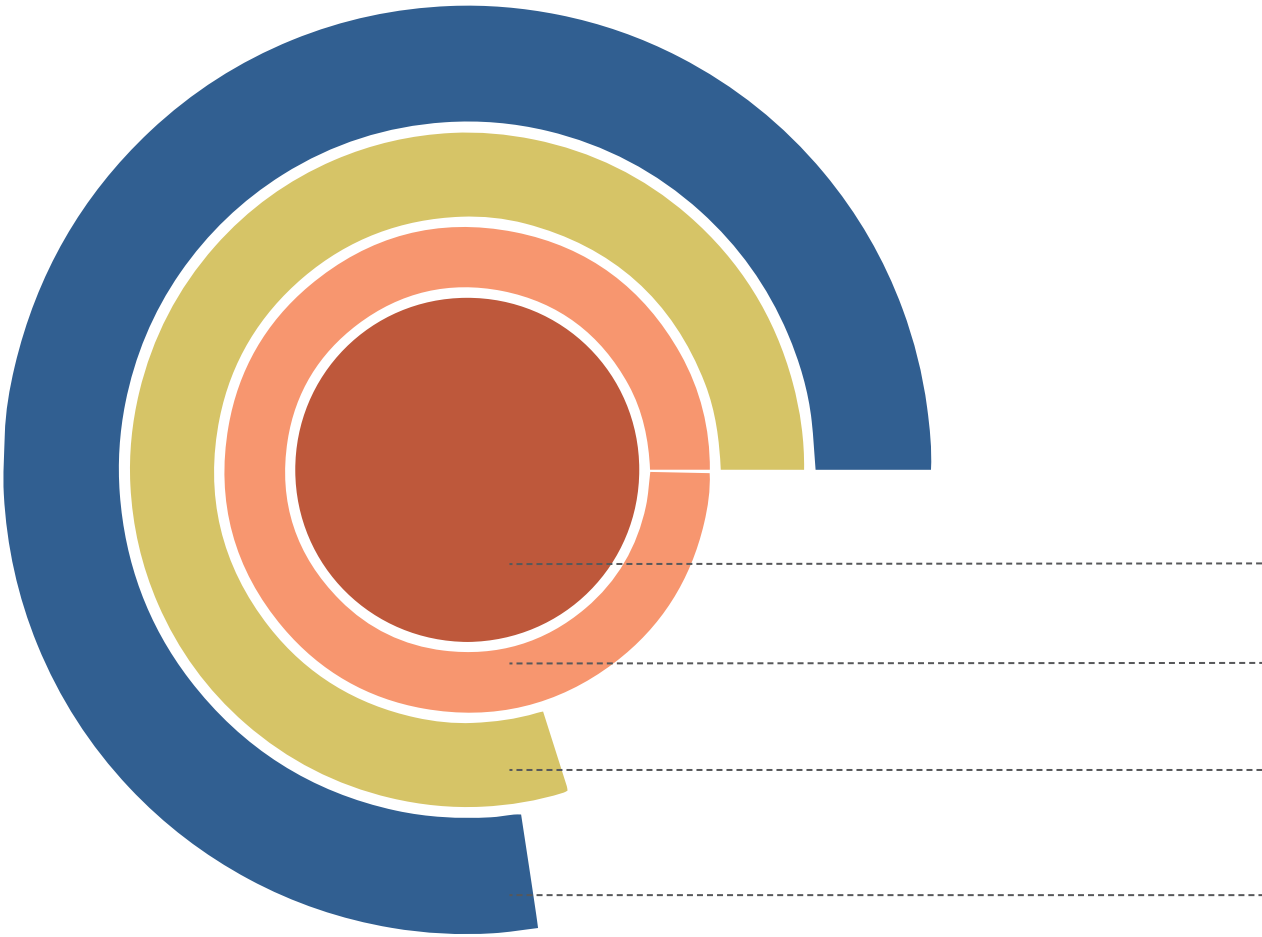
30 million people on treatment by 2020

90% of people with HIV know their status

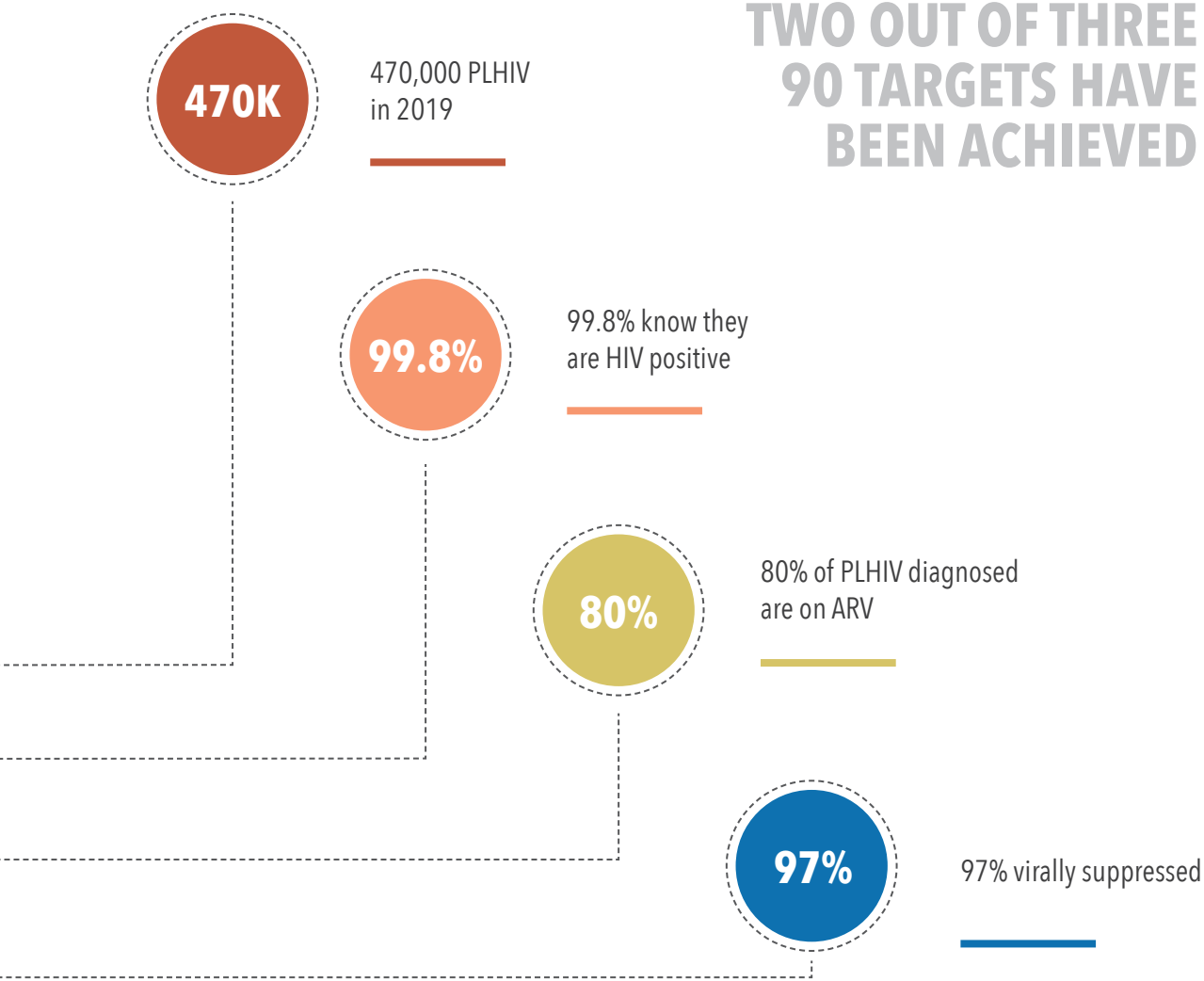
90% of people who know their HIV-positive status are on antiretroviral therapy

90% of people on antiretroviral therapy are virally suppressed

ACHIEVEMENTS



TWO OUT OF THREE 90 TARGETS HAVE BEEN ACHIEVED



INCREASE CONDOM USE AMONG KEY POPULATIONS AND REDUCE THE INCIDENCE OF HIV INFECTION

The condom use rate in commercial sex settings

1989	1993
14%	94%

Reduction of the incidence of sexual transmission of HIV

1989	1993
	↓79%

HIV prevalence among Thai army recruits

1991-93	1993-95
2.5/100	0.6/100

Pregnant Thai and non-Thai migrant women who were HIV+ received PMTCT intervention

2015
96%

Reducing the level of neonatal HIV infection to 2.1%

CHALLENGES

DRUG RESISTANCE

Resistance to ARV drugs continues to be a challenge in PLHIV case management. Drug resistance requires further screening for starting 2nd or 3rd line ARV. Thus, it is imperative to continue monitoring the factors that give rise to drug resistance and prevent these from occurring.

STIGMATIZATION RELATED TO HIV/AIDS

Stigmatization toward PLHIV/AIDS is still a problem in Thailand, and this has a particularly harmful effect on the high-risk populations in society.

A PERSISTENT CASELOAD OF NEW INFECTIONS IN KEY POPULATIONS

Data from the Bureau of Epidemiology of the DDC indicate that infection trends among MSM and young cohorts are also increasing. In particular, HIV incidence among male sex workers has been rising since 2014, and that indicator is a proxy for further spread among the general MSM population. In addition, HIV prevalence among pregnant women appearing at ANC clinics has shown a rising trend from 0.55% in 2016 to 0.60% in 2018. Infection is more common for women in their 1st pregnancy. These data imply that HIV/AIDS spreads more among the younger generation.

INADEQUACY IN SUPPORTING CIVIL SOCIETY AND PLHIV GROUPS IN CONDUCTING OUTREACH

The NHSO supports CSOs for outreach activities by using the lump-sum payment method. However, the funds are not always adequate to cover the cost of additional operations. Still, the direct support from the NHSO to CSOs and the network of PLHIV is vital to facilitate and maintain contact with PLHIV and risk populations. The members of these groups appreciate the financial incentive and the social recognition for being productive members of society.

THE LACK OF HEALTH SERVICE PERSONNEL

The number of PLHIV needing ART is growing due to the intensive screening and testing. These rising caseloads are placing an increased burden on the health care system and personnel. One way to ease this workload is to reduce the frequency of checkups for uncomplicated cases of HIV infection. In addition, counselling can be conducted by telemedicine to healthcare units that lack an HIV/AIDS specialist. Further, peer-based services to vulnerable populations reduces the burden on the local health care providers in the hospitals and clinics.

SUMMARY

The NHSO is the crucial financial mechanism to achieve HIV/AIDS control and alleviation. Thailand achieved universal ART provision in 2006, due to the domestic and international drivers, for example, the funding from the Global Fund, GPO-VIR® production by Thai GPO, and encouragement by among PLHIV advocacy groups.

Thailand still faces challenges in preventing and responding to HIV/AIDS, e.g., negative attitudes and discrimination against PLHIV, emergence of resistance to ARV drugs, and a growing burden on the health care system. The number of personnel in the mainstream health system may one day be inadequate to meet the service need. Thus, new service delivery models, such as community-led HIV services, are urgently needed to retain PLHIV in the care system and encourage all persons with HIV risk behavior to attend VCT.

NHSO

National Health Security Office