Investing for results. Results for people.
A people-centred investment tool towards ending AIDS
LIKHOMO TSEO: MAY YOUR COWS MULTIPLY

This Sesotho blessing illustrates the desired impact of investments in the AIDS response. The growth in the number of cows denotes the growing economic power of families and communities as people living with HIV go back to work, and fewer people acquire HIV infection. It shows that with declining AIDS-related deaths, fewer cows are being slaughtered at funerals and children are back at school and are being looked after by their parents.

Every dollar spent on AIDS is an investment not expenditure. Investment delivers returns. Returns multiply over time. On the other hand expenditures create gaps and demand more, endlessly. As policy-makers and civil society leaders, your approach to the AIDS response will determine your impact. A people-centred investment approach will save lives, reduce costs and get the most out of the money invested.

How? There are three ways. The first is to invest fully. Half-hearted and half-empty promises do not deliver results. Building half a road will not get you to your final destination. If you do not invest fully, you will have to pay more later and keep on paying forever. AIDS investments have to be predictable—people living with HIV should not have to worry whether they will have access to medicines, month after month. The pace of scale-up of HIV prevention and treatment services should not depend on the volatility of markets and political changes.

The second is to invest effectively—in the right places and right things. Emotional investments never pay off, nor do investments that are spread thinly. This is no different for the AIDS response. Investment has to be directed to where people are becoming infected and people need treatment. The choice of activities must be based on strong fundamentals. Thirty years of the AIDS response has shown us what works and what does not, what is effective and what is not.

The third is to invest efficiently. AIDS responses are largely undertaken by the public sector. Fragmentation of procurement and distribution, taxation and duties on imports of life-saving medicines, diagnostics and equipment and protectionism contribute only to reducing the number of people who can access HIV prevention and treatment services, while increasing the burden on the taxpayers and benefiting a few. More can be done with less by streamlining service delivery and fostering innovation. By cutting overhead costs, more resources can be made available.

Are you ready to end AIDS? If you are, you must be ready to answer the questions this tool asks—and if you do answer them honestly and make the right choices, I can guarantee that the future HIV healthcare bill will diminish and national growth will be re-energized.

Michel Sidibé
Executive Director
MAKING SMART INVESTMENT DECISIONS

No individual, business owner or government leader wants his or her hard-earned resources to be spent without careful thought. On the contrary: everyone wants the maximum returns on investments and to get more value for money. Investments in the AIDS response should not be treated any differently.

The AIDS response needs a people-centred investment approach so that returns are maximized. For the response, the returns are clear—zero new HIV infections, zero discrimination and zero AIDS-related deaths. One person acquiring HIV infection, one single case of discrimination or one AIDS-related death is too much.

AIDS-related investments must be smart and produce results for people. Results that matter—lives saved, keeping people from acquiring HIV infection, keeping people alive, keeping people and families healthy and productive, and keeping children in school.

Objectives of the tool

Resource planning for AIDS is not a new concept. Several approaches have been tried with mixed success. Some approaches led to the development of an ideal and comprehensive response but could rarely be implemented. In many cases, the planning process was divorced from the investment decision process—and decisions were made without the involvement of key partners, especially communities. As a result, most countries did not reach the national targets set for 2010. This cannot be allowed to happen with the 2015 global AIDS targets.

This tool aims to reignite the momentum to reach the 2015 global AIDS targets agreed on by United Nations Member States at the 2011 United Nations General Assembly High Level Meeting on AIDS and articulated in the 2011 Political Declaration on HIV/AIDS. These targets are set within a results framework that is people-centred and outcome-oriented.

This tool poses key programmatic and investment questions that national AIDS responses should be able to answer before making decisions on how to allocate resources for AIDS.

It is a tool to help guide investment priorities that are cost-effective, efficient and produce maximum impact. This tool can help national decision-makers from government, civil society, communities and development partners to come together and plan investments that are coherent and harmonised.

The aim of this tool is:

- to fully fund the AIDS response through country ownership and shared responsibility;
- to put knowledge, experience, lessons learnt and innovation forward to make effective programme decisions; and
- to invest resources to obtain optimal results.

With full understanding of the response, critical life-saving choices can be made. No set formula can be applied to arrive at the final choice, nor are the questions presented exhaustive—they are starting-points for arriving at an outcome-oriented investment decision. They help in ensuring the transparency of investment choices, directing partner investments, monitoring results and mobilizing resources.

Are you ready?

- Do you want to get maximum return for your investments in AIDS?
- How do you make your programme decisions currently? Who makes the investment decisions?
- What degree of control do you have to make the investment choices?
- Are you satisfied with the results you have achieved so far?

1 “A specific group of people, often living in a defined geographical area, who share a common culture, values and norms, are arranged in a social structure according to relationships which the community has developed over a period of time. Members of a community gain their personal and social identity by sharing common beliefs, values and norms which have been developed by the community in the past and may be modified in the future. They exhibit some awareness of their identity as a group, and share common needs and a commitment to meeting them.” Health Promotion Glossary. Geneva, World Health Organization, 1998.
WHO SHOULD BE INVOLVED IN DEVELOPING THE INVESTMENT PACKAGE?

The diversity of the HIV epidemic requires a context-specific response. National investment packages should be developed through an intensified national dialogue around investment choices and priority-setting involving all key national partners, including civil society groups at all stages. Appropriate forums for this dialogue include existing multistakeholder structures and processes such as national AIDS commissions and other governance bodies and partnership forums. In particular, the investment framework should facilitate an intensified dialogue between AIDS programmes and funding, planning and development authorities responsible for steering broad national development programmes.

Opportunities for applying investment thinking and the insights of the investment package will arise in all stages of the planning and implementation cycle of national AIDS programmes and may include investment cases for AIDS, sustainable funding discussions, reviewing and renewing national strategic plans and developing costing and implementation plans for national strategies.

A wide range of existing tools in programme planning and implementation can be applied to investment package discussions. In addition to the existing AIDS-specific tools, there are related tools in marginal budgeting for bottlenecks and Millennium Development Goal assessments. UNAIDS will continue to work with countries in applying existing tools and identifying and filling gaps.

Using the tool

The four step process guides you through four stages of developing a context specific, outcome-driven country owned investment package. At the start of each section, key concepts are elaborated to set the context for each stage of the investment decision making process.

Key questions:

These questions are open ended to trigger investment based thinking among policy makers, civil society and community leaders. Some questions help the reader explore the current practices and choices while other questions are aimed at stimulating innovation and critical thinking while making investment decisions. More questions can be added or adapted based on the local context.

Key decision points:

At the end of each stage of the investment decision process, decision makers are invited to formulate their choices in concrete terms. Using the “fill in the blanks” exercise approach, critical decisions can be conveyed in a transparent and accountable manner.

INNOVATION IN PRACTICE

This section illustrates real-life examples of how some countries and organizations have brought innovation in the AIDS response and are applying the concepts of investment thinking in delivery of HIV prevention and treatment services.

CASE STUDY

Two case studies using a simulation approach illustrate how investment planning can be applied in real life. The countries profiled in the simulation are fictitious but the issues and solutions that are described are borrowed from existing programmes and models. The case studies do not provide ideal solutions, but illustrate the tough choices that have to be made to produce results and maximize value for money.
The AIDS response must be fully funded to end AIDS. This requires about US$ 24 billion annually by 2015 in low- and middle-income countries. This target is not negotiable, as agreed by member states in the 2011 Political Declaration on HIV/AIDS. It is not about charity: it is about global commitment and duty. This requires shared responsibility and global solidarity of governments, civil society, international organizations, communities, faith-based groups and the private sector. It also requires innovation in mobilizing resources and adopting innovative funding models. This will give countries a fighting chance to end AIDS within our lifetime.

Resources for the AIDS response are investments and not expenditures. If investments in the AIDS response are not adequate, well targeted and prioritized, not only will future investment needs increase but the effectiveness and return on current investments will diminish.

Investments in the AIDS response must be based on three tenets: equity, evidence and efficiency. They are supported by four fundamental principles: country ownership; community engagement; shared responsibility and global solidarity; and grounded in the local epidemiological context.

The estimate of US$ 24 billion is based on what is needed to increase the present rates of coverage to achieve universal access to HIV prevention, treatment, care and support by 2015 and to maintain this level of access thereafter. The global investment requires scaling up HIV programme funding from US$ 16.6 billion in 2011 to US$ 24 billion in 2015 and then declining to US$ 19.8 billion in 2020.

Fewer resources will be needed after 2015 because coverage will have reached target rates and fewer people will acquire HIV infection, which would have required treatment and other health and social services. There will also be efficiency gains, such as costs saved on treatment commodities and a shift to community-based treatment and testing.

Fully funding the AIDS response and investing it effectively and efficiently can prevent an estimated additional 4.2 million adults from acquiring HIV infection, prevent 680 000 children from becoming newly infected with HIV and prevent 1.9 million people from dying from AIDS by the end of 2015. Nearly 15 million people will be accessing HIV treatment, and new infections among children will be virtually eliminated. In addition, an estimated 3.9 million life-years will be gained—improving the quality of life for all people.

**Are you ready?**

- How many resources are needed for the AIDS response between 2012 and 2015?
- What national results are you aiming for in 2015?
- What is the opportunity cost you would loose if the response is not fully funded?
- What will be the revised resource need in 2016 if the national AIDS response is not fully funded?
ESTIMATED RESOURCE NEEDS IN LOW- AND MIDDLE INCOME COUNTRIES 2015

Total: US$ 24 billion

- Sub-Saharan Africa: 53%
- Caribbean and Latin America: 11%
- Western and Central Europe: 2%
- East Asia and Oceania: 7%
- Eastern Europe and Central Asia: 6%
- Middle East and North Africa: 5%
- South and South-East Asia: 16%
- Caribbean and Latin America: 11%

ESTIMATED RESOURCE NEEDS IN LOW- AND MIDDLE INCOME COUNTRIES FOR PROGRAMME ACTIVITIES BY REGION 2015

- Sub-Saharan Africa
- Middle East and North Africa
- Caribbean and Latin America
- West and Central Europe
- Eastern Europe and Central Asia
- South and South-East Asia
- East Asia and Oceania

Legend:
- Treatment, care, and support
- Elimination of new HIV infections among children
- Behaviour change programmes
- Voluntary medical male circumcision
- Populations at higher risk
DEVELOPING A CONTEXT-SPECIFIC, OUTCOME-DRIVEN, COUNTRY-OWNED INVESTMENT PACKAGE

To achieve the 2015 global AIDS targets, countries must be able to use the mobilized resources effectively and efficiently. Decision-makers must determine a context-specific, outcome-driven, country-owned investment package. UNAIDS proposes a four-step process—understand, design, deliver, sustain—that can aid decision-makers in adopting an optimal package of investments and choices for programme implementation.

At each stage of the process, decision-makers must have an investment lens, asking the key question: how to maximize results for every dollar invested.

FOUR STEP PROCESS

Developing a context-specific, outcome-driven, country-owned investment package

1. UNDERSTAND
   Understand the problem

2. DESIGN
   Design the investment portfolio to solve the problem

3. DELIVER
   Apply the investment portfolio at scale and generate efficiency

4. SUSTAIN
   Sustain for impact and ending AIDS
Understanding the problem helps to zero in on the core activities that will help bring about the maximum impact. It provides decision-makers with key data points about the extent of the AIDS epidemic and in-depth understanding of the dynamics of the epidemic. It provides pointers towards the future directions of the AIDS epidemic if the status quo is maintained. Countries must be able to identify the key drivers of the epidemic and focus on the relationship between the epidemiology of HIV infection and the behaviour and social conditions that impede their ability to access and use HIV information and services. These include full understanding of the legal and socio-cultural environment and measuring the extent to which stigma and discrimination block the demand for and use of available services for the population as a whole.

Understanding the problem enables countries to match and prioritize their AIDS response by identifying, selecting and funding the HIV prevention measures that are most appropriate and effective for the country in relation to its specific epidemic scenario and settings. This includes prioritizing the right interventions for the general population as well as for populations at higher risk of acquiring HIV.

Engaging people receiving HIV prevention and treatment services in programme design and delivery is critical to an effective response, as is ongoing analysis of what works and the costs and benefits of various HIV prevention measures and their feasibility given the available human and financial resources.

**INNOVATION IN PRACTICE**

- In one country, a balanced approach between the general population sex workers and men who have sex with men was adopted after it was found that nearly 30% of the people newly infected with HIV were sex workers or men who have sex with men. Targeted behaviour change programmes remained the mainstay of HIV prevention, while HIV services were also extended to sex workers and men who have sex with men.

- One country shifted from distributing resources equally to every province to distribution based on the epidemic burden. This enabled districts with a high burden to receive a larger share of the available resources.

- Programmes for discordant couples were initiated in one country after it was found that nearly 40% of the people acquiring HIV infection were people in discordant relationships.

- In another country, large cities have their own AIDS control programmes. This devolution of authority and resources helps to make the delivery of services more efficient.

- Mode-of-transmission studies have been conducted in more than 30 countries. These studies have helped AIDS programme managers to identify populations requiring focused outreach. For example, one country programme shifted the emphasis to sex workers and their clients, who accounted for a majority of the people acquiring HIV infection but received relatively fewer resources.
Key questions

- When will the next 1000 people become infected with HIV?
- Where will the next 1000 people acquiring HIV infection be (for example, geographical distribution and population groups)?
- Why will the next 1000 people acquire HIV infection (for example, behavioural, social and cultural factors)?
- How can you prevent them from becoming infected with HIV?
- Which approaches have worked? Which have not? What evidence do you have?
- How do you reach the general population? How can you bring behaviour change in an efficient manner?
- Who needs antiretroviral therapy?
- Who is getting antiretroviral therapy?
- Who is not getting antiretroviral therapy and why?
- Who is lost to follow-up or presents too late?
- How effective is treatment for people getting it?
- Where are the major investments in AIDS? Why?
- Where are the sources for AIDS resources? How much are they tied to the interests of the holder of the resources?

Key decision points

- I/we choose ______ as a population group for focused outreach because this will prevent ______ people from acquiring HIV infection in the next two years.
- I/we agree to ensure that ______ people receive treatment in the next two years. This will ensure that _____% of the people eligible will have access to treatment.
- I/we agree to offer testing to _____% of pregnant women for HIV infection and provide access to antiretroviral therapy for _____% of pregnant women living with HIV. This will reduce the number of children newly infected with HIV from _____ to _____ by 2015.
- I/we are not focusing on ______ as a population group for focused outreach because _________.

Add more decisions starting with “I” or “we” as appropriate.
Designing the investment portfolio is a critical part of a people-centred approach for achieving results. Decision-makers have to make choices about the combination of interventions they will fund and the effectiveness of these interventions in reducing the number of people acquiring HIV infection or dying from AIDS. A good design saves costs, reduces waste, generates demand and supports good adherence.

Delivering on the 10 global AIDS targets requires a portfolio of investments that includes a set of interventions and activities that have to be undertaken in each country to achieve the impact required. These include a set of people-focused activities supported by measures that create a context-specific enabling environment. In addition, the programme delivery approaches selected should leverage Synergy with the health and development sectors to maximize efficiency.

The pattern of necessary expenditure depends on the size of the population in need in relation to each activity in each country. The spending pattern will therefore vary from region to region and country to country. Not all people require the same mix and intensity of activities. Priorities for investments in people-focused activities can be effectively set based on the country’s epidemiological and demographic context.

The highest-priority activities need to include:

- providing antiretroviral therapy for people living with HIV and treating opportunistic infections;
- treatment for prevention: providing antiretroviral therapy for preventing HIV transmission among discordant couples;
- providing HIV prevention services for women and girls who are pregnant;
- implementing behaviour change programmes, including condom promotion for the general population with special emphasis on people with multiple partners, people engaging in casual sex, and young people;
- carrying out male circumcision (in countries with high HIV prevalence and low rates of circumcision); and
- focusing outreach on people at higher risk: people who inject drugs (including young people and women who use drugs), sex workers and their clients (such as migrants, truck drivers) and men who have sex with men (including young men).

Behaviour change programmes can have a significant impact if designed and managed correctly. Successful behaviour change programmes for the general population combine community dialogue with mass-media and information campaigns and are directed at changing social norms as well as individual behaviour.
Programmes should support the development of locally owned and implemented solutions that can be measured and tracked over time. Key objectives should include reducing the number of sexual partners, delaying sexual onset and using condoms. Behaviour change programmes can include social marketing of condoms to promote condom use for people engaging in casual and multi-partner sex.

Every epidemic context has particular subpopulations or geographical hotspots in which the risk of HIV transmission is concentrated among a section of the general population or that account for an especially large proportion of the people newly infected with HIV. This may include those aforementioned populations but may also include other populations such as fishermen or miners.

These activities must be supported by a set of overarching critical enablers. Without critical enablers, many of the activities outlined above have a suboptimal chance of success—resulting in wasted opportunities and resources. Critical enablers are context specific and difficult to measure but indispensable. Communities must take the lead in identifying the choice of critical enablers.

Examples of social enablers are conducting outreach for HIV testing, reducing stigma, advocating human rights and mobilizing communities. Programme enablers include strategic planning, programme management and capacity-building for community-based organizations. HIV programmes must leverage Synergy with other health and development programmes to reduce the risk of vulnerability of acquiring HIV infection, improve human security, especially related to gender-based violence, and extend the benefits of social protection programmes to people affected by HIV.

**INNOVATION IN PRACTICE**

- By adopting WHO treatment guidelines and rationalizing treatment regimens, several middle-income countries can reduce their first-line treatment costs by nearly 60%.
- Adopting a community-driven approach to service delivery and task shifting from doctor-managed care to nurse-managed care can reduce costs by 11%.
- In one country, women living with HIV start antiretroviral drugs as soon as they are pregnant and receive treatment for life. This has saved costs within four years of delivery and improved outcomes for infants. Although receiving antiretroviral therapy for life is more expensive, it improves maternal outcomes, which offsets the higher cost.
- In one country, HIV prevention efforts received more resources after a spending analysis revealed that the number of people acquiring HIV infection outpaced efforts to scale up treatment year after year.
Key questions

- Which programmatic actions will reduce the risk of exposure or exposure for the populations you have identified above?
- What relative weight is given to each of these programmatic actions?
- Are these programmatic actions backed by evidence? Do they follow or comply with internationally agreed standards?
- What differentiation are you making for the various population groups within the general population?
- What are the preconditions for treatment access (testing, referral and entry to care) and conditions for retention in care?
- Have you realistically assessed the likely impact, using realistic effectiveness data adjusted to the local context?
- What are the gaps resulting from your decision(s)? How do you plan to bridge the gaps? What is the time frame?
- Who is making the investment decisions? How transparent are investment and expenditure decisions? Do you need to change them?
- What proportion of your total investment is used for programme management?
- What proportion of the external investment is used for programme implementation?

Key decision points

- I/we choose ___________ as the delivery method for ___________ based on the following criteria ___________.

- I/we will promote ___________ as the main HIV prevention strategy for the ___________ population group because ___________.

- I/we do not consider ___________ the strategy of ___________ for reaching the ___________ population group, as it is not cost-effective ___________ but instead ___________ choose ___________.

- Add more decisions starting with “I” or “we” as appropriate.
The investment portfolio has to be delivered at scale to generate impact that, in turn, results in more eligible people being reached. A well-designed programme is of little use if it does not reach vast numbers of people. To go to scale, decision-makers have to ensure that delivery methods are rationalized, duplication removed and cost-efficiency generated by maintaining uniform investment packages for similar types of services.

Although advocacy for reducing commodity prices continues, HIV programmes must be implemented as efficiently as possible, with fewer parallel structures and stand-alone services, and reduced programme costs. Ultimately, the HIV response has to become a sustainable and integral part of the health system.

HIV programme decision-makers must increasingly demand information on unit costs and strive for efficiency in delivering HIV services. Service delivery sites vary widely, even within countries, but overall costs must decline as programmes go to greater scale and adopt more efficient delivery models.

Efficient programmes reduce costs, speed up service delivery, enable scaling and maximize coverage. Efficiency can also be gained when programmes are focused on behaviour rather than on all population groups.

**INNOVATION IN PRACTICE**

- By introducing a new tender process, which removed protection measures, the unit costs of antiretroviral medicines were reduced by 53% in one country. The savings generated from this were put back into treatment programmes, enabling more people to access antiretroviral therapy.
- In one country each partner agency was procuring its own drugs and maintaining its own supply chain management system. National procurement and a common distribution of drugs have helped to reduce unit costs and to reduce waste in one country, and the unit costs in another country were reduced by 37%.
- One middle-income country issued a compulsory licence for the manufacture of a key second-line antiretroviral drug, saving nearly US$ 95 million.
- The unit costs of stand-alone HIV testing and counselling centres vary by more than 10-fold from place to place within a country. Many of these centres are idle and not operating at capacity, as the demand is less. Shifting to a community mobilization effort in one district, increased coverage to 80% within a week and substantially reduced the unit cost of testing.
- Facility-level unit costs of antiretroviral therapy were significantly reduced in several sub-Saharan countries as more people accessed HIV treatment. In one country, costs declined from US$ 500 per person to US$ 200 per person.
- Stand-alone facilities soak up overhead and have high management costs. One country reduced its overhead by integrating HIV testing and counselling services within existing health facilities.
- Male circumcision unit costs were reduced when clinical efficiency was achieved through forceps-guided surgery, assembly-line patient management, task-shifting and community mobilization efforts.
Key questions

- How are you ensuring that the scale of activity is sufficient to the scale of the problem?
- What are your unit costs for each programmatic choice you have made? Have you assessed them against available benchmarks (such as cost data from similar countries or programmes) and reduced costs if indicated?
- Have you identified common delivery platforms and points of entry, to generate programme Synergy, increase value for money and reduce loss to follow-up?
- Has the programme been audited to identify duplication?
- Are partners following the agreed investment package and unit costs? Are financial controls in place to ensure that allocations are consistent with the agreed package?
- Do you have an investment package for key activities that all implementation partners agreed to? Is this package followed by the agencies providing resources (such as donors, principal recipients of grants from the Global Fund to Fight AIDS, Tuberculosis and Malaria, international organizations, ministries and other funding bodies)?

Key decision points

- I/we have __________ [in local currency] for __________ [year] allocated towards __________ [activity].
- I/we state that the unit cost of __________ [in local currency] for __________ [activity] __________ is comparable and realistic.
- I/we will invest __________ [in local currency] towards __________ [activity] and this will prevent __________ people from becoming infected or dying.
- I/we choose not to invest in __________ [activity], since the return on investment is not at the agreed level of __________.
- The total resources we need for the period __________ [year] is __________ [in local currency]. We anticipate receiving __________ [in local currency] from __________ and __________ [in local currency] from __________.
- I/we control the flow of __________ [in local currency] and agree to invest it according to the agreed investment package and account for it by __________.
- Add more decisions starting with “I” or “we” as appropriate.
SUSTAIN FOR IMPACT AND ENDING AIDS

Sustaining the AIDS response requires strong country ownership. A strong country-led response can ensure that the investments made in health and development are synergized, key services are integrated and duplication avoided. This can also set the parameters for an equity-based allocation of resources that is aligned to the social, cultural and epidemiological context.

The resource needs for the global AIDS response in low- and middle-income countries is expected to increase from US$ 15 billion in 2010 to US$ 24 billion in 2015. Meeting this target will remain a shared responsibility met with global solidarity.

Current investments in the AIDS response in low- and middle-income countries is about US$ 15 billion each year (end 2010). Nearly 51% of the resources come from international sources and the rest from domestic sources. At country level, the distribution between domestic and international varies depending on the size of the epidemic and national income. The concept of shared responsibility and global solidarity for investments must be internalized in the global health funding architecture.

Another key aspect in increasing sustainability is local production of drugs in Africa, which has more than 80% of the people eligible for treatment. The current dependence on imports for antiretroviral drugs can be reduced if local production capacity in Africa is strengthened.

Another aspect is to build the capacity of communities to own and manage the delivery of health programmes. In a people-centred approach, communities take the lead in programme implementation, monitoring and accountability. Such an approach increases the use of key services and reduces transaction costs for the individual, the family and the overall AIDS programme. Community engagement is vital for advocacy, generating demand and ensuring accountability for results. Civil society organizations play a vital role as enablers and must have the resources and tools to play their role effectively over the long term.

Reducing the vertical delivery of AIDS programmes and integrating them into health and community development systems is another way to ensure sustainability. For example, integrating antiretroviral therapy with other services such as treatment for tuberculosis and other coinfections may be less costly than stand-alone provision. The same approach must be applied to integrating HIV into routine maternal and child health programmes.

At the same time, essential management structures, technical support and supervision needs to be maintained and strengthened, and processes need to be streamlined and costs contained. Use of funding must be monitored to ensure that it is getting to where it is needed and working as hard as it can.
African self-reliance for antiretroviral medicines—reducing AIDS dependence

Africa is hugely dependent on imported pharmaceutical and medical products. Perhaps the most well-known example is medicines for HIV. Africa is home to 68% of the 34 million people living with HIV globally and yet imports more than 80% of its antiretroviral drugs.

Given this situation, improving the security of pharmaceutical and medical product supply is on the minds of African policy-makers. Although, in some respects, the current situation serves Africa well in providing high-quality pharmaceuticals at a low cost, there are strong arguments for improved local supply.

- Greater manufacturing capacity in Africa could ensure the production of drugs for diseases that disproportionately affect Africa that the rest of the world does not supply.
- It could shorten supply chains, resulting in fewer stock-outs and lower inventory costs. Economically, more local production would help relieve trade imbalances and exchange-rate pressure for African countries. Local production would produce jobs and could catalyse the development of a broader manufacturing- and knowledge-based economy. Many people in Africa believe in the principle of lessening dependence. As African countries develop, they become more self-sufficient in fulfilling the needs of their people; the production of medicines, as a high-value commodity, is particularly symbolic.

COSTING LOCAL PRODUCTION

Establishing a new state-of-the-art medicines production facility in Africa will cost between US$ 30 million and US$ 50 million. On average, the annual operational costs of such a facility could be between US$ 15 million and US$ 25 million. Establishing five such facilities can meet the needs of Africa.

These facilities can be established using a combination of approaches such as public-private partnerships, joint ventures, direct foreign investment and South–South technology transfers.

Such investment must be viewed with a long-term perspective, and investment in local production should not impede equitable access to antiretroviral therapy for eligible people living with HIV. In the short-term, local production is not expected to reduce costs but is an investment that provides returns over time.

INNOVATION IN PRACTICE

In one region, countries could treat between 1.2 and 3.8 times more people living with HIV if they pool procurement or negotiate prices that were closer to the low regional generic price.

In one country, integrating HIV treatment services within existing health facilities did not reduce the cost of delivering antiretroviral therapy but reduced other health care costs and out-of-pocket expenses—increasing the satisfaction of the people receiving services and reducing travel-related costs.

In countries where HIV prevention services for people at higher risk of HIV transmission and infection have grown in scale, unit costs have declined. These costs are lower when communities manage them.

The costs of delivering programmes funded by external partners tend to be higher than those funded by domestic sources. A study found that, for every US$ 1 of external funding that is replaced with domestic funding, programme management costs decline by US$ 0.20.
Key questions

- What is the resource mix for your overall AIDS response? How predictable is it? Do you have long-term resource commitments from partners—domestic and international?
- How do your international partners deliver HIV services – independently, in Synergy or in an integrated approach?
- What proportion of your antiretroviral therapy costs are funded domestically? What policy decisions have you taken to reduce dependence on external funding, if any?
- What systems or guarantees do you have to ensure reliable access to drugs and other essential commodities? Have you considered domestic or regional partnerships to ensure commodity supply?
- Do you have an information management system to measure impact in real time?
- Do you have systems to implement continuous quality improvement based on routine programme monitoring? How often do you monitor?
- What systems do you have to use real-time impact monitoring to manage system performance, adjust to changing programme or epidemic contexts and create incentives for performance improvement?
- What systems are you putting in place to strengthen human resource capacity?
- Have you revisited your multisectoral strategy for developing Synergy with other health and development sectors?

Key decision points

- I/we agree to reduce dependence on external funding for HIV treatment by ______ % by ______ [year].
- I/we will invest ______ [in local currency] in local production of ______ by ______ [year].
- I/we agree to change monitor performance and change programme approaches if ______ is not achieved ______ by ______ [year].
- I/we agree to integrate ______ services within ______ [sector] and thereby increase efficiency by ______ % and reduce out-of-pocket expenses for people receiving services by ______ %.
- Add more decisions starting with “I” or “we” as appropriate.
CASE STUDY: Dhrita-rashtra*

Dhrita-rashtra is an ancient country of the South with a rich culture, a relatively small but growing economy and a large and growing population of 90 million. The country is administered from its capital, Andhernagari, by a popular elected government that has been in power for the last 15 years, following years of political instability that ensued after independence.

The epidemic: basic facts

HIV was first reported in 1990, and since then HIV prevalence has climbed to about 0.7% of the total population. At the end of 2011, nearly 290 000 people were living with HIV (164 200 of these among key populations at higher risk of HIV infection—see below), doubling from about 147 000 in 2001.

The country’s epidemic is not uniform. HIV cases have been reported in all 14 provinces, but provinces with significant urban centres have a higher HIV prevalence. In three of the provinces, HIV prevalence exceeds 2%. HIV prevalence among sex workers is 6% (12 000), 13% (13 000) among men who have sex with men and 23% among people who inject drugs. The National AIDS Council recently estimated that the country has nearly 200 000 sex workers, 100 000 men who have sex with men at higher risk of HIV transmission and about 600 000 people who inject drugs. Most of the sex workers are concentrated in five main cities, and one province in the north has a higher concentration of people who inject drugs. Most men who have sex with men are also married, and the women partners of men who have sex with men have increasingly been acquiring HIV infection.

The national AIDS response: end 2011

The national AIDS response was initiated even before the first case of HIV was detected, as the political leaders wanted to protect young people.

To counter criticism that development aid was concentrated only in the capital and main cities, the government had decreed that more than 80% of development projects should take place in rural areas and the provinces. Donors were encouraged to select provinces to concentrate their aid efforts, in a bid to avoid duplication. Provincial AIDS councils were formed in each of the provinces and took the lead in coordinating the AIDS response.

Current investment in AIDS is about US$111 million versus a projected need of US$180 million based on a costing exercise in 2009. Most of the resources (85%) for AIDS come from international sources, with one donor country supporting nearly half of all international assistance. The Global Fund provides another quarter and the remaining from other donor countries and international philanthropies. About 15% of the total investment comes from the national budget; in fact, the domestic contribution reached a high of 30% between 2005–2008 but declined as more international resources became available.

*Dhrita-rashtra is an imaginary country. The information presented in this case study are for illustrative purposes only.
Access to antiretroviral therapy has been rapidly scaled up in recent years. Nearly 55,000 of the 100,000 people who are eligible are receiving antiretroviral therapy. Antiretroviral medicines are funded largely by international assistance, with the donors responsible for procurement and distribution in their designated areas. The average cost for treatment per person is around US$700 per year. Very few children acquire HIV infection, since the country has integrated HIV prevention services for pregnant women across its maternal and child health clinics. The mainstay of the AIDS programme has been its focus on young people. The country’s President, Mr Chorminar, believes that protecting young people from HIV infection and drug use can secure the country’s future. Intensive peer education within schools, youth clubs and mass-media programmes aimed at the general population have been undertaken in most parts of the country. There is also a powerful drug control programme overseen by the Ministry of Internal Security. Nearly half of the estimated people who use drugs have been sent to drug rehabilitation centres. After much persuasion from civil society groups and international partners, a pilot methadone substitution and needle and syringe programme was started in one province. The national coverage of programmes for people who inject drugs is about 2%. Several civil society organizations have started working with sex workers across the country. The national coverage of HIV services for sex workers is about 25% and about 40% in the main cities and the provinces with high prevalence. Networks of men who have sex with men have been established recently and are providing limited services. Sex work, same-sex relationships and drug use are criminalized, and a disconnect exists between law enforcement and public health programmes.
The future

After attending a high-level meeting on AIDS at a regional gathering of heads of state, President Chorminar appointed a high-level commission to make clear recommendations on achieving zero new HIV infections, zero discrimination and zero AIDS-related deaths. Highlights of the presidential speech based on the recommendations received are given below.

I direct that sex workers, men who have sex with men and people who inject drugs must receive priority in HIV prevention and treatment services. By 2015, the coverage of programmes should reach 80% among sex workers and men who have sex with men and 60% among people who inject drugs. This will reduce the number of people acquiring HIV infection from 36,000 per year to about 17,000. Investment in focused outreach programmes will increase from US$ 15 million to US$ 60 million. Of this, US$ 36 million will go towards harm reduction programmes, US$ 16 million towards sex work and US$ 8 million towards men who have sex with men.
Young people remain a priority, but our focus is now shifting towards young people at higher risk—young people who inject drugs, young sex workers and young men who have sex with men. We have to become smarter at protecting our young people. School textbooks will continue to have lessons on HIV and sexuality in a strengthened health education programme. We will significantly reduce costs by adopting this approach.

My government will introduce legislation in Parliament to decriminalize sex work, same-sex relationships and drug use. Drug rehabilitation will henceforth be voluntary. Based on evidence, I am directing that needle and syringe programmes and opioid substitution programmes be introduced in all urban cities and in districts in which the HIV prevalence exceeds 2%.

Antiretroviral therapy will be provided to 150,000 people by 2015. The procurement of antiretroviral medicines will be centralized, and a common distribution system will be adopted. Given the high migration within the country, people living with HIV will be able to access their medicines from where they are without having to be tested again. Access to antiretroviral therapy will cover all people, irrespective of the residential status. This move will help in reducing the cost of delivering treatment from US$ 700 to US$ 300. I thank the donors for agreeing to this step. The total outlay for HIV treatment will be US$ 45 million. An additional US$ 5 million will go towards tuberculosis programmes. By increasing efficiency, we are saving nearly US$ 60 million. Alternately, we would have been able to only reach 65,000 people with the current costs. With just an additional US$ 6.5 million, we are able to increase treatment access three-fold. Now we will especially emphasize increasing access to treatment for sex workers, men who have sex with men and people who inject drugs.

I am glad that very few children are being born with HIV infection today. In some districts, virtually no cases have been recorded in the past few years, but I am told this is because the prevalence of HIV is low in these districts. However, we need to do better in our cities, where children are acquiring HIV infection. The government will continue to invest US$ 5 million in this area.

I am pleased that the mass media have been important in increasing awareness about AIDS. We will continue this, but with a greater focus on reducing stigma and discrimination, violence against women and girls and human rights. We will also explore new media with mobile phones and the Internet to reach out to young people in partnership with the private sector. The mass media will also continue to promote safer sex and condom use. The investment (including in-kind resources) will be about US$ 15 million. Condom marketing and distribution programmes will receive US$ 5 million.

Since our focus has shifted to population groups that are hard to reach, we will invest in strengthening the capacity of community groups and civil society organizations. The ownership of delivery of programmes will be shifted to communities. This will help in improving the use of resources and in reducing the huge programme management costs—currently estimated at between US$ 10 million and US$ 15 million.

I am also directing the establishment of a special initiative to focus HIV prevention and treatment efforts in the five main cities and the three districts where the HIV prevalence exceeds 2%.

The total investment in AIDS is expected to reach US$ 152 million per year in 2015. We will also make efforts to increase our domestic share of funding from US$ 15 million currently to reach at least US$ 45 million by 2015. Thanks to this investment, we expect that, from 2015 onwards, our resource needs will drop to about US$ 112 million by 2020.
Puccharland has a population of nearly 40 million. The country has an agriculturally based economy but has a small and growing industrial base. Many people, especially young people, flock to the cities looking for work. It has two main ports that serve as the trading gateway for many of its landlocked neighbours. The country recently held elections, and the opposition won. The new government has promised a reform agenda and to deliver on basic services—health, housing and education.

**The HIV epidemic: basic facts**

Puccharland has nearly 900 000 people living with HIV. The national HIV prevalence is about 6%, dropping from a high of more than 10% among pregnant women just five years ago. Nearly 120 000 people are newly infected each year. The HIV prevalence has declined in all the country’s 22 provinces during the last few years. The HIV prevalence among women is 8.1% versus 5.3% among men. The HIV prevalence among women 15–19 years old is 3% versus less than 1% among young men of the same age. For young women 20–24 years old, the HIV prevalence is nearly 7% versus only about 1.5% among men of the same age. Many couples are in discordant relationships—nearly 40% of couples with HIV have one partner who does not have the virus. Most young people become sexually active by the age of 15 years. Nearly 60% of men are circumcised, largely in areas where circumcision is a tradition.

The HIV prevalence varies from region to region and from urban to rural areas. However, in four provinces the HIV prevalence is about 12%. In one province, the HIV prevalence is 12% versus about 10% in the two coastal towns and the capital city. The HIV prevalence among fishers, migrant workers, people living in slums and sex workers is higher than the general population. No studies have been undertaken among men who have sex with men and people who inject drugs. A recent study showed that sex workers and their clients and men who have sex with men could account for up to one third of the people acquiring HIV infection. Injecting drug use has also been known to occur in cities.

**The national AIDS response: progress at the end of 2011**

The national AIDS response was started in 1990. After an initial focus on sex workers and urban areas in the early 1990s, the focus shifted to general population programmes. The main emphasis was raising awareness and promoting abstinence, being faithful, reducing the number of sexual partners and using condoms. Investment in upgrading the health care system has improved blood safety, treatment of sexually transmitted infections and the adoption of universal precautions for infection control.

In recent years, there has been a major emphasis in increasing access to HIV treatment. At the end of 2011, nearly 180 000 people were receiving antiretroviral therapy, covering nearly 60% of...
the people eligible. Women accounted for nearly 60% of all people receiving HIV treatment. The coverage of services to prevent children from acquiring HIV infection was about 23%. The cost of treatment was nearly US$ 700 per person. The total investment towards providing antiretroviral therapy is about US$ 130 million.

The total investment in AIDS is about US$ 430 million. About US$ 169 million is spent on HIV prevention efforts, of which US$ 40 million is for preventing children from acquiring HIV infection, US$ 10 million towards mass media and condom promotion, US$ 60 million for voluntary counselling and testing, US$ 20 million for community mobilization, US$ 20 million for multisectoral programmes and US$ 15 million for peer education programmes. Sex work, men who have sex with men and people who inject drugs received about US$ 16 million in total. Programme management costs were estimated at US$ 30 million.

Most funding for the AIDS response came from international sources—nearly 85%. However, the share of international resources dropped from nearly 95% about five years ago. Both international and domestic resources for AIDS have grown in the last few years.
The future

Displeased with having to report that the 2010 targets for universal access were not met, the government ordered an overhaul of the national AIDS programme. Provided below are excerpts from a special budget mention of the AIDS epidemic by the Finance Minister in Parliament.

Allow me to now turn your attention towards the AIDS epidemic. I will go into detail because the Health Minister and I have agreed to a new approach to AIDS. I am pleased to announce that the government intends this year to present a four-year forecast of its investment in AIDS. This is being done to ensure that implementers have predictability and we can make long-term agreements for procurement, which will reduce costs.

Total AIDS investment

The total investment for the AIDS response will rise from about US$ 430 million to US$ 580 million by 2015. From this year forward, all AIDS investment, both national and international, will be reported in budget figures. I am glad to announce that, together with our development partners, we have reached an agreement to have a common framework for AIDS investments and reporting progress. We still have a long way to go before complete harmonization, but this is a significant step in ensuring country ownership of the investments and the response. I also commit that 15% of government revenue will go towards health programmes and a proportional allocation to AIDS based on the burden of disease.

Geographical priority-setting

The AIDS response will receive in-depth attention in six provinces and three cities where impact of investments can be maximized. These areas account for nearly 45% of the people acquiring HIV infection and 50% of the people dying from AIDS in Puccharland. Nearly 50% of all investments will be directed in these areas. I know this will upset some of my respected members, but let me assure you that focusing on these areas also benefits you.

Antiretroviral therapy for people living with HIV and treatment of opportunistic infections (including treatment for prevention: antiretroviral therapy for HIV prevention among discordant couples)

About 500 000 people will receive antiretroviral therapy. Of these, nearly 400 000 will receive it for their own health, and the other 100 000 will be couples in discordant relationships. The unit costs for treatment will be reduced as the government pursues price reductions and common procurement and reduces management overhead. Couples counselling will be promoted, and the government will shift from stand-alone HIV testing and counselling centres to community-based approaches and integration with existing health facilities.
Male circumcision

With the agreement of traditional leaders, voluntary medical male circumcision programmes will be scaled up in provinces with high HIV prevalence and low rates of male circumcision. The financial outlay for circumcision will increase from US$ 2.5 million in 2011 to US$ 100 million by 2015. This massive effort along with scaling up treatment has the potential to reduce the number of people newly infected with HIV in the country significantly. By reaching the 2015 targets, I hope that the next government (definitely ours) will reap the benefit of having to spend much less than current levels.

Zero new HIV infections among children

A special effort to eliminate new HIV infections among children is already underway. The Health Ministry has a dual mission—to improve the health of mothers and children. In addition, they have folded the mission of zero new HIV infections among children within this. We have also decided that women living with HIV will be offered lifelong HIV treatment. Programmes for preventing mother-to-child transmission will receive about US$ 60 million.

Behaviour change

A new approach to behaviour change programmes will be adopted that focuses on community dialogue and engagement. We will reallocate resources from various multisectoral programmes and instead focus on a civil society led social movement to address issues of intergenerational sex, gender-based violence, multiple partnerships, widow inheritance and other harmful social norms. This movement will also celebrate the social norms that provide respect and dignity for all people—especially women and girls.

Focused outreach towards fishermen, migrants and people living in slums

These populations have been identified as having a higher risk of HIV infection than the general population, and special efforts will be taken to ensure that they have access to HIV prevention and treatment services. The government will seek the support of civil society organizations in providing life-saving services to these populations. Further, programmes to reach sex workers, men who have sex with men and people who inject drugs will be scaled up.

Human rights and non-discrimination of people living with HIV

This government is a people's government—and we respect the human rights of all people. We will allocate US$ 30 million towards programmes to create an enabling environment. Funds will be earmarked for public awareness campaigns and mass-media initiatives to reduce stigma and discrimination.