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Section 7 Scenario analysis

“ Knowledge is like a garden: if it is not cultivated, it cannot be harvested.

—Guinean proverb.

Section 7 Scenario Analysis

Scenarios are not predictions, but each describes a plausible outcome. Thus, an analysis of them helps us to learn about some of the challenges Africa may face in the future. This section compares the three scenarios by highlighting some of their key messages, and comparing their epidemiological outcomes and the level of resources that are needed to secure these outcomes. The chapter begins with a summary of critical ideas in the three scenarios.

The scenarios

The scenarios initially set out to answer one central question: “Over the next 20 years, what factors will drive Africa’s and the world’s responses to the AIDS epidemic, and what kind of future will there be for the next generation?” In answering this question, the scenarios pose two related questions: “How is the crisis perceived and by whom?” and “Will there be both the incentive and capacity to deal with it?” The responses to these questions lead us into the three scenarios:

- **Tough choices: Africa takes a stand**
- **Traps and legacies: The whirlpool**
- **Times of transition: Africa overcomes**

Each scenario proposes very different answers.

Tough choices: Africa takes a stand

The key message of ‘Tough choices’ is that, while there are enormous odds to overcome, there is much that countries in Africa can do with their own strength—and particularly with their collective strength—to grow their economies, to prioritise developmental objectives, to lay the foundation for future growth and development, and to reduce the incidence and prevalence of HIV.

This scenario suggests that it is unlikely that the attitudes of the rest of the world to Africa or the provision they make for Africa will change—but it describes African countries nurturing their

domestic resources, including cultural strengths, to find their own way forward. It shows that, with leadership and community mobilization, effective HIV and AIDS responses are possible without huge outlays of resources on stand-alone programming. This scenario ends with declining HIV incidence as the long-term investments in social, economic, and human capital over two decades begin to pay dividends.

This scenario is about identifying the tough choices that state leaders and their people have to make. Leaders make their own priorities for their countries—rather than avoiding or displacing them with externally imposed or suggested priorities, disguised through large amounts of HIV- and AIDS-specific funding and programming. ‘Tough choices’ demonstrates that it is possible, although not easy, to make tough decisions. Not everything can be done at once, so choices must be made between competing priorities. It may require the sacrifice of more immediate economic comforts for a longer-term sustainable national development.

‘Tough choices’ includes a stark message that deaths from AIDS will continue to rise. At the end of the period, despite discipline and effort, the number of people dying each year and the number of people living with HIV and AIDS remain the same as at the beginning of the scenario because of population momentum. Admittedly, this is a much better future to be in than the one described in ‘Traps and legacies’, but nonetheless, it is not a



pleasant or comfortable world for the near future. However, the foundations are laid for a future that is no longer blighted by AIDS.

Traps and legacies: The whirlpool

The essential message of 'Traps and legacies' is that it will be difficult to make a difference to the AIDS epidemic if HIV is viewed in isolation from its root social, economic, and political context; or if it is seen only as a medical problem or as an issue of individual behavioural change, addressed via programmes that only consider the symptoms. The scenario deliberately does not play out a worsening epidemiological situation—population growth is enough to translate existing rates of incidence and prevalence into a doubling of the numbers of people living with HIV and AIDS by 2025.

'Traps and legacies' is a story of good intentions thwarted by an underlying development malaise, which remains unchanged in the quest for swift dividends. The AIDS epidemic does catalyse people and institutions into responding, but they cannot make sufficient headway in the face of depleted capacity and the spillover impacts from high-prevalence to low-prevalence countries. In this scenario, the continent is gripped in a downward spiral of disunity, denial and stigma, contested knowledge, wasted resources, and competing sources of power and authority. The capacity of systems, people, and institutions to respond to the crises of AIDS and under-development are systematically diminished.

At the start of the 'Traps and legacies' scenario there is a huge emphasis on HIV and AIDS, but the fractured, short-term nature of the response and the failure to make long-term, long-cycle investments result in a failure to deliver a lasting solution. Obviously, there are some winners: enclave economies, based on Africa's mineral wealth, and an élite who continue to live an international lifestyle. However, for the majority at

the end of the scenario, demographic, social, and economic impacts have gradually eroded the capacity of high HIV prevalence societies, leading to a collapse in memory, transmission of culture, values, and social meanings, with profound effects.

Times of transition: Africa overcomes

'Times of transition' describes a series of transitions in the way in which Africa and the rest of the world approaches health, development, trade, security, and international relations. The prospect of the collapse of world trade regulation, the failure to meet the Millennium Development Goals, and another century of war leads the continent to draw back from the brink of disaster. The AIDS epidemic mirrors and magnifies a wider crisis and so acts as a catalyst for action—by civil society as much as states. The transitions require sustained social investment and fundamental changes in the way in which donors provide aid and governments deal with it—so that it promotes sovereignty, but does not undermine national autonomy, is not inflationary, and does not promote dependency.

In 'Times of transition', attitudes to Africa are transformed in an increasingly interconnected world and, within Africa, Afro-pessimism, Afro-scepticism, and Afro-exaggeration are replaced by a new understanding of solidarity and citizenship. On the international stage, this requires what has been called a new global covenant, involving security and human rights agendas brought together in coherent international frameworks that encompass economics, trade, social justice, and political equality. These changing international norms are shaped by, and are more responsive to, African needs and perspectives. Within Africa, this scenario requires pan-African solidarity and high levels of regional cooperation. It will need governments that put public good before private office; that direct the benefits of Africa's vast mineral wealth to becoming



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an engine for pan-African good; and that ensure that the state is a resource for all, rather than a prize to be captured. In terms of interpersonal behaviour, this scenario requires that gender relations be transformed, so that women throughout society are able to determine when, where, how, and with whom they have sex.

This scenario suggests that, if these transitions could be made within a generation, they could dramatically reduce the number of people infected with HIV and fundamentally alter the future course of Africa—and the world—in the twenty-first century.

Common challenges

The three scenarios illustrate three possible ways in which Africa and the rest of the world may respond to the epidemic.

Defining the crisis is crucial

How the crisis confronting Africa is defined, and by whom, will make a fundamental difference to the outcome of tackling the crisis. As the three scenarios demonstrate, definitions and explanations of the cause and effect of the epidemic, its magnitude, and the nature of effective solutions may be shared, imposed, ignored, or accommodated. However, a plurality of responses will work only if they are coordinated in the context of an overall shared goal.

The impact of the epidemic is yet to come

Even with the most successful antiretroviral therapy roll-out, treatment will not reach everyone and, in the majority of cases, it may only delay death for a few years. The momentum of population growth means that the number of people in Africa will continue to rise, almost doubling over the next 25 years. Inevitably, this means that the number of deaths over the next 25 years will continue to rise.

However, the steepness of the curve on a graph, and the manner in which AIDS illness and mortality is regarded, is far from predetermined.

Exceptionalism versus isolationism

HIV is an exceptional disease. In high HIV prevalence countries, it has a unique capacity to reverse decades of development progress. However, a line must be drawn between treating HIV as an exceptional disease (exceptionalism) and paying attention only to HIV at the expense of other diseases (isolationism) or development issues.

In 'Tough choices', the AIDS epidemic is seen as part of the crisis of underdevelopment and actions are taken by each nation—in the context of limited domestic resources and stagnant overseas development assistance flows—to tackle underdevelopment and to find development models that suit their particular needs and environment. The spread of HIV means that difficult choices come into even clearer focus. However, solutions are devised not as a response to AIDS, but with the goal of securing sustained, more autonomous development.

In 'Traps and legacies', AIDS is treated in isolation from its social and economic context. Because of the emphasis on antiretroviral therapy, the overall response focuses on a medical approach: the urgent need to respond to AIDS is translated into a medical emergency. AIDS captures much of the additional money that goes to Africa between 2004 and 2010, and diverts money and capacities from other areas.

In 'Times of transition', the AIDS epidemic becomes a catalyst, helping people and institutions across the world understand that it is a small part of a wider international peace and development crisis. AIDS engenders an exceptional response, but it is not treated in isolation from its wider social and economic context.



The danger of swift dividends

Although the AIDS epidemic is an emergency, it is essential to develop both short-term pragmatic solutions and long-term strategic responses. Prioritizing only one approach has grave consequences. Unfortunately, current approaches tend towards providing solutions that are short-term in nature.

'Tough choices' responds by accepting short-term hardship for many, in order to achieve longer-term goals; 'Traps and legacies' describes what might happen if the focus is placed on the symptoms of the emergency only; and 'Times of transition' tackles the symptoms and ensures sustainable development by massively expanding the resources and capabilities of the system.

Dependency, independence, and interdependence

As globalization marches forward, it becomes a truism that individuals, communities, nations, and the systems that they create and within which they exist and work are becoming increasingly interconnected. This integration can create both opportunities and constraints.

In 'Tough choices', African nations struggle for autonomy, which provides opportunities for longer-term economic, political, and social reforms, although in the short term it means restrictions and limitations (of financial flows, for instance).

In 'Traps and legacies', integration increases, but it creates dependence among African nations on richer countries and multilateral institutions—and this undermines or blocks the economic, cultural, and political reforms that are needed to ensure more inclusive and sustained development of individual countries, and erodes regional cooperation.

In 'Times of transition', interdependency is achieved, which establishes equal partnerships

between African nations and the countries of the rest of the world and sees pan-African rhetoric translated into reality. However, this is only possible with fundamental changes on both sides and, of course, it may also introduce new vulnerabilities to external shocks for everyone involved, such as volatile international financial flows.

The dangers of ignoring local culture and meaning

The meanings attached to sex, death, ill health, HIV, identity, trust, and cosmology play a large part in determining actions in response to the AIDS epidemic. Yet, overall, in current HIV and AIDS policy, too little attention is paid to local culture and meanings. Medical or behavioural models of HIV transmission may have little to do with indigenous views and beliefs, and the mismatch can have profound consequences. The scenarios illustrate how different approaches to meanings may affect the outcomes of HIV and AIDS policies.

In 'Tough choices', national governments focus on using local meanings—whether that means adapting or reinforcing them—in order to introduce and sustain effective policies and programmes. These create powerful platforms for social action, although models of transgression and penance may also evolve with a constraining effect.

In 'Traps and legacies', ignorance of, conflict over, or ignoring the deeper meanings held by local cultures may mean that policies or programmes cannot gain a foothold in a community. These approaches may, in fact, increase stigma, blame, and taboo and lead to suspicion of, or rejection of, prevention technologies and treatments.

In 'Times of transition', there is a change in the conceptual thinking of stakeholders: ways of thinking that are based on risk, vulnerability, impact, and opportunity are effectively adapted to local contexts.



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The problem with policy triage and the public debate

In the face of a crisis that obviously exceeds the current capacity to respond, combined with continuing population growth, not everything can be done at once. Systems are under strain at all levels and resources of all types must be used judiciously. The scenarios explore a range of different approaches to decisions and actions taken around the allocation of scarce resources.

In 'Tough choices', national and state forces are determined to act on their own agendas—and they evolve a system of checks and balances, in order to achieve their longer-term development goals within a context of constrained capacities.

In 'Traps and legacies', there is little or no time for reflection on the extent or use of national or international capacities because events are moving too fast, results are needed too quickly, and the priorities of stronger individuals, countries, or institutions dominate.

In 'Times of transition', in response to more transparent and better governance by governments, multilateral institutions, NGOs, and corporations, financial resources grow, predictably and sustainably. This, in turn, generates further economic and political reforms, which, again, prompt improvements in development governance, including greater transparency and rationalization in decision-making processes.

Leadership is not enough but is important

Leadership in the response to HIV and AIDS is vital. However, leadership without the backing of institutional capabilities and resources, available systems capacity, or effective policy will not be able to deliver a successful response to the AIDS epidemic.

In 'Tough choices', national leadership galvanizes a national, regional, and—over time—pan-African response to the epidemic.

In 'Traps and legacies', there are plenty of leaders speaking out. National leaders declare the AIDS epidemic within Africa as a national emergency, but these statements seldom go beyond rhetoric.

In 'Times of transition', the appeal of overt and high profile leadership takes a backstage role to the deeper leadership challenges of building national and pan-African consensus and exemplary, long-sighted, and committed involvement in new global policy and programming synergies.

There is no magic bullet

Just as the causes of the AIDS epidemic are complex, so are the responses. There is no single policy prescription that will change the outcome of the epidemic. Antiretroviral therapy is not a magic bullet, although it is often presented as such, nor is the wide availability of condoms or voluntary counselling and testing. Not even a vaccine can fulfil this role if it is not available until after 2020, after another 15 years of underinvestment in African national health systems. At this late stage it would be difficult, if not impossible, to administer a vaccine sufficiently widely. However, a vaccine that became available after 2020 *could* make a rapid difference if there had been significant investment in human capital and national and health systems in the interim period. Rather than developing an approach that pins all hopes on finding a single magic bullet, the scenarios suggest that it is necessary to accept, and plan for, a wide range of policy interventions.

Bad action may be worse than no action

In 'Times of transition', the epidemic is always viewed in terms of its full human, social, political, economic, and development context. The long-term consequences of actions are always considered to be as important as their immediate impact. This approach involves experimentation—and a willingness to learn from mistakes and start again, using that new learning.



While ‘Times of transition’ plays out the full set of actions needed to reduce the spread of the AIDS epidemic significantly, this is not to imply that anything less than this would be a waste of time. This approach could be played out on a smaller scale—at a national or regional level—and it would still make a difference. However, when resources do not permit a full set of actions in a comprehensive response, it is extremely important to tailor prevention strategies to address the local dynamics and impacts of the epidemic, and priorities must be set within this framework. In this context, it is important to recognize that there are diverse AIDS epidemics across Africa.

Approaches and actions of the kind suggested in ‘Traps and legacies’, such as the inappropriate scaling up of antiretroviral therapy without sufficient checks and balances, may be worse than no action at all. In contrast, ‘Tough choices’ extols the virtue of careful action: if ‘Traps and legacies’ is the hare, ‘Tough choices’ is the tortoise, winning this particular race through careful goal setting and the determination to make the best of scarce resources.

Gender

The importance of paying attention to gender—women’s social, economic, and physiological vulnerability to HIV—is well understood, but the policies and actions that might best reduce vulnerability are not.

‘Tough choices’ shows that, even if gender is not the focus of attention for ideological or human rights reasons, there are entirely pragmatic economic and social reasons to address the status of girls and women in the context of national development and the lowering of HIV prevalence.

‘Traps and legacies’ describes how there is danger in focusing on women in isolation, without considering the complexity of wider family and community relations. For example, programmes that emphasize individual behavioural change can

place the onus for action on women, and yet, in fact, women often lack the power to make or negotiate choices within their sexual relationships.

‘Times of transition’ shows that focusing on gender issues and their wider ramifications can have immense transformative power, catalysing social, economic, and political reforms.

Taking care of orphans and other vulnerable children

The scenarios show that the number of children orphaned by AIDS will rise, no matter what course of action governments choose, and that the consequences of ignoring the psychological, cultural, emotional, and social needs of those children will be very grave. So far, the resilience of communities to care for these children has been considerable, but the ongoing nature of the AIDS epidemic means that this resilience may be worn away.

‘Tough choices’ describes how African governments can address taking care of orphans and vulnerable children as a crucial part of building the future of their nations. Several approaches are explored: some view these children as an economic resource; others concentrate on their education or training; some ensure they stay within their community; others build orphanages.

‘Traps and legacies’ shows how these children might become a driver of social instability and future poverty. A vicious cycle develops where large numbers of children are caught up in a pattern of continuous and traumatic stress, leading to problems ranging from delinquency to depression. These children then grow up to become adults who are chronically traumatized.

In ‘Times of transition’, children orphaned by AIDS receive more resources, including explicit psychological help, and are not viewed as victims. They are encouraged to play an active role in building their own futures, making choices about their education and about where and how they can live.



Mental and physical treatment

'Tough choices' and 'Traps and legacies' show the dangers of overlooking mental health in the response to HIV and AIDS. First, there is the individual trauma the epidemic is inflicting. In addition to that, there is trauma at both community and national levels, which is still little understood. One of the problems raised in tackling this trauma is that there is no common, personified enemy for people to see and unite against—there is no one to bring to justice and no mechanism through which justice can be delivered.

'Tough choices' explores some of the ways in which hope might be instilled among people and comfort brought to those who are suffering, but the resources for this are limited. Governments tend to focus on targeting help where it will provide the greatest effect—in many countries, they focus on taking care of the future generation, especially orphans and vulnerable children.

'Times of transition' more explicitly recognizes the importance of offering widespread psychological care—and finds ways to provide this.

Who benefits from social change?

All the scenarios tell stories about responses to rapid social change.

'Tough choices' describes how balancing or tempering rapid social change with other values, such as continuity of culture or identity, can be tough, but can pay dividends in the maintenance of security, autonomy, and social cohesion.

'Traps and legacies' shows how a minority can capture the benefits of social change, with disastrous consequences for the majority.

'Times of transition' reveals some ways in which much larger numbers of people can be caught up in positive social change—and some of the benefits they might access if knowledge, economic growth, and social transformation are shared more widely.

Local responses are critical

For effective responses to HIV and AIDS, local action is critical for sustaining safe behaviours; providing care and, increasingly, treatment to people living with HIV and AIDS; and in mitigating the impact of the epidemic, for example in providing care for children orphaned by AIDS. Nationwide responses to HIV and AIDS require service provision at a local level and the involvement of community organizations (whether quasi-governmental, religious, or communal). The three scenarios explore very different patterns for local organization and its relation to the state and other structures.

In 'Tough choices', the role of the state as arbiter and coordinator of local efforts is paramount and, in some instances, that implies trade-offs in supporting diversity and sustaining the momentum of local efforts.

'Traps and legacies' sees a proliferation of local responses, rarely coordinated and often sustained by direct contact between local organizations in different parts of the world.

In 'Times of transition', civil society is an engine for the transitions that take place, with a sometimes contested, but necessarily robust, relationship with government.

Religious transformation

The role of faith-based organizations in responding to the epidemic has been considerable, but it is rarely examined in relation to the changing dynamics of religion as a social force across the African continent. The scenarios bring to light some of the profoundly different roles that religion might play.

In 'Tough choices', the actual and latent capacity of faith-based organizations is marshalled by national leaders as part of a national HIV and AIDS response.

In 'Traps and legacies', religious institutions provide one of the few refuges available to



communities suffering from the impacts of AIDS, but the relationship between people of different faiths, and between faith-based and secular institutions, is often uncomfortable and sometimes extremely tense.

In 'Times of transition', religious leaders and their congregations, both within and outside Africa, play a crucial role in shaping new global values and, specifically, the response to the AIDS epidemic. Collaboration between religious groups grows. These developments require a willingness to set aside doctrinal differences, in favour of cooperation.

The significance of time

Time itself has different meanings in the three scenarios.

'Tough choices' tells us that time is intergenerational and that the past matters—the value of ancestors, family history, and identity profoundly shape the present, and actions in the present have consequences not just for those alive today, but also for generations yet to come.

In 'Traps and legacies', time is short and returns need to be immediate; targets are time-bound and action is measured out in political terms of office. Long-wave events such as an AIDS epidemic do not respond well to such short-termism.

'Times of transition' tells us something about the depth of time, rather than simply its length. The transitions and transformations envisaged in 'Times of transition' could take generations if they only occurred sequentially, with each one having to complete before another could begin.

'Times of transition' tells of a world in which leapfrogging and synergy are dominant metaphors; where rapid transition is possible because it rides on the back of a series of other transitions, all taking place simultaneously.

Development responses too rarely take account of time, other than to measure it out in conventional three or five-year project cycles.

While any action is already too late for the millions who have already died from AIDS, there is a need to take time—and human experience of time—as a significant factor in the response to HIV and AIDS, or else the same mistakes will be repeated.

Funding the necessary response

Indicators of progress in responding to the AIDS epidemic are closely tied to the amount of resources spent on HIV and AIDS programmes and services. In particular, the scenarios suggest that, to produce better epidemiological outcomes or even to prevent significant deterioration, spending on HIV and AIDS prevention, care, treatment, and mitigation will have to be scaled up substantially from current levels.

The scenarios investigate the resources required for AIDS programmes.

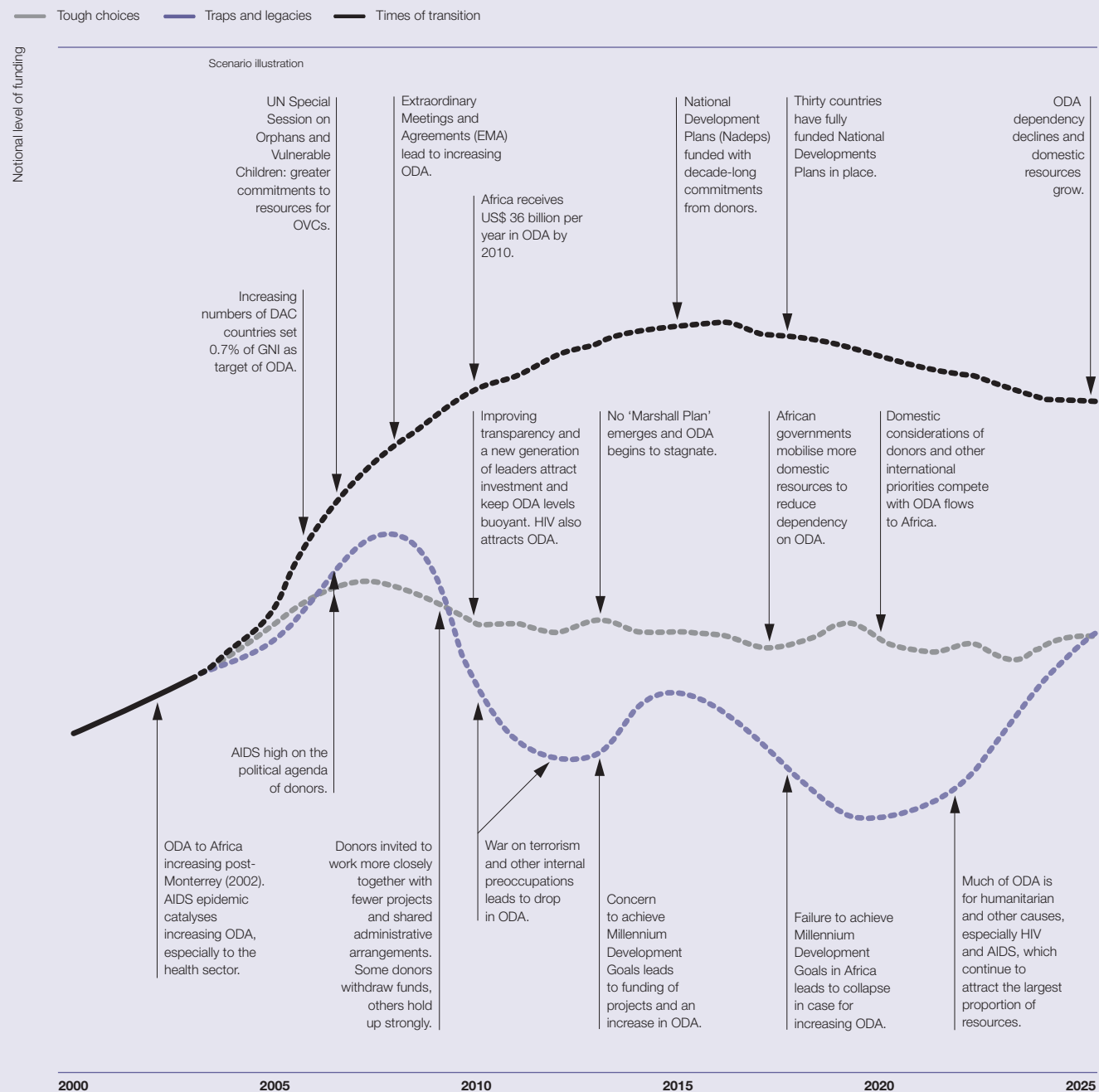
In 'Tough choices', aid remains largely stagnant after an initial surge of donor interest. The large spending recommendations of the *Millennium Project* do not happen. Nonetheless, African governments seek to maximize investments through well developed domestic policies.

In 'Traps and legacies', there are substantial increases in aid over an initial period of growth and much of this is captured by HIV and AIDS programming in isolation from other development issues. Thereafter, aid is volatile and unpredictable.

In 'Times of transition', it is assumed that significant and sustained increases in aid are made, much in line with the recommendations of the *Millennium Project*, and that HIV and AIDS funding occurs in that broader development context.

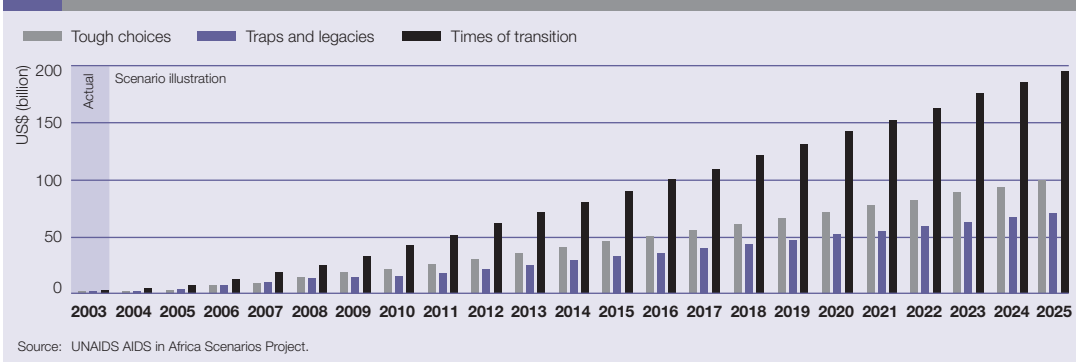
The scenarios make it clear that it is not only *how much* that is spent on HIV and AIDS programming that counts, but also *how effectively* those resources are used and what other development goals are financed at the same time.

Figure 74 Comparison of ODA to Africa, by source, 2000–2025



Sources: UNAIDS AIDS in Africa Scenarios Project.

Figure 75 Cumulative expenditure on HIV and AIDS in Africa, 2003–2025



The impact of the AIDS epidemic will play out over a long period—it can be described as a silent explosion, followed by a series of shockwaves—and policy responses also take time to show their impact. Short-term projects may have local and individual benefits, but measuring out the future of the epidemic in three-year time horizons will not have a significant overall impact. Short-term solutions can cause the very thing they are meant to prevent.

‘Tough choices’ describes how, within African nations, policy perspectives could be lengthened—even when those of foreign governments or institutions remain short or narrow.

‘Traps and legacies’ describes the consequences of policy restlessness, when action is tied to political terms of office or expectations of swift returns.

In ‘Times of transition’, everybody’s perspective lengthens, both within Africa and outside, with donors making 10-year and 15-year funding commitments, and African leaders being able to, and willing to, make long-term plans.

For the purposes of these scenarios the project has drawn on work done on costing the response to the epidemic over the last decade (**Appendix 1** and **Appendix 2**). This includes extrapolating the costs and likely effectiveness of some 26 interventions. These include 18 specific prevention interventions, ranging from mass media campaigns and voluntary counselling and testing, to work with specific vulnerable populations (including young people both in and out of school); and service delivery ranging from condom distribution to universal precautions in health care settings.

The package of interventions also includes care and treatment, ranging from palliative care to the roll-out of antiretroviral therapy. Under this component, costs include laboratory services for monitoring treatment and toxicity of drugs; nutritional support for patients; and drug costs.

Costs have also been included for the care of orphans and vulnerable children. However, costs such as additional training for health personnel are not included, nor expanded infrastructure.

The benefits of paying for a scaled-up response to the AIDS epidemic should substantially exceed the costs incurred. Under the ‘Times of transition’ scenario, donors, governments, and the private sector in Africa spend US\$ 195 billion in the fight against AIDS in the first quarter of this century. Under the ‘Traps and legacies’ scenario, they spend about US\$ 70 billion¹. Total spending under ‘Tough choices’, with its slower expansion of antiretroviral therapy, is intermediate between ‘Times of transition’ and ‘Traps and legacies’ at around US\$ 98 billion.

The resources required are not astronomical. To put them in context: the cost of a full response to Africa’s AIDS epidemic (US\$ 195 billion) is less than half of what the United States spent on new vehicles in 2003².

HIV and AIDS programme expenditure by source

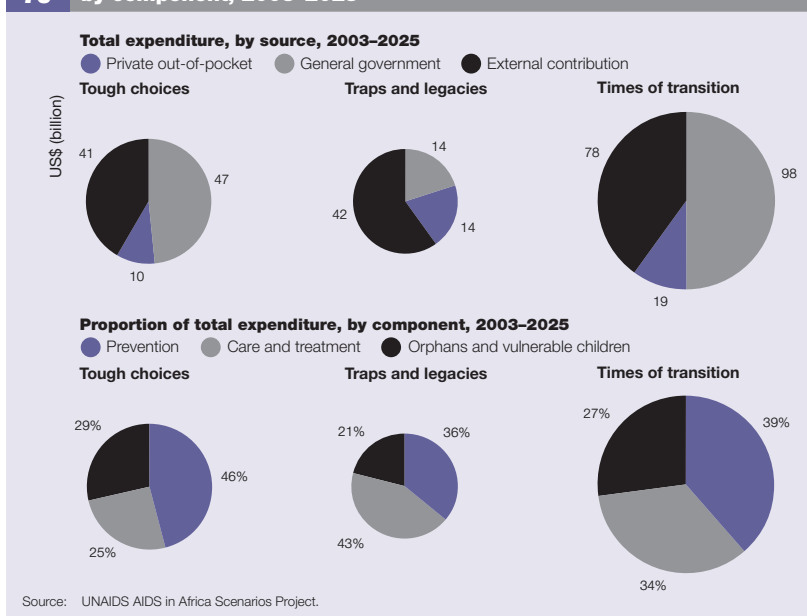
Each scenario envisages different epidemiological outcomes. This is mainly due to the distinct HIV and AIDS programmes that are implemented in each scenario. Not only do these programmes differ in their epidemiological outcomes, but also in their programme content, costs, and sources of funding.

The lowest-cost programme, rolled out in the ‘Traps and legacies’ scenario, requires governments and individuals to each contribute 20%, with external contributions providing the remaining 60%. Although this scenario plays out the lowest-cost option, it also requires the greatest relative external contribution.

The ‘Tough choices’ scenario rolls out an intermediate-cost programme option and requires the smallest relative proportion of external contributions (48%) and the greatest domestically

¹ The cumulative expenditures of the more expensive scenarios hide a reduction in cost increases over time. Beyond 2025, the early expenditure, more costly paths eventually lead to falling costs of response to the epidemic. In later years, the positive effects of spending more, sooner will become increasingly evident.

Figure 76 Expenditure on HIV and AIDS in Africa, by source and by component, 2003–2025



financed proportion with government spending of 42% and individuals' out-of-pocket costs of 10%.

The most cost-intensive programme, in the 'Times of transition' scenario, requires 50% from external contributions, 40% from government, and the remaining 10% from individuals, and shows the growing engagement of African governments in responding to HIV and AIDS and the reduced dependency on aid.

Figure 76 also provides a breakdown of the cumulative expenditure by component in the three scenarios. It shows that in 'Tough choices', the key priority is prevention; in 'Traps and legacies', care and treatment are prioritized, within a much smaller overall resource 'pie'; and in 'Times of transition', with a much larger overall expenditure, a good balance is achieved between prevention, care and treatment, and support for orphans and vulnerable children.

Figure 77 Comparison of expenditure on HIV and AIDS and new infections in Africa, by scenario, 2003–2025

Indicator (US\$ billion except where marked)	Scenario		
	Tough choices	Times of transition	Traps and legacies
Total expenditure on HIV and AIDS	98	70	195
Prevention	45	25	75
Care and treatment	25	30	67
Orphans and vulnerable children	28	15	53
Cumulative new infections (million)	65	89	46

Source: UNAIDS AIDS in Africa Scenarios Project.

Spending more buys better health and more years of life

What, then, does spending an additional US\$ 125 billion 'buy' for Africa, if it follows the 'Times of transition' path rather than the 'Traps and legacies' path?

First, the additional money buys fewer HIV infections and extra years of life. How many fewer infections? How many extra years of life? One way to answer these questions is to compare the results of the more optimistic scenarios to the less optimistic 'Traps and legacies' scenario.

For example, over the period 2003 to 2025, there would be 43 million fewer people infected with HIV under the 'Times of transition' scenario than under 'Traps and legacies' (**Figure 77**). The additional spending required for the HIV prevention component under the 'Times of transition' scenario—around US\$ 50 billion—may reasonably be considered as a key component contributing to the lower number of infections (though the 'Times of

Figure 78 Incremental cost of prevention in Africa, over and above the 'Traps and legacies' scenario, 2003–2025

Incremental cost (US\$)	Scenario	
	Tough choices	Times of transition
Per infection averted	800	1 160
Per QALY saved ^a	20	29

^aThe QALY calculation is based on the incremental or additional number of infections averted in each scenario, using 'Traps and legacies' as a baseline. The calculation assumes that a typical HIV infection occurs at age 25, and average life expectancy is 65. One infection averted thus yields an additional 40 years of working life. Because the calculation was based only on infections averted and not on years of life gained through antiretroviral therapy, only prevention costs are taken into account.

Figure 79 **Adult HIV prevalence in Africa, by scenario, 1980–2025**

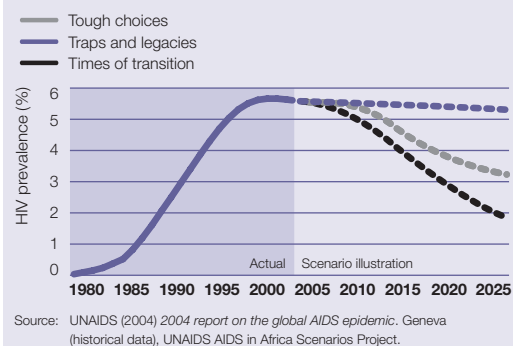
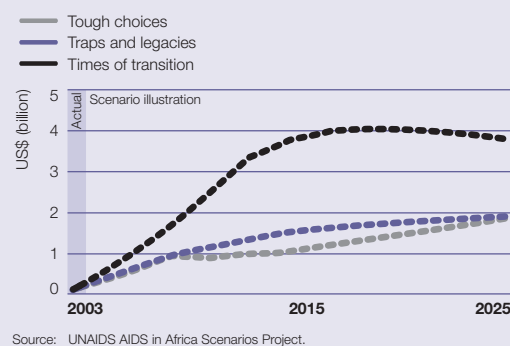


Figure 80 **Annual expenditure on care and treatment in Africa, by scenario, 2003–2025**



transition' scenario makes it clear that substantial social and economic change are also required).

Taking 'Traps and legacies' as a baseline, the additional costs for 'Times of transition' and 'Tough choices' can be presented as an incremental cost per infection averted (Figure 78). This analysis shows that the 'best buy' in terms of greater cost-effectiveness of the proposed interventions can be attributed to the 'Tough choices' scenario, reflecting the 'tough choice' approach of that scenario. In 'Tough choices', the easy-to-reach groups are covered, rather than the hard-to-reach groups, and the incremental cost of achieving one fewer infection, compared to 'Traps and legacies', is US\$ 800. The cost per infection averted under 'Times of transition' averages nearly 50% more than under the 'Tough choices' scenario, due to higher costs in preventing HIV infection in populations that are more difficult to reach.

Epidemiologists and health economists often estimate the cost-utility of an intervention by calculating the number of additional years of life attributable to a health intervention. In this case, each infection saved under 'Times of transition' and 'Tough choices' can be compared to 'Traps and legacies' with each infection avoided assumed to be equivalent to 40 additional years of life.

Cost-benefit analysis is only one, narrow, way of interpreting the benefits of responding rigorously to HIV. Beyond these calculations, there is a far broader benefit from the concerted response to HIV and AIDS explored under the 'Times of transition' scenario. Spending directed at controlling the epidemic serves, in effect, to so marginalize the disease as to gradually end the need for maintaining a high level of spending beyond 2025. Also, in the years beyond, both lives and money would be saved in substantial numbers and amounts. Diminishing the impact of the epidemic could more than make up for earlier expenditures by increasing growth and stability in African countries.

Spending money to save money

Prospective spending in the 'Times of transition' and 'Tough choices' scenarios would likely be substantially lower than the costs the spending would avert. A widespread and unchecked epidemic would persist under the 'Traps and legacies' scenario, even with expenditures that total US\$ 70 billion in a quarter century and amount to US\$ 4 billion annually by 2025. Under the 'Times of transition' scenario, spending in 2025 will be US\$ 11 billion, almost three times the level under 'Traps and legacies', but with a vast difference in terms of potential outcomes.

Under 'Traps and legacies' in 2025, HIV would remain a clear and present danger, with more than 40 million adults and children infected, amounting to 3% of the population (or over 5% of adults, see Figure 79). Under 'Times of transition', the African AIDS epidemic should be in decline, with only 2% of adults infected.

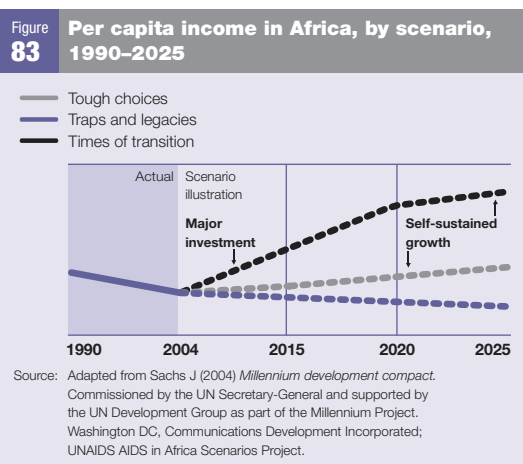
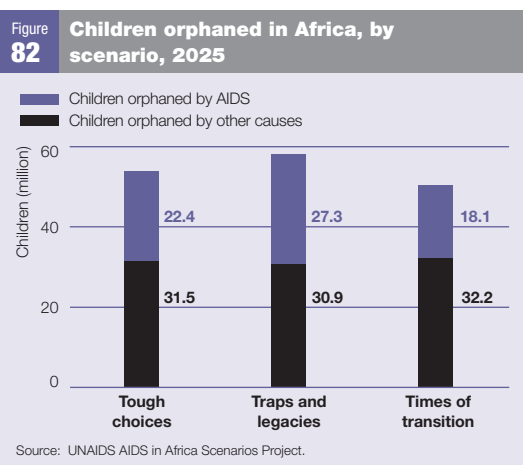
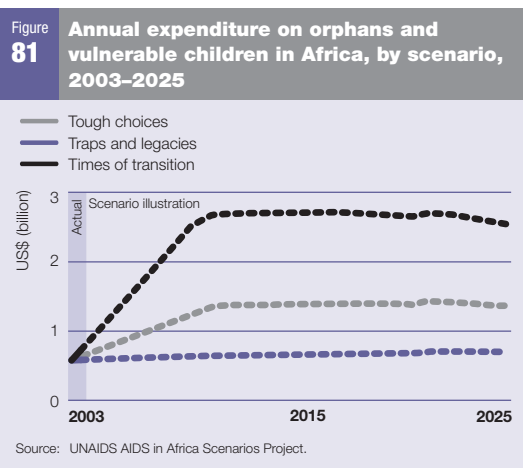
The balance between prevention and care

When HIV prevalence stabilizes or drops, the first positive financial effects of earlier resource expenditure become noticeable in declining costs for care and treatment. Care and treatment costs in the 'Traps and legacies' and 'Tough choices' scenarios grow steadily throughout. Alternatively, annual costs for care and treatment in 'Times of transition' begin to decline as early as 2017.

The rapid roll-out of antiretroviral therapy under 'Times of transition' shows the greatest overall spending on care and treatment, providing 57% coverage by 2012. This scenario also presents the most dramatic evidence of a decrease in absolute demand for antiretroviral therapy.

Orphans and vulnerable children

Resources expended on orphan support services remain constant at 2003 levels for the 'Traps and legacies' scenario throughout the period of the



scenario. Under 'Tough choices', expenditure is double that of 'Traps and legacies' by 2010 and remains at just under US\$ 1.5 billion annually through to 2025. Under 'Times of transition', spending on orphans and vulnerable children is much higher, rising to and remaining above US\$ 2.5 billion per year throughout the period.

The number of children orphaned by AIDS continues to grow under 'Traps and legacies', reaching more than 27 million by 2025. That number could already be in decline at the end of the period for both the 'Tough choices' and 'Times of transition' scenarios. After 2025, the number of orphans and vulnerable children and associated costs are expected to decline further under both these scenarios, unlike the 'Traps and legacies' scenario.

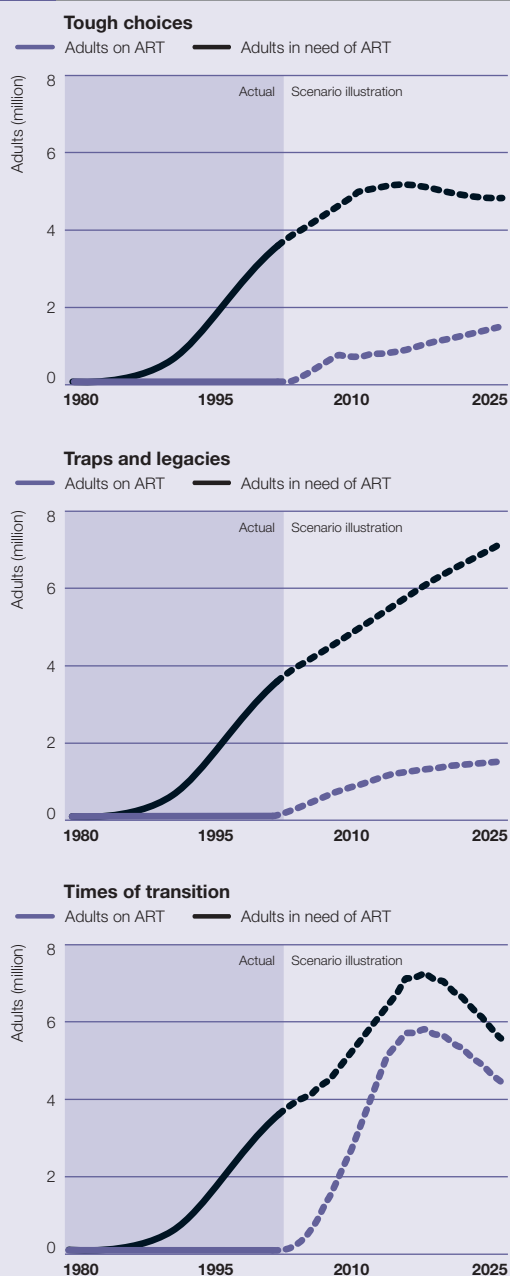
Per capita income in Africa

This section provides an analysis of how the different scenario paths interact with per capita income.

In 'Tough choices', the average aggregate economic growth is in the region of 2% per year, slightly exceeding the rate of population growth in some regions. Up to 2015, aid is accompanied by significant amounts of foreign direct investment (FDI) from within Africa itself, enabling improvements in infrastructure. Later, this, along with more beneficial international trade agreements, prompts a return of overseas FDI. Growing confidence is promoted by a local environment that is better able to sustain its own economic growth thanks to the investments made by African governments in setting their house in order.

In 'Traps and legacies', FDI into, and aid to, African countries drops, and African countries fail to secure improved multilateral trade conditions. The long-term aggregate result is a reduction in per capita incomes. Moreover, because economic growth does not keep pace

Figure 84 Adults receiving, and in need of, antiretroviral therapy in Africa, by scenario, 1980–2025



Source: UNAIDS (2004) 2004 report on the global AIDS epidemic. Geneva (historical data); UNAIDS AIDS in Africa Scenarios Project.

with the demands of the growing population, most of the economic gains made in some parts of Africa disappear.

In 'Times of transition', an average economic growth of 4% per year exceeds population growth and results in increased per capita income. Until 2020, massive investments, through large injections of aid and the facilitation of trade, mean that greater investments can be made in human capacity and infrastructure. Importantly, investments over the longer term are aimed at making Africa a more competitive producer and a more diversified exporter. This means that more funds generated by trade can be reinvested to strengthen economies after 2020, when they become increasingly self-sustaining.

Success stories of early interventions

The relative success of the more expensive scenarios should be evident by 2025, perhaps even by 2015. Differences in mortality between the three scenarios are directly related to the number of people receiving antiretroviral therapy. In 'Traps and legacies', the antiretroviral therapy roll-out fails, while in the 'Times of transition' scenario the roll-out has a significant impact on mortality.ⁱⁱ

These impressive achievements serve as indicators that substantial early spending can have timely and positive effects on the epidemic. Costs are still relatively high by the end of the scenarios—but the higher the spending at 2025, the faster the costs can be reduced in subsequent years.

The likely increases in societal well-being achieved by these changes promise to more than make up for the costs incurred as one looks beyond 2025 into a future in which AIDS is no longer an unstoppable epidemic impacting the future development of Africa.

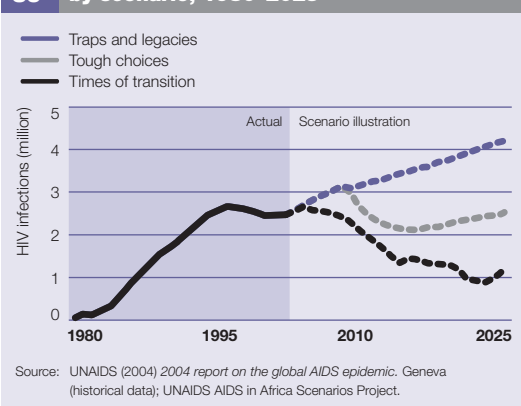
ⁱⁱ Those people in need of ART in any year are defined as those people becoming newly eligible for ART, plus those people already on ART in the previous year who will successfully continue on ART in this year. In the 'Times of transition' scenario, there are many more people on ART and many of them continue on ART in the following year. Thus, the total need is higher than for a scenario where only a few people are already on ART and the need is mostly for those newly progressing to AIDS. Most of the people defined as needing ART in the 'Times of transition' scenario are not defined as needing ART in the other scenarios because they have already died.

Figure 85 **Population in Africa, by region and scenario, 2004 and 2025**

Region	Year		2025					
	2004		Scenario					
			Tough choices		Traps and legacies		Times of transition	
Africa	813		1 230		1 220		1 240	
East Africa	195	24%	325	26%	322	26%	329	27%
West and Central Africa	314	39%	501	41%	501	41%	504	41%
Southern Africa	130	16%	176	14%	172	14%	179	14%
North Africa	174	21%	226	18%	226	19%	226	18%

Source: UNDP Population Division; UNAIDS AIDS in Africa Scenarios Project.

Figure 86 **Annual new adult HIV infections in Africa, by scenario, 1980–2025**



The AIDS epidemic

The continent's total population grows from over 810 million to 1.22 billion in 'Traps and legacies', to 1.24 billion in 'Tough choices', and to 1.24 billion in 'Times of transition'. The data are calculated using the *UN Population Division's* medium fertility variant, and the resulting population differences are exclusively due to the impact of the AIDS epidemic (increasing deaths and fewer births) and of the AIDS programmes (lives extended, infections averted, and consequently more births).

The number of people in each region and the relative percentage of the total population are indicated in **Figure 85**. West and Central Africa increase both in actual number of people and relative proportion of the population of Africa. By contrast, Southern Africa, shows an increase in the actual number of people, but a reduction in the percentage of its population relative to that of the continent.

People newly infected with HIV

One of the more dramatic differences between the scenarios is the picture of the number of people newly infected with HIV. The 'Traps and legacies' scenario shows a rapid rise in HIV incidence throughout the period, and by 2025 there are more than 4 million new adult infections per year. 'Times of transition' shows a significant decline in HIV prevalence, but the actual number of people newly infected begins to rise again towards the end of the period, because the population continues to grow.

Incidence is tied to prevention spending, so, for example, the incidence numbers for 'Tough choices' and 'Traps and legacies' diverge shortly after 'Tough choices' shows a marked increase in prevention spending over 'Traps and legacies'.

Figure 87 **Adults living with HIV and AIDS in Africa, by scenario, 1980–2025**

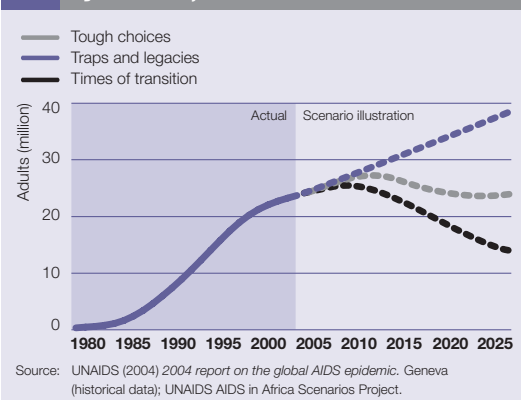
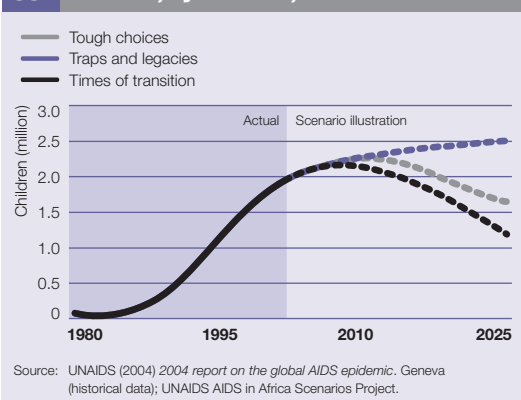


Figure 88 **Children living with HIV and AIDS in Africa, by scenario, 1980–2025**



Adults living with HIV and AIDS

Reflecting differing levels of commitment to prevention programmes and changes in incidence, the number of adults living with HIV and AIDS diverges considerably for the different scenarios.

AIDS erodes the human capacity of health care systems and significantly increases the burden of disease, as AIDS-related illness both prevents patients with other conditions receiving the care they need, and prompts the resurgence of other diseases, such as TB and pneumonia.

Figure 89 shows how trends in TB incidence follow close behind trends in HIV incidence in the three scenarios.

Children living with HIV and AIDS

The number of children living with HIV and AIDS also begins to diverge early across the three scenarios, reflecting prevention and treatment roll-out.

People dying from AIDS

The 'Traps and legacies' scenario results in 66 million cumulative adult deaths from AIDS by 2025. In 'Tough choices', the cumulative total will be 60 million, and in 'Times of transition', the total will be 53 million. This is perhaps the harshest message of these scenarios: that no matter what policy direction is followed, the death toll will continue to rise over the next 20 years. However, there are many millions of deaths from AIDS that can be prevented.

Scaling up prevention

Both 'Tough choices' and 'Traps and legacies' expand prevention spending only slowly from the 2003 level of about US\$ 0.8 billion per year (Figure 92).

In 'Traps and legacies', the average annual rate of growth of spending is 2.6%, which is only the same as the growth rate of the population.

Figure 89 Trends in adult HIV prevalence and TB incidence per 100 000 adults per year in Africa, by scenario, 1980–2025

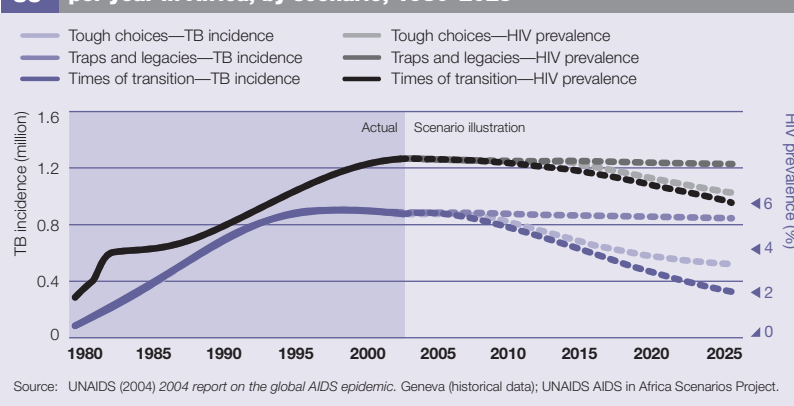


Figure 90 Cumulative and annual adult deaths from AIDS in Africa, by scenario, 1980–2025

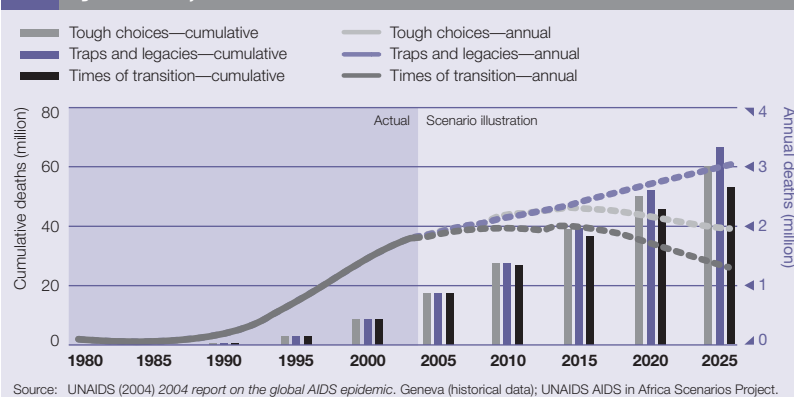
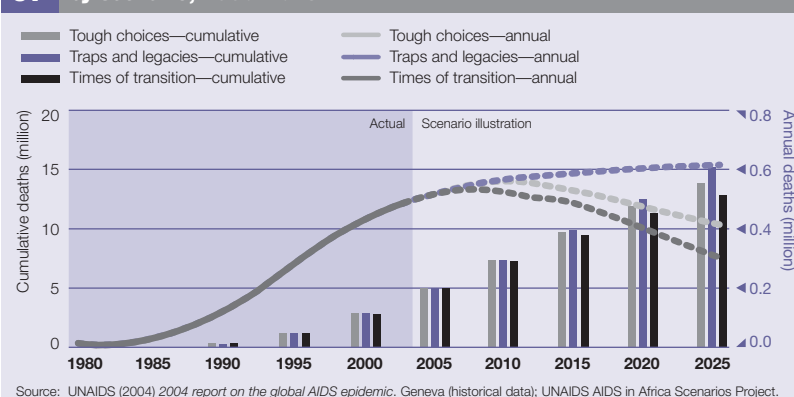
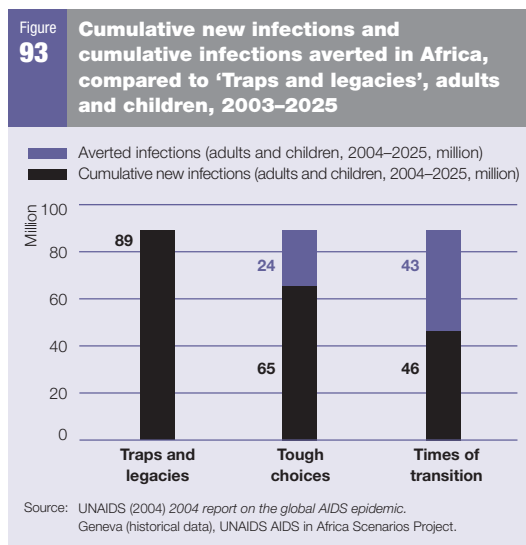
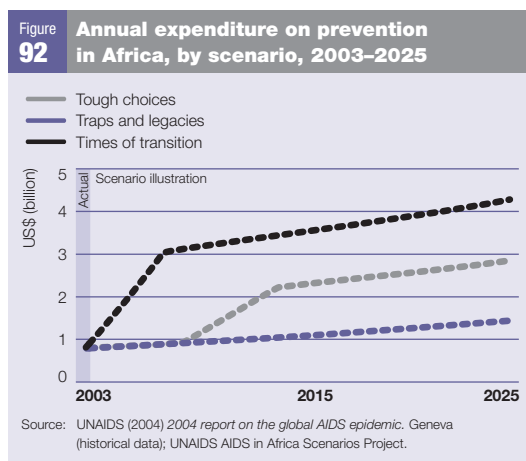


Figure 91 Cumulative and annual child deaths from AIDS in Africa, by scenario, 1980–2025





'Tough choices' increases prevention resources at more than twice that rate: rising slowly at first, accelerating for a number of years, and then levelling off at the growth rate of the population. Under 'Times of transition', prevention spending rises by a significant 40% per year for the first four years, to reach US\$ 3 billion per year by 2007, and then continues to expand at the rate of population growth to maintain per capita services at a constantly high level. This early commitment of funds contributes to the powerful impact on incidence in this scenario. Spending on prevention early on leads the 'Times of transition' scenario to yield fewer than half the number of new HIV infections per year in 2025 when compared to the 'Traps and legacies' scenario.

Figure 93 illustrates the number of new infections averted across the three scenarios. 'Traps and legacies' indicates that, as prevalence remains more or less constant over the years of the scenario and population grows, there are some 89 million new HIV infections across Africa. In 'Times of transition', with maximum roll-out of prevention interventions and high levels of antiretroviral therapy roll-out, 43 million new HIV infections are averted when compared to 'Traps and legacies'. In 'Tough choices', with its more limited expenditure on all interventions, 24 million infections are averted when compared to 'Traps and legacies'.

¹ Dye C, et al (1998) Prospects for worldwide tuberculosis control under the WHO DOTS strategy, *The Lancet*, 352:1886.

² The National Automobile Dealers Association (NADA) reported that total dollar sales of new-car dealerships reached US\$ 700 billion in 2003, of which 60% (US\$ 420 billion) was through new vehicles departments. *AutoExec Magazine* (May 2004) NADA. Available at <http://www.nada.org>

Figure 94 Comparing key elements across the scenarios

Key issue or theme	Tough choices	Traps and legacies	Times of transition
Education	High prevalence countries (HPCs) recognize the need to rebuild capacity rapidly: emphasis on secondary and technical education, not universal primary education. Impact of schooling on epidemic effectively leveraged. Teachers seen as key and receive antiretroviral therapy.	Education for All and Millennium Development Goals not met; considerable impact of epidemic on teachers who, in many countries, receive only limited access to antiretroviral therapy. Education not used effectively to respond to the epidemic. Large percentage of children in HPCs, especially orphans and vulnerable children, fail to complete basic education. Education infrastructure fails to keep pace with population growth.	Sufficient political will and finance leads to maximum leveraging of education system in response to HIV. Major efforts to educate girls. Teachers gain effective access to antiretroviral therapy, rapidly change behaviour, and lead by example.
Health sector development	Ill health and malnutrition seen as a major economic burden, constraining national development. Different diseases prioritized in different countries; malaria gains in status. Health care provision in small urban centres concentrated and rationalized; rural work given to faith-based and NGO providers. Some traditional practices leveraged in national interest. No parallel HIV- and AIDS-specific structures.	Growing external funds for health sector development—but not used effectively. Growth in antiretroviral therapy leads to parallel systems, draining key public-sector staff into externally-financed HIV and AIDS projects. In HPCs, rural primary health care systems collapse. Increasing use of traditional medicine. Immunization rates do not keep pace with growing populations.	Best use of increasing external aid flows in HPCs to kick-start health systems. International commitment to Millennium Development Goals increases overall funding for health sector, largely through sector-wide and budget-wide mechanisms. Effective use of managed networks of providers, with government setting standards and directing efforts. Brain drain managed.
HIV prevention	Emphasis on AIDS-free future drives vigorous prevention campaigns in most countries. Some adopt high rates of condom use, legalize and regulate prostitution, and emphasize STI treatment. Others hold more conservative ethos, which can lead to coercive and sometimes counterproductive approaches. Generally, collective good supersedes individual rights and choice. Falling incidence overall.	AIDS policy increasingly focused on treatment. Continued lack of agreement or coordination around effective HIV prevention and emphasis on 'high risk behaviour and personal behavioural change' renders increasing resources and efforts ineffective. Little emphasis on context driving risk behaviour. Major initiatives in voluntary counselling and testing not pursued and new infrastructure wasted.	Best use made of lessons of previous 20 years of epidemic. Strong synergies achieved between treatment and prevention approaches, and the number of people knowing their HIV status rises. Imaginative application of a variety of strategies means maximum appeal to many different audiences. Mother-to-child-transmission therapy effectively rolled out in HPCs and becomes a gateway for further prevention and treatment efforts.
Impact of the epidemic	Awareness of future impacts drives efforts to retain a minimum of skilled essential personnel and to create long-term strategic approaches. Largely successful, but with some short-term cost. Improving food self-sufficiency improves nutrition of general population.	Some countries and sectors do better than others, but overall efforts to address impact are sporadic and uncoordinated, with short-term time horizons. In HPCs, the long-term impact continues to be underestimated and psychological impacts rarely effectively addressed. By 2025 HPCs hard hit at all levels, with impacts spilling over into lower prevalence countries.	Availability of sufficient funds means that short-term, pragmatic responses to immediate needs do not sabotage longer-term efforts to mitigate impact. Full understanding of impacts, shared with wider community of actors, leads to joined-up, effective, strategic approaches, tailored to context and involving relevant communities.

Comparing key elements across the scenarios (Continued)

Key issue or theme	Tough choices	Traps and legacies	Times of transition
Biomedical approaches	<p>Gradual progress in biotech research and clever use of scientific advances.</p> <p>Microbicide use is encouraged in some countries, viewed with suspicion in others.</p> <p>Investment in tertiary and technical education means more local capacity.</p> <p>Growth of biotech industries in some countries leads to local breakthroughs.</p>	<p>Development of microbicide, vaccine, and new therapeutics proceeds, but slowly, hampered by underfunding, competition, and redundancy. Competition over Phase III clinical trial sites limits opportunities. Poor health systems and inadequate preparation mean that even major breakthroughs are inadequately rolled out.</p>	<p>Significant funding increases for international public goods leads to rapid breakthroughs in drugs and other approaches to malaria, TB, and HIV.</p> <p>Consolidated, international approaches lead to an HIV vaccine with an improved version by 2025, delivered with childhood immunization. Widespread availability of microbicides. Biomedical approaches matched with social and systems developments, improving their accessibility and use.</p>
Overall focus on HIV and AIDS	<p>Political rhetoric not matched by sustained increases in resources by external partners: Africa must seek its own long-term solutions to HIV and AIDS. HIV seen in many countries as indication of overall crisis of underdevelopment, poverty, and poor governance. Governments look for cost-effective ways of managing this larger agenda.</p>	<p>At the start, HIV and AIDS are the major focus of national and international efforts, but efforts are uncoordinated, and competition for scarce human and systems resources leads to waste and burn-out. Solutions imposed on, rather than owned by, African partners. Failure to tackle the epidemic effectively leads to political disengagement; resources fall. By 2025, AIDS has become normalized, much like malaria, but far more catastrophic. Poorer people are far more vulnerable to the epidemic.</p>	<p>Spread of HIV is seen as a metaphor for global injustice and inequality and is addressed as a priority by the international community, under the leadership of African countries. Fundamental changes in international architecture enable Africa to address deep-seated structural problems that are the wider cause of the epidemic.</p>
HIV and AIDS programme governance	<p>Seen as part of larger governance agenda and resourced appropriately.</p> <p>Decentralization via traditional authority structures leads to mixed outcomes: some highly effective. In HPCs, strong central control of resources to ensure maximum leverage. Governments impose discipline on donors.</p>	<p>Generally contested and confused (but with important exceptions). Large external resources fuel competition between government departments, resulting in wasteful duplications. Control either over-centralized or decentralized, without adequate structure or accountability.</p>	<p>Strong central leadership, with government acting as coordinator, standard-setter, and facilitator of a plethora of initiatives. Major emphasis on synergy and harmonization, from largest to smallest partners. HIV and AIDS seen in context of overall national budget and sector priorities, though with some ring fencing of HIV- and AIDS-specific funds.</p>

Comparing key elements across the scenarios (Continued)

Key issue or theme	Tough choices	Traps and legacies	Times of transition
National leadership and governance	The AIDS epidemic plunges Africa into social, political, and economic austerity. African governments are forced to make tough choices. Approaches and perceptions of crisis are disparate, but innovative and often collaborative approaches are employed. Governments build alliances across society, mobilize private sector support, and coopt civil society and traditional leaders. Resources from within and outside the continent used more efficiently.	The social, political, and economic strains of AIDS begin to fragment society and reverse advances in governance, human rights, and the rule of law. The epidemic undermines democratic institutions, public service parastatals, and security agencies; and disrupts social, political, and economic processes. It triggers unrest and exacerbates existing tensions, as groups compete for increasingly scarce resources and power. As the epidemic worsens, regime security begins to supersede human security—even as the legitimacy and relevance of the state erodes. African governments lack concerted or coordinated response. Several states collapse or fragment into ethnic, class, or religious enclaves; conflict is rampant.	Characterized by new leadership, alliances, and global partnerships and rules. Partnerships between governments, civil society, and the private sector help build capacity, not only to combat the virus, but also to ensure the functioning of institutions and delivery of public services, and facilitate sustainable economic growth and development. Good governance, vibrant civil society, and more equitable international systems help Africa rebuild its social, economic, and political structures.
Poverty	More inclusive labour markets and other activities to tackle underdevelopment. Poverty reduction is quite swift in relative terms, with the proportion of people living on less than US\$ 1 per day falling from 50% in 2000 to 33% in 2025 in the sub-Saharan Africa region; and the actual number increasing only slightly, from 303 million to 323 million. Also, as more people are put to work (often through government schemes), poverty in monetary terms may not preclude access to services.	Maintenance of existing revenue allocation structures and economic strategies mean that, in sub-Saharan Africa, the proportion of people living on less than US\$ 1 per day decreases negligibly from 50% in 2000 to 49% in 2025. As population grows, the actual number of absolute poor increases by 50%, from 303 million in 2000 to 458 million in 2025.	National and international imperative to reduce poverty and improve human development. Governance improvements pay off and sub-Saharan African poverty is reduced, in both relative and actual terms, to 22% of people living on less than US\$ 1 per day in 2025, equivalent to 216 million people.
Orphans and vulnerable children (OVCs)	Long-term view of OVC issues dictates rapid implementation of policies designed to improve their life chances in most HPCs. Financial constraints mean institutional approach not an option; emphasis instead on strengthening family and community capabilities, and ensuring all children have access to an education. Task forces develop subnational and community efforts, with the aim of bringing OVCs together in community-led groupings. Faith-based groups and community women's organizations play major role. Large numbers of OVCs absorbed into public works programmes.	Emphasis on issues caused by OVCs rather than on the plight of children. Legislation to protect OVCs in some countries, but not translated into policy or practice. Extended family increasingly unable to cope, receiving no additional support. Orphan-headed households show courage and resilience, but lack of socialization inevitable, perpetuating intergenerational poverty. Many children turn to gangs and rebel armies for survival. Many infected with HIV while young.	Civil society pressurizes state and international bodies. UN Special Session on OVCs provides focus for global process; action plans built into national development plans of most African countries, guided by African Union Commissioner. Desire for AIDS-free generation demands special efforts for the most vulnerable. Governments expected to be accountable, providing leadership and policy. Highly decentralized service delivery leads to appropriate resources for community-level programmes, etc. Widescale roll-out of antiretroviral therapy leads to less morbidity and fewer orphans.

Comparing key elements across the scenarios

Key issue or theme	Tough choices	Traps and legacies	Times of transition
Gender	Gender relations begin to change, under the twin demands of economic development and lowering HIV prevalence. Reform of property rights plays fundamental role. The growing integration of women is pragmatic, rather than ideological, as female education and training opportunities open up. In some countries, limited electoral reform allows women to play a greater role in government. However, in other countries, ideological opposition to women's equality prevents substantial change.	Existing gender relations continue: women continue to bear the burden of coping with the epidemic, both in terms of living with the virus and caring for the infected. Young women continue to have higher rates of HIV infection than their male peers. Élite women continue to do well. Poorer women, on coming of age, find they have fewer opportunities than their mothers and grandmothers. Current negative masculine behaviour is reinforced, as scarcity of money, food, employment, and hope drives aggression and conflict.	Major efforts to educate girls lead to a gradual shift in expectations among educated women, which is increasingly reflected in the socialization of their sons. Rapid modernization and urbanization provides new scripts for male behaviour and attitudes. In rural areas, increasing flows of funding for community development go through women's collectives, as their track record of investment decisions is excellent. Within a generation, many women are more able to change their behaviour rapidly than their male counterparts.
People living with HIV and AIDS (PLWHA)	PLWHA are involved in HIV-prevention programmes, though not without tension. More open approach to HIV reduces stigma in some countries and PLWHA are less afraid of disclosure, though antiretroviral therapy is limited. In other countries, stigma still prevalent. More efforts to ensure roll-out of cotrimoxazole, TB prophylaxis, morphine, and other simple drugs.	Stigma persists: social costs of admitting to being infected continue to outweigh the perceived benefits. Few medical advantages: few PLWHA can access antiretroviral therapy. In policy terms, stigma leads to a failure to involve PLWHA in prevention. Even where PLWHA are consulted, they are excluded from key programme decisions.	PLWHA are catalysts for broader transformation. Integrated approach to HIV and AIDS brings benefits ranging from better psychosocial support to more opportunities for treatment. Growing community cohesion means less stigmatization. Improved service quality includes increased respect for confidentiality.