E. Expenditures on HIV/AIDS in Tanzania

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Section One: Background

The first three cases of AIDS in Tanzania were reported in 1983. By December 1994, a cumulative total of 53,247 cases had been reported. However, this probably represents only one-fourth to one-sixth of the true number of AIDS cases. The National AIDS Control Programme (NACP) estimates that about 200,000 people have acquired AIDS since 1983. The number of people with HIV is even more alarming; according to estimates based on blood donor prevalence, by 1995 as many as 1 million to 1.5 million Tanzanians could have been infected since the beginning of the epidemic (URT 1995).

A national policy on HIV/AIDS/STDs was put into effect in 1995 by the government of Tanzania, the goal of which is to mobilise and sensitise the community to get actively involved in preventing further transmission of HIV and to cope with the social and economic consequences of AIDS. Specifically, the policy aims to:

- increase the community's awareness of HIV/AIDS and its consequences through information, education, and communication
- prevent further transmission of HIV/AIDS through the use of such preventive measures as safer sex, testing, and counselling
- provide infected persons and their caregivers with appropriate social, medical, physical, and spiritual support through the existing health care system and through home-based care
- safeguard the rights and interests of infected persons by preventing discrimination in relation to employment, housing, treatment, travel, education, and other social services
- support and promote research activities geared to strengthening the national efforts toward control and prevention of HIV/AIDS/STDs
- safeguard the rights of the community as a whole against infection with HIV/AIDS/STDs

- define and coordinate the roles of different players involved in AIDS control and prevention
- create a national institutional framework that will coordinate the mobilisation of financial, human, and material resources for AIDS prevention and control.

The national policy on HIV/AIDS/STDs stipulates that HIV/AIDS patients receive the same level of care as other patients. Counseling is expected to be a basic component in the care of HIV/AIDS patients. The government encourages home-based care, where patients can be cared for and nursed by family members, though effective mechanisms to ensure home-based care are yet to be put in place. The policy also enumerates specific strategies for prevention of HIV/AIDS, including activities 'targeted to those groups involved in high risk behaviour', though cultural, religious, and political factors have precluded significant government-supported activities directed at these groups.

This study examines expenditures on AIDS, how they are broken down by source of financing and by intervention, and their major determinants. We use both quantitative data from research studies and government documents and secondary qualitative information. In addition, this study has benefitted from information obtained from the proceedings of a workshop attended by experts in clinical, epidemiological, social, and economic aspects of HIV/AIDS, and from interviews of officials in the government and NGOs whose activities include treatment, prevention, and/or mitigation of the impact of AIDS.

Section Two: Sources of funding and pattern of expenditures

In Tanzania there are four major sources of funding for the treatment, prevention, and mitigation of the impact of AIDS: government, donors, private individuals, and employers. Analysis of expenditure by the government, donors, and individuals is based on a World Bank study of health expenditures in East Africa in 1993 (World Bank 1996); we have integrated estimates for employer expenditures.[1] No attempt was made to account for insurance expenditures because health insurance is as yet quite uncommon in Tanzania. Allocations for HIV/AIDS and STDs are aggregated (except in the analysis of specific prevention strategies below).

Curative care (treatment) includes outpatient and inpatient care of AIDS and opportunistic infections. Prevention includes two types of activities – those directed at individuals, such as STD treatment, the screening of blood for transfusion, and distribution of condoms, and those directed to populations, such as education and mass information campaigns. Activities to mitigate the impact of AIDS, such as the care of orphans, account for substantial expendi-

tures as well, but while some information is presented on the expenditures of NGOs, no systematic estimates could be made for the country as a whole.

Government spending on curative AIDS/STD services may be underestimated in the World Bank (1996) study because it likely excludes spending on treating patients abroad for Kaposi's sarcoma, complicated tuberculosis, and so on without specifically classifying these conditions as AIDS-related. Donor expenditures classified as 'preventive' draw on some of the curative resources supplied by government. For example, donors use hospital staff to carry out certain preventive activities, but the staff time is counted as being spent on 'curative' activities. Thus, government expenditure on preventive health is probably also underestimated. Finally, private spending on preventive health may be underestimated because it is based on household budget surveys, which generally collect data only on expenditure on curative care.

2.1 HIV/AIDS/STD expenditures vs. total health expenditures

Most financial resources in the Tanzanian health sector are allocated to treatment – 59.5 per cent of total health care expenditures (table 1). Prevention interventions receive 39.6 per cent of total health expenditures. In contrast, most financial resources for HIV/AIDS/STDs are allocated to prevention (84.1 per cent) (table 2).

Table 1. Total health spending by use and source of finance, 1993 (millions of Tshs)

	Use							
	Prevention		Treatment		Nonessential		Total	
Source	**Tshs**	**(%)**	**Tshs**	**(%)**	**Tshs**	**(%)**	**Tshs**	**(%)**
Government	4,205	(21.1)	14,845	(74.7)	868	(4.4)	19,918	(100)
(%)		(10.3)		(24.3)		(100)		(19.4)
Donors	29,513	(86.7)	4,534	(13.3)	0	(0)	34,047	(100)
(%)		(72.4)		(7.4)		(0)		(33.1)
Private	7,059	(16.9)	34,796	(83.1)	0	(0)	41,855	(100)
(%)		(17.3)		(56.8)		(0)		(40.7)
Employers	0	(0)	7,034	(100)	0	(0)	7,034	(100)
(%)		(0)		(11.5)		(0)		(6.8)
Total	40,777	(39.6)	61,209	(59.5)	868	(0.8)	102,854	(100)
(%)		(100)		(100)		(100)		(100)

Source: World Bank (1996) and authors (for employer data).

Table 2. Total spending on HIV/AIDS/STDs by use and source of finance, 1993 (millions of Tshs)

	Use					
	Prevention		Treatment		Total	
Source	**Tshs**	**(%)**	**Tshs**	**(%)**	**Tshs**	**(%)**
Government	178	(24.8)	540	(75.2)	718	(100)
(%)		(1.6)		(25.6)		(5.4)
Donors	10,974	(98.6)	155	(1.4)	11,129	(100)
(%)		(98.3)		(7.3)		(83.8)
Private	17	(1.6)	1,063	(98.4)	1,080	(100)
(%)		(0.2)		(50.4)		(8.1)
Employers	0	(0)	352	(100)	352	(100)
(%)		(0)		(16.7)		(2.6)
Total	11,169	(84.1)	2,110	(15.9)	13,279	(100)
US$ (000)	27,578		5,210		32,788	
(%)		(100)		(100)		(100)

Source: World Bank (1996) and authors (for employer data).

Private individuals finance the largest share of curative services, overall and for HIV/AIDS/STDs, accounting for half of curative care for HIV/AIDS/STDs and 56.8 per cent of curative care for all health conditions. The extent of government subsidy for care is similar for HIV/AIDS/STDs and all health care – about a quarter of all costs are paid for by government. Firms pay 11.5 per cent of expenditure on all curative care and 16.7 per cent of expenditure on curative HIV/AIDS/STD care.

An accurate estimation of the cost of hospital days for AIDS was beyond the scope of this study. However, Pallangyo and Laing (1990) estimated the average lifetime cost per AIDS case at Tshs 55,917 (US$347) for adults and Tshs 37,541 (US$266) for children. The number of hospital days per AIDS patient was estimated to be 31.9 for adults and 21.6 for children. At the time their study was performed this represented 12 per cent and 13 per cent of total days of care for adults and children, respectively.

Donors fund a very large share of preventive expenditure – nearly three-quarters of total health prevention (72.4 per cent) and nearly all of HIV/AIDS/STD prevention (98.3 per cent). Because of the large share of prevention interventions financed by donors and the large amount spent, donors fund a third of all health spending in Tanzania and 83.8 per cent of all spending on HIV/AIDS/STDs – a larger share in both cases than that of the government. The contribution of government to health and HIV/AIDS/STD spending is therefore very small – 19.4 per cent of total health spending and 5.4 per cent of spending on HIV/AIDS/STDs. Roughly three-quarters of government funds for health generally and for

HIV/AIDS/STDs are allocated to curative care, while nearly all donor spending is allocated to prevention. Likewise, almost all private expenditure is for curative care.

2.2 Expenditures for prevention

Further analysis was carried out to break down prevention into its component parts: information/education/communication (IEC), blood screening, STD control, and condom distribution (see table 3). These analyses were carried out using actual expenditures recorded by the NACP for 1994 and were combined with estimates based on transfusion statistics, STD studies, and condom data from the major nongovernment distributor. However, the figures in table 3 are not strictly comparable with the 'prevention' figures from the 1993 World Bank study because of different methodologies used in defining prevention and different completeness of reporting the components of prevention.[2, 3, 4]

Table 3. AIDS prevention expenditure by source, 1994 (millions of Tshs)

	Government		Donors		Private		Total	
Intervention	**Tshs**	**(%)**	**Tshs**	**(%)**	**Tshs**	**(%)**	**Tshs**	**(%)**
IEC	0	(0)	571.7	(100)	0	(0)	571.7	(100)
(%)	(0)		(36.3)		(0)		(29.6)	
Blood	10.6	(4.1)	135.4	(52.2)	113.2	(43.7)	259.2	(100)
(%)	(23.9)		(8.6)		(36.6)		(13.4)	
STD treatment	13.2	(19.4)	9.8	(14.4)	44.9	(66.0)	68.0	(100)
(%)	(29.7)		(0.6)		(14.5)		(3.5)	
Condoms	20.6	(2.0)	860.0	(83.4)	151.3	(14.7)	1,031.9	(100)
(%)	(46.3)		(54.5)		(48.9)		(53.5)	
Total[a]	44.5	(2.3)	1,576.9	(81.7)	309.4	(16.0)	1,930.8	(100)
US$ (000)	79.4		2,815.7		552.6		3,444.7	
(%)	(100)		(100)		(100)		(100)	

Note: Exchange rate – 560 Tshs/US$1.
a. Totals may not sum due to rounding.
Source: Authors' estimates from NACP (1994) and the Tanzania AIDS Project, funded by USAID.

Table 3 shows that about half of actual expenditure on four prevention activities in 1994 was spent on condoms (53.5 per cent), followed by IEC (29.6 per cent), blood safety (13.4 per cent), and STD control (3.5 per cent). Roughly half of all preventive spending by the government, donors, and private individuals was for condoms.

Overall, donors financed 82 per cent of expenditures on these four prevention activities. They bore 83 per cent of the costs of condom distribution, 52 per cent of the cost of safe blood supply, and 14 per cent of the costs of STD

treatment. Private individuals paid two-thirds of the costs of STD treatment, 44 per cent of the costs of safe blood, and 15 per cent of the costs of condom distribution. Finally, the government paid for 19 per cent of the cost of STD treatment, 4 per cent of the costs of safe blood, and only 2 per cent of the costs of condom distribution.

2.3 Expenditures on mitigating the impact of HIV/AIDS

Levels of spending on mitigating the impact of AIDS are anecdotal and not based on systematic data collection. In 1994, donors spent about Tshs 66.64 million (US$119,000) on mitigation through the NACP (NACP 1994). Of this amount Tshs 32.2 million (US$57,000) was donated through one large NGO (NACP unpublished data).

Actual expenditures on mitigation most likely substantially exceed these figures. First, there are many NGOs operating in Tanzania not covered in this study that work to mitigate the impact of AIDS. Second, private individuals incur substantial expenses on mitigation. Based on the findings of Mujinja and Over (1992), Tibakweitira (1995) estimates burial and mourning expenses for 30,000 AIDS deaths per year at about Tshs 2.2 billion (US$3.9 million). In the same study, estimated expenses that community members incur in taking care of orphans were about Tshs 9.2 billion (US$16.4 million) annually. This estimate is arrived at by taking into account maintenance costs for an estimated 150,000 AIDS-related orphans (NACP 1994) and school expenses for school-age AIDS orphans taken as 50 per cent of the total number of orphans. Even these figures may be underestimated, but, nonetheless, they are a strong indication that individuals spend much more on AIDS than has been thought. Third, employers assist in burial expenses of their employees and meeting transportation costs of families of the deceased. Noting that employers contribute more than mere payment of medical bills for sick employees, one expert cited an example of a factory that spent about Tshs 12 million (US$21,400) in assisting relatives and on transportation costs for 34 dead employees to their home areas for burial.

Section Three: Determinants of the level and pattern of expenditure

Tanzania is a low-income country, with a GNP per capita of only US$140. Total spending on health in 1990 was only 4.73 per cent of GNP (US$4 per capita).

3.1 Government spending

Several factors have influenced the observed pattern of government expenditures, which strongly favors curative care but at very low spending levels. The government policy on cost recovery was in transition over the course of this study. Patients were expected to pay a very modest fee, but exemption and enforcement probably varied greatly. Therefore, government curative services were very highly subsidised. Patients' biases toward curative rather than preventive care oblige the government to spend more on curative care.

Donors favor spending on preventive health. The government, therefore, must fill the gap by spending more on curative health. The public sector in Tanzania does not procure antiretroviral AIDS drugs. These drugs may be bought and used privately on an individual basis. No estimates are available of the extent to which this occurs.

The fear of the AIDS epidemic should make it easier for the government to target prevention activities to commercial sex workers. But commercial sex work is prohibited by law, so there are political as well as cultural reasons for the government to resist supporting such prevention programmes. In fact, government has had to accept that sex workers be assisted to reduce the spread of AIDS because if the government refuses it will be denied resources by donors.

3.2 Private spending

More is spent privately on curative health care and curative HIV/AIDS/STD care than by the government. During the course of this study, the extent of privatization of the health sector was increasing. More private clinics were opening on a fee-for-service basis; previously, these types of clinics had been illegal for the most part. Patients consulting public sector health services must frequently purchase drugs, as the government stores are often out of stock.

3.3 Donor spending

Since there is no cure for HIV/AIDS, donors believe that preventive activities are more cost-effective than treatment. They are increasingly channelling their spending through NGOs. One of the incentives influencing decisions to channel funds through NGOs is that they may be easier to monitor and are less bureaucratic than the government and are believed to reach target groups more effectively.

3.4 Trends in spending

There are indications that both government and donor expenditure have fallen since 1993. There have been nominal annual increases in the government's AIDS budget, but in real terms there may not have been any progress, since inflation has been running at about 20 per cent per year. A study of the worldwide trend in HIV/AIDS funding by donor agencies indicated declining support (Mann and Tarantola 1996). AIDS funds for Tanzania from the WHO (global and extrabudgetary funding from national governments) decreased from US$2.44 million in 1992 to US$1.97 million in 1993 and to US$1.06 million in 1994. Funds from the UNDP (bilateral) decreased from US$272,680 in 1992 to US$231,176 in 1993 and to US$129,658 in 1994 (NACP 1995). A consensus of Tanzanian AIDS experts at a one-day workshop held in Dar es Salaam in May 1996 confirmed that donor funding for AIDS in Tanzania is indeed in decline.

Notes

1. Estimates of employer expenditures were based on outlays for medical treatment of employees from a large insurance company in Dar es Salaam. We then extrapolated this to the number of employed persons we thought might be compensated in this way.
2. Estimates of expenditure on transfusions in table 3 assumed that there were 93,730 persons screened, of which 7.5 per cent tested positive and had to be tested a second time. We assumed that 60 per cent of the screenings took place in government hospitals and the balance in private hospitals. The cost per screening in the public sector was assumed to be Tshs 2,500 and in the private sector Tshs 3,500. The confirmation tests were assumed to be twice as expensive. Finally, we assumed that the government financed 10 per cent of the cost of screening, private individuals 30 per cent, and international donors 60 per cent.
3. In estimating the costs of STD treatment, we assumed that 4,038 cases were seen on average in each region annually and the cost of drug treatment is about Tshs 2,500 or about US$5. We assumed that half of all STD consultations occurred in private health facilities.
4. The figure for expenditure on condoms includes 60 per cent of the cost of the Tanzania AIDS Project (USAID).

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