

# Dynamics of Disasters

## AIDS

**A**cquired Immune Deficiency Syndrome (AIDS) is a health disaster of personal, community, national and international dimensions. Several features of the pandemic justify designating AIDS as a chronic, expanding disaster.

The World Health Organisation defines health as: "A state of complete physical, mental and social well-being and not merely the absence of disease or infirmity".

This Report describes disasters as combining two elements: events and vulnerable people, with a disaster occurring when the event exposes that vulnerability and threatens people's lives or their abilities to survive. Frequent characteristics of disasters include disruption of day-to-day patterns of life, widespread suffering, and the need for protection, water, food, shelter, clothing, medical and social care.

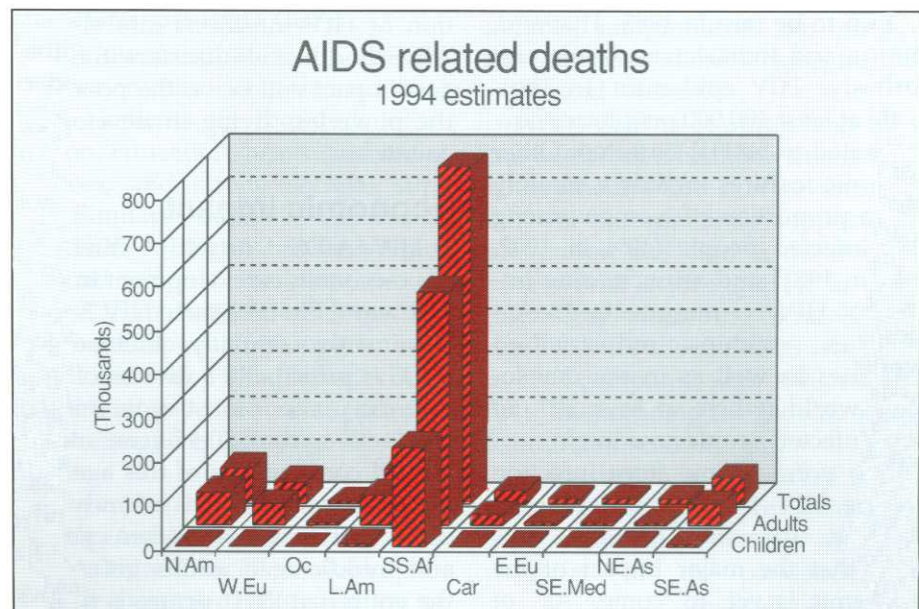
To document the health disaster of the Human Immunodeficiency Virus (HIV) and AIDS, it is neces-

ary to summarise the progress and pace of the pandemic, its economic impact and effect on communities, the basic requirements for effective prevention and acceptable care, and its political and psychological dimensions.

HIV/AIDS is currently overwhelming existing health and social capacity in many areas, and it will increasingly threaten to overwhelm societies around the world, necessitating in turn an expanded national and international response to this health disaster.

In analysing HIV/AIDS a range of figures is available. Within the United Nations system, the World Health Organisation collates statistics from governments recording their official notifications through health systems and national AIDS programmes. Also useful are assessments, figures and estimates compiled from a wider range of sources by authoritative national and international organisations which

Figure 11: AIDS-related deaths in 1994, estimates for global regions. The figures shown here are estimates based upon present records and future projections. Clearly AIDS, particularly in sub-Saharan Africa, is going to be one of the major killer disasters of the decade. (Source: Mann JM et al, *AIDS in the World*, Harvard University Press, Cambridge, USA, 1992.)



cooperate together as the Global AIDS Policy Coalition.

### **HIV/AIDS: current status**

The international spread of HIV started in the mid-1970s. By 1980, approximately 100,000 people worldwide were HIV-infected. During the 1980s, this number increased 100-fold, to 10 million. As of 1 January 1993, an estimated 12.9 million people were HIV-infected: 7.1 million men, 4.7 million women and 1.1 million children. Worldwide, one in every 250 adults has been infected with HIV.

For 1995, GAPC projects 19.8 million cumulative HIV infections, including a 50% increase among adults and a more than doubling of HIV infections among children. By the year 2000, the GAPC estimates that between 38 and 110 million adults, and at least 10 million children, will have become HIV-infected.

The HIV pandemic remains dynamic. Among countries already affected by the pandemic, the virus continues to spread. Thus, a 70% increase in HIV infections is expected in Western Europe from 1992 to 1995. However, the most dynamic feature of the pandemic involves spread to new areas of the world, particularly in the developing world. For example, there are now more than one million HIV-infected people in South-east Asia, a region in which HIV infections were known to be rare in 1985. Thailand, Burma and India have experienced explosive HIV epidemics. In Thailand, at least 400,000 people are now estimated to be HIV-infected. Other dynamic features include a steadily rising proportion of women among HIV-infected people (40% in 1992, 20% in 1981) and an increasing impact of HIV on marginalised communities within industrialised countries as well as in the developing world (where at least 80% of HIV-infected people now live).

The average time from infection by the HIV to the developing of AIDS is 10 years. Therefore, it is clear that the major impact of the pandemic is yet to come. As of

1 January 1992, a total of 2.6 million people (two million adults and 600,000 children) had developed AIDS. So far, about 90% have died. However, the number of people with AIDS is increasing rapidly, as those infected during the past decade steadily develop clinical disease. From 1992-95, an additional 2.9 million adults and 900,000 children will have developed AIDS. Thus, there will be more new AIDS cases during the next three years than occurred during the entire first decade of the pandemic. The rapid increase in AIDS, which occurs years after the HIV infections have occurred, is most dramatically illustrated in Thailand. From 1987 to 1992 there were a few hundred AIDS cases in the country, while from 1992 to 1997, at least 80,000 new cases of AIDS are projected. AIDS is already the leading cause of death among young men in New York and three other US cities. By the year 2000, as many as 24 million adults may have developed AIDS, along with at least five million children.

In summary, the global HIV/AIDS epidemic is already severe and is growing rapidly. HIV will reach most, if not all, human communities during the next decade. The impact of AIDS will expand markedly during the coming decade, as a result of new HIV infections and the relentless transformation of HIV infections into clinical AIDS, and like all disasters, the biggest impact will be on the poor and the powerless living in developing countries.

### **Economic impact**

HIV/AIDS directly threatens socio-economic development in several ways. First, because HIV is predominantly sexually transmitted, AIDS is principally a disease of persons in the most economically productive years, 20-45 years old. A second consequence of this age distribution is that AIDS is a family and community disease. When young and middle-aged adults get AIDS, the entire family structure is threat-

ened with disintegration. AIDS orphans already number approximately 1.8 million worldwide. During the next three years this number will more than double, to 3.7 million. The United Nations Children's Fund estimates that in Africa alone, more than five million children will be orphaned by AIDS by the year 2000. The loss of mothers and fathers, along with other wage earners and workers, places severe strains on family income generation, including the capacity to sustain agricultural productivity.

The direct costs of caring for a person with AIDS are approximately equal to the per capita GNP. Thus, each person-year of AIDS care in North America or Western Europe costs US\$22,000-US\$32,000, compared with US\$2,000 in Latin America and the Caribbean, and US\$400 in sub-Saharan Africa. However, these costs include only direct health care; indirect costs due to losses in productivity are many times higher.

The selective loss of young and middle-aged adults creates family and community disasters and makes AIDS unlike virtually any other health problem of the developing or the industrialised world. The societal and economic impact of AIDS is already outdistancing that of most pre-existing health conditions in heavily affected parts of the world.

## **Prevention and care**

Worldwide experience with HIV prevention has demonstrated that three elements are required: information/education, health and social services, and strong societal support. Similarly, extensive experience with HIV/AIDS care has shown that a broad range of services are required, from diagnostic facilities and treatment capacity for opportunistic infections and HIV-disease, counselling and psychosocial support, to welfare support, including food and shelter.

Prevention and care services are complex and often overwhelm existing health and social service capacity. For example, HIV screening of

blood for transfusion is necessary and relatively simple; however, the major cost in making blood safe involves pre- and post-test counselling of blood donors. People who discover they are HIV-infected face years of coping with issues of preventing transmission, fear of social stigma, and the omnipresent threat that clinical AIDS will start.

The rapidly rising demand for complex services (educational, medical, nursing, counselling, welfare) has severely strained even industrialised country systems. For example, in 1990 in the industrialised world a total of 81,000 person-years of AIDS care was needed; based on current projections, in 1995, this need will double. In Asia, the number of person-years of AIDS care required will rise four-fold during the same period. Overall, the world is facing a doubling of AIDS care needs from 1990 to 1995.

Human rights and anti-discrimination is a second major area in which services are needed. The need to protect HIV-infected people from discrimination and to ensure access to information, education and health care creates a major new burden for human rights, legal, health and social service systems. This work has been shown to be critical to protect public health, particularly as those most affected by AIDS, as by other disasters, tend increasingly to be among those most socially vulnerable, marginalised and powerless: the poor, those lacking human rights and women.

HIV/AIDS prevention and care can overwhelm health systems, both governmental and non-governmental, yet international support for prevention and care in the developing world is levelling off or even decreasing. According to the GAPC, resources for global AIDS work fell in 1991 compared with 1990, for the first time, echoing the growth of the overall humanitarian gap.

A fundamental inequality in resources available for prevention and care contributes to the disaster potential of the pandemic. The

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## Focus 13: AIDS and Uganda's vulnerable women

Disasters are about vulnerability and human rights, such as the way Uganda's women are denied the education, health care, human dignity, equality, value, status and political power to protect themselves from HIV/AIDS

Uganda's women live in a low income country, with a per capita gross national product in 1986 of US\$230 a year, one which is vulnerable to disasters and badly affected by years of conflict. The country can afford to spend little on education, health and social services, and women and girls have less access to and ownership of resources

In Uganda, few women use contraceptives (less than 1% of all married 15-44 year olds in 1981-85) so women have big families (1987 total fertility rate was an average 6.9 children per woman) and the annual population growth rate is high 3.1% in 1980-86. Fewer girls than boys start or finish primary or secondary school and in 1985 only 45% of adult women could read and write, against 70% of men

The Ugandan Red Cross Society, supported by the Federation, takes an active role in combating HIV/AIDS (known in Uganda as "Slim") the first cases of which were reported in 1982. The number of cases reported to the Ugandan National Aids Control Programme has risen fast every year

Cumulative number of AIDS cases:

1983	17
1984	29
1985/86	910
1987	3,624
1988	7,249
1989	12,805
1990	19,955
1991	32,000

Delayed and under reporting mean that the true figures could be 5-7 times higher than reported figures. Of the 32,000 AIDS cases reported by the end of 1991, 92% were children (mainly from perinatal transmission) and the rest adults. About 83% of all reported cases are people aged 15 to 40, the economically most-productive group.

Women develop AIDS at an earlier age. The mean age for female AIDS cases is 27.5 years (standard deviation + or - 8.06) and for male

32.1 (SD +/- 9.04). Women aged 15-21 are about four times more affected than men of the same age group. However, the overall sex ratio of reported HIV/AIDS cases is 1:1. Heterosexual intercourse is thought to be the transmission mode for 80% of Ugandan infections.

HIV/AIDS has affected the whole community with despair, guilt, anger, confusion and panic, but the impact on women, both those HIV-positive and those affected by HIV/AIDS in their family and community, has been disproportionate. The 1:1 male female ratio of reported cases is deceptive, giving an impression of no gender bias, yet the vulnerability of women is demonstrated by the ways in which they are more adversely affected by the HIV/AIDS disaster.

Women have a higher risk of infection, more younger women are infected, women are less able to claim their rights once infected, women carry a heavier burden as carers for the sick and orphans.

Ugandan wives are not expected to refuse their husband's advances, even if they know he is engaging in behaviour a high risk of HIV infection. Having paid a dowry, the man almost "owns" his wife.

A woman without a man is not readily accepted. She will be regarded as a prostitute or termed abnormal. A woman will look for a man, even as a casual partner, increasing her risk of HIV infection.

Women are not equal participants in decisions, including those of personal relationships and reproductive health. It is nearly a taboo for women to insist on condom use. Since sexually transmitted diseases (STDs) are more difficult to diagnose in women than in men and STDs predispose to HIV infection, women are at a greater risk of catching HIV. Anecdotal evidence and the age/sex infection figures indicate that many women are infected during adolescence by older partners.

Ugandan women's vulnerability can be seen in the typical scenarios of AIDS affecting the family

If the husband falls sick first, the wife has to take care of him and risk infection. All possible resources are liquidated to "heal" the man. When

the man dies, what little is left for survivors may be claimed by his relatives. The woman may be forced out of the house into destitution.

In much of Uganda, the dead man's brother "cleanses" the death by having sexual intercourse with the widow, making her his wife and taking responsibility for the children. She cannot refuse the relationship and risk of HIV without being driven from her home.

If the woman falls sick first, traditional male roles mean that her husband is not obliged to take part in her care, though he may pay for the costs. Fewer resources are liquidated than when a man is ill and when the woman dies the husband takes another wife. It is not uncommon for the husband to divorce or abandon his wife after accusing her of bringing the infection.

If both husband and wife die, the burden still falls unequally on women, as society expects the grandmothers, aunts or other women in the family to take full care of the orphans without assistance (there are cases of 12-year-old girls becoming heads of household).

In Uganda, the Red Cross Society performs a range of work to combat the preventable disaster of HIV/AIDS. Young people are the main focus of its AIDS programme, which seeks to sensitise and protect "the future" through education.

It has formed an "AIDS Prevention Club" for "a generation without AIDS", through study, action and encouraging blood donation. The AIDS programme runs through all Ugandan Red Cross activities, such as primary health care, first aid, essential drugs management and recruitment of blood donors.

Philly Lutaaya, a well-known Ugandan singer diagnosed HIV-positive, toured the country in collaboration with the Ugandan and Swedish Red Cross Societies to promote HIV/AIDS education and prevention activities. His last album before he died was dedicated to living with AIDS.

*Based on AIDS, health and human rights (Uganda case), by Margaret Jenkins of the Uganda Red Cross Society*



*AIDS: Women are more vulnerable to the disaster of HIV and AIDS than men; they have less chance to protect themselves from infection, and less access to education, health care and other resources.*

*Uganda, 1987. Chris Steele-Perkins/Magnum.*



developing world has over 80% of the world's HIV infections and cases of AIDS, but over 90% of global spending for prevention and care in 1991 was in the industrialised world. For example, South-east Asia has 26% of the world's population, yet spent only 0.6% of world prevention resources.

In 1991, an average of US\$2.70 was spent per person for prevention in North America, compared with only US\$0.07 per person in sub-Saharan Africa and US\$0.03 in Latin America.

Thus, a wide range of official, non-governmental and community-based services are needed for HIV prevention and care of people with HIV/AIDS. The prevention needs are extremely large, and the care needs are escalating.

### **Political dimensions**

AIDS is the first pandemic to occur during the era of global communications. Extraordinary media interest, combined with the fearsome aspects of AIDS, has helped make AIDS a highly political and politicised phenomenon. In many countries, counter-productive public health and community responses have occurred, including misguided efforts to control HIV spread through coercive measures, such as restricting travel or mandatory HIV testing.

At least 75% of global HIV infections are sexually transmitted, with an approximately 7:1 heterosexual:homosexual ratio, although this obviously varies widely from region to region. The fact that most HIV infection is sexually transmitted, the lack of a cure or a preventive vaccine, and the highly fatal course of illness have made AIDS into a unique global health phenomenon.

As a result, even in countries as yet little affected by the pandemic, substantial energies are often expended to deal with clearly ineffective, inappropriate or discriminatory approaches to HIV prevention and care. The psychological dimension of HIV/AIDS is often transformed into a political dimension, which

complicates efforts to prevent infection and deal with the real problems raised by the pandemic.

### **AIDS as a health disaster**

Many health experts will initially resist calling AIDS a "health disaster". The word disaster could raise public fears and undermine confidence in rational and proven approaches to care and prevention. Disaster terminology may also give an impression that catastrophe is inevitable. Nothing could be further from the truth: like almost every disaster, HIV/AIDS is preventable.

The HIV/AIDS pandemic is overwhelming the existing personal, community and national capacities to respond and cope with its diverse impacts. The gap between needs and services, both for prevention and care, is increasing rapidly in many communities and countries.

Sufficient evidence already exists to classify the HIV/AIDS pandemic as a health disaster, yet its major impacts are yet to come. The additive burden of HIV/AIDS, particularly in communities or countries with already weak or insufficient health and social service capacity, will seriously exacerbate vulnerability to other health problems.

The future of the HIV/AIDS pandemic will be determined by individual, community, national and international responses. Disaster preparedness is critical, including strengthening primary health care systems, establishing surveillance, informational, educational and service structures required for prevention, pro-active measures against discrimination, and avoiding counterproductive and inappropriate policies. Disaster response is also critical and must invoke, as with any disaster, measures to share knowledge and resources within a framework of global solidarity.

AIDS is already creating stresses and problems characteristic of other, more classically defined disaster situations. AIDS is universal, chronic and expanding, making this health disaster a particularly complex global challenge ■