

**Public Health and Profitability:
Perceptions and Responses of the Business Community
in Ghana to HIV/AIDS and Malaria**

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Abstract

This paper examines one hundred and nineteen businesses in Ghana in order to gauge their perceptions of and responses to the fundamental challenges posed by HIV/AIDS and malaria. It seeks to establish the 'real' and perceived levels of incidence; assess their economic and social impacts in terms of productivity, employment and staffing levels, efficiency etc; and analyze what - if anything - is being done to curtail their presence and spread.

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1. Introduction

Malaria imposes a fearsome burden on poor countries, the AIDS epidemic an even weightier load. (Sachs 1999:19)

HIV/AIDS and malaria represent two of the most significant public health and development challenges faced by Ghana and Ghanaians today. The former is a relatively new scourge with unpredictable and potentially devastating consequences; the latter an age-old problem, still very much a matter of grave concern. Ghana's *Vision 2020* (the government's overall socio-economic development policy) recognizes that HIV/AIDS and malaria are the two most significant health-based threats to achieving the goal of becoming a middle-income country by 2020 (MESW 1999:v).

Health and wealth are intricately related, however the nature and direction of this relationship (health leads to wealth or vice versa) is still yet not entirely understood. Nevertheless, it is a basically acknowledged belief that a healthy workforce is more likely to be a productive one and therefore better able to generate wealth and advance national development. As Bloom et al. (2000a) note,

Good health helps people become richer and better educated, just as income and education allow people to take better care of their health. This positive feedback encourages a 'virtuous spiral' to develop that can lead, in the right policy environment, to rapid economic and social development.

Businesses clearly operate within a national and regional context and are 'dependent on the strength and vitality of the economies in which they operate' (UNAIDS 1998b). At the company level, ill health takes its toll in a number of different ways; from the loss of experienced personnel, absenteeism for personal or family reasons, increased recruitment and training costs, increased labour turnover leading to lower productivity and increased healthcare costs etc.

This paper examines one hundred and nineteen businesses in Ghana in order to gauge their perceptions of and responses to the fundamental challenges posed by HIV/AIDS and malaria. It seeks to establish the 'real' and perceived levels of incidence; assess their economic and social impacts in terms of productivity, employment and staffing levels, efficiency etc; and analyze what - if anything - is being done to curtail their presence and spread.

It begins by exploring the prevalence and distributions (both geographic and demographic) of these two issues and proceeds to examine their impacts within a global context more generally and West Africa and Ghana specifically. It then analyses the position of the business community through an exploration of the responses of Ghanaian firms to questions laid out in the EAGER Project/Africa Competitiveness Report Survey regarding HIV/AIDS and malaria.¹

¹ This survey was a joint effort of USAID's Equity and Growth Through Economic Research (EAGER) project and the World Economic Forum/Center for International Development at Harvard University's *Africa Competitiveness Report 2000-2001* (Schwab et al. 2000). The EAGER project surveyed business, business association, and civil service perceptions of governance in Ghana and seven other African countries (Goldsmith forthcoming). The ACR

1.1 HIV/AIDS²

Since the beginning of the HIV/AIDS epidemic two decades ago, some 16.3 million men women and children have lost their lives³ and globally 33.6 million are currently living with the disease. In 1999 alone, AIDS deaths worldwide are believed to have totaled some 2.6 million (UNAIDS 1999a). The overwhelming majority of people living with HIV/AIDS – 95% of the global total – live in the developing world. (ibid.)

The continent worst affected and infected with HIV/AIDS is Africa. Estimates suggest that 23.3 million people are currently infected with the virus on the continent (UNAIDS 1999a). In other words, the continent with just 10% of the world's population is home to 70% of the world's HIV/AIDS infection and a staggering 150 million individuals are believed to be either directly or indirectly affected by the epidemic (IPAA 1999:30).

Not only is the African continent – particularly south of the Sahara- the region worst affected by HIV/AIDS but it is concomitantly (and by no means coincidentally) the region with the lowest access to health care and social and economic safety nets (UNAIDS 1999a). The worst affected areas of the continent are the east, central and southern parts,⁴ however considerable variations exist within countries (J. Oppong 1998:437). In the worst situations - such as in Botswana and Zimbabwe - one quarter or more of the total population is infected. The adult HIV/AIDS prevalence rate in Botswana is 35.80% (UNAIDS 2000b) and 25.06% in Zimbabwe (UNAIDS 2000c). Life expectancy in some parts of the continent has plummeted.⁵

In West Africa, the epidemic has traditionally been most severe in Cote d'Ivoire where current estimates put the national adult prevalence rate at 10.76% (UNAIDS 2000a). However, other parts of the sub-region are emerging as afflicted such as Nigeria and Burkina Faso with HIV/AIDS prevalence rates of 5.06% and 6.44% respectively (UNAIDS 2000d/e; J. Oppong 1998: 437). Within countries, urban areas - particularly the largest cities – invariably experience the highest infection rates. This is true for Burkina Faso, Mali, Nigeria, and Sierra Leone. Significantly, this is not the case in Ghana (J. Oppong 1998: 437). In Ghana the rate of infection is relatively low (as compared with neighboring countries) and the principal areas of infection are rural not urban (Adjei Mensah forthcoming).⁶

A number of factors are believed to facilitate and increase the spread of the disease. These include certain behaviors - casual unprotected sex; multiple partners; injecting drug use; relations

examined business leaders' attitudes in several additional African countries with parallel questionnaires. The studies were coordinated to reduce duplication and 'survey fatigue' among respondents. One set of questions dealt with health matters, which are the focus of this paper.

² AIDS - the Acquired ImmunoDeficiency Syndrome - is the late stage of infection caused by a virus, the Human Immunodeficiency Virus (HIV) (<http://www.UNAIDS.org>)

³ According to UNAIDS and WHO 1999.

⁴ The 'main AIDS belt' comprises – Uganda, Rwanda, Burundi, Western Kenya, Western Tanzania, parts of Eastern Democratic Republic of Congo, Malawi, Zambia, Zimbabwe, and Botswana (J. Oppong 1998: 437)

⁵ Life expectancy at birth in southern Africa increased by 15 years from 44 years to 59 in the early 1990's. As a direct result of HIV/AIDS, it is expected to drop to 45 years between 2005 and 2010. (UNAIDS 1999).

⁶ This is part is accounted for by the return of commercial sex workers from Cote d'Ivoire to their rural communities to seek treatment. See section on Epidemiology of HIV/AIDS in Ghana.

with 'high risk' categories of people such as commercial sex workers. A key feature of the diseases – and one that allows it to spread more rapidly – is the fact that an infected individual can live for eight to ten years without showing any symptoms.

HIV/AIDS does not respect borders. In fact 'its transmission is often facilitated by sub-regional trade routes, tourism and migration patterns common throughout the continent' (Sai 1999:7). Social dislocation and low social cohesion - brought about by upheavals such as wars - are also known to be contributory factors (Sai 1999: 7).

The presence of existing sexually transmitted diseases (STDs) is a major factor in the speed of spread⁷. It is also known that the disease is more efficiently transmitted – through sex - from male to female than from female to male. Social, cultural as well as biological and economic factors account for the disproportionate number of women infected and these reasons vary from country to country and region to region; not least among these reasons in gender inequality (C. Oppong 1995; Hamblin and Reid 1991). A key consideration however, is the difference in age patterns of HIV infection for men and women. Women tend to become infected younger for both biological and cultural reasons.⁸ For every 10 African men infected, between twelve and thirteen women are infected (UNAIDS 1999a)

Cultural attitudes may also facilitate the spread of HIV/AIDS. Cultural norms and taboos surrounding sex, as well as fear of societal disapproval, may be a hindrance to the effective flow of information (Archer 2000). According to Sai⁹, 'A particular worry in Africa in general, including Ghana, is the belief in unproven cures, miracles (religious and others) and a fatalistic desire for a magic bullet (Sai 1999: 9).

1.2 Malaria¹⁰

In absolute numbers, malaria kills 3,000 children per day under five years of age. It is a death toll that far exceeds the mortality rate from AIDS. (WHO 1998a)

Malaria is the world's most important tropical parasitic disease. It kills more people than any other communicable disease except tuberculosis (WHO 1998a). Annually, approximately 300 million people are infected with malaria (The Malaria Network: 1998) and it is believed to account for approximately 2 million deaths globally (Hamoudi and Sachs 1999a). However, the quality of country-specific data is often suspect, and underreporting is likely in many cases. In Africa, some estimates claim that the 28 million annual cases reported represent between 5 and 10% of the actual total malarial incidence (Hamoudi and Sachs 1999a: 2).

⁷ According to some estimates, there is a four-fold increased risk of acquiring HIV/AIDS in the presence of a genital ulcer (such as caused by syphilis) and a significant - although lesser - increased risk associated with the presence of other STD's such as gonorrhoea, chlamydial infection and trichomoniasis (Sai 1999:9).

⁸ According to several recent studies conducted in African countries, girls between the ages of 15-19 are around five or six times more likely to become HIV positive than boys of the same age (UNAIDS 1999)

⁹ Professor Sai is a well-respected Ghanaian authority on the topic of HIV/AIDS. He is currently the President of the Ghana Academy of Arts and Sciences and is the former Senior Population Advisor with the World Bank.

¹⁰ Malaria is caused by protozoan parasites of the genus Plasmodium and the parasites are transmitted by female anopheline mosquito from person to person (The Malaria Network 1998).

Irrespective of the reliability of the data, we know for certain that malaria imposes a tremendous burden on people; in lives lost, medical costs, absenteeism from school, labor costs etc. (WHO 1998a). This burden is known to be intensifying in many tropical regions (CID and LSHTM forthcoming). The costs are therefore economic - 'malaria obstructs overall economic development'¹¹ (ibid.) as well as social – the 'enormous toll [it takes] on human health and well-being' (ibid.). The short-run costs are high and rising (lost-work time etc.) as are the long-term implications on development (it may impede the flow of trade, foreign investment etc) (CID and LSHTM forthcoming).

Those most at risk of malarial infection are the very young and pregnant women as well as refugees, other displaced persons entering endemic areas and non-immune travelers (WHO 1998a). In common with HIV/AIDS, malaria disproportionately affects the poor.

In contrast to HIV/AIDS, malaria has been known to man since time immemorial.¹² Over time, its global distribution has shrunk and presently it is predominantly found in the poorer tropical regions of the world. In spite of its longstanding relationship with world populations and despite the lessons that have been learnt in attempts to combat it, malaria still represents an immense and intimidating public health challenge. It appears that the long-standing relationship between humans and the malarial parasites means that the two are well suited and adapted to each other (Hamoudi and Sachs 1999a: 2).

We know, 'Malaria and poverty are intimately connected' (Gallup and Sachs 1998a: 1). Not only are countries with a high incidence of malaria poor, but their records of economic growth are abysmal (ibid.)¹³ There are however, 'formidable methodological and measurement problems' encountered in attempts at assessing and measuring the impact and cost of malaria on individuals, households, firms and economies (Gallup and Sachs 1998a: 8). Gallup and Sachs conclude that 'the impact of malaria on the productivity of individuals in areas of stable malaria cannot be assessed with the current state of research' (Gallup and Sachs 1998a: 9). However, some attempts, at estimating the costs of malaria have been undertaken. According to the WHO, the direct and indirect costs of malaria in sub-Saharan Africa exceed \$2 billion (WHO 1998a). In terms of its impact on labor time lost, the WHO calculates that a single bout of malaria costs an estimated equivalent of ten working days (WHO 1998a).

The global burden of malarial disease is borne most heavily by sub-Saharan Africa, 'about 40% of the world's population remains at risk of infection, of whom 19% live in Africa; in addition, about 90% of clinical cases occur in sub-Saharan Africa' (Hamoudi and Sachs 1999a: 2). Global estimates of its incidence have been rising – as have estimates of its incidence in Africa¹⁴

¹¹ 'The annual loss of growth from malaria is estimated to range as high as 1.3 percentage points per year' (CID and LSHTM forthcoming).

¹² Unlike vector-borne diseases, directly-transmitted diseases such as HIV/AIDS are believed to require a threshold level of population in order to survive. These critical levels of human agglomeration are believed to have developed over the last 10 millennia (Hamoudi and Sachs 1999a: 2)

¹³ Gallup and Sachs 1998a, note that while many serious diseases in the developing world are consequences of poverty, malaria is not. They note that the incidence and severity of the disease is determined principally by climate and ecology.

¹⁴ According to Hamoudi and Sachs, 'In 1990, the WHO estimated global malaria incidence at about 120 million clinical cases annually; in 1994, they estimated 300-500 million cases annually. (Hamoudi and Sachs 1999a: 2)

¹⁵(Hamoudi and Sachs 1999a: 3). According to WHO, only 7% of the sub-Saharan African population live in areas with no or little risk of malaria¹⁶. Unlike HIV/AIDS malaria can be easily treated with drugs, however the parasites have developed resistance to these anti-malarials in certain regions, Africa included (WHO 1997). It can also be prevented with environmental management such as the draining or spraying of stagnant waters.

2. Epidemiology of HIV/AIDS and Malaria in Ghana

2.1 HIV/AIDS

The first HIV/AIDS cases were officially reported in Ghana in March 1986. By 1994 - according to the National AIDS Control Programme (NACP) estimates – the national prevalence rate was 2.6%. By 1999, it was estimated that 400,000 Ghanaians - between the ages of 15-49 - were living with HIV¹⁷. Currently - in 2000 - it is estimated that 4.6% of the adult Ghanaian population is infected¹⁸ - representing some 600,000 individuals (ibid.) Other projections put the 2000 figure at one million (see below). Daily, about 200 Ghanaians are being infected (Adjei Mensah forthcoming).

Table 1. HIV/AIDS Prevalence and Projections for Ghana¹⁹

DATE	SITUATION	DATA
1986	First cases of AIDS reported in Ghana	
1994	Estimated HIV Prevalence rate*	2.7%
1998	Estimated HIV Prevalence rate*	4.0%
1999	Estimated HIV prevalence rate*	4.6 %
	Estimated No. of HIV + cases	600,000
	HIV prevalence among ante natal women	2.4 %
	HIV prevalence among STD patients	17 %
	HIV prevalence among Blood Donors	4 %
	HIV prevalence among sex workers in Accra	75.8%
2000	Projected number of people with HIV/AIDS	1,000,000
2004	Projected HIV prevalence rate	6.4%
2005	Projected number of people with HIV/AIDS	1,200,000
2009	Projected HIV prevalence rate	8.2%
2014	Projected HIV prevalence rate	9.5%

*Ages 15-49. Source Sentinel Surveillance data by region.

¹⁵ ‘According to Malaria Foundation International, malaria incidence in Africa may be increasing by 20% each year’ (Hamoudi and Sachs 1999a: 3)

¹⁶ The WHO Africa region consists of 46 countries, including Algeria but excluding Djibouti, Somalia and Sudan (WHO 1994).

¹⁷ According to the first National AIDS Impact Model (AIM) (Sai 1999: 6).

¹⁸ Based on figures generated by the sentinel surveillance system established by the Ghanaian Ministry of Health (MOH). (IPAA 1999: 5).

¹⁹ Adapted from: ‘HIV/AIDS Prevalence and projections’ in IPAA Joint Country Mission Report: Ghana. 12-16 October 1999. Source: National AIDS/STD Control Programme/Ministry of Health. Also adapted from ‘HIV/AIDS in Ghana: Background, Projections, Impacts, Interventions’ MOH, NACP March 1999.

As in other parts of the world, the most productive members of the population are affected and most people who have developed AIDS in Ghana are young. For women, peak ages for AIDS cases are between 25-29; for men 30-34 (IPAA 1999: 5); females are disproportionately affected.

In fact the features of the disease in the country and the nature of its spread – particularly in the early years of the epidemic - were quite ‘rare’ and unlike the situation occurring in other African countries (J. Oppong 1998: 437). Two salient features were apparent. In the mid-1980’s – when HIV/AIDS was first detected in Ghana – over 80 percent of all reported cases were female. The second early feature of the disease was that close to 100% of these initial cases had a history of travel outside the country (Anarfi 1997: 227)²⁰. Many of these females were returning sex workers from Cote d’Ivoire. Subsequently, the ratio of females to males has evened out and the proportion of those who have traveled or lived outside the country has decreased as the disease has taken on its own internal (intra-national) transmission networks and dynamics. There are marked regional disparities in the prevalence of HIV/AIDS in Ghana. Adjei Mensah highlights these and stresses the importance of gender, geography, poverty and polygamy in explaining these differences in the country (Adjei Mensah forthcoming)²¹.

The main mode of infection in Ghana is heterosexual transmission, thought to represent 80% of cases. The second major mode is vertical transmission (mother-to-child) representing 15% of cases. The rest are believed to be the result of blood transfusions (IPAA 1999: 5).

Results from Ghana’s most recent Demographic and Health Survey indicate that 97% of women and 99% of men in the country have heard of HIV/AIDS (DHS 1999b: 125). Significantly, in terms of sources of HIV/AIDS information, 53.1 % of women and 49.6% of men heard of AIDS at their place of work - among other sources. However, a worrying one in five women and one in nine men did not know of any way to avoid contracting AIDS (DHS 1999B: 128).

If current rates of infection are sustained then it has been predicted that by 2005 more than 1.2 million Ghanaians will be living with HIV (IPAA 1999: 5).²² A recent report by the National AIDS Control Program anticipates that by 2014, ‘AIDS [will] be responsible for 35% of all deaths in the country’ (PANA 2000). Thus, one of the most worrying features of the epidemic in Ghana is the fact that it has not yet stabilized (MOH 1999:10).

2.2 Malaria

Malaria is hyperendemic in Ghana. The crude parasite rate ranges from 10% to 70% with *Plasmodium falciparum* accounting for 80-90% (MOH 2000). It ‘continues to be *the* major cause of ill health [in Ghana]’ (Adjei and Gyapong 1999: 2). It ranks number one in the

²⁰ ‘Ghana’s difficult economic crises created a substantial exodus of economic refugees who migrated temporarily into high HIV/AIDS prevalence regions and indulged in high risk activities’ (J. Oppong 1998: 447). Many of those who left were women.

²¹ In 1998, the Northern part of the country (made up of Northern Region, Upper East and Upper West) had a combined prevalence rate of 1.2 %, whereas the middle part of the country and the Southern part each had a prevalence rate of 4.6% (MOH 1999: 13).

²² This would appear to be a rather conservative estimate.

Ghanaian Ministry of Health's 'Top fifteen causes of out-patient morbidity'²³. Data from the Center for Health Information Management (CHIM) at the Ministry of Health reveals the heavy burden of malarial morbidity in Ghana.²⁴ Malaria is also the principal cause of mortality in children under five years and the leading cause of workdays lost due to illness (MOH 2000: 6).

Table 2 and Figure 1 below, both indicate an increase in the incidence of malaria in Ghana over a ten-year period. Documented outpatient cases rose from 1.4 million in 1990 to over 2.3 million by 1999. The population of Ghana increased by 3.8 million over the same period, therefore population growth outstripped the increase in the number of malaria cases.

²³ The fifteen 'top causes' of out-patient morbidity in Ghana are: 1 – malaria; 2 – upper respiratory infection; 3 – diarrheal diseases; 4 – accidents, fractures, burns; 5 – pregnancy and related complications; 6 - diseases of the skin; 7 – gynaecological disorders; 8 – intestinal worms; 9 – acute eye infection; 10 – hypertension; 11 – rheumatism and joint pains; 12 – anaemia; 13 – diseases of oral cavity; 14 – measles; 15 – ear infection.

²⁴ I am grateful to Mr. William N.A. Roberts - the Principal Technical Officer in Bio-Statistics at the Centre for Health Information and Management, Ministry of Health - for the data on malaria.

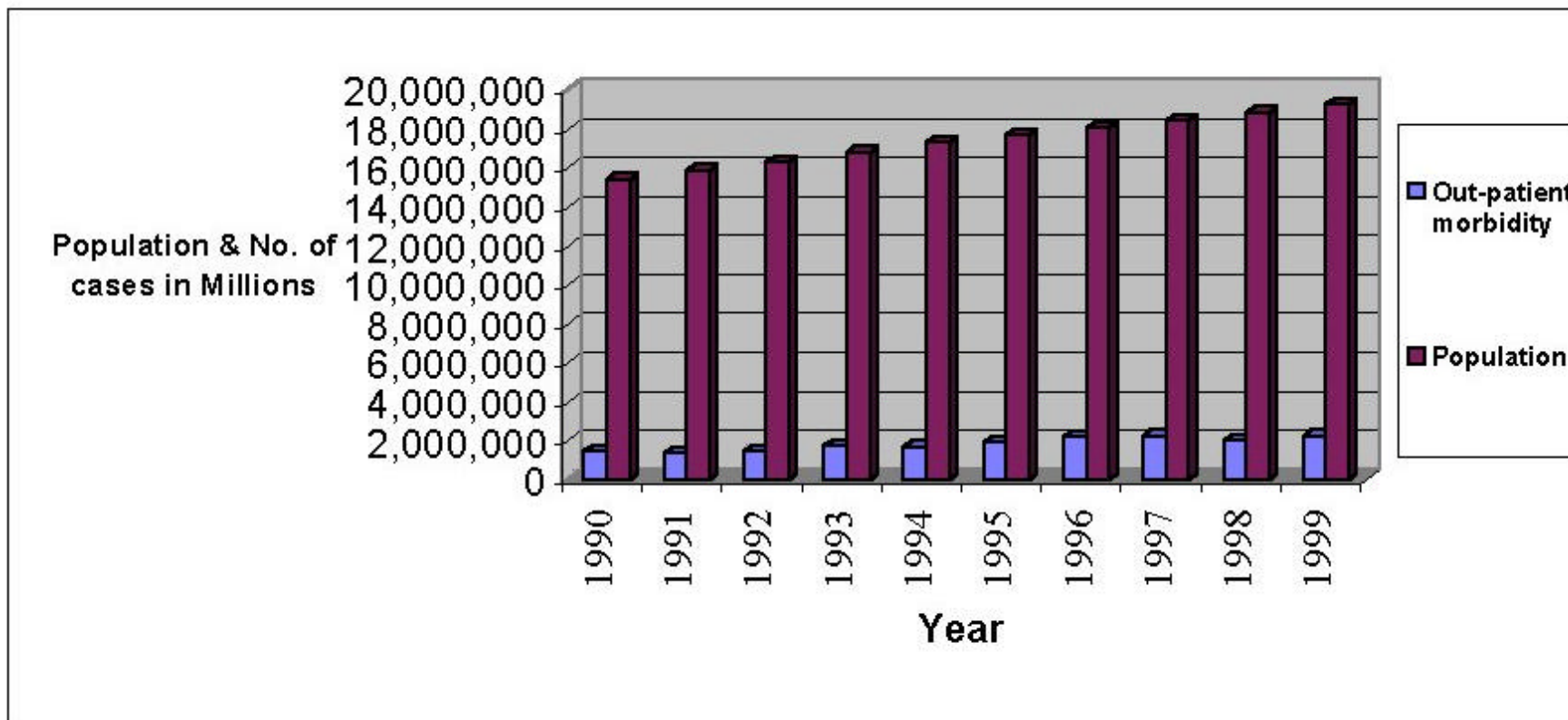
Table 2. Annual Malarial prevalence in Ghana by Region - based on outpatient consultations

YEAR →	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999
Western	95,432	135,313	152,224	144,454	168,463	159,332	191,231	215,869	243,029	248,418
Central	117,866	96,850	113,325	109,022	130,009	134,581	146,604	148,359	154,772	166,591
Greater Accra	263,502	270,579	222,802	302,633	274,247	274,045	278,819	284,951	259,110	252,769
Eastern	171,337	157,842	171,715	244,185	205,200	230,989	256,074	239,409	235,652	270,272
Volta	128,699	134,337	159,772	203,322	213,296	200,463	202,318	224,421	182,855	92,366
Ashanti	336,190	261,541	307,977	376,739	318,863	483,288	559,724	548,934	318,141	476,546
Brong-Ahafo	184,761	171,674	187,061	266,111	231,897	268,250	294,710	339,211	311,281	325,888
Northern	66,585	54,241	51,627	62,668	62,107	66,099	105,737	135,996	125,014	220,336
Upper East	42,438	51,313	46,748	19,766	68,627	54,743	98,389	31,763	108,936	117,061
Upper West	31,903	39,061	33,696	48,211	NA	56,526	56,253	58,849	62,588	88,230
Total	1,438,713	1,372,751	1,446,947	1,737,111	1,672,709	1,928,316	2,189,859	2,227,762	2,001,378	2,258,477

NA = Not Available.

Note: Based upon out-patient cases collected at the District and Regional Level by the Ministry of Health and collated by the CHIM, Accra

Figure 1. Annual Prevalence of Malaria in Ghana based on out-patient morbidity and Population²⁵ of Ghana*



²⁵ Population data from U.S. Census Bureau, International Data Base. <http://www.census.gov/cgi-bin/ipc/idbsum?cty=GH>

3. Impacts of HIV/AIDS and Malaria

Even at this relatively low rate of infection in Ghana, HIV/AIDS has had serious impact on families and communities, with concomitant repercussion in the wider economy. (IPAA 1999: 6)

HIV/AIDS represents a multifaceted challenge to the country and people of Ghana. Its potential impacts are numerous as it cuts across and affects all sectors of the economy. Therefore not only is it a public health problem - of the most extreme kind - but it is also an economic one, with the potential to impede the very development of the nation and reverse some of the hard won socio-economic gains made in the past (IPAA 1999: 3).

The most obvious impact of HIV/AIDS is felt by those directly *infected* as well as those indirectly *affected*; in other words individuals, families, and whole communities are being burdened and stressed by the disease - the country's human capital. These burdens are both financial (increasing cost of health care, lost productivity, funeral expenses etc.) as well as social (stigmatization, increasing numbers of orphans etc.)²⁶ In terms of the demographic impact, the Ministry of Health (MOH) predicts that the epidemic will affect the growth of the population and that by 2014 there will be about 1.6 million fewer people in Ghana than there would have been without the epidemic (MOH 1999: 30-31). Not only is the country's human capital being affected but so is its social capital; the quality of countless lives is being eroded - as people's safety, standing and contribution to society is challenged - and as their ability to inspire, educate and recreate is curtailed.

In relation to the economy, HIV/AIDS is likely to affect the development of *all* sectors - including health, education, labor force, economy, transport and agriculture (PANA 2000). Although it is inevitable that enormous increases in death among young, economically active adults will affect national economies, it is difficult to isolate and measure the exact effects (UNAIDS 1999a: 16). Lessons from other parts of the continent indicate that productive sectors of the economy will be affected (both in the public and private sphere), since the numbers and quality of skilled and unskilled workers will be reduced (ILO 2000). This in turn increases expenditure and reduces productivity and profits (IPAA 1999: 6). Some sources claim that food production has already been reduced in Ghana as a result of the disease.²⁷

Some sectors of the economy are more likely to be affected than others. For example, it has been deduced that, 'sectors that employ young, sexually active...men who are far away from their families for a long time may be severely affected' (IPAA 1999: 6). There is evidence to suggest that these young men are likely to be at greater risk due to their relations with prostitutes (Anarfi et al. 1997). Further evidence is provided by the existence of large numbers of AIDS cases

²⁶ The Ministry of Health predicts that 'the number of maternal and double orphans [could] rise quickly from 126,000 in 1999 to 252,000 in 2004 and to more than 603,000 in 2014 (MOH 1999: 26).

²⁷ See Ghanaian Chronicle June 6, 2000. Article entitled 'Law to Combat AIDS needed' by Richmong Antwi-Boasiako.

reported in Adansi West District, which incorporates Obuasi, home to Ashanti Goldfield Corporation (IPAA 1999:6).

The Health Sector is being greatly affected by the rising numbers of HIV/AIDS patients. In February 2000, the National AIDS Control Programme stated that it expected an, ‘astronomical rise in expenditure on AIDS patients as the disease continues to spread rather fast’ (PANA 2000). Not only will expenditure on HIV/AIDS increase but presumably scarce resources are being diverted from other issues and health concerns and health personnel may be putting their own lives at risk.

Malaria also represents a formidable challenge to the people and state of Ghana. As with HIV/AIDS it transcends the health sector and represents a fundamental development challenge. Beyond the impacts on individuals and families, there are other ways in which malaria may affect the potential growth of the country’s economy (Gallup and Sachs 1998a: 9). For example, potential foreign investors as well as tourists may well be deterred from coming to Ghana. Gallup and Sachs go as far as to conclude that, ‘In general, the transmission of ideas, techniques, and development of transportation systems may well be stunted by malaria (Gallup and Sachs 1998a: 9).

4. Responses

The response to the HIV/AIDS epidemic in Ghana has come from many quarters, both Governmental and non-. In the case of the Government of Ghana, there appears to be political will to combat **HIV/AIDS**²⁸. Government led responses include Ghana’s Vision 2020 document for economic and social development which focuses on women, youth and other ‘at-risk’ groups and makes AIDS a priority (IPAA 1999:7). However more can be done.²⁹

The Ministry of Health (MOH) has taken the lead in responding to the epidemic and has spearheaded a number of initiatives - through its National AIDS/STD Control Program (NACP)³⁰ - to control and restrict the spread of HIV/AIDS infection in the country (DHS

²⁸ This is evident from the following: In 1995, the Government established the National Technical Committee on AIDS in order to ‘advise it and implement measures to contain the epidemic’ (MOH 2000); In 1986 a National Advisory Council on AIDS was established to guide the national response (IPAA 1999:7); In 1987 the Government established the National AIDS Control Programme (NACP) which was ‘charged with co-ordinating the national response to the epidemic’ (MOH 2000: 3); an inter-ministerial Body – the National Commission on HIV/AIDS – has been established to co-ordinate the response at the National level; and a National Strategic Plan to guide the implementation of multi-sectoral action has been set-up.

²⁹ Because of their high cost, the Government has not yet introduced anti-retrovirals for the treatment of HIV/AIDS into the country.

³⁰ The NACP has – according to the MOH 2000: 4 - achieved the following to date:

- Created high level of awareness about HIV/AIDS; knowledge about AIDS is 97% among females and 99% among males (GDHS, 1998)
- Established an epidemiological surveillance system for HIV AND aids
- Provided facilities for HIV screening and counselling services
- Developed STIs management guidelines and training programmes for both public and private health institutions.
- Developed the AIDS Impact Model (AIM) as an advocacy tool

1999b). These strategies include, ‘...maintaining a safe blood supply, ensuring safe use of needles, and disseminating information through public campaigns to change social attitudes and behavior (DHS 1999b: 125).

However, sectors other than the Ministry of Health need to be involved if HIV/AIDS is to be effectively challenged. The Ministry of Employment and Social Welfare (MESW) for example has established a ‘District Response Initiative’ (given the decentralized nature of local government). Through an initial pilot phase - involving 10 districts - this aims at, ‘getting District Chief Executives (DCE’s) and local civil society groups to take responsibility for the prevention and control of HIV/AIDS at local levels’ (IPAA 1999:8).³¹ The Ministry of Youth and Sports has established an AIDS Programme directed at the youth. The Ministry of Agriculture has developed a plan aimed at reducing HIV/AIDS infection among the country’s farmers and its extension workers (IPAA 1999:9)

Civil society’s response is also crucial. In Ghana there are many non-governmental organizations responding to the HIV/AIDS epidemic in the country. The majority however is engaged in prevention, not many of them are involved in the care and support of patients and their families (IPAA 1999:9). Other responses have come from various religious bodies and traditional rulers.

The response of the public to the epidemic has been rather disappointing. For example, in general there is reluctance by the Ghanaian public to seek treatment for STD’s³². One main reason for this is the availability and ease of access to prescription drugs (including anti-biotics). Despite the (by now) vigorous media public education campaigns general perceptions of risk and vulnerability to HIV are low (MESW 1999:3).

Efforts aimed at controlling **malaria** in Ghana have a long and fragmented history, stretching back to pre-independence. Traditionally, the Ministry of Health has overseen malaria control, sometimes ‘to the exclusion of other stakeholders’ (MOH 2000: 6). In Colonial and post-colonial times malaria was eradicated in some communities by sanitary means and during the colonial period quinine was sold to the public over the counter at all post-offices. Post-independence, from 1961 to 1968, with the support of WHO, Ghana started preparations for a malaria eradication programme. This was terminated due to the technical difficulties imposed by the development of DDT resistance in *anopheles* mosquitoes globally (Moses 1999: 18). Other past efforts include the ‘Pinotti Project’ – which ran from 1959 to 1964. The project introduced medicated salt using chloroquine for mass chemoprophylaxis in the Kusasi Local Council area (now Bawku District, Upper East Region) (Moses 1999:18). In 1964, the project was abandoned because the local population did not like the bitter taste of the medicated salt and were

- Various MDA’s, including Education, Youth and Sports, Agriculture, Employment and Social Welfare, Interior, Local Government, Finance, Communication and Health are already participating in the effort to combat the epidemic or have plans to do so.

³¹ The Ministry is apparently thinking of ways to scale up the initiative to all 110 districts (IPAA 1999:8).

³² As we know the presence of certain STD’s greatly increases the risk of acquiring HIV/AIDS.

uncooperative; also, the supply of salt was irregular and unmedicated salt penetrated into the study area.³³

Since 1968, there has been no official policy on malaria control in Ghana. Unofficially, what has been practised...can be described as passive case detection with chloroquine treatment. (Moses 1999: 18)

The emergence of chloroquine resistance in Ghana has threatened this position.

Most recently (2000) Ghana adopted the 'Roll Back Malaria' plan and in the Draft document of the strategic plan for Ghana 2000-2010 it is recognised that a 'key principle of the initiative is to 'make malaria control a truly developmental issue' and increase stakeholder participation (MOH 2000: 4).³⁴

5. The Business Community: Perceptions and Responses

5.1 The Ghanaian Economy and Labour Force

The Ghanaian economy fundamentally relies on the production and export of primary products. The majority of goods traded internationally are agricultural and mineral. Agriculture (encompassing fishing and forestry) remains the principal sector; it employs two thirds of the labour force and accounts for approximately half of the total gross domestic product (GDP) in the country. The second largest sector of the economy is Services (37%) while the industrial sector accounts for 16% of GDP (MESW 1999: 1).

In 1999, the 'workforce' in Ghana was estimated to be 7.5 million, out of a total population of 19.16 million. The public sector employees represented 595,000 individuals, 62% of these being government service employees (i.e. civil service, education services, subvented and security agencies) and the remainder public enterprise employees. The informal sector on the other hand constitutes between 70-80% of total employment (MESW 1999: iv). The industrial sector (comprising of: Manufacturing, Construction, Mining and Quarrying and Electricity, Water and Gas) is believed to amount to a quarter of the total formal employment in the country (MESW 1999: 2).

5.2 Practices and Policies

In 1999 the Ghanaian Ministry of Employment and Social Welfare, UNAIDS and Private Sector Consultants collectively combined to draw up the objectives of a ground-breaking/first of its

³³The project was to assess whether or not under local conditions interruption of malaria transmission by means of medicated salt was feasible. However, 2 months after the introduction of medicated salt parasite rates fell to 6% in the study area in September 1961 compared to 86% in the control area' (Moses 1999:18).

³⁴ I am grateful to Dr. George Kwadwo Amofah – Deputy Director of Public Health, Ministry of Health, Ghana – for providing me with an advance copy of *Draft 3 Roll Back Malaria Strategic Plan for Ghana 2000-2010*. MOH July 2000.

kind study of the *Work Place Response to the HIV/AIDS epidemic in Ghana*. It was conducted in five regions of the country and included companies and organizations from the formal and informal sectors. The formal sector firms included representatives from: the mining industry, wood processing, ports and harbors, the service sector and teachers.³⁵

The study was born out of the recognition that the business sector in Ghana had been ‘slow to respond to the HIV/AIDS epidemic’ (MESW 1999: iv)³⁶. It therefore aimed at: a) ‘reviewing existing policies and legal issues affecting HIV/AIDS and the workplace; b) reviewing current incidence of HIV/AIDS infection at selected workplaces and the factors that may promote the spread of the disease in the community; c) analyzing the social and economic impact of HIV/AIDS on the workplace including health care costs, absenteeism and cost of hiring replacements, cost of permanent replacement...’(MESW 1999:iv/ibid).

The results of the study indicated that in 1997 a ‘typical’ company was expected to incur average annual HIV/AIDS costs of US\$10,264 and an average cost per employee of US\$38³⁷. It was projected that at a future hypothetical prevalence rate of 20%, these costs would rise dramatically to US\$48,700 and US\$179 respectively, representing a five-fold increase (MESW 1999: v).

The Ministry’s study also reviewed the laws that affect health issues in the business community and highlighted some of the major loopholes in the existing legal framework.

5.3 Laws and Loopholes

In Ghana, certain legal instruments guide and influence the relations between companies and their work force and vice versa. In 1999, the MESW reviewed existing policies and laws in order to assess whether HIV/AIDS was considered in their formulation. Certain of these are relevant to the present consideration of HIV/AIDS and malaria. These include the: a) Labour Decree, 1967, NLCD 157; b) Industrial Relations Act, 1965 Act 229; c) Workmen’s Compensation Law, 1987; d) Factories, Offices and Shop Act, 1990. Act 328.

The Labour Decree ‘provides for medical examination of workers’ and states that ‘Every worker who enters into a contract shall be medically examined at the expense of the employer’ (MESW 1999:7). At present HIV testing is not part of pre-employment medical exams. Presumably,

³⁵ Given the sensitive and highly confidential nature of the information, the names of the Companies and organisations visited were not stated in the report. Therefore it is impossible to know whether the businesses surveyed by the MESW were among those included in the EAGER/ACR study – although presumably there was considerable overlap,

³⁶ Key informant interviews, focus group discussions were held with staff and management as well as informal associations. Financial data on turnover, salary, health, funeral and burial costs were collected from companies for the economic analysis (MESW 1999:iv).

³⁷ Based on the ‘Cost of AIDS model’ the components of which are: employees salary, labour turnover, training, reduce productivity, funeral attendance, absenteeism, recruitment, annual health costs, burial cost/death benefits per employee, HIV/AIDS rate, annual turnover and expenditure. Apart from the company’s annual turnover and expenditure, these components are each classified by the category of employee at the workplace - manual labourer, secretarial, technical and management. However, where there are no such disaggregated data, the total crude figures were used.

though employers could surreptitiously or overtly introduce HIV testing in order to deny employment to those who test positive. The Ministry of Employment and Social Welfare is of the belief that ‘Efforts will need to be made to ensure the current situation remains the same, and that no mandatory testing is introduced in the future, as implicitly Ghana subscribes to the WHO/ILO guidelines on HIV/AIDS at the workplace’ (MESW 1999: 11) (See ILO and WHO 1988).

The Industrial Relations Act ‘prescribes that, employees and employers always negotiate on issues that are of importance to both parties’ (MESW 1999: 7). In theory, this law could be used as a tool for all parties to come together to jointly discuss how best to initiate and implement an HIV/AIDS workplace programme (MESW 1999: 8). The Workmen’s Compensation Law ‘makes provision for the compensation of workers sustaining personal injury by accident arising out of and in the course of employment’ (MESW 1999: 8). It is therefore one of the most significant and potentially useful legal instruments available regarding HIV/AIDS; however as with the other laws/legal mechanisms it does not explicitly refer to HIV/AIDS.

The Factories, Offices and Shops Act 1970, Act 328 provides for the welfare and safety of persons employed in these establishments. It does not however deal with the dismissal of workers based on health grounds (MESW 1999: 8).

5.4 Collective Bargaining Agreements

The most important and relevant of the mechanisms available to the business community - in dealing with HIV/AIDS and malaria - are the Collective Bargaining Agreements (CBA) negotiated and drawn up between employers, employees, and trade unions. The CBA is a ‘set of procedural rules for arriving at conditions of work including wages’ (MESW 1999:8). The following list includes all the major issues dealt with:

Table 3. Collective Bargaining Agreements include:

▪ Engagement and Probation
▪ Employment and Service Records
▪ Union Membership
▪ Hours of Work
▪ Resignation/Termination
▪ Salary and Wage Structure etc.
▪ Sick Leave
▪ Sick Report
▪ Medical Facilities
▪ Periodic Medical Examination

In general, senior management is exempt from the directives of the CBAs. In fact, companies have “standing orders” through which they provide conditions of service for senior employees (MESW 1999: 8). According to the MESW ‘some senior management is agitating in favour of

being party to collective bargaining agreements, which would confer on them similar rights as for the general workforce and backing for industrial redress (MESW 1999:8).

The most important sections of the CBAs – of relevance to the current study – are the sections that deal with Sick Leave, Sick Report, Medical Facilities and Periodic Medical Examination. In a 1999 study of CBAs in Ghana it was discovered that, ‘Under the Sick Leave provisions, each organization specifies the period of illness for which the worker would be paid his or her full salary or half salary...The section also specifies under what conditions sick leave would be granted’ (MESW 1999: 9) The MESW provided an example of a ‘typical example’ of sick leave entitlements (see Table 4. below):

Table 4. ‘Typical’ Example of Employees Sick Leave Entitlements (MESW 1999:9)

NO. OF YEARS OF SERVICE	INITIAL ILLNESS	SUBSEQUENT ILLNESS
1-5 years of service	6 months full pay	6 months half pay
More than 5 years	9 months full pay	3 months half pay

The MESW (1999: 9) noted that ‘the provision of medical facilities’ was a universal feature of the CBAs. ‘Most of the documents state that the employer shall provide free medical treatment to all employees...Many diseases are not mentioned including STD’s, which tended to be treated outside clinics.’ Clearly then, HIV/AIDS is not considered or covered by the firm’s doctors.

The dependants of employees are often included in the provision of free medical facilities. However, some firms do not state the numbers of the employees’ family (spouse and children) who are covered.

In the MESW’s study, all the companies studied conducted a medical exam for applicants/potential employees in order to determine their fitness for work. Other companies surveyed conducted periodic medical examinations that could be surreptitiously used to test workers for HIV. The ministry concluded that,

In all the companies studied, it was not obvious that any worker had been dismissed as a result of his or her HIV status. However, two of the companies studied had opt-out clauses concerning ‘self-inflicted’ injury. One manager defined STD’s and HIV/AIDS as ‘self-inflicted’. (MESW 1999:11)

According to the Ministry, all companies provide cash (as part of the CBA) to help defray funeral costs in the event of the death of an employee. The actual amount of cash varies and in some instances is quite a considerable amount of money (from 300,000 to 1 million cedis). However, it was not uncommon for the employers to purchase a coffin, drinks and sometimes transport to convey the deceased to his or her hometown.

In sum, it has been found that CBAs - as well as the other legal instruments available to employers and employees - have not been updated to reflect the current and future changes likely

to be generated by HIV/AIDS (MESW 1999). In fact, HIV/AIDS is likely to test the limits of these laws. The present guidelines and policies need to be critically assessed to respond to employee needs while maintaining a cost effectiveness that will not negatively affect the viability of the companies and economic development.

5.5 EAGER/ACR- Incidence, Impacts, Perceptions and Prevention.³⁸

The EAGER/ACR study surveyed one hundred and nineteen firms in Ghana³⁹. The distribution of firms surveyed by sector is as follows:

Table 5. Distribution of firms surveyed by sector

SECTOR	%
Manufacturing	30
Other services	21
Wholesale and retail trade, restaurants and hotels	20
Finance, insurance, real estate, business services	16
Agriculture, forestry and fisheries	9
Construction	3
Mining and Quarrying	1
Total	100%

5.6 Perceptions of productivity

The firms surveyed were asked to rank major diseases/events in terms of their relative impact on the productivity/effectiveness of their workforce in the past, present and future. The results (for the present) appear below.

³⁸ The relatively small number of firms surveyed (119) and the large number of ‘no-response’ answers given across all sectors precludes a meaningful analysis by sector or type of firm, nevertheless where a response from a particular sector is significant it shall be noted.

³⁹ Of these 52% were large firms (more than fifty employees); 37% were small and medium sized enterprises (SME’s) (fifty or fewer employees) and 11% were unclassified. The majority of these - 77% - were located in the capital city, Accra; a further 12% were in Tema; 9% in Takoradi and 2% in Kumasi.

Table 6. Ranking of diseases/events in terms of impact on productivity at the present time

	Malaria	Alcohol/ Substance abuse	Road/ Vehicular Accidents	TB	Industrial Accidents/ Injuries	Violence	HIV/ AIDS
Very Strong/Strong	30	8	7	4	3	3	2
Not Strong/ No Impact	35	47	49	44	50	39	39
Not Applicable	1	4	5	11	8	18	18
No response	35	40	40	41	38	40	40
Total	100%	100%	100%	100%	100%	100%	100%

Source: EAGER/ACR data. Each cell represents % of firms and has been rounded off. Each column may not add up to 100% due to the rounding effect.

Malaria has the highest perceived impact on productivity followed by alcohol/substance abuse, road/vehicular accidents, tuberculosis, industrial accidents/injuries, Violence and finally HIV/AIDS. The ‘no response’ rate was relatively high for all categories.⁴⁰

Approximately 30% of firms believed malaria to have a significant impact on productivity. However, a comparable number of firms (35%) expressed an opposing opinion – namely that malaria has a negligible impact on productivity. A further 35% of firms gave no response. Opinions are therefore clearly divided. Nevertheless, malaria was ranked as *the* number one health issue to impact upon productivity.

Despite the fact that the survey sought only detailed information on malaria and HIV/AIDS – from the perspectives of the businesses at least - there are issues which impact on productivity/efficiency more than HIV/AIDS at the present time. For instance, alcohol is placed a highly ranked second place followed by road/vehicular accidents. Four percent of firms ranked tuberculosis as having a very strong impact. The incidence of TB in sub-Saharan Africa as a whole and in Ghana specifically has been rising; this upsurge is closely related to the spread of HIV/AIDS⁴¹. Regarding HIV/AIDS, the data reveal that only a small percentage of firms (2%) are of the opinion that it represents a strong and/or significant challenge to productivity now.

Data was sought on the perceived impacts on productivity in the past, present and future. An assessment of the changes over time indicate that despite HIV/AIDS having the lowest ranking at the present time, it represents the only disease whose impacts are judged to increase in the future; none of the businesses believed it impaired productivity three years ago, 2% felt it did at the present time and 3% in two years time. All the other diseases/events are believed to decrease in terms of their impacts on productivity over time. The other striking feature of the data is the remarkably high proportion of ‘no response’ as well as ‘not applicable’. Presumably, the latter

⁴⁰ An average of 40% of firms did not venture an opinion on the relative impacts of any of the events/disease.

⁴¹ ‘HIV and TB form a lethal combination, each speeding the other's progress. HIV weakens the immune system. Someone who is HIV-positive and infected with TB is many times more likely to become sick with TB than someone infected with TB who is HIV-negative. TB is a leading cause of death among people who are HIV-positive. It accounts for about 15% of AIDS deaths world-wide. In Africa, HIV is the single most important factor determining the increased incidence of TB in the last ten years’. (WHO 2000. Fact Sheet No. 104)

represents firms who believe HIV/AIDS is not present in their workforce. More than 50% of firms did not respond to the issue of the probable impact of HIV/AIDS in two years time!

5.7 Malaria and the workplace

The majority of firms surveyed, over 63% believed that malaria caused their average employee to be absent from work. Approximately one-quarter of firms disagreed, claiming that malaria was *not* a cause of absenteeism. The remaining 12% of firms declined to give an opinion. The average number of days that employees were absent due to malaria was estimated to be 15.3. However, the range of days mentioned extended widely from 1 to 80 days.

The perceptions of the impact of malaria on employee efficiency were varied. When asked to quantify the anticipated levels of impaired efficiency caused by malaria, the answers given ranged from 1% to 100%. Thirteen percent of responses claimed 50% impairment. Once again nearly 40% declined to answer. Therefore, a lack of consensus on the impact of malaria was again apparent.

In a hypothetical question, firms were asked to imagine how their employment/staffing levels would be affected were malaria removed. Half of the firms believed the removal of malaria would have little or no effect - at any skill level - and close to 20% gave no response. Of those that did believe the removal of malaria would affect staffing levels, opinions were evenly divided between firms who envisioned a smaller skilled workforce and managerial staff and those who believed the contrary. Concerning unskilled workers, slightly more firms were of the belief that the removal of malaria would lead to a smaller workforce (13% of responses) than a larger one (8%).

The firms were asked to gauge the impacts of the removal of malaria on other aspects of their business. The results appear below:

Table 7. The effect of the removal of malaria on businesses

	Reduce operating expenses	Increase efficiency production	Increase sales from current outlets	Wider marketing opportunities	Little or no effect
Strongly agree	13	35	16	13	11
Largely agree	18	21	16	13	9
Agree somewhat	15	16	13	13	10
Disagree somewhat	2	3	10	13	13
Largely disagree	8	10	14	13	16
Strongly disagree	8	3	10	11	10
No Response	37	12	20	23	31
Total	100%	100%	100%	100%	100%

Source: EAGER/ACR data. Each cell represents % of firms and has been rounded off. Each column may not add up to 100% due to the rounding effect.

The most decisive impact that the removal of malaria would have is in relation to efficiency and production, with 72% believing that these would increase. Forty-six percent of firms felt that operating expenses would be reduced, were malaria eradicated, and 45% that the removal of malaria would increase their sales. Thirty-nine percent of firms believed that they would have wider marketing opportunities available to them.

Other responses to malaria were mixed, for while over 63% of firms acknowledged that malaria resulted in absenteeism in the short term, close to 50% felt that the eradication of malaria would have little or no effect on long-term staffing levels. In sum, malaria represents the most significant health factor affecting the business community. Were malaria removed, absenteeism would decrease and productivity increase.

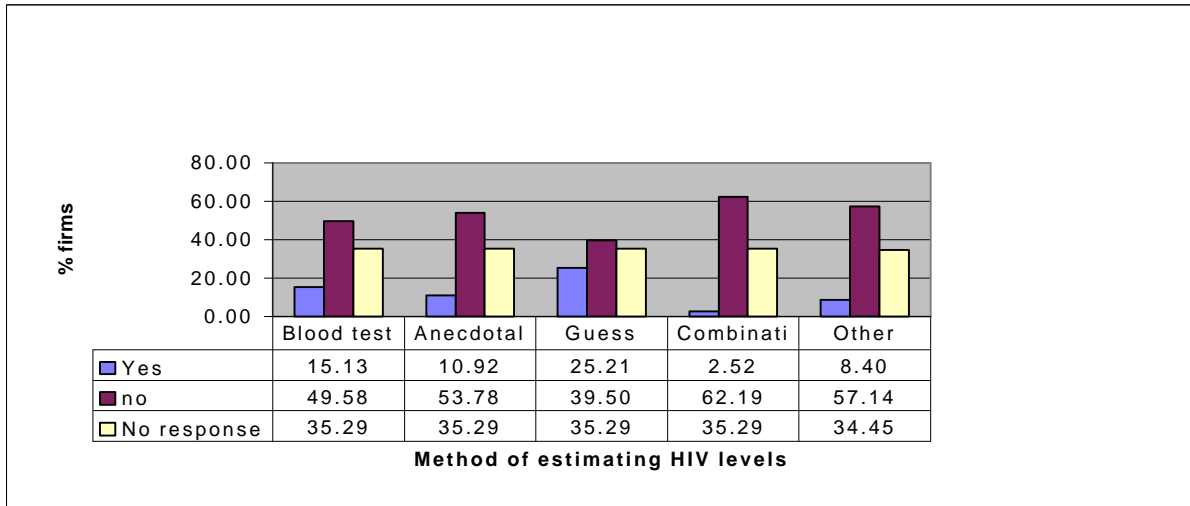
5.8 HIV and the workplace

Nearly 60% of firms gave no response whatsoever to the question of the percentage of their workforce estimated to be HIV positive.⁴² A further 30% claimed to have no HIV positive workers; the remaining 12% of firms gave answers ranging from 0.05% to 4%. In one case - the only firm in the mining and quarrying sector, - gave an extreme response of 20%. Four percent of its workforce is estimated to have died of an AIDS related illness and this figure was believed to rise to 10% in two years time; this mining company do routine HIV screening, so presumably this figure is relatively accurate. The average prevalence rate was 0.76%.

Only 23 % of the firms surveyed felt 'extremely' confident about the accuracy of the HIV infection rates they claimed. Approximately 35% of firms gave no response to the question of how they arrived at their HIV infection rates. A quarter of firms admitted to guessing these rates and a further 10% based their estimates on purely anecdotal evidence. Only 15 % performed blood tests exclusively; and another 10% or so combined their methods and performed 'other' (unidentified) sorts of procedures. Clearly then, only a small percentage of businesses seek out and know the actual HIV infection rates of their staff.

⁴² The nearly 60% "no-response" rate generated by this question represented a typical situation.

Figure 2. How firms arrive at their estimates of HIV infection among their staff.



Attempts aimed at estimating the proportions of HIV+ employees by level of management and level of staff proved futile for 90% of firms gave no response. Questions aimed at estimating the percentage of the workforce that had died due to AIDS related illness’ (over time) also met with ‘silence’ – nearly 97% gave no response whatsoever. Less than five firms gave percentage figures and these ranged from 2% five years ago to 10% in two years time. The data appears below.

Table 8. Percentage of Company's workforce that has died due to AIDS related illness

%	5 YEARS AGO	3 YEARS AGO	NOW	2 YEARS FROM NOW
0	39	3	45	27
0.01	1		1	1
0.5	1			
1	1		1	1
2	1			
2.41	1			
3				1
4			1	
10				1
No Response	57	97	52	70
Total	100%	100%	100%	100%

Source: EAGER/ACR data. Each cell represents % of firms and has been rounded off. Each column may not add up to 100% due to the rounding effect.

In terms of the ‘costs’ imposed on businesses by the epidemic – close to 50% of firms gave no response and between 29% and 40% felt the epidemic presented ‘No Obstacles’ to any feature of running their business. Of those that felt that AIDS represented a ‘Major Obstacle’ health care

costs represented the most significant cost (7%) followed by a reduction in the skill levels of the workforce and a decrease in strategic planning, 4% respectively. See below:

Table 9. Ranking of the severity of the AIDS epidemic on the costs of running business

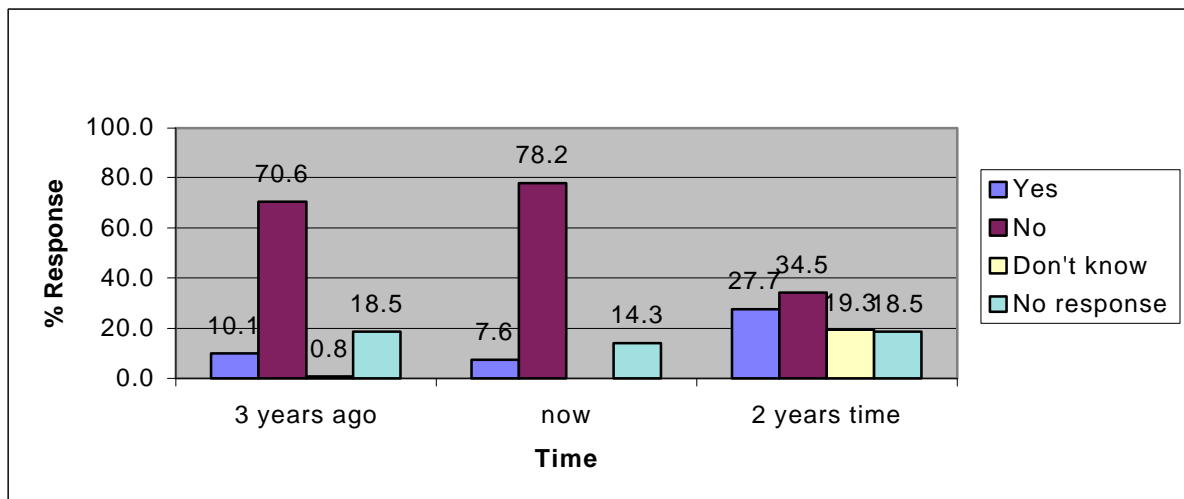
	Health Care cost	Funeral benefits costs	Time lost to illness	Time lost to funeral attendance	Reduction in skill level of workforce	Training costs increasing	Quality of your product decreasing	Strategic planning decreasing	Firm's morale decreasing	Other
No obstacle	31	34	32	29	39	40	40	34	33	26
Minor obstacle	10	10	12	12	6	5	5	8	11	8
Moderate obstacle	4	4	6	5	3	3	3	5	6	4
Major Obstacle	7	3	3	3	4	3	3	4	3	3
No Response	48	49	48	52	48	49	49	50	48	60
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%

Source: EAGER/ACR data. Each cell represents % of firms and has been rounded off. Each column may not add up to 100% due to the rounding effect.

The most severe and significant ‘costs’ to firms occasioned by the AIDS epidemic are health care costs, followed by time lost due to illness, funeral benefits and time lost to funeral attendance. 21% of firms surveyed felt that health care costs represented an obstacle. The no-response rate for these HIV/AIDS questions was again high – approaching 50%.

In order to gauge the business community’s response to the HIV/AIDS epidemic, the surveyed firms were asked if they provided routine HIV screening as well as counseling or education services for their employees.

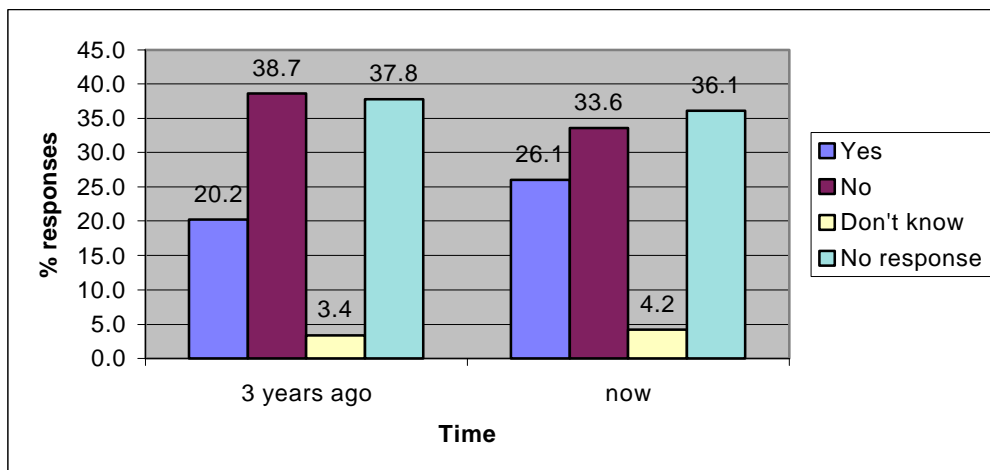
Figure 3. Percentage of firms providing Routine HIV Screening



The percentage of firms providing screening increases with time from 10% three years ago to a projected 28% in two years time, representing a three fold overall increase. Concomitantly the percentage of firms who profess to have no screening services is projected to halve from 71 % three years ago to 35% two years hence. Importantly two issues emerge from the data that illustrate *both* the uncertain nature of the epidemic *and* the ambiguous response. First of all more firms claimed to provide screening in the past than the present and 20% of firms admitted to not knowing whether or not they will provide screening in the future! Of the firms who screen for HIV, only 11% of them provide anonymous testing; the remainder claimed that testing was either not anonymous, they did not know or they gave no response.

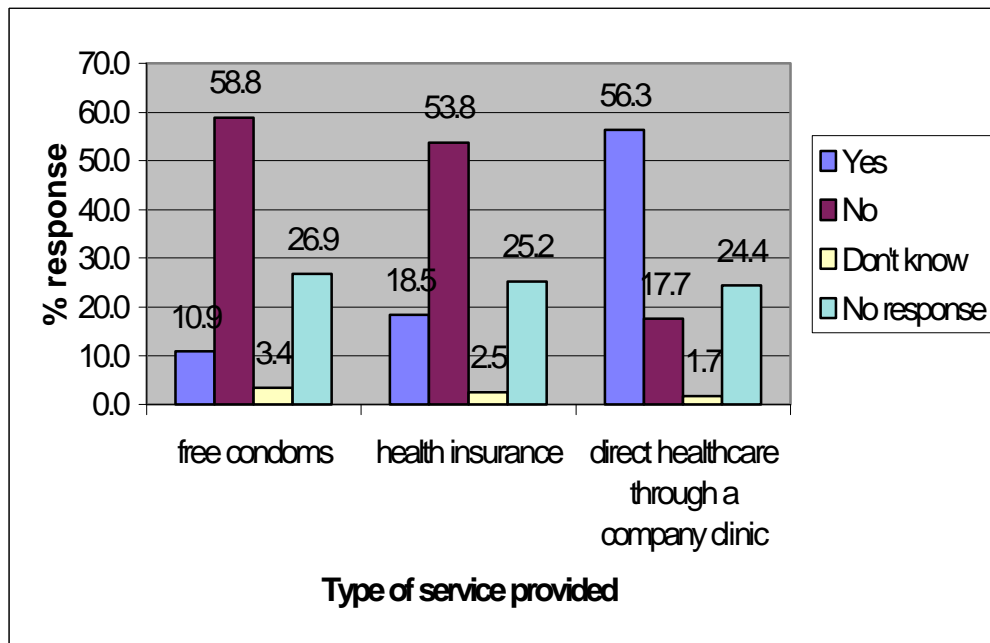
Regarding HIV counseling and education, we see from the graph below that there has been a slight increase in such services provided over the last three years – from 20% firms three years ago to 26% now. Conversely, the percentage of firms that do not provide these services have fallen from 39% three years ago to 34% at the present time.

Figure 4. Provision of HIV Counseling and Education by Companies surveyed



We see from the graph below that only 11% of firms provide free condoms. All but one of these firms was located in Accra and firms from most of the sectors were included⁴³. Not all firms who provided free condoms also provide direct health care through a company clinic and concomitantly not all firms who provide health care through a company clinic provide insurance. In terms of health insurance, 19% of firms provide it and more than 50% provide healthcare through a company clinic.

Figure 5. Services Provided by Companies



⁴³ Wholesale and retail trade (restaurants and hotels) (3 firms), construction (1 firm), manufacturing (3 firms), mining and quarrying (1 firm), agriculture and forestry (1 firm), finance, insurance etc. (1 firm), Other services (3 firms).

Only 21 of the 119 firms responded to the question ‘What are the total costs of all HIV-related testing, counseling, educational services provided by your company? Of these, 18 claimed to be incurring no costs whatsoever and the three that responded gave widely varying figures of \$142, \$500 and \$20,000 respectively. These three firms were all located in Accra; two were in the manufacturing sector and the third was in financial services.

6. Discussion

6.1 Malaria and Productivity

From the data presented above, we see that malaria is considered the most significant health issue to affect the business community. Not only is it a major cause of absenteeism, it is also believed to impact upon efficiency and productivity. Were malaria removed, levels of absenteeism would decrease and productivity would presumably increase.

The high levels of ‘no-response’ - particularly in relation to the HIV/AIDS questions - indicate that not all firms have thought through the implications of the epidemic, or if they have, management (who filled out the survey) was unable or unwilling to comment.

6.2 HIV Prevalence

In comparing the EAGER/ACR data with the results generated by the MESW study we see that the conclusions reached are exceedingly similar. Both studies found that the majority of firms are yet to feel the full impact of the epidemic and are unprepared. The general perception is that HIV/AIDS prevalence is low among the workforce. These perceived rates were far lower than NACP and UNAIDS data would suggest.

Bloom et al. note that for the continent as a whole, ‘business leaders tend to perceive HIV infection levels to be lower than those recorded by UNAIDS among those aged 15-49’ 2000: 28). Therefore, the Ghanaian response is no different in this regard.

Table 10. A Comparison of UNAIDS data with Business Leader's Views of HIV/AIDS in the workplace for selected African Countries
(Adapted from Bloom et al 2000: 29)

Country	No. of Business Leaders Surveyed	UNAIDS 1997 Adult Rate (%)	ACR 1999
Burkina Faso	19	7.17	2.75
Botswana	69	25.10	14.78
Cameroon	12	4.89	3.00
Cote d'Ivoire	16	10.06	3.94
Ghana	119	2.38	0.76
Congo/DRC	3	4.35	15
Kenya	119	11.64	7.51
Lesotho	29	8.35	10.56
Malawi	66	14.92	19.05
Mali	6	1.67	0.00
Namibia	98	19.94	7.63
Nigeria	70	4.12	0.63
South Africa	116	12.91	8.69
Senegal	125	1.77	0.28
Swaziland	10	18.50	0.14
Uganda	141	9.51	9.01
Zimbabwe	130	25.84	17.84

According to Bloom et al. (2000: 31) the divergence between 'real' and 'perceived' rates of infection can be accounted for in a number of ways. Either the business leaders are in 'denial' and are refusing - or reluctant - to acknowledge the true state of affairs, or the 'proportion of infected workers is lower than the proportion of infected adults, with a high number of those infected not working for one reason or another'.

Business leaders in only three countries (Congo/DRC, Lesotho and Malawi) claimed their workforce had higher HIV/AIDS prevalence rates than UNAIDS. The most extreme of these was Congo/DRC where, the three business leaders interviewed averaged a 15.00% HIV prevalence rate compared with a 4.35% national rate.

6.3 Costs

The fact that only three firms have systematically allocated funds to tackle HIV/AIDS is very telling. It illustrates the fact that most firms still do not take the epidemic seriously enough to warrant a concerted effort. It could also mean that the firms are not willing to disclose the amount of money they are spending. For example the mining and quarrying firm that estimated that 20% of its workforce is HIV+ did not give a response to the question aimed at eliciting the cost of HIV-related testing. The range of money allocated (\$142 at one extreme and \$20,000 at

the other) also illustrates the varying levels of importance afforded the epidemic by the different firms. Suffice it to say that the one firm allocating \$20,000 dollars to HIV/AIDS is a company that estimates 2% of its workforce are HIV + - they guessed this figure.

The Ghanaian Ministry of Employment and Social Welfare found that in 1998, at the time of the study –,

Most senior management interviewed were of the opinion that AIDS is not affecting the medical expenditure and were confident that the situation will remain the same. This is because they had not been apprised of the cost of AIDS care per patient. (MESW 1999: 15)

In 1999, according to the EAGER/ACR data, a different result was attained; the perception among the surveyed firms, was that HIV/AIDS imposed the most ‘severe’ impact on ‘health care’ costs. The MESW study employed the AIDSCAP Micro-Economic Model to estimate company profits without and with HIV/AIDS. They were able to apply this model to two large companies⁴⁴. They concluded that ‘the decrease in profits due to HIV/AIDS is small at the moment’ (MESW 1999:17). When these costs were broken down into ‘cost centers’ to show ‘the main cost consuming areas’, it emerged that (for the wood processing company) costs due to HIV absenteeism represented the greatest share (21%) along with cost of burial and providing burial benefits (21%). Unlike the findings of the EAGER/ACR, the cost of health care was ranked as fourth – representing 14% of costs.

The total financial cost of HIV/AIDS was calculated by the MESW using current average health claim costs. The tobacco company (with a total workforce of 316) was spending \$15,223.04 on AIDS. The wood processing concern (with a workforce of 977) was expending \$5,305.38. The cost of HIV/AIDS ‘impact per employee’ is \$69.51 for the former and \$ 6.61 for the latter. The Ministry concluded that,

The higher cost of HIV/AIDS to the tobacco company is mainly due to the greater value of their health and death packages. For all the companies interviewed, the average burial and death benefit packages range from US\$159 to US\$1,255 (excluding drinks and transportation costs), whilst HIV/AIDS health care cost ranged from US\$78 to US\$255. It therefore appears companies spend relatively more on staff deaths than on the health of their employees. (MESW 1999:18)

Three out of the thirty African countries surveyed (Ghana included) ranked ‘healthcare costs’ as the most significant of the costs imposed by HIV/AIDS. A further four ranked ‘healthcare’ costs and ‘time lost to AIDS related sickness’ as imposing an equally heavy burden. A greater number of countries, eight, placed ‘time lost’ as the main impact of the epidemic on their workforce and business operations.

⁴⁴ A wood processing company and a tobacco company.

6.4 Employee Services

Not only are the perceptions of the prevalence rates and impacts of HIV/AIDS low in both studies (EAGER/ACR / MESW) and for the continent as a whole (according to the EAGER/ACR data), but attempts being made to prevent infection and support those infected (screening, counseling, condoms etc.) are modest in the extreme. Currently, the majority of HIV/AIDS prevention programmes⁴⁵ - implemented at the workplace - have been developed and financed by NGO's, not by the businesses themselves. The Director of the National AIDS Control Programme (NACP) – indicated that multi-national firms in Ghana - with branches in parts of East and Southern Africa - (who had already experienced the full-blown epidemic first hand) had done more to implement prevention programmes than other firms⁴⁶. He mentioned the name of an International Bank who have suffered severe losses in the eastern and southern parts of the continent and whose prevention program in Ghana was commendable.

In the table below (Table 11), the percentage of firms who routinely provide screening, free condoms and counseling/education is compared with the HIV/AIDS prevalence rates for the respective countries. This is in order to see if overall, as the NACP Director noted, countries which have higher prevalence rates, and which have presumably felt the impacts of the epidemic, are doing more to protect their workforce and concomitantly their profitability.

⁴⁵ On the whole these consist of peer education, condom distribution, education durbars and counselling services

⁴⁶ The NACP is vigorously trying to encourage firms to take the epidemic seriously. On the day I interviewed the Director of the NACP, members of his team were off to talk to the Ghana Cocoa Marketing Board about the need to take AIDS seriously.

**Table 11. As a Response to HIV/AIDS, the % of firms that provide services by country
(Adapted from Bloom et al. 2000: 30)**

REGION/COUNTRY	HIV/AIDS %	ROUTINE SCREENING	FREE CONDOMS	COUNSELING/ EDUCATION
NORTH AFRICA				
Algeria	0.07	0.00	0.00	0.00
Egypt	0.03	18.75	0.00	9.09
Morocco	0.03	10.00	0.00	0.00
Tunisia	0.04	13.89	0.00	31.43
<i>AVERAGE</i>	<i>0.04</i>	<i>10.66</i>	<i>0.00</i>	<i>10.13</i>
WEST AFRICA				
Burkina Faso	7.17	22.22	17.65	53.33
Cote d'Ivoire	10.06	18.75	20.00	50.00
Ghana	2.38	8.57	14.81	40.79
Mali	1.67	40.00	20.00	20.00
Nigeria	4.12	25.42	15.38	51.06
Senegal	1.77	9.30	22.37	31.03
<i>AVERAGE</i>	<i>4.53</i>	<i>20.71</i>	<i>18.37</i>	<i>41.04</i>
CENTRAL AFRICA				
Cameroon	4.89	33.33	40.00	54.55
Congo (DRC)	4.35	33.33	0.00	50.00
Gabon	4.25	20.00	40.00	40.00
<i>AVERAGE</i>	<i>4.50</i>	<i>28.89</i>	<i>26.67</i>	<i>48.13</i>
EAST AFRICA				
Ethiopia	9.31	0.00	15.79	16.67
Kenya	11.64	27.93	41.51	59.55
Madagascar	0.12	5.38	14.46	28.38
Mauritius	0.08	5.00	3.12	16.00
Seychelles	-	30.00	20.00	28.57
Tanzania	9.42	4.35	15.00	27.27
Uganda	9.51	3.08	18.80	27.72
<i>AVERAGE</i>	<i>6.68</i>	<i>10.82</i>	<i>18.38</i>	<i>29.17</i>
SOUTHERN AFRICA				
Angola	2.12	16.67	50.00	16.67
Botswana	25.10	1.49	56.25	51.85
Lesotho	8.35	6.90	62.50	34.78
Malawi	14.92	1.59	35.00	60.00
Mozambique	14.17	4.00	33.33	31.25
Namibia	19.94	11.96	38.55	50.00
South Africa	12.91	9.73	36.36	59.34
Swaziland	18.50	12.00	62.50	71.43
Zambia	19.07	6.49	38.16	35.48
Zimbabwe	25.84	8.26	40.00	57.47
<i>AVERAGE</i>	<i>16.09</i>	<i>7.91</i>	<i>45.27</i>	<i>46.82</i>

Countries with higher HIV/AIDS prevalence rates, in the eastern and southern parts of the continent, are doing more to provide services for their employees; 45% of firms in Southern Africa provide free condoms compared with only 18.37% in West Africa and 0.00% in North Africa. In fact, the percentage of firms who provide condoms counseling and education would appear to be ‘modestly’ correlated with ‘perceived’ and ‘real’ rates of infection (Bloom et al. 2000: 35). Routine HIV/AIDS screening on the other hand does not appear to be related to the severity of the epidemic; in fact, it is ‘mildly negatively correlated’ (ibid.). For example, only 8% of firms in Zimbabwe screen for HIV/AIDS despite the national prevalence rate of 25.84% and a perceived workforce infection level of 17.85%. In direct contrast to this, in Mali the with a prevalence rate of 1.67%, 40% of firms screen for HIV/AIDS.

7. Conclusions and Recommendations

We already know from the literature that, ‘the robustness of the correlation between health and economic indicators...suggests that health is...a determinant of economic success. (Hamoudi and Sachs 1999b: 2)

The full impact of the HIV/AIDS epidemic has not yet been felt in Ghana; nor has the likely devastation of the workforce and productivity been acknowledged by the business community. Some of the potential economic costs of HIV/AIDS and malaria to business have already been outlined⁴⁷ and various efforts aimed at measuring the perceptions of the business community have been identified. Apart from the economic costs there are also social costs which are harder to quantify and have received less attention; these relate to the organizational disruption brought about by the loss of personnel and changes in behavior and attitudes induced by HIV/AIDS (McPherson 1999: 10) such as fear, poor morale, stigmatization and discrimination at the workplace.

7.1 Learn from experience

Businesses in Ghana have much to learn from their counterparts and competitors across the continent; ideally they ought to learn from mistakes made and build upon the successes. The ‘costs’ of inaction are great. As a result of the HIV/AIDS epidemic, some companies in Africa have been very badly affected and others have collapsed, as their workers get sick and die. According to a survey conducted on commercial farms in Kenya, ‘illness and death have already replaced old-age retirement as the leading reason why employees leave service. Retirement accounted for just 2% of employee drop-out by 1997’ (UNAIDS 1999a).

Some firms in Africa have implemented prevention programmes in the workplace to combat HIV/AIDS and to safeguard their investment in their human capital (UNAIDS 1999a). The successful initiatives among these should be duplicated (but modified to reflect Ghanaian

⁴⁷ Increased health care expenditure; Increased retirement, pension and death benefit claims; decreased productivity as worker absenteeism rises owing to personal illness or absence from work to care for sick relatives; increased recruitment, labour turnover and training costs from the loss of experienced workers. (UNAIDS 1998B)

circumstances). For example in Zimbabwe, a peer-led AIDS education programme in 40 factories - which included a condom distribution campaign – led to a 34% lower rate of HIV infection among employees in participating than in non-participating businesses. The programme cost just \$6.00 per worker. (UNAIDS 1998a: 6). Another positive example comes from South Africa where the members of the business community launched a ‘Business Coalition on HIV/AIDS... in Johannesburg in February 2000 to coordinate a new level of response to the problem’ (Bloom et al. 2000: 35).

7.2 Mobilize existing laws

Employers need to be aware of the latest medical and scientific developments and to modify their policies according to new knowledge. Key policy areas include health care, work duties and performance, employee benefits (pensions, disability), recruitment and training and cost. (UNAIDS 1998a: 5)

The rates of HIV/AIDS in Ghana have reached projected levels and if current CBAs and other legal instruments are not amended and re-negotiated then it is clear that the business community in Ghana will be compelled to reevaluate their financial and social investment in the whole workforce as well as their economic growth and development.

Existing laws should be mobilized and updated to help the fight against AIDS. For example, the Industrial Relations Act ‘prescribes that, employees and employers always negotiate on issues that are of importance to both parties’ (MESW 1999: 7). In theory, this law could be used as a tool for all parties (employers, employees, trade unions) to join forces and discuss how best to initiate and implement HIV/AIDS workplace programmes (MESW 1999: 8). Thus, new policies and mechanism for dealing with issues such as absenteeism, sick leave entitlements, ill health and early retirement etc. need to be developed.

7.3 Invest in Workplace Programmes

Effective workplace programmes can be set up by a company at a fraction of the current, rising financial cost of AIDS to the business. Companies should not wait for the government or health sector to take action for them. (UNAIDS 1998b)

For a long time AIDS prevention and care was ‘sold’ to businesses in ‘health’ terms by ‘health’ experts (UNAIDS 1998a: 3). Now it is widely acknowledged that everyone has a stake in the battle against the disease and that the more stakeholders get engaged the better. Therefore, firms should be encouraged to plan, implement, and invest in ‘home-grown’ Workplace programmes which are appropriate for their employee culture, size, structure etc. Such programmes should ideally be comprehensive and sustainable taking into account the ‘legal, ethical, social and economic dimensions of HIV/AIDS’ (UNAIDS 1998b). The cost effectiveness of such programmes should be emphasized; we saw from the MESW’s AIDSCAP model that some firms in Ghana are spending more on employee death than on health at the current time.

Effective workplace programmes should be equitably communicated to all staff (senior and junior) and ‘periodically monitored, re-evaluated and updated’ (UNAIDS 1998b). They ought to encompass the following:

Table 12. Essential Elements of a HIV/AIDS Workplace Programme

• Information Education and Communication
• Promotion and Provision of Condoms
• STD Prevention and treatment at workplace and elsewhere
• Care and Support for infected employees
• Promotion of Voluntary Counseling and Testing

Workplace programmes ought to be designed by businesses to accommodate their particular needs using clear and appropriate language. As Bloom notes, businesses have skills and expertise in marketing and Public Relations; the ‘same sophistication used to market business brands needs to be applied to marketing messages about HIV prevention and AIDS care’ (Bloom et al. 2000: 35). We know that well designed marketing campaigns can be effective; since the start of the National ‘Love Life, Stop AIDS’ Campaign, the sale of condoms in Ghana has risen by 70% (Segbefia 2000)⁴⁸.

Regarding malaria, many low-cost, cost-effective interventions are available for combating it in the workplace. The most obvious of these are anti-vector activities such as – protective clothing; insecticide treated mosquito netting; repellants/ insecticides; mosquito coils etc. as well as basic sanitary measures (maintaining a clean environment, free of stagnant water).

Businesses in Ghana have to act *now* if they are to lessen - and ultimately remove - the impacts of malaria and HIV/AIDS upon their workforce and their profitability. Ghana’s most valuable resources and assets are her people and the business community has a fundamental responsibility to play in ensuring the health and wealth of the nation.

⁴⁸ The ‘Love Life, Stop AIDS’ campaign is a partnership between The Ghana Social Marketing Foundation (GSMF), The Ministry of Health, The Ministry of Communications and Johns Hopkins University, USA’. Local and popular music forms – highlife, hiplife, rap, reggae, gospel – are the medium through which safe sex messages are disseminated –by local artist(e)s.

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