

THE IMPACT OF THE BRAIN DRAIN ON HEALTH SERVICE DELIVERY IN ZIMBABWE: A RESPONSE ANALYSIS

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142 King George Road
Avondale
Harare, ZIMBABWE.
Tel: +263-4-33 50 44, 30 35 14
E-mail: iomharare@iom.int
Internet: <http://www.iomzimbabwe.org.zw/>

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The Impact of the Brain Drain on Health Service Delivery in Zimbabwe: A Response Analysis

Prepared for IOM

by

Nepachem cc
1 Conebush
Country View Gardesn
20 Sonneblom Road
Midrand 1685
South Africa

Summarized by Geoffrey Feltoe

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List of Acronyms

BDS	Bachelor of Dental Surgery
CSO	Central Statistical Office
GoZ	Government of Zimbabwe
HBMLS	Bachelor of Medical Laboratory Sciences Honours Degree
IOM	International Organization for Migration
MBChB	Bachelor of Medicine Bachelor of Surgery Degrees
MoH&CH	Ministry of Health and Child Welfare
NGOs	Non Governmental Organizations
NHIS	National Health Information System
NUST	National Univesrity of Science and Technology
SADC	South African Development Community
SCMLT	State Certified Medical Laboratory Technicians
SPSS	Statistical Package for Social Science
STERP	Short Term Emergency Recovery Programme
UNDP	United Nations Development Programme
UZ-CHS	University of Zimbabwe College of Health Sciences
WHO	World Health Organization

CHAPTER I

INTRODUCTION AND BACKGROUND

I.1 Extent of brain drain in the health sector

The poor economic situation prevailing in Zimbabwe has led to multiple and complex migration issues characterized by high levels of brain drain, cross-border mobility and irregular migration. The economic decline over the past five years has precipitated a growing exodus of professionals from the country in search of better economic opportunities. Skill areas that are affected include (but are not limited to) health, education, engineering, surveying, architecture, veterinary medicine and forensic science.¹ Migration is also a common coping strategy for households under stress, as families try to diversify their livelihood options. Most Zimbabweans migrate to South Africa, the United Kingdom and Botswana. Other common destinations for Zimbabwean migrants include Namibia, the United States of America, Canada, Australia and New Zealand. Officially, Zimbabwe has a population of 11.6 million people as of 2002, but it is estimated that over 3 million Zimbabweans are in the diaspora. According to a study undertaken in Zimbabwe in 2005, the magnitude and trend of brain drain had reached unacceptable and unsustainable levels (Chikanda, 2005). The health sector has been the worst affected as both professionals and semi-skilled workers in the sector have migrated in search of better employment opportunities.

As of December 2008, the overall vacancy rate in the public health sector stood at 32 per cent, while that for general medical practitioners, medical equipment engineers, environmental health officers and health-care programmers stood at 60 per cent, 48 per cent, 79 per cent and 79 per cent respectively (Ministry of Health and Child Welfare-Zimbabwe, 2008). At a time when the sector experienced these high vacancy rates, the majority of those who remained in service went to work erratically as they could not afford transport costs to get to work, and/or worked elsewhere to supplement their income. As of January 2009, the University of Zimbabwe College of Health Sciences had an average vacancy rate of 50 per cent, while the National University of Science and Technology's medical school had an average vacancy rate of 51 per cent (Emergency Summit on Health, 2009). As a result, the range of courses on offer at the two institutions has been reduced, and it is likely that the quality of education has been compromised.

¹ Although undocumented, young men and women (mainly unskilled and semi-skilled) are crossing the borders irregularly into South African and Botswana daily in search of work in the neighbouring countries. An interesting aspect of this migration phenomenon is its circular and seasonal nature.

The Health Task Force Report (2009) observed that the health sector is characterized by overall failure by public sector hospitals to perform their intended functions; failure to retain local well-trained health care professionals; inability to recapitalize/re-equip the entire health sector; inability to provide reliable and consistent basic supplies of medicines; inability to maintain, upgrade, develop, and implement a sustainable health professional training policy; inadequate coverage of benefits by health care insurance providers and failure to carry out regular preventive vaccinations.

In March 2009 the Government of Zimbabwe published a document entitled The Short Term Emergency Recovery Programme (STERP) with the theme “Getting Zimbabwe Moving Again”. It acknowledged the many problems bedevilling the health sector arising from the economic crisis. These include a sharp decrease in funding for the health sector, leading to the loss of experienced health professionals and deterioration of infrastructure, shortages of drugs and drastic decline in the quality of public health services. The STERP notes that high vacancy rates in the health sector have lead to the overburdening of remaining personnel. Consequently there is a rising challenge in dealing with diseases such as malaria, AIDS, cholera and tuberculosis among others.

While the foregoing illustrates the magnitude of the migration challenges facing Zimbabwe and the attendant impact on service delivery, the capacity of the Government of Zimbabwean (GoZ) to manage the multi-faceted migration issues so as to address the negative aspects of the brain drain and enhance its positive impact has been constrained by the lack of accurate information and a comprehensive and coherent policy framework for implementing migration practices in an integrated manner. While the government is responsible for the overall policy framework and planning, the lack of information on migration has militated against the inclusion of migration issues in national planning or human resource planning for the health sector and other sectors. It is against this background that the International Organization for Migration (IOM) Zimbabwe commissioned the “Zimbabwe Health Worker Survey” in December 2008 to focus on health professionals in the diaspora.

I.2 Objectives of the Study

The overall objective of the study was to profile the skills of Zimbabwean health workers in the diaspora with the aim of assessing the extent and nature of health worker migration. This would inform future human resource policy in the health sector. The survey also assessed the generic profile of the health care professionals and collected relevant information via detailed questionnaires regarding the factors that induced migration, experiences of health professionals in the diaspora, and the possibility and conditions for short-term and permanent return. Specifically, the study was commissioned to achieve the following objectives:

- a) To assess the nature and magnitude of health worker migration from Zimbabwe and the impact of such migration on the health service delivery in Zimbabwe;
- b) To assess the factors that induced the emigration of health professionals from Zimbabwe;
- c) To determine the spatial distribution and profile the skills of Zimbabwean health professionals in the diaspora;
- d) To provide policy and programmatic recommendations on stemming the brain drain of health professionals from Zimbabwe and the possibility for short-term and permanent return of health professionals to Zimbabwe in a bid to address the adverse impact of the brain drain on service delivery in the health sector.

I.3 Structure of the Paper

Section 1 provides the introduction and background, while Section 2 presents the survey methodology. The findings and recommendations/conclusion are the subjects of Sections 3 and 4 respectively.

CHAPTER 2

METHODOLOGY

The approach to fulfill the study objectives entailed a desktop study conducted in Zimbabwe involving key informant interviews, an online diaspora health worker survey that involved 830 professional health worker respondents, secondary data from various sources as well as insights from the Emergency Health Sector Summit held in Harare (5-6 March 2009) at which over 200 stakeholders deliberated on Zimbabwe health related issues for two days.

To address objective (a), data was sourced from key informants that included the Ministry of Health (Zimbabwe), Health Services Board, Health Professions Authority, teaching hospitals in Zimbabwe, major hospitals in Zimbabwe as well as from the United Nations Development Programme (UNDP), IOM and Non Governmental Organizations (NGOs) that deal with health. The key informant interviews were conducted between February and May 2009. Information collected from the key informants included: health worker vacancy trends, the Country's health training capacity, health facilities and performance indicators in Zimbabwe, capacity of hospitals and clinics and burden for diseases and the World Health Organization (WHO)'s health indicators for Zimbabwe.

Objective (b) was addressed by data collected using a structured questionnaire over the internet. The selection of respondents entailed posting the survey tool on the internet on which those interested completed it and were also asked to refer their own colleagues to be involved- a snow-ball sampling process. The on-line questionnaire was posted on various websites including: New Zimbabwe, The Financial Gazette, Zimpapers, The Zimbabwe Independent, Zimbabwe Situation and ZIMNEWS. The questionnaire was administered between February and April 2009. The questionnaire captured a number of variables including: push and pull factors that have led to emigration, demographic characteristics and spatial distribution of respondents, professional advancement after emigration, salaries and benefits before and after emigration, training opportunities after emigration and the level of support to family members following emigration.

To address objective (c), data on plans in place to alleviate the brain drain as well as to attract health professionals back was sourced from key stakeholders in Government. This data was collected from the two-day stakeholders Summit on Health at the Crown Plaza Monomotapa on the 5th and 6th of March 2009 with over 200 key participants representing core stakeholders in the health sector. The participants included senior government officials, representatives of health councils and health services

boards and civic organizations. Information collected at the summit included issues on health workforce retention, health financing, medicines, vaccines and medical equipment, Infrastructure and plant (such as boilers, elevators), transport and communication, leadership, governance and policy as well as organization and management of health services.

Secondary data was collected and analysed from existing data bases and demographic and health survey reports produced by the Central Statistics Office (CSO) and the National Health Information System (NHIS) under the Ministry of Health and Child Welfare (MoH&CW)-Zimbabwe. The 2006 National Human Resources Survey conducted by Nepachem also enriched the study findings. Some information on the experiences in other countries has also been gathered and synthesized.

2.1 Data Analysis:

The data collected using on-line questionnaire was downloaded onto a local computer for analysis using Statistical Package for Social Sciencies (SPSS). The analysis captured the frequencies for the different variables the results of which were tabulated or used to generate graphs as shown under Section 3 of the report.

2.2 Strength of the Survey

The on-line survey site was set up to comply with internationally accepted standards including: keyboard access for mobility impaired users; color contrast for users with low vision; and alternative content for visual aspects of the site so that assistive products such as screen readers could be easily access and translate information for users. This enabled the study to reach a broad range of potential respondents. The research also customized the process a willing respondent went through when completing the survey by adding skip logic. The goal of skip logic was to collect data on specific survey participants. This was accomplished by directing respondents through the survey process based on responses to previous questions. This allows routing respondents to a page of follow-up questions that were relevant to them. This eliminated unnecessary confusion by skipping non-applicable questions.

2.3 Limitations of the Survey

The sample was a self-select group of individuals mostly with easy access to the internet. There is a possibility that documented migrants were more likely to take part in the survey than their undocumented counterparts, which is probably true for SADC countries. Zimbabwean medical professionals in South Africa and Botswana are most likely to be under-represented because of a

number of factors including the difficulty of practising and participation in casual jobs. Various studies have shown that most people tend to inflate their incomes; hence reported incomes may not necessarily be accurate.

According to the survey, a considerable number of Zimbabwean nurses are working in South Africa as domestic helpers or in restaurants. In an interview, a key informant at the Methodist Church in central Johannesburg mentioned that there were easily more than 200 qualified nurses sheltering at the Church. This is likely to be true for Botswana as well. Most of these individuals are un-documented and are unlikely to have access to internet facilities.

CHAPTER 3

FINDINGS FROM THE STUDY

3.1 Results from Secondary Data Review and Key Informants

3.1.1 Zimbabwe Core Health Indicators

The study identified a critical shortage of staff in the medical field. According to the Ministry of Health and Child Welfare figures for December 2008, Zimbabwe had 1.7 health workers per 1,000 people, which is below World Health Organization (WHO) Africa regional average of 2.6. The critical shortage of staff was also highlighted by the WHO staffing fact sheet of 2008 (Table 1). Though the latest report was relatively old, it gave a gloomy picture of Zimbabwe's doctor patient ratio of 0.16 health doctors per 1,000 people compared to 0.22 doctors per 1,000 patients in Africa on average. Follow-up results from consultations with key stakeholders led to suggestions that there is need to increase training capacity and retention of graduates from various medical training institutions as well as putting an emphasis on bonding of cadets.

Table 1: Zimbabwe WHO core health indicators

<i>Indicator</i>	<i>Value (2004)</i>
<i>Ratio of dentists per 10 000 population</i>	<1
<i>Number of dentistry personnel</i>	310
<i>Number of nursing and midwifery personnel</i>	9,357
<i>Number of other health service providers</i>	1,324
<i>Number of Pharmaceutical personnel</i>	883
<i>Number of Physicians</i>	2,086
<i>Ratio of nursing and midwifery personnel per 10 000 population</i>	7.00
<i>Ratio of other health service providers per 10 000 population</i>	1.00
<i>Ratio of pharmaceutical personnel per 10 000 population</i>	<1
<i>Ratio of physicians per 10 000 population</i>	2.00

Source: WHO Staffing Fact Sheet of 2008.

3.1.2 Zimbabwe Health Trainee Capacity

The study revealed a training capacity of the government health system of about 8,000 trainees as shown in Table 2, with the institutions not having enough capacity to rapidly expand this to meet the needs of the country. There would have to be additional investment in capacity to achieve this goal.

Table 2: Zimbabwe government health trainee capacity

Training Category	2nd Year Students	3rd Students	Year	Total No. of trainees (1 st to final Year)
MBChB/BDS	178	180		808
B Pharmacy	70	54		244
BSc Nursing Sc	28	20		108
BSc HEP	17	26		103
BSc OT	23	21		94
BSc Physio Therapy	24	22		106
HBMLS	35	32		112
Trainee Primary Care & Student Nurses				5,303
Trainee Clinical Officers				20
Trainee Midwives				270
Trainee Environmental HO				24
Trainee Environmental HT				360
Trainee Pharmacy Technicians				120
Dental Technician Trainees				12
Dental Therapy Trainees				30
Trainee SCMLT				44
Trainee Rehab Technicians				40
Total Estimates of Trainees				7,798

Source: UZ Medical School data, MoHCW Data December 2008.

1. Degree student estimates cover 5 years (MBChB, BDS) and 4 years (the others).
2. Nurses, EHTs, dental therapy etc trainees cover all years (2 or 3 years where applicable).

Key:

MBChB	-Bachelor of Medicine Bachelor of Surgery degrees
BDS	- Bachelor of Dental Surgery
HBMLS	- Bachelor of Medical Laboratory Sciences Honours degree
SCMLT	- State Certified Medical Laboratory Technicians

3.1.3 Professional Registration Fees

All affiliated medical professionals are required to register with different professional bodies in order to practice in Zimbabwe. The fees differ for the different bodies, some requiring a once-off registration fee, others requiring a once-off annual fees, some a quarterly fees, and yet others have an annual subscription fee with quarterly payments as well. The fees range in amounts from USD 10 for trainees to USD 200 per annum for some clinical professions. Considering the low levels of remuneration of health workers, the fees were quite high resulting in some workers in the country not re-registering. The study also revealed that staffing in hospitals has been affected by cumbersome re-registration procedures for health professionals who might be willing to return home. A workshop held for diasporas in South Africa in October 2009 by IOM in collaboration with the

Government of Zimbabwe has revealed that there are nurses and other professionals that are willing to return as they were not able to find work in South Africa or other host countries in the region, but the bureaucratic and high re-registration costs (+USD 1,000 per professional) with the Health Professional Council is hindering them to come back.

3.1.4 Health Worker Vacancy Trends

The study revealed very high vacancy rates for the medical professionals for 2008 as indicated in Table 3. The top five areas in terms of vacancy rates for the period under review were medical programmes, environmental health technicians, doctors, the Head Office staffing and psychological services with radiographers emerging among the top in June 2008. These patterns are important for the country when human resources strategies are being crafted to fill vacancies internally or through short-term engagements of those professionals in the diaspora.

Table 3: Health worker vacancy trends

Category	Total No. of post available in the	Jan 08 Vacancy (%)	Mar 08 Vacancy (%)	Jun 08 Vacancy (%)	Dec 08 Vacancy (%)
Key Staff-Head Office	83	64	61	51	48
Doctors	1,705	68	65	61	61
Nurses	19,379	30	33	36	28
Environmental Health	2,429	61	68	60	60
Pharmacy	585	42	42	41	41
Radiography	460	53	53	58	34
Physiotherapy	470	34	36	32	33
Nutrition	972	48	45	19	20
Orthopaedic	49	22	22	31	31
Dental staff	307	43	36	35	36
Laboratory/Pathology	564	48	45	46	44
Research	46	50	50	48	48
Health Promo & Public Relations	73	52	41	45	45
Surveillance & Information	225	36	36	32	34
Engineering	190	53	55	49	48
Psychology Service	26	58	58	58	58
Records & Information	415	38	30	37	37
Programmes	50	69	78	79	79
Administration	5,934	34	31	20	20
Overall	35,426	36	37	31	32

Source: Analysis of MoHCW Human Resources Database December 2008.

3.1.5 Vacancy rates at the Medical Schools

The study revealed very high vacancy rates at the only two medical schools in the country (National University of Science and Technology (NUST) and University of Zimbabwe College of Health Sciences (UZ-CHS)) as

professionals and semi-skilled workers at the two institutions migrated as a common coping strategy in search of better employment opportunities. As a result of this “brain drain”, medical schools have not been able to fulfil their mandates of adequately providing trained human resources to the health sector. As of December 2008 the University of Zimbabwe College of Health Sciences had a vacancy rate of 50 per cent and NUST had a vacancy rate of 51 per cent. The range of courses on offer has thus been reduced and in general the quality of education has been compromised in spite of sterling effort by staff still in place. The UZ-CHS has also witnessed an increase in the failure rate at 5th year final level in the medical programme with 50 per cent failing to graduate in 2008 (Professor Nyagura, 2009).

3.1.6 Budget Allocation for the Health Sector

The review of the Zimbabwe 2009 National Budget, indicated that 16 per cent of the total budget was allocated to the health sector and this was the second highest after Education, Sports, Arts and Culture. It was difficult to compare the national expenditure in health in US dollars to other nations due to the varying exchange rates that were used to convert Zimbabwean dollars expenses to US dollars during the study period. The easier approach was to monitor is the Health & Child Welfare budget as a percentage of the total budget. This figure has remained fairly static up to 2007 as shown in Table 4, before increasing to 12 per cent in 2008 and 16 per cent in the 2009 budget.

Using the manpower headcount figures of 35,834 (Ministry of Finance/Treasury Documents of 2008), allocation per Health Worker per year was USD739 which falls far short of comparable regional salaries.

Table 4: Trends in Government funding of Health Ministry budget

Year	2002	2003	2004	2005	2006	2007	2008	2009
Health & Child Welfare (billion Z\$)	35.0	73.5	701.2	2,754.7	8,110.4	590.0	962,912.2	157.0 (USD)
Total Budget-Votes, Statutory Appropriations	401.7	783.9	8,747.0	31,840.0	127,882.0	6,233.9	7,905,314.0	1,000.0
Health & Child Welfare as % of Total Budget	9	9	8	9	6	9	12	16

Source: Government of Zimbabwe National Budget for 2009.

3.2 Results from the Situational Analysis

The situational analysis involved analysis of desk study information and views from the key discussions on health at the Summit on Health held at the Crown Plaza Monomotapa on the 5th and 6th of March 2009 where over 200 key participants representing core stakeholders in the health sector. Issues prioritized by the stakeholders included health workforce retention; health financing; medicines, vaccines and medical equipment; Infrastructure and plant (such as boilers, elevators); transport and communication; leadership, governance and policy; organization and management of health services. The situational analysis is presented in the form of matrix in Table 5.

Table 5: Situational and gap analysis for the health sector

Gap	Effect	Action needed
High vacancy rates in hospitals and medical training institutions	Very slow or no health service delivery leading to high deaths rate that could have been mitigated; slow or no injection of new medical cadets to fill the void left by brain drain	Improve remuneration for medical professionals
Uncoordinated approach to address brain drain in the health sector	Massive brain drain of professionals from health institutions and subsequent poor delivery of services.	Need to include the issue of brain drain in the Migration Management and Development Policies. Some of the policy measures to include, expanding training and conducting research on the regional conditions of service.
Reduced management competence and most key posts occupied by junior, inexperienced or those in acting capacity	Resource wastage due to inefficiency and infrastructure damages rise. Uncertainty leads to indecision	Capacity building of junior staff;. Confirmation of those in acting capacities
Skills limitation for resource bargaining and writing of bankable proposals	Resource mobilization and bargains for Treasury allocation remain weak. Mobilization of resources from other sources also weak	Capacity building for human resource practitioners and technical staff on best human resource management practices
The Zimbabwe Health worker / 1,000 ratio under authorized establishment is 2.5; using December 2008 staff situation it is 1.7 and using Council Registers data 2.5. This against an Africa average of 2.63/1,000	There are data inconsistencies adversely affecting policy forecasts and which ever ratio one uses, the country remains below continental average. The few workers are over-burdened when one assumes that the 32% vacancy rate under-stated the situation on the ground	Raise authorized establishment to above 40 000 and quickly fill vacancies. Establish staff retention schemes and align conditions of service to those in the region.
Treasury allocation of USD 158 million in 2009 against expectations of USD 700 million	Remuneration packages remain suppressed	Treasury allocations must be raised to match regional (SADC) remuneration packages.

3.3 Review of Experiences from Other Countries Gleaned from Literature

According to WHO, globally, there were 13 physicians per 10,000 people, with large variations between countries and regions. In Africa, there were only 2 physicians per 10,000 people compared to 32 per 10 000 in Europe. The global average is 28 nurses and midwives per 10,000 people, ranging from a low of 11 per 10,000 in Africa to a high of 79 per 10,000 in Europe. Africa accounts for 14 per cent of the world's population, harbours 25 per cent of global disease burden and has only 1.3 per cent of global health workers. It is estimated that 2.5 health workers per 10,000 inhabitants are needed to achieve the Millennium Development Goals. The health workers/population ratio in Africa is 0.8 health workers per 10,000 inhabitants. According to WHO, 2008, Africa needs at least 1 million more health workers in the short term to enable noticeable improvement on its health status.

Total health workforce density (per 1,000 population) for the Africa region ranked lowest at 2.3 compared to Eastern Mediterranean at 4.0, South-East Asia at 4.3, Western Pacific at 5.8, Europe at 18.9 and Americas at 24.8 (WHO, Global Atlas of the Health Workforce, 2008) This picture puts pressure on Zimbabwe health stakeholders to double act: reversing the brain drain and its effects as well as catching up on the health worker/population ratio. In many developing countries, especially those in sub-Saharan Africa, the continuous low supply of trained health workers has been exacerbated by an increased disease burden, top of the list being HIV and AIDS, TB and malaria. Out migration of medical professionals, especially of nurses and doctors, makes the situation dire. The challenge remains for African countries to overcome the economic, social and political constraints that have negatively affected some of the strategies and initiatives meant to slow down outward migration.

Retaining skilled professionals, or attracting them back from abroad, requires a strong investment climate and adequate compensation and opportunities in the public sector. Financial incentives have not succeeded in encouraging returns. Instead, encouraging the return of professionals may need to be adequately researched (Thorn, 2008). Brown (2004) pointed out that international migration of health professionals is thought to reflect the widening of global inequalities. According to Loeffler I. (2000) migration is not just economic. Doctors "use their qualifications as a passport to freedom, intellectual and emotional fulfilment and professional satisfaction."

In addition to large income differentials, factors explaining the decision of high-skilled professionals to emigrate to high-income countries (or to remain after completion of higher studies) include the quality

of living conditions and research facilities, as well as the density of research networks and the size of the pre-existing diaspora. Factors favouring a return include proximity to family, cultural affinities, and emigrants' desire to contribute to technological progress in their native country. Wuliji *et al.* (2009) saw the issue of migration in the context of the wider human resource agenda, thus viewed migration as one form of attrition and a symptom of other root causes. Vujicic *et al.* (2004) showed that willingness of health care professionals to migrate from developing to developed countries was somewhat unresponsive to wage differences between source and destination countries.

Arango (2000) suggests that migration is motivated by the perceived net gain of migrating: that is, the gain will offset the tangible and intangible costs of moving, while according to Castles (2007) the decision to migrate is often a family strategy to produce a better income and improve survival chances. These factors also played a role in the Zimbabwean scenario. Participants at the IOM International Dialogue on Migration seminar, "Migration and Human Resources for Health: From Awareness to Action" (2006) observed three considerations that needed to be taken into account in the development of any migration strategy: (1) the international mobility of persons, as an integral part of globalization, was here to stay; (2) everyone has the right to live in any country, including his/her own; and (3) migration was a potentially beneficial feature of the modern world.

Leipziger, the World Bank Vice President for Poverty Reduction and Economic Management notes that financial incentives alone have not been successful in encouraging returns in low income countries. Comprehensive human resource policy development should consider both remuneration and professional development. The World Bank noted that over-investment in nurses and other professionals for export was a valid development strategy and effective non-pecuniary incentives (such as professional networks) that can work better in retaining and attracting back talent from abroad.

3.4 Results from the Questionnaire Interviews

3.4.1 Push-Pull Factors that Induced the Emigration of Health Professionals from Zimbabwe

According to the results of the survey, the flight of health professionals from Zimbabwe has mainly been driven by a combination of push-pull factors, both socio-economic and political in character. Asked why they had left Zimbabwe, 82 per cent of respondents cited three or more reasons (Table 6). The major push factors that made most respondents leave the country included: low salaries in Zimbabwe (90% agreed); the general economic conditions in Zimbabwe (88% agreed), and poor working conditions (82% agreed). Other push factors in order importance as depicted by number of people agreeing include,

political problems in Zimbabwe (65%), poor working facilities leading to redundancy (57%), bad relations with management (54%) as well as poor safety at the work place (51%).

The pull factors for emigrating were mirrored in the push factors, that is, better salaries abroad (87% agreed), better benefits (82%), better working conditions (75%) and better advancement opportunities for dependents (76%). Other pull factors cited included better opportunities for further advancement (76%), and better study opportunities for respondents (62%). Joining family members (27%) or friends (20%) were relatively less important reasons for emigrating. The falling standards of education in Zimbabwe in recent years would explain why the respondents cited study opportunities for dependants as a major motivating factor to emigrate.

Table 6: Pull and push factors for migrating among Zimbabwean health professionals in the Diaspora

Push/Pull Factor	Agree	Indifferent	Disagree	Not applicable
General economic situation	87.5% (477)	5.3% (29)	2.9% (16)	4.2% (23)
Access to social services	61.4% (308)	15.5% (78)	11.8% (59)	11.4% (57)
Access to professional specialization	68.8% (346)	12.9% (65)	9.9% (50)	8.3% (42)
Low salaries in Zimbabwe	89.5% (477)	2.8% (15)	3.8% (20)	3.9% (21)
Poor working conditions in Zimbabwe	82.1% (430)	7.1% (37)	7.1% (37)	3.8% (20)
Political reasons	64.8% (335)	13.5% (70)	10.4% (54)	11.2% (58)
To further my education	61.5% (303)	17.2% (85)	12.8% (63)	8.5% (42)
Self advancement	76.3% (384)	10.1% (51)	6.6% (33)	7.0% (35)
Joining family members abroad	27.0% (127)	13.0% (61)	26.6% (125)	33.4% (157)
Joining friends abroad	20.4% (95)	13.9% (65)	31.8% (148)	33.9% (158)
Better salaries abroad	87.2% (449)	4.9% (25)	4.1% (21)	3.9% (20)
Better benefits abroad	81.7% (412)	6.9% (35)	6.2% (31)	5.2% (26)
Better working conditions	75.1% (380)	10.3% (52)	10.1% (51)	4.5% (23)
Study opportunities for dependants	75.9% (384)	6.1% (31)	6.5% (33)	11.5% (58)

3.4.2 Demographic Characteristics and spatial distribution of medical professionals in the diaspora

3.4.2.1 Spatial Distribution of Respondents

As indicated in Table 7 below, the bulk of the respondents were located in United Kingdom (63%), followed by Australia (12%), South Africa (6%), USA (5%), Botswana 5 per cent, New Zealand (2%), Canada 1 per cent and Other (6%). The Other category included countries such as Namibia, Ireland, Lesotho, Zambia, Kenya, Malawai, Swaziland, Russia, Ethiopia, Democratic Republic of Congo, The Netherlands and Saudi Arabia suggesting a wide geographical dispersion of Zimbabwe's health professionals. The results may also indicate that there is a higher concentration of Zimbabwean health professionals in the UK than any other country. The low number of health professionals in South Africa (despite its proximity to Zimbabwe) may be attributed to that country's **Policy on Recruitment and Employment of Foreign Health Professionals** which stipulates that there is an adequate supply of trained SA health professionals and therefore recruitment and employment of foreign health professionals should not occur and applications by foreign health professionals for permanent residence should not be supported. It further stipulates that the recruitment of individual applicants from developing countries, in particular from another SADC country, should not be supported.² This may explain the claims (albeit empirical) that the majority of Zimbabwean nurses who emigrated to South Africa are finding it difficult to register and practice in that country, and that for this reason the majority are employed in menial jobs or sectors other than health.

Table 7: Spatial distribution of respondents

Country	N	%
United Kingdom	465	63
Australia	39	12
South Africa	88	6
Botswana	8	5
United States of America	11	5
New Zealand	41	2
Canada	39	1
Other	53	7

In terms of distribution by profession, the UK had the highest concentration of specialized professionals (Table 8) with 80 per cent of clinical psychologists, 86 per cent of gynaecologists, 75 per cent of nutritionists, 100 per cent of orthopaedic surgeons, 80 per cent of paediatricians, 80 per cent of pathologists, 88 per cent of physiotherapists, 83 per cent of psychiatrists, and 73 per cent of specialist nurses.

² See sections 4 of the **Recruitment and Employment of Foreign Health Professionals in the Republic of South Africa**, Pretoria, 2004. <http://www.doh.gov.za/docs/misc/fwmp-f.html>

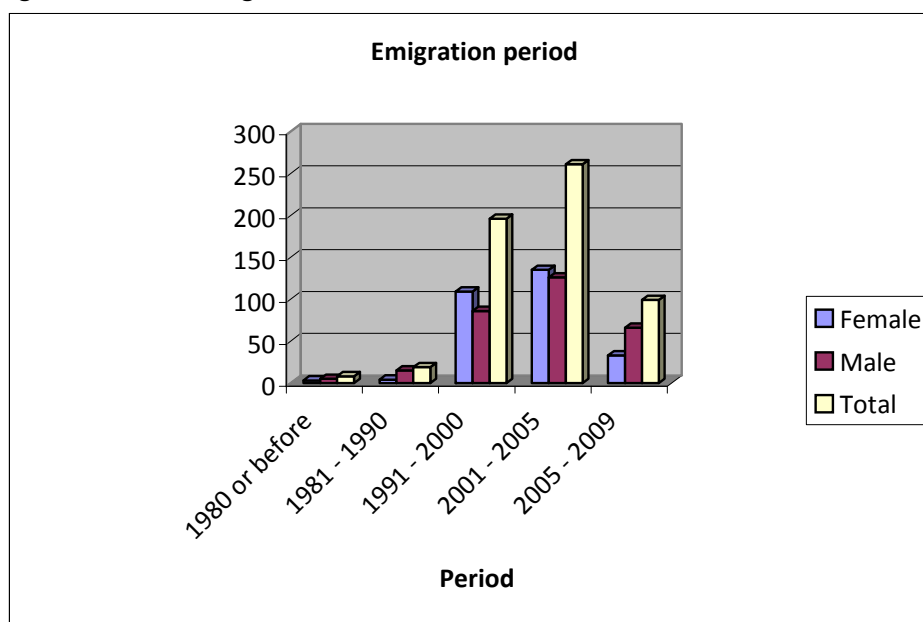
Table 8: Spatial distribution of specialized professionals

Profession	UK (%)	Other (%)
Clinical Psychologist	80	20
Gynaecologists	86	14
Nutritionists	75	25
Orthopaedic Surgeons	100	0
Paediatricians	80	20
Pathologists	80	20
Physiotherapists	88	12
Psychiatrists	83	17
Specialist Nurses	73	27

3.4.2.2 Distribution by Year of Emigration from Zimbabwe

As depicted in Figure 1, the majority of respondents (72%) emigrated from Zimbabwe after the year 2000. The period with highest migration was 2000 to 2005, when 44 per cent of respondents left the country. This corresponds to the period when there was an escalation of socio-economic problems in the country. Emigration during these six years surpasses that during the ten year period between 1991 and 2000 when 33 per cent of respondents left the country.

Figure 1: Year of emigration from Zimbabwe



As depicted in Figure 1, more women left Zimbabwe in the years 1991 to 2005 compared to men, although more male medical professional than their female counterparts left the country between 2005 to 2009. Judging from the responses, there seems to be slightly more male health professionals (52%) than females (48%) in the diaspora indicating that men have been more subjected to the pull and push

factors of migration. This may partly be explained by the fact that traditionally men in Zimbabwe are obliged to fend for the family.

3.4.2.3 Demographic Profile of Respondents

Close to 70 per cent of respondents were married, while 22 per cent were single and the rest (8%) did not provide their marital status. That the majority of respondents were married corroborates the finding that the prospect of better educational opportunities for their dependants was a major deciding factor to emigrate (Table 1). While the average age of respondents was 38 years, the majority (67%) were in the 30 – 44 year age range, indicating a loss to Zimbabwe of an experienced cohort that is in the prime of their life. Significantly, 19 per cent of respondents were over 45 years, a group which comprises persons with experience who could provide leadership and direction to younger professionals and to the health sector in general.

3.4.2.4 Residence Status of Respondents after Emigration

A considerable number of respondents had either citizenship or permanent residence status in their host countries (Table 9). The seeming ease with which health professionals attain citizenship or indefinite leave to remain may be explained by the fact that this category of professionals is in relative demand in host countries. Almost 60 per cent were citizens or had permanent residence status, an indication that this group is fairly well established in their host countries, and may be unlikely candidates for permanent return. They could still, however, be targeted for short-term sabbatical assignments or for short-term locums. A third of respondents were on work permits in their respective host countries and these are potential candidates for both short-term and permanent return.

Table 9: Residence status of respondents after emigration

Residence Status	% of respondents
Citizen	22
Permanent Residence	36
Work Permit	34
Student Permit	4
Other	4
Total	100

3.4.2.5 Employment Status of Respondents Before and After Emigration

Table 10 shows medical occupations of respondents before and after leaving Zimbabwe. In general, the respondents' occupations before and after leaving the country remain fairly constant, except for specialized nurses and general practitioners, whose trend indicate that there were proportionally more specialist nurses after emigration than before emigration. There were less people working as general practitioners after emigration than before emigrating, indicating that most professionals went through specialist training after leaving the country. This lends credence to the finding that one important reason why health professionals migrated was to pursue further studies (Table 1).

Table 10: Employment status of respondent before and after leaving Zimbabwe

Position/Specialist	Before	After
General practitioner	30 (5%)	24 (4%)
Surgeon	12 (2%)	13 (2%)
Anaesthesiologist	10 (2%)	13 (2%)
Pathologist	5 (1%)	5 (1%)

Obstetrician	0 (0)	0 (0)
Gynaecologist	6 (1%)	7 (1%)
Paediatrician	4 (1%)	5 (1%)
Orthopaedic Surgeon	2 (0%)	3 (1%)
Pharmacist	26 (4%)	18 (3%)
Physiotherapist	7 (1%)	8 (1%)
Dentist	10 (2%)	7 (1%)
Other specialist doctor	7 (1%)	10 (2%)
General Nurse	151 (23%)	158 (25%)
Midwife	28 (4%)	12 (2%)
CEU Nurse	1 (0)	0 (0)
Specialist nurse	77 (12%)	146 (23%)
Social scientist	13 (2%)	13 (2%)
Clinical Psychologist	2 (0%)	6 (1%)
Psychiatrist	4 (1%)	13 (2%)
Nutritionist	5 (1%)	4 (1%)
Laboratory Scientist	30 (5%)	24 (4%)
Laboratory Technician	6 (1%)	5 (1%)
Occupational therapist	6 (1%)	5 (1%)
Radiologist	11 (2%)	10 (2%)
Clinical counsellor	3 (1%)	6 (1%)
Other	198 (30%)	126 (20%)

3.4.2.6 Professional Advancement of Health Professionals after Emigration

Fifty two per cent of respondents indicated that they had assumed more senior responsibilities since emigrating, with 12per cent reporting that their responsibilities after emigrating were more or less similar to those they had performed in Zimbabwe, and 27per cent indicated that they had more junior responsibilities than those they held in Zimbabwe. This lends credence to the finding that one important reason why health professionals migrated was for professional advancement (Table 1).

3.4.2.7 Salaries and Benefits Before and After Emigration

There was a noticeable salary improvement among respondents after emigration, with proportionately more individuals (86%) indicating that they were earning more in host countries than what they used to in Zimbabwe (Figures 2 and 3). More than half the respondents also indicated improved changes in benefits (76%) and type of work (57%). Eighty one per cent of respondents had indicated that they earned USD 500 or less in Zimbabwe compared to only 5 per cent earning USD 500 or less in the diaspora. The proportion reporting earnings of USD 2,001 or more was higher in the diaspora, 82 per cent compared to 6 per cent when they were still in Zimbabwe. Twenty three per cent of individuals in the diaspora reported current earnings of over USD 5,000, while only 2 per cent reported earnings of this magnitude before leaving Zimbabwe.

Respondents in the USA reported the highest salaries, with 84 per cent reporting monthly incomes of USD 3,001 or more compared to 71 per cent in Australia, 63 per cent in the UK, 37 per cent in South Africa, and 25 per cent in Botswana for the same salary scale. The highest earning professions were specialist doctors and general practitioners.

Respondents also reported an improvement in other benefits (such as housing and transport) after emigration (Figure 2). The proportion reporting housing benefits of over USD 100 or more increased from 10 per cent while still in Zimbabwe to 37 per cent in the diaspora. Thirty five per cent of respondents reported current transport benefits of over USD 100 a month compared to 6 per cent before emigrating.

The increase in salaries and benefits after emigration is in line with the some of the major reasons that respondents cited as a push/pull factors for emigrating (Table 1). Because of the higher salaries offered in the USA and UK, health professionals in these countries are highly unlikely to come back to Zimbabwe on a permanent basis, but can be tapped to provide short-term assignments in the country. However, health professionals in countries such as Botswana and South Africa, where remuneration packages are relatively lower, are potential candidates for permanent returns.

Figure 2: Salary, benefits and type of work changes after emigration

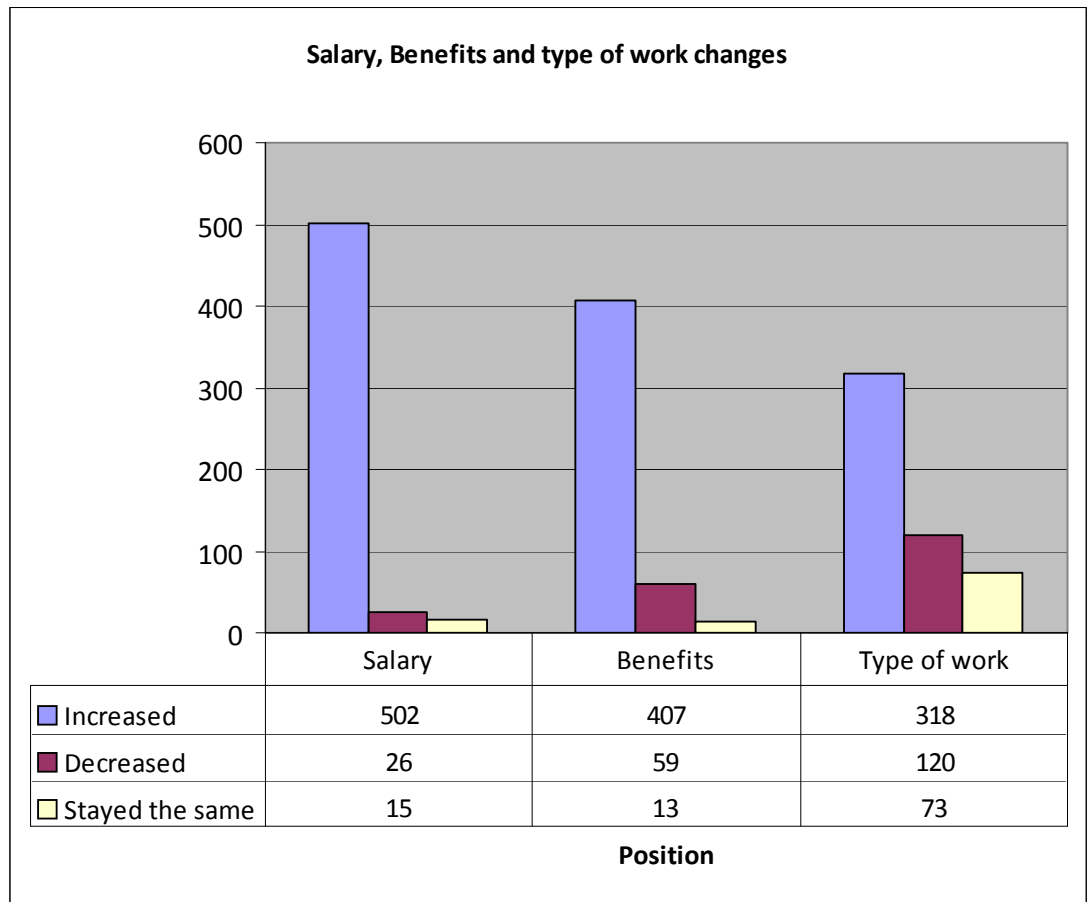
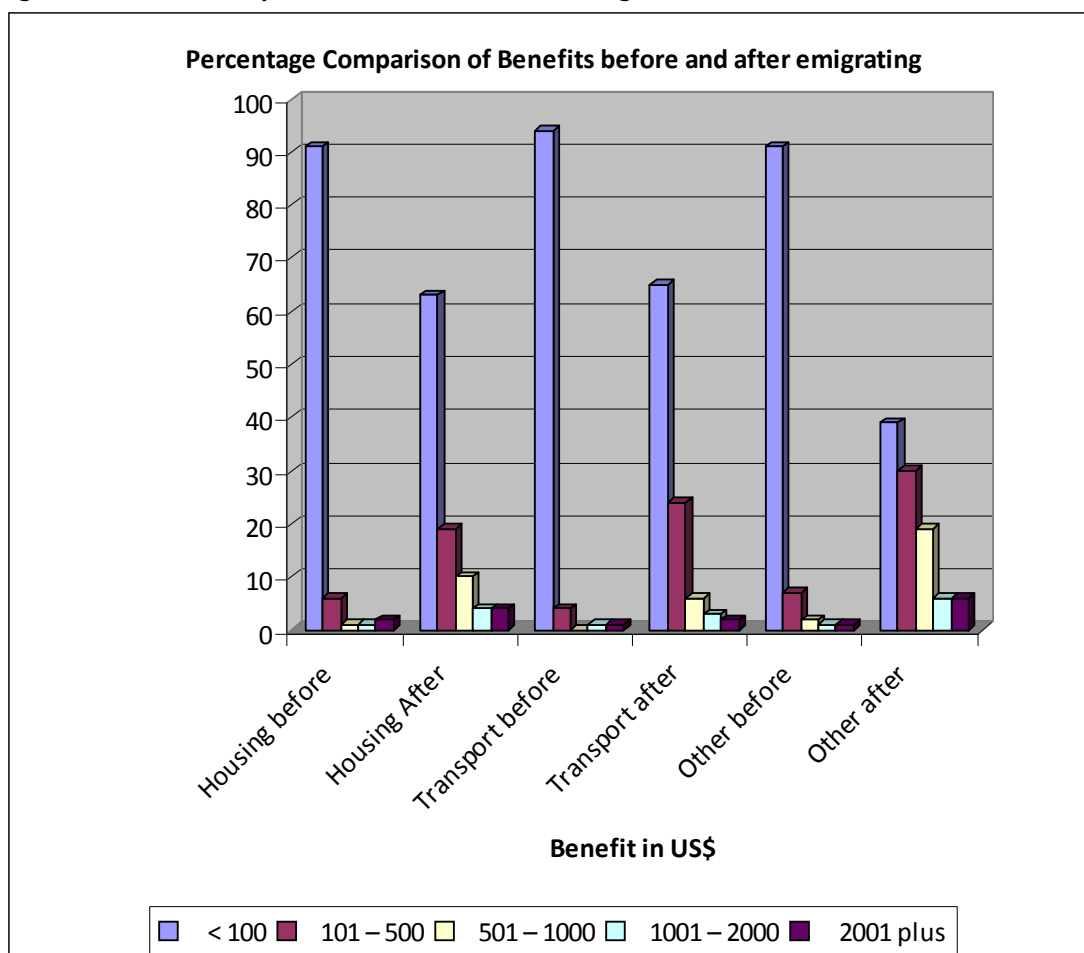


Figure 3: Non Monetary Benefits Before and After Emigration



3.4.2.8 Training Opportunities Realized after Emigration

Seventy eight per cent of respondents said they had acquired new skills since leaving Zimbabwe. Respondents who had settled in the UK (87%), USA (83%), Canada (71%) and Australia (68%) indicated that they had acquired new training since leaving Zimbabwe. Thirty per cent indicated that they had links with medical institutions in Zimbabwe or their country of residence. This indicates a high level of skills which Zimbabwe could tap into.

3.4.2.9 The Level of Support to Family Members

The level of family support to members still in Zimbabwe seemed to have increased since respondents moved from Zimbabwe (Table 11). Forty per cent of respondents indicated supporting family members back in Zimbabwe by contributing at least USDUSD1,001 a month. This compares to 19 per cent before respondents moved from Zimbabwe. This support to families members in Zimbabwe suggests respondents' strong links to their home country, and might therefore be willing to combine short assignments to Zimbabwe with visits their extended or immediate families.

Table 11: Estimated family support in Dollar terms before and after migrating

	Support when in Zimbabwe	Support now
USD 0 – 1000	337 (80%)	273 (60%)
USD 1001 – 2000	56 (13%)	120 (27%)
USD 2001 – 5000	17 (4%)	41 (9%)
USD 5001 – 10 000	6 (1%)	13 (3%)
USD 10 001 plus	4 (1%)	5 (1%)

CHAPTER 4

CONCLUSIONS AND RECOMMENDATIONS

The majority of health professionals migrated mainly for socio-economic and political reasons, self advancement, to further their education and seek better working conditions and study opportunities for dependants. Further, a considerable number of health professionals in the diaspora have realized their goal for emigrating as they are better remunerated, have assumed more senior responsibilities and have undergone specialist training after leaving Zimbabwe. This could be attributed to the fact that the majority of health professionals in the diaspora have sought and attained citizenship or permanent residence status in their respective host countries, and are therefore fairly well established in those countries. Further, the majority of health professionals in the diaspora are married, and presumably have children of school going age. Since the majority are now citizens in their host countries, their children are eligible for educational scholarships bursaries and related entitlements.

For the foregoing reasons, it is highly unlikely that health professionals who have migrated would consider returning to Zimbabwe permanently, unless the combination of factors that pushed them to emigrate are addressed in Zimbabwe. Short of an overall improvement in the Zimbabwean economy, it is unlikely that such issues as low remuneration, poor working conditions, limited professional advancement, lack of study opportunities for dependents and weak social services can be addressed in a sustainable manner. Thus while current efforts by donors to support for the remuneration of health professionals is commendable, it is a stop gap measure that is not sustainable in the long term.

While it is unlikely that the socio-economic situation in Zimbabwe will improve in the foreseeable future to the level similar to that obtaining in the country before the year 2000 (after which most health professionals emigrated), the country could still benefit from the skills of health professionals in the diaspora through temporary returns. In the interim, the authorities could introduce skills retention measures that seek to retain those professionals who are still in the country and those who are coming through the health education system in a bid to stem the tide of migration of health professionals. The measures would also focus on attracting health workers who are still working in the country, but might be engaged in non-health service related activities.

Temporary returns (or sequenced short-term returns) entail health professionals returning to Zimbabwe to work/lecture in health institutions/medical schools as per the needs of the institutions/medical schools and availability of health professionals as and when they are needed. Through such a

programme health professionals in the diaspora would help address the shortage of human resources in the health sector until such a time when the situation has normalized. Such a programme would require establishing a database of Zimbabwean health professionals in the diaspora. The database would profile the skills of health professionals willing to participate in the programme and provide indications as to when they would be available. The skills would be matched against the needs in the country. The needs would be determined by a skills audit of health institutions/medical schools in Zimbabwe. IOM Zimbabwe is currently piloting such an initiative, which is facilitated on a voluntary basis. Based on the lessons learnt from the programme on the return of qualified health professionals, it could be expanded to facilitate returns of more health professionals and cover more institutions and sectors as per needs.

According to IOM Zimbabwe's experience with temporary returns, one of the factors that limits the effectiveness of the programme is the limited duration which health professionals can return to Zimbabwe, especially for those health professionals who are employed in public health systems abroad. In view of this limitation, the Government of Zimbabwe should consider entering into bilateral agreements with governments of countries that host the majority of Zimbabwean health professionals, in particular the UK and Australia that are host to Zimbabwean health professionals with specialized skills. The agreements would facilitate the return of health professionals for longer periods, while at the same time balancing this provision with the needs of the host country. This could be part of the host countries' contribution to its bilateral aid to Zimbabwe.

Since it has the highest concentration of specialist skills, the UK has greater potential for providing professionals to participate in short-term assignments to Zimbabwe, or return to Zimbabwe on a permanent basis. If carefully crafted, bilateral arrangement between the UK and Zimbabwe which seeks to encourage cooperation in the area of health human resources is likely to succeed.

Another innovative way through which skills of health professionals in the diaspora could be tapped is through virtual returns. Using audio-visual conferencing technology, health professionals in the diaspora could deliver lectures to medical students in Zimbabwe through a realtime audio-visual link. Such technology can also be used to link specialists in the diaspora with health professionals locally to perform simple surgical procedures. This option presupposes the availability of the requisite technology, which could be availed through bilateral cooperation or twinning arrangements between institutions in host countries and those in Zimbabwe.

Efforts should also be made to attract those health professionals, particularly Zimbabwean nurses in South Africa, who have failed to register and practice in that country to return and work in Zimbabwe. Such efforts would be bolstered by marked improvements in remuneration and working conditions for this category of health professionals in Zimbabwe. As a first step, benchmarking local remuneration packages for the health sector against those obtaining in the southern African region is likely to attract this group of health professionals. The authorities should make an effort to publicize such improvements among the target group as they occur. The publicity effort could be achieved through disseminating the relevant information through the associations of Zimbabwean nurses based in South Africa. As noted above, the majority of Zimbabwean nurses in South Africa are employed in menial jobs or sectors other than health. Should this be the case, these individuals are undergoing a de-skilling process, a situation which does not bode well for Zimbabwe should they decide to return home. It is likely, therefore, that a marginal increase in the remuneration of nurses in Zimbabwe (at least above the minimum wage in South Africa) may motivate this group of health professionals back home. A survey of this category of health professionals based in South Africa that would establish their situation and what it would take to entice them back is recommended.

The onus should not only be upon the government to address the malaise of the health sector. The government should provide incentives and actively seek partnerships with the private sector to promote the recovery of the health sector. Tax breaks and other incentives could be introduced to encourage private sector investment in the health sector. The availability of specialized health professionals in the private sector could benefit public health institutions and medical schools as the professionals could avail their skills to the public institutions through locums and consultancies, and to medical schools through block release lectures. In this way, initiatives with multi-sectoral partnerships are encouraged, which could go a long way in speeding up the recovery of the Zimbabwean health sector and beyond.

Annex 1: Breakdown of Earnings by Destination

Country of Destination	% of Respondents with Monthly Incomes ≥ USD 3,001
United States	84
Australia	71
United Kingdom	63
South Africa	37
Botswana	25

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Also available online at:
<http://www.iomzimbabwe.org.zw>

The poor economic situation prevailing in Zimbabwe has led to multiple and complex migration issues characterised by high levels of brain drain, cross-border mobility and irregular migration. The economic decline over the past five years has precipitated a growing exodus of professionals from the country in search of better economic opportunities. Skill areas that are affected include (but are not limited to) health, education, engineering, surveying, architecture, veterinary medicine and forensic science. Migration is also a common coping strategy for households under stress, as families try to diversify their livelihood options. The health sector has been the worst affected as both professionals and semi-skilled workers in the sector have migrated in search of better employment opportunities. As of December 2008, the overall vacancy rate in the public health sector stood at 32 per cent, while that for general medical practitioners, medical equipment engineers, environmental health officers and health-care programmers stood at 60 per cent, 48 per cent, 79 per cent and 79 per cent respectively. This calls for measures that can address the causes of brain drain and that can also minimize its effects.

This paper is intended to guide policy makers through some of these challenges by profiling the skills of Zimbabwean health workers in the diaspora with the aim of assessing the extent and nature of health worker migration. This would inform future human resource policy in the health sector. The captures the factors that induced migration, experiences of health professionals in the diaspora, and the possibility and conditions for their short-term and permanent return and policy options that can retain staff currently in the country and those that can attract the professionals to return back either permanently or on a short-term basis.

