



## *Country Case Study*

# GHANA: IMPLEMENTING A NATIONAL HUMAN RESOURCES FOR HEALTH PLAN



## GHWA Task Force on Scaling Up Education and Training for Health Workers



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# SUMMARY

Ghana has recognised the need to address its serious health workforce shortage, and consequent issues with health service delivery. A new human resources strategic plan has been developed to guide scale-up from 2007 to 2011. This fits into the broader health sector plan, which prioritises general health system development, promotion of healthy lifestyles and environment, improving healthy reproduction and nutrition services and governance and financing. It is also consistent with the President's vision to bring the country to middle-income status by 2015 – a goal that requires a healthy population. A review of the 2004 programme of work in the health sector found that failure to achieve improved health outcomes was often tied to issues of poor morale and distribution of the health workforce. After an in-country health workforce forum in 2005, the Ministry of Health carried out a needs assessment, which underpins the current plan.

The plan is backed by strong political will and is being implemented jointly by the Ministry of Health and its agencies including the Ghana Health Service. A particular priority is being placed on the scale-up of mid-level health workers based on experience on the ground and evidence from elsewhere in sub-Saharan Africa demonstrating their cost-effectiveness and improved retention and acceptance of rural postings compared with doctors. Three funding scenarios have been modelled for the plan, allowing for variations in the macroeconomic context and donor behaviour. Funding is provided through the health SWAp but current resources remain insufficient for full implementation.

The Community-based Health Planning and Services (CHPS) programme was initiated in 1999 to place community health officers (typically specially trained enrolled nurses or field technicians) in rural and deprived communities to work with health aides from the community. Given that the aim to serve every district has not yet been met, the new human resources plan includes strengthening this programme. Bottlenecks to overcome include

insufficient incentives for staff to accept rural postings and lack of true community ownership.

Training institutions are being encouraged to increase their intakes of all cadres, but without simultaneous increases in available resources. This is causing some problems, particularly with large class sizes and accompanying low number of tutors. To ensure capacity is available for the scale-up process, accredited private schools are being used for some training, under supervision from regulatory bodies. Practising health workers and new graduates from the universities are being encouraged to take on teaching responsibilities, with budgets provided for books and research. New training sites are planned and over the long-term every hospital is expected to have some training capacity.

Mid-level cadre training is being expanded at the fastest rate. Opposition to the enrolled nurse cadre led to a programme to upgrade them to registered status. Instead, a programme has been initiated to train a new cadre of health assistants to carry out auxiliary tasks. A new programme for medical assistants (previously specially trained registered nurses) was also implemented, and it now takes school leavers. The goal is to double the output of medical assistants in the next two years and to give them enhanced and delegated skills to replace some physician functions.

In terms of retention, salary levels are increasing, and incentive programmes involving housing and rural bonuses, as well as bonding schemes are being formulated. In recognition of the importance of effective health service management, Ghana is working with both the World Economic Forum and World Bank on a health management training programme. The current health workforce strategy also includes plans to strengthen information and monitoring systems with the formation of Ghana Health Workforce Observatory with its website. It is too early for the effects of the increase in production of health workers to be felt and evaluated, as students are yet to graduate.



# INTRODUCTION

The Republic of Ghana is divided into 10 regions, subdivided into a total of 138 and increased to 170 districts since January 2008. The Ministry of Health, represented by the Ghana Health Service owns half of the country's health facilities, the private sector (including private maternity homes) owns approximately 21% and the Christian Health Association of Ghana owns the remainder.

The 2002-06 health strategy placed human resources as a priority, clearly identifying health workforce challenges and proposing a set of policies. It also called for the continuation of the Community-based Health Planning and Services (CHPS) programme, which was introduced in 1999.

A review of the strategy in 2004 highlighted some serious problems: low morale, poor distribution, escalating cost of salaries, high attrition and so on. The capacity of health training institutions to train sufficient numbers to meet national requirements was inadequate in terms of infrastructure, logistics and teaching

staff, as well as funding. And although more health workers were being educated and trained it was not clear that this general increase was well matched to population health needs and priorities.

By 2005, addressing these health workforce challenges had become a top government concern. The vision of the President is to lead the country into middle-income status, and to sustain economic growth and poverty reduction people need to be healthy. The three main pillars for this vision are human resources development, good governance, and promotion of the private sector.

In the new health strategy (five year Programme of Work: 2007-2011), four main strategic objectives have been identified as general health system development; promotion of healthy lifestyles and environment; improving healthy reproduction and nutrition services and governance and financing. Human resources for health is one of the priorities under general health system development.

# PLAN DEVELOPMENT AND IMPLEMENTATION

The new strategy aims to increase production of skilled health professionals based on a needs assessment. A 2005 situational analysis

determined the number of workers in the following categories:

Health worker cadre	Total number
Medical officers	2026
Dental surgeons	31
Pharmacists	1550
Expatriate doctors	200
Professional nurses	7304
Enrolled nurses (health assistants)	2956
Community health nurses	3246
Registered midwives	2810
Medical assistants	430
Allied health professionals	588
Non clinical and clinical support staff	27,918
Traditional birth attendants	367
Traditional practitioners	21,182

The team then brought together representatives of the various agencies that contribute to the planning, training and management of human resources for health in the country, at a series of meetings to assist in the preparation of the strategy. An increase in intakes to existing institutions and an expansion of the total number of health facilities and education institutions was proposed to help meet national health goals.

The intention is that newly created health facilities will be staffed with newly trained and recruited health workers, and staff requirements for 2011 were projected (assumptions made on population growth rate, drop out rate from schools, attrition in service, and worker per population norms). Based on an analysis of the gap between these goals and the current situation, the plan sets out strategies to ensure that sufficient human resources are available and effectively managed and used in ways that enable the health sector to achieve its service delivery goals.

The idea is to fit plans with resources available through the health SWAp but create a basis that can be expanded and built on if extra resources become available. Currently plans based on three funding scenarios (taking into account possible changes in the macro-economic environment and behaviour of donors) are being worked on, with assistance from WHO. The health workforce directorate of the Ministry of Health is in consultation with development partners, notably the World Bank and USAID.

The table below shows the targets set for 2011, and the main inputs and assumptions used to make the projections. Included in this is the commitment to double the output of medical assistants in the next two years and to give them enhanced and delegated skills to replace some physician functions.



Type of health worker	Number at post in January 2006	Yearly intake % increase each year	Drop out rate from schools	Attrition rate once employed	Norm agreed (worker/pop)	Target number 2011 (based on norms)	% increase 2006-2011
Medical officers	2026	10%	1%	1.5%	1:5800	3732	84%
General nurses	10 206	5%	1%	2.5%	1:1300	19,181	88%
Midwives	2810	20%	1%	1.5%	1:3000	8205	192%
Community health nurses	3246	5%	2%	1%	1:2000	12,934	298%
Laboratory technicians/technologists	430	5%	1%	1.5%	1:23,000	1062	147%
X-ray technologists	108	5%	1%	1.5%	1:23,000	1062	883%
Pharmacists	1550	10%	1%	1.5%	1:8000	2625	69%
Health assistants	o (programme to start in 2009)	20%	1%	0.5%	1:3500	7176	
Medical assistants	500	50%	2%	1.5%	1:20,000	1242	148%

The Ministry of Health and its agencies including Ghana Health Service and other service delivery agencies are implementing the plan together with partner development agencies. There are clear differences between these organisations, especially in this area of human resources, but they have committed to working together.

In addition the Tropical Health Education Trust (THET) is in the process of finalising a code of conduct with the Ministry of Health to provide support from the UK on education and training, particularly for mid-level workers.



## EXPANSION OF EDUCATION AND TRAINING CAPACITY

Increasing pre-service training intakes of all cadres was part of the 2002-06 health strategy, and the government has increased intake into training institutions over the past years. However, resource expansion has been minimal, class sizes are large and tutor needs have exploded. Further increases in training institution intakes are now taking place but with combined investment into expanding training infrastructure and tutors. More tutors are being trained, and health practitioners are encouraged to spend a proportion of their time teaching. Accredited private schools are being used for some nurse and technical-level practitioner training, with supervision from regulatory bodies. The establishment of new training sites is planned and the intention is that every hospital should be upgraded to become a training site.

The training of mid-level cadres resumed in 2006 with a focus on re-orienting their training and practical scope to meet population health needs. A plan to address the need for training and continuing medical education for more mid-level health workers is being formulated, building on relevant pilot work. Medical assistants (physician substitutes), for example, were traditionally professional nurses with one additional year training. However, nurses had lost interest in

the cadre and a revised training programme that takes school leavers was implemented in October 2006.

The training of enrolled nurses has not been continued because of opposition from the professional nurses. Instead, a new cadre known as 'health assistants' (nurse substitutes) has been created. Training takes two years (may be accelerated in the future) and covers areas such as clinical, physiotherapy, laboratory and X-ray, to fulfil an auxiliary capacity. The intention is to catalyse longer-term changes that the Ministry wish to make in the allocation of their training budget in favour of mid-level health workers. Existing enrolled nurses are receiving training to reach diploma status and new schools are being accredited to give diplomas.

The Global Health Initiative of the World Economic Forum is currently in the process of setting up a unique public-private partnership, using Ghana as the pilot country. It is aimed at addressing management gaps at the national health system level, through the lending and sharing of relevant private sector's management skills to the public sector. The World Bank has also recently approved \$15m for leadership and management training.



# COMMUNITY-BASED HEALTH PLANNING AND SERVICES PROGRAMME

The Ministry of Health has identified the need to train more mid-level health workers as the key priority and to make a long-term shift of resources into this area. This is based on experience on the ground and on evidence from elsewhere in sub-Saharan Africa demonstrating the cost-effectiveness, distribution and efficiency of mid-level workers. Doctors are essential for supervision but experience shows that they resist rural postings. In the context of Ghana's burden of health problems, much can be achieved using mid-level workers to serve more remote areas.

In 1980 a new cadre termed 'community health nurses' was created to provide more professional and potentially more acceptable services than village health workers. Over 2000 were trained and deployed by 1990 but most worked from sub-district health centres rather than in the community, and their outreach work remained at static service points. As a reaction to these challenges, the CHPS programme was introduced in 1999. This represented the national scale up of pilot work that had been carried out, and aimed to build on earlier work by relocating nurses into communities.

Implementation of CHPS is continuing. Community health nurses and other cadres including enrolled midwives and field technicians are being retrained and recertified as community health officers, with training workshops introducing community diplomacy techniques, counselling and midwifery. These nurses are then assigned to a compound, which consists of a room for living and a room for a community

clinic, and equipped with a motorcycle. Services provided include immunisation, family planning, birth attendance, antenatal/postnatal care, basic treatment and health education to approximately 3000 individuals living in their zone. Community health officers are supported by volunteer community health aides who are trained for six weeks; they assist with community mobilisation and help maintain community registers.

The introduction of CHPS into districts occurs through extensive planning and community dialogue. A key principle is that traditional leaders of the community must accept the CHPS concept and commit to supporting it. By the end of 2000, 30 of 138 districts had begun CHPS, and by March 2003 the initiative had become a national effort with 104 districts having at least started the district planning process and introduction of community based care. By the end of 2005, 270 compounds had been built, but only 186 were manned with a community health officer.

The existing CHPS programme for improving access to services remains a key component of national health policy, as it attempts to place mid-level workers in rural areas and deprived communities, and includes an 'urban CHPS' component. The planning is not clear however, and there are outstanding issues to be addressed, such as:

- Which areas of the country are a priority?
- Where are the MDG 4 and 5 deficits most often encountered?
- What proportion of zones/areas should be targeted for 2015?



## EMPLOYMENT AND RETENTION

Salary levels have been improved, and recent increases make Ghanaian health workers one of the best paid in West Africa. This has positive effect on stemming down the “brain drain” and has also ensured health workers’ satisfaction. However, this has stretched the health budget and there has been little to show for improved productivity.

A mixed plan of incentives and coercion has been operating for years, but without significant success. There are plans to improve benefit schemes, including introduction of a fair, transparent housing scheme and enhanced pension schemes. A rural/deprived area incentive scheme was implemented a few years back including faster promotion, faster post-basic training, rural monetary incentives and better accommodation. It was subsequently dropped although a possible re-packaging is being looked at, requiring funds from the general health budget.

Considering global pay differentials, Ghana cannot compete in the global health labour market to retain higher-level professional staff. The Ministry of Health believes that a formal policy is needed to train for export. It may be possible to attract private investment in medical schools or investment from beneficiary Western countries and embark upon some form of ‘controlled migration’.

Nurse requests for verification of qualifications, required for international migration, dropped precipitously between 2005 and 2006. This was

achieved through a combination of improved bonding (three years coordinated by the Ministry of Health and Nurses Council), and possibly the drop in demand from the UK, usually the highest recipient of migrants. There are plans to institute a proper bonding system and extend it to all categories of health professionals. This includes rotations to areas of need and compulsory rural postings for certain cadres to help address distribution issues.

There has been collaboration with district assemblies to recruit trainee nurses and health aides from their area and sponsor them through training. This is working better in some districts than others. It has not yet been possible to sponsor medical students due to their higher costs. There has been the formation of central staff allocation committed to ensure equity in staff distribution.

There are plans to shift more resources into continuing professional education (develop post-basic courses for each staff category and specialist fellowships), giving priority to staff working in deprived areas and professional development that will enhance quality health care delivery. The production of workers with ‘non-tradable skills’ will continue to be pursued but if basic levels of clinical and nursing skills are achieved the potential to graduate into higher training can also be built in.



## MONITORING AND EVALUATION

In general, human resources information systems are quite weak and uncoordinated, with only irregular updates received. There are, however, some regional initiatives and moves towards strengthening them. The east, for example, has developed a system on its own. The Accra region has copied this, but attempts to encourage national scale up are needed. It is acknowledged that systems need to be improved for accurate planning to meet needs.

It is too early for the effects of the increase in production of health workers to be felt and evaluated, as students are yet to graduate. The CHPS programme, however, is more advanced and has been experiencing some problems. For example, there have been difficulties getting staff to accept rural postings, no incentives are offered, and there are still vacancies in more appealing locations. Many zones are not functioning as prescribed, and are evolving into a lower tier of facility-based services with limited home-based or outreach services.

Community health officers are being posted with insufficient resources, including lack of transport for home visits, training and supervision. Support is limited both from the health system and the community, and there is little ownership by the latter. Ultimately, scaling up CHPS on the district budget is proving difficult and the rest of the system is not strong enough to support the initiative. Health centres are not well staffed and equipped as first referral points, which means district health management teams are forced to be the key supervisors for the zones. It is hoped that the broader scaling up of the health workforce will in time help solve this problem. Schools for training community health officers are also being upgraded to 'diploma awarding' but this makes rural retention, training costs and future salary needs greater. At the same time there are concerns whether quality and productivity will improve at all, and they may even decrease.



# LESSONS LEARNT AND POLICY RECOMMENDATIONS

## PRE-SERVICE TRAINING

Expanded training infrastructure is a priority but care needs to be taken to avoid redundant infrastructure once core numbers are reached and migration drops. Practical training is important and minimises the need for specific training infrastructure. But practice sites and supervision are lacking and more health facilities need to be involved in training. Inadequate numbers of tutors is an ongoing problem in all training contexts. Professional protectionism has limited which cadres can be scaled up. This has led to the creation of new cadres to avoid use of higher-level terms (for example 'nurse') for lower-level auxiliaries. Some concerns have been expressed about the quality of the expanded workforce, whose numbers will begin to be felt 2009 onwards. It is very important that quantity does not lead to compromises in quality.

## FINANCIAL CONSTRAINTS

Political will is strong, and there is a real focus on training to meet needs. However, lack of resources is an ongoing problem and further resource-based planning and scenario development is needed. The CHPS programme demonstrates that new policies with major cost implications should be carefully assessed before being rolled out. It has been scaled up too far and fast, causing the problems described above.





## REFERENCES

### Documents

1. Ministry of Health, Republic of Ghana. Dealing with the human resource crisis in the health sector. Draft Policy on the way forward towards a sustainable human resource development. September 2005.
2. Human Resources Policies and Strategies for the Health Sector, 2007-2011.
3. Ministry of Health. Government of Republic of Ghana. The Second Health Sector five year programme of work: 2002-6. SWAp II. November 2001.
4. Health sector five-year Programme of Work 2002-6. Independent Review of POW 2005. June 2006.
5. Health sector five-year Programme of Work 2002-6. Independent Review of POW 2006. June 2007.
6. Nyongator F, Awoonor-Williams JK, Phillips JF, Jones TC and Miller RA. The Ghana Community-based Health Planning and Services.
7. Initiative for scaling up service delivery innovation. *Health Policy and Planning*; 20(1): 25-34 2005.
8. Notes of THET meeting with Ghanaian Ministry of Health, March 2007.
9. Draft Code of Conduct between THET and the Ghanaian Ministry of Health.
10. Dovlo D. Using mid-level cadres as substitutes for internationally mobile health professionals in Africa. A desk review. *Human Resources for Health* 2004, 2: 7
11. Delanyo D. Sectoral Activities Programme. Social dialogue in the health sector: Case Study Ghana. Working Paper 2005.

### Interviews

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Launched in 2006, the **Global Health Workforce Alliance** is a partnership dedicated to identifying and implementing solutions to the health workforce crisis. It brings together a variety of actors, including national governments, civil society, finance institutions, workers, international agencies, academic institutions and professional associations. The Alliance is hosted and administered by the World Health Organization.

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