TECHNICAL BRIEF

CapacityPlus: Serving health workers, saving lives.

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Innovative Financing Options for the Preservice Education of Health Professionals

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The World Health Organization (2006) has estimated that there is a shortage of four million health workers globally, one million of whom are needed in Africa alone. Despite significant investments in scaling up health workers made by a variety of developing-country governments and donors, the available funding falls grossly short of what is required. Clearly, if the world is to meet its health workforce needs, new sources of funding for health worker education need to be found.

In order to address this problem, the USAID-funded Capacity*Plus* project, the International Finance Corporation (IFC), the World Bank, and the Global Health Workforce Alliance (GHWA) brought together technical experts and stakeholders to discuss and agree on innovative solutions for the financing of preservice education. In addition, the IFC and the World Bank wrote an analysis paper on the issue. Below is a summary of the innovative forms of financing proposed or documented through this process. The majority of these examples have been applied successfully in medical schools. Several have also been used in other institutions, such as schools of nursing or pharmacy. We suggest that health professional schools consider how each of the financing sources might apply to their school.

Sources of funding

Alumni

Schools in developed countries have a long history of maintaining a relationship with alumni. This relationship serves a number of purposes, including determining how well graduates have been prepared for the profession. However, perhaps the most important use of alumni has been for fundraising. In most countries, medical practitioners are in the upper quintile of wage earners (Freeman and Oostendorp 2000). Therefore they are in a better financial position to donate than most citizens. Given the large numbers of alumni that most schools have, even small donations can make a significant difference to a school's funding. Alumni are also an important source of large donations, such as those for named buildings or endowed chairs. The alumni association of the King Edward VII College of Medicine and Faculties of Medicine of the Universities of Malaya and Singapore has contributed extensively to the development of the *alma mater* in the form of endowed chairs and fellowship funds (Lim 2005). Tapping into alumni as a source of funding requires relatively small investments in alumni affairs programs to track alumni and offer programs to engage them in the ongoing life of the school.

Clinical care

Clinical care can help fund education by subsidizing faculty salaries, purchasing equipment used in clinical teaching, or generating profits that are directly invested in education (Watson 2003). In the US, for example, 87% of graduate medical education is funded directly or indirectly by patient revenues (Braddom 1997). Even in countries where basic care is free, private "concierge care" or medical tourism can generate funds that subsidize health worker education.













Concessionary lending

Donors can set up subsidized loan programs to help establish or expand health professional schools. For example, through its Health in Africa program, the IFC offers concessionary loans to schools (IFC 2010).

Diaspora

The global diaspora, especially the health diaspora, is a rich source of potential investment in health schools. Either large donations from individuals or collected donations from diaspora organizations such as the Association of Nigerian Physicians in the Americas can be sought. For example, the Garden City Nursing School in rural Ghana was founded completely with the donations of a single Ghanaian physician from that region. The West African College of Surgeons is another institution that has provided the diaspora a vehicle through which they can give back to their societies (Bode, Nwawolo, and Giwa-Osagie 2008).

Diverting existing financial streams

Currently many countries spend large sums of money in training health workers overseas. If this money were instead invested in founding health professional schools in-country, the same number of health workers could be trained more efficiently. For example, Ghana was spending \$500,000 per year to train dentists in the UK, of which only 10% returned. The government decided to divert this scholarship funding stream into founding the first dental school in Ghana. The school was started with a total investment cost of \$750,000 and has now trained 200 dentists, the majority of whom are still practicing in-country¹. This plan reaped triple benefits: not only was Ghana able to train more dentists more cost-effectively, but these dentists are more familiar with the pathology and resources found in Ghana, and more of them are actually practicing in Ghana and contributing to the health of communities. In another example, the government of Botswana spends \$2 million a year sending patients to other countries for medical care that could not be received in-country. Now that the government is in the process of founding a medical school, this care can be provided more cost effectively in-country.

Donations and endowments

Donations and endowments are large financing contributions to a school. The entire medical school at the University of Chicago was established by way of a collection of endowments by a number of donors (Anonymous 1916). Donations tend to be spent immediately whereas endowments are invested to provide permanent income streams to the school. Even in countries with relatively low gross domestic products, there are wealthy people in-country or in the diaspora who are interested in making a permanent and visible contribution to their country. Smaller donors can also be sought via fundraising campaigns. Tapping into the potential of donations and endowments requires having a donor development office. In addition, school board members are often required to make personal donations as well as to engage potential large donors.

Gifts-in-kind

Significant contributions can be made to health science schools

as gifts-in-kind. Important gifts-in-kind can include land on which to site a school, or buildings, or access to buildings (for example, using an apartment block as a dorm). Gifts-in-kind can also come from the community, such as community members allowing students to stay in their homes in the absence of dorms. Other gifts-in-kind may include faculty time and medical and teaching equipment. For example, at the Amoud Medical School in Somaliland, 35% of the faculty teaches as volunteers. Botswana's first university was founded through the "One man, one beast" campaign, which raised money from the people of Botswana in the form of cash, cattle, grain, eggs and other unique contributions².

Health insurance funds

A number of countries have health insurance schemes that are run by the public sector, or in partnership with the private sector. A portion of the revenue from the health insurance industry can be allocated to the education of health workers, who will later contribute to the delivery of services for those who are covered by insurance. For example, in the US Medicare and Medicaid provide approximately \$11.5 billion for graduate medical education (Dower 2012).

Local development funds

The community-based medical schools of the Training for Health Equity Network (THEnet) have had success in persuading local governments to use development funds to support the establishment of medical schools. The founding of a new medical school in a district capital or rural town has significant implications for job generation, local health, and educational opportunities. In addition, having a medical school and its associated hospital located in their community makes it easier for local leaders to attract other businesses and professionals. The University of Northern Ontario conducted an analysis of the economic impact of the new school on the city in which it was located, and revealed that the province's investments had been returned threefold (Northern Ontario School of Medicine 2010). Local development funds can also be used to provide scholarships to local students, with agreements stipulating a required number of years of return service.

Matching funds

Schools can work with large donors to set up matching funds that challenge other donors to make donations. The matching donations may be made by the universities themselves as an incentive for external organizations to make the original contribution (UCSF n.d.). Donors are attracted to matching funds because it allows them to leverage the funding of other donors and effectively double the impact of their money. Matching funds are good at attracting both large and multiple small donations. Capacity*Plus* is setting up a matching fund with the Methodist Church to help scale up the production of health workers in Methodist health professional schools in Africa.

Microdonations

The relative large sums needed to educate health workers compared to other public health interventions, such as buying a bed net or vaccinating a child, have discouraged small donors. However, through mechanisms such as GlobalGiving.org,

Improving Management



In addition to innovative sources of funding, there are a number of ways to produce cost efficiencies in schools and therefore do more with the same amount of funding. Capacity*Plus* is applying and refining a program for improving the management of health professional schools.

minimum donations of \$10 are accepted toward the training of a health worker. This taps into a large pool of small donors and facilitates fundraising via campaigns. For example, a single church parish in a developed country can pay for the education of a nurse through microdonations. IntraHealth International set up a program through Global Giving (n.d.) to accept microdonations for the education of health professionals.

Private for-profit investors

Although most private medical and nursing schools are nonprofit, an increasing number are for-profit. Such medical schools tap into the funds available from wealthy investors. One example is St. George's Medical School in Grenada (SGU n.d.; Smith 1982). This for-profit school was founded by three wealthy investors in 1977. It has now trained more physicians practicing in the US than any other medical school inside or outside the US.

Private foundations

Many private foundations in developing countries as well as developed countries are potential sources of funding, both for capital investments and for student scholarships (Wisconsin Medical Society n.d.). European foundations can be identified through the European Foundation Center, and North American foundations can be found through CharityNavigator.org. The Rockefeller Foundation, for example, has a long history of financing both capital investments in medical schools and student scholarships and fellowships (Jones and Rahman 2009).

Religious communities and institutions

Especially for faith-based schools, religious communities and institutions are a potentially large source of financing. Given their social mission and historical interests in health, many religious communities and institutions are quite willing to invest in the training of health workers.

Research funding

Research funding from external sources such as the US National Institutes for Health or the Wellcome Trust can be used to subsidize the salaries of faculty or the stipends of students who engage in research work (NIH Clinical Center n.d.). In addition, some of the facilities and equipment, such as laboratory space, purchased with research funding can also be used for teaching.

Scholarships

Student scholarships that are provided by governments, foundations, or private companies can pay directly for education (AMA n.d.). At the College of Medicine, University of Malawi, students with the top 20 premedical program entrance exam scores are given scholarships, provided that funding is available (SAMSS 2009). In addition, some countries compel private universities to offer scholarships to students in order to maintain their accreditation. For example, Mexico, Syria, and the Philippines have required private schools to give scholarships to a percentage of students to offer opportunities to low-income or needy students (Salmi and Hauptman 2006).

Student loans

Because health professional students will become some of the top earners in their countries on graduation, it is quite feasible for them to pay for a portion of their education. Student loans are currently not widely used in developing countries, mainly due to concerns over accountability in repayment. By connecting loan repayment to certification renewal or paying for loans directly out of recipient paychecks, this accountability can be increased and revolving loan funds can be established.

Tiered admission

In order to subsidize their students on school scholarships many schools, such as the medical school in Malawi, have started to accept students on a tiered basis. The most qualified students are given full scholarships, and other students who still meet admission criteria are admitted on a self-pay basis. The tuition paid by the self-pay students subsidizes the scholarships of the first tier of students. In some cases the second tier of students may be admitted from outside the country, as at the College of Medicine in Malawi (Muula 2009).

Tuition

For either public or private schools, tuition can be a major source of funding. For private schools, tuition is often the only source of funding, whereas in public schools, tuition is supplemented by funding from the Ministry of Health or the Ministry of Education. Tuition tends to have a variety of different sources, including the student's extended family and income earned by students working as research assistants or in laboratories. Other sources of tuition funding include public and private loans as well as grants from public and private sources. In developing countries, the ability of the extended family to pay for a young person's education should not be underestimated. Many families have at least one member who either has access to credit within the country or is a member of the global diaspora. Such loans within the extended family are often expected to be paid back over time once the student graduates and starts to earn an income.

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