

How should schools of public health engage in public health practice? Experience from an academia–community–provider partnership in Pakistan

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Introduction

Schools of public health¹ have expanded significantly over the last 30 years, including in low- and middle-income countries (LMICs). There are > 200 schools and programmes of public health in North America (1), > 200 public health programmes in Europe (2), and a recent mapping of health education institutions and programmes in the WHO African Region found 77 public health programmes in 47 countries (3). There are also public health programmes in Brazil, Egypt, India, Nigeria, Pakistan, and South Africa.

Schools of public health train public health professionals, educators and researchers to address health challenges and improve population health (4,5). In LMICs, most schools focus on developing educational and research programmes, although research has remained deficient in many. In addition to teaching and research, these schools provide disease surveillance, health education and emergency preparedness services. However, there is little attention to community engagement in the provision of services, including public health practice. Public health practice refers to the collection and analysis of identifiable health data by authorities for the benefit of the participating community (6).

Public health practice in an academic setting may overlap significantly with public health research; for example, in practice-based research conducted to provide evidence for public health policy (7). In the context of LMICs, socially responsible schools of public health acknowledge their obligation to engage in the development of public health practice models that have the potential to be scaled up. This means demonstrating in practice what is taught in classrooms and published in research papers.

The Aga Khan University (AKU) was established in the 1980s to serve LMICs, with a commitment to the

development of human capacity through the discovery and dissemination of knowledge and its application through service (8). The Department of Community Health Sciences at the university has pioneered field-based public health programmes by developing models of healthcare and health promotion, and supporting training in community settings (9). In 2018, the department established an academic public health practice model called the Rural Health Program in Thatta District, Sindh Province, Pakistan. This paper summarizes the experiences to date and shares several lessons learned that are relevant to other schools of public health in resource-constrained settings.

Opportunities, challenges, and achievements of Thatta Rural Health Program

Pakistan lags behind its South Asian neighbours in terms of population health. Neonatal mortality and childhood stunting in Pakistan are among the highest in the world (10). By extending the social accountability of medical schools, schools of public health in Pakistan have an obligation to support the strengthening of health systems and improvement of health outcomes (11). As a socially responsible department, in 2018, the Department of Community Health Sciences initiated the Rural Health Program in Thatta, a community of just under 100 000 people residing in 120 villages. The aim was to strengthen the district health system and contribute to improvements in health indicators (12).

The overall approach evolved into an academia–community–provider partnership. As an implementation research initiative, the guiding principles of the Rural Health Program (Box 1) were clarified with the stakeholders at the outset. Initial exchange visits helped build mutual trust, followed by a series of planning workshops that encouraged active participation of all district stakeholders, especially community representatives. The priority areas identified, for which several activities were

¹Schools of public health is an umbrella term that includes departments of public health, community health, community medicine, and population health in medical schools and universities.

Key messages

- Schools of public health contribute to population health by training public health professionals, educators and researchers. However, public health practice receives less attention.
- The debate in low- and middle-income countries is not whether schools of public health should engage in public health practice, but how and to what extent? The experience of Aga Khan University emphasizes that academic engagement in public health practice is urgently needed in resource-constrained countries.
- Schools of public health through academia–community–provider partnership offer several lessons, including the need to develop well-articulated priorities, build mutual trust and credibility, mainstream vulnerable groups in decision-making, be responsive during emergencies, and to translate the scholastic commitment of public health schools into community needs.

Box 1 Guiding principles of the Rural Health Program in Thatta District

- Building partnerships with all health stakeholders, including public, nongovernmental, and private providers; non-health-sector stakeholders and communities.
- Strengthening district health systems through participatory planning, effective monitoring, and improving support systems.
- Engaging and empowering communities by increasing their involvement in decision-making and in taking responsibility for their health needs.
- Providing technical support and serving as a catalyst of change and a facilitator without engaging in direct implementation and delivery of services.

completed, included maternal, neonatal and child health; water and sanitation in villages; capacity development of district health managers; transportation of medical emergencies; and health expenditure and utilization surveys to estimate the financial burden on households.

The program faced several challenges. First, there was a lack of women's participation despite efforts to engage them. Second, the private healthcare providers were not adequately engaged. Third, district health staff were occupied with polio eradication for a major proportion of their time. Fourth, in the absence of direct funding support, the programme was less attractive to some district providers than the donor-funded projects. In addition, COVID-19 brought programme activities to a halt in February 2020, and, later, online activities were introduced to cope with the pandemic and rebuild the lost momentum.

Experiences from the programme indicate the need to secure formal permission and commitment from government for community health programmes, build trust early for sustained partnerships, engage all stakeholders and be a “neutral broker”, clarify the catalytic role of the university instead of its role as a

primary implementor, and be present even if a pandemic or outbreak occurs.

How should schools of public health engage in public health practice?

The Rural Health Program is not the first of its kind. Similar initiatives have been implemented previously by Aga Khan University (12) and other schools of public health in LMICs (5,13,14). Many schools in the United States of America have public health practice as an integral component of their programmes (15–18). Despite their socially responsible commitment to academic public health practice, there are limits to what schools of public health can do to influence population health, because they are part of a wider public health system (19).

The United States National Academy of Medicine has determined that schools of public health have 6 major responsibilities in the 21st century (Box 2) (20). Two recommendations are relevant to schools in LMICs: (1) significant expansion of supervised practice opportunities and sites; and (2) rewarding experiential excellence in the classroom and practical and field-based training of practitioners. The Rural Health Program is an illustrative model of an academia–community–

Box 2 21st Century responsibilities of schools of public health as determined by United States National Academy of Medicine

1. Educate the educators, practitioners and researchers, as well as prepare public health leaders and managers.
2. Serve as a focal point for transdisciplinary research and traditional public health research.
3. Contribute to policy that advances public health.
4. Work collaboratively with other professional schools to assure quality public health content.
5. Ensure access to life-long learning for the public health workforce.
6. Engage actively with various communities to improve public health.

provider partnership, which responded to several of these responsibilities of schools of public health. In addition to public health education and research, public health practice serves as the third or practice pillar. Most schools of public health in LMICs have fallen short of the goals of public health practice.

Conclusions

Despite the short duration of the Rural Health Program, key lessons include the need for continued stakeholder engagement, well-articulated priorities, and an imple-

mentation roadmap; gaining the trust of district health care providers; mainstreaming vulnerable groups into decision-making; being prepared and responsive during emergencies; and demonstrating that the strength of academic institutions is their intellectual capital and scholastic excellence. The past and current experience at Aga Khan University shows that engagement of schools of public health in public health practice is urgently needed in resource-constrained settings.

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