HealthANSWERS Partnership EDUCATIONAL STRATEGY

The Partnership draws on the research-infused education of health workers in all the universities, and their commitment to interprofessional service learning in the shared hubs in the region. The Partnership will contribute particular strengths in field-based service learning, drawing on two decades of experience in field epidemiology training delivered through the innovative and award-winning MPhil (Applied Epidemiology) [MAE] program. The MAE has been instrumental in the development of Australian and regional capabilities for generating and translating evidence into practice, and has been the model for similar programs in China, India, Malaysia, Vietnam and the Pacific. A strength at UC is the clinical professor track which situates academics in clinical settings doing clinically relevant research which feeds directly back into undergraduate and postgraduate curricula. At UC, the Faculty of Health clinical education model is vital to research training, where the clinical educators are part of the academic team so they deliver curricular content while also supporting students in practice. This provides a conduit between practice and academia narrowing the theory-practice gap.

The academic partnership is able to leverage the educational capabilities of our fellows of the renowned UK Higher Education Academy, which prioritises research- and evidence-based teaching and learning. The ANU and UC are two of the four Australian subscribing institutions to the HEA, and between them have over 400 recognised and trained fellows. ANU – the Australian sponsor of this initiative – has also developed a specific pathway for clinician teachers to achieve Fellowship.

MODEL OF CAPACITY BUILDING

We have adapted Potter and Brough's capacity pyramid as our framework, focusing on the top three components of the pyramid, focusing on workforce and infrastructure, skills and tools. ² Our strategy, including framework, activities and projected outcomes, is available online. The strategy has two phases, beginning with activities that can be readily put in place. The second phase includes elements that will require respectful discussion and collaborative planning.

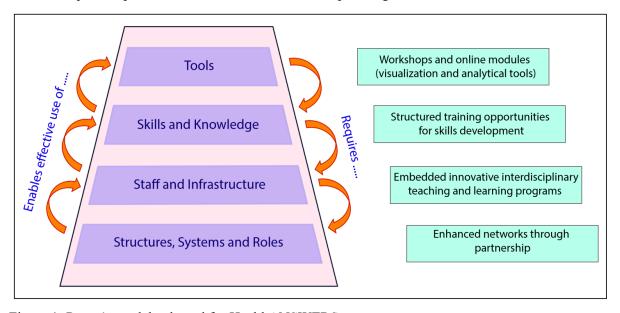


Figure 1: Potter's model, adapted for HealthANSWERS

WORKFORCE AND INFRASTRUCTURE

Stage 1: 2020-21 This component involves developing capacity support programs capacity development for nursing and allied health researchers, integrating MAE student(s) into service for the HealthANSWERS partners, and enhancing practice-based primary care research networks to enable

health professionals to train in and conduct research. All approaches involve field-based learning, remote mentoring and peer-led education on translating research into practice.

- Creation of an MPhil (Applied Epidemiology) training position for health services in the HealthANSWERS Partnership footprint (contribution in kind by the service). Plans are in place to ensure a position in 2020 with Capital Health Network, and in 2021 with one of the HealthANSWERS Partnership Local Health Districts. This involves a two-year placement in the service, supported by field and academic supervisors, with intensives on campus with other MPhil (AE) students from positions in public health units around the country. The model is able to deliver research-led improvements to service delivery in real time, while enhancing the capacity of other workers in the field.³
- Capacity development through Synergy, the ACT Health/UC Nursing and Midwifery Research Centre, and the University of Wollongong School of Nursing to support *practice-based research placements*, in community and hospital settings, auspiced by leading nursing and midwifery academics from both universities. Within Synergy and Allied Health, there are 4-8 grants of around \$10,000 each that are awarded each year to registered practitioners supervised by academic staff to lead practice development and research initiatives across the ACT.
- Enhancing and extending existing *practice-based networks for primary care research*, to include allied health practitioners in primary care. The strategic focus, activities and outcome measures are detailed on the HealthANSWERS website. The existing practice-based networks (ISPRN, ACT PracNet and Deep End ACT) will be supported to meet regularly and mentored through the university partners, with small seeding grants to drive research. A Murrumbidgee practice-based network will be developed in collaboration with the Murrumbidgee PHN. Members of the four practice-based networks will be supported to meet annually to share learnings and develop collaborative research across the networks.

Stage 2: 2022-2024 This involves (a) two PhD scholarships in health services research for clinicians, and (b) a customised collaborative plan for integrated field-based training for Aboriginal health workers and other staff at Katungul Aboriginal Medical Service, addressing the use of data for decision-making, with sub-modules already developed by MAE staff.

SKILLS TRAINING

The research and translation leaders in teaching and training, many of whom are recognised educators, will act as mentors for clinicians to identify skills needed for research.

Stage 1: 2020-2021 General training in research: Canberra Health Services and UC have partnered to embed three current conjoint research professor roles focused on research capacity and capability development across CHS. General research training, mentoring and research implementation skills support clinicians to better understand research, engage in research design and project execution, and to translate evidence into practice. Further, drawing on the ANU Medical School's success in adapting for clinicians the skills training for the UK Higher Education Academy, we will develop a mentor-led modular program for research training. Our experience suggests that the skills needed for clinicians to engage in research are developing (problem-setting, identifying relevant tools), research mechanics (applying for funds and ethics approval), and practices (managing datasets, analysis, using teams to accelerate research and translation, and writing for publication). We have a range of video modules used by graduate medical students undertaking research already developed by many of the research/translation leaders. The mentors will provide structured support to clinicians seeking these skills. We have demonstrated that it is possible to do this in groups, rather than individually.

Specialised skills and knowledge training are needed to drive translation of genomics into the clinic. The CPI has established Schools of Personalised Immunology for clinicians and scientists, so far held in Canberra and Melbourne, and is currently planning its first international school in Spain, 2019.

Supporting the infusion of research into educational offerings in all disciplines, our health practitioner educators constitute a network of peer-to-peer educators, sharing curricula and polices that bolster the research-infused education approach in the UOW and ANU schools of clinician education, which have won seven national teaching awards for innovative models of education in as many years. The

Partnership will also disseminate a successful model for service-research inter-professional learning, enabling them to develop skills in translating research.⁵ Teach-the-teacher workshops for health faculties will be offered by the research team at ANU which developed and evaluated this program.

Stage 2: 2022-24. Collaborate with other CIRHs/AHRTCs to develop a consortium skillset for health outcomes and translational research, with a view to developing a national accreditation mechanism.

TOOLS

Stage 1: 2020-21 All three universities offer workshops on tools to support capacity development. UC has a comprehensive modularised cross-university researcher development framework, including detailed attention to coding. Examples of specific tools taught through workshops include: visualisation of data to help decision-making (Professor Salvador-Carulla, ANU), casemix analysis (Professor Eagar, UOW), social network analysis (**Dr Gavin Smith**, ANU), integration and implementation science (Professor Gabriele Bammer, ANU – also customised as a self-paced edX MOOC), policy-making (**Dr Rosemary Korda**, ANU), health communication and safety (Professor Diana Slade, ANU), budgeting, and imposing a Health in All Policies framework. All will be made available to members of the Partnership.

Stage 2: 2022- 24. We will establish a repository with tools and knowledge transformation approaches for use by all the AHTRCs and CIRHs. This will be modelled on the Integration and Implementation resources repository currently maintained at ANU by Dr Bammer.

- 1. Davis S et al. The Australian Master of Applied Epidemiology program: looking back, moving forward. Comm Disease Intelligence 2016; 40: e326-e333.
- 2. Potter C, Brough R. Systematic capacity building: a hierarchy of needs. Health Policy Plan 2004; 19:336-45.
- 3. Patel MS, Phillips CB. Strengthening field-based training in low and middle-income countries to build public health capacity: lessons from Australia's Master of Applied Epidemiology program ANZ Health Policy 2009; 6:5
- 4. Anderson K, Beckman E. Evaluation of clinician skills-based training for associate membership of Higher Education Academy ANU, 2018.
- 5. Craig, P, Phillips C, Hall S Building social capital with interprofessional student teams in rural settings: a service learning model *Australian Journal of Rural Health* 2016; 24: 271-277