INTERNATIONAL VISITING FELLOW REPORT: OBSERVATIONS ON E-HEALTH AND RESEARCH NETWORKS

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ACKNOWLEDGMENT

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- Adelaide
- Canberra
- Greater Green Triangle
- Melbourne
- Perth
- Sydney.

I would particularly like to thank Professor James Dunbar, Tim Usherwood, Nigel Stocks, Ellen McIntyre, Bob Wells and Jon Emery as well as Will Wright for their help in organising elements of my visit, acting as generous hosts and introducing me to their colleagues in Australia. I would also like to acknowledge the many administrative, technical and support staff who helped me to complete this visit.

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INTRODUCTION

International Visiting Fellowships are intended to allow Australia’s primary health care sector to benefit from the expertise of internationally acclaimed academics. The Australian Primary Health Care Research Institute awards the fellowships under Stream 11 of its research program. I was invited to undertake this visiting fellowship by APHCR1 because of my research in the fields of e-health and my role in the development of primary care research networks in Scotland\(^1,2\). I was asked to deliver a keynote lecture (Appendix i) at the 2009 General Practice and Primary Health Care Conference in Melbourne, where I was able to hear about research from across the country, deliver a workshop and a seminar and provide a commentary on the two best papers from Australian primary care during the previous 12 months at a plenary session. I also had the privilege of visiting three practices, six academic groups, the Department of Health and Ageing and to be present when the Prime Minister launched ‘A Healthier Future For All Australians - Final Report of the National Health and Hospitals Reform Commission’ in Canberra on 27 July 2009.

During the three week visit I was able to meet primary care researchers at all stages of their research career in most primary health care professions and many disciplines which contribute to Australia’s vibrant and developing primary care research community. I undertook a range of lectures and seminars as detailed in the itinerary and as exemplified in appendices ii and iii. I formed a strong impression that many of the capacity building efforts that have been undertaken in recent years have been very successful. This is borne out by the large and increasing number of successful National Health and Medical Research Council (NHMRC) bids from primary care. A recent international comparison prepared by York University for the Heads of Department in the UK Society for Academic Primary Care shows that Australia’s primary care research productivity is exceeded only by the Netherlands and the UK. The figure below which shows the estimated number of robust publications by primary care researchers per billion dollars of GDP on research.

![Estimated number of robust publications by primary care researchers per billion dollars of GDP on research (current PPP $)](chart.png)
As the Australian Health System prepares to undergo the largest re-organisation in two decades with an increased emphasis on prevention, primary health care and e-health, it is clear that the research community is ready to step up to the challenge of providing high quality evidence to support the decisions which will be needed to improve patient care. It is also self-evident that a mutually beneficial relationship between primary care researchers and policymakers exists in many areas which makes it possible for research findings to be translated into practice in Australia more rapidly than many other industrialised nations.

ITINERARY

PRACTICES VISITED:

Aboriginal Medical Service Western Sydney
Hamilton Medical Group, Victoria
Hawkins Practice Mt. Gambier S.A.

ACADEMIC DEPARTMENTS VISITED

- University of Adelaide
- Australian National University, Canberra
- Flinders University, Adelaide
- Greater Green Triangle University Department of Rural Health, Flinders and Deakin Universities: Warrnambool, Hamilton, Mount Gambier
- Melbourne
- Perth
- University of Sydney.

POLICYMAKER SEMINARS

Department of Health and Ageing staff in Canberra with responsibilities for:

- e-health
- practice research networks

OTHER DISCUSSIONS

- Meeting Meng Tuck Mok, PhD Implementation & Data Manager BioGrid Australia and Dougie Boyle
- Meeting with Associate Professor Adrian Schoo and Dr Dale Ford, Clinical Director, National Primary Care Collaborators
- Adelaide to Outback GP Research Committee
- Meeting with Dr Oliver Frank and Professor Nigel Stocks regarding data linkage/IT
- Lunch with APHCRI hub staff including Bob Wells the Director of APHCRI
Meeting with Jon Emery and PHCRED staff on Primary Care Networks.

Attended launch of the final report of the National Health and Hospitals Reform Commission by Prime Minister Kevin Rudd.

**LECTURES AND SEMINARS**

**SYDNEY**

Monday 13 July
Lecture - *Integrating knowledge derived from phenotypic and genotypic data into consultations*
Faculty of Medicine, University of Sydney

Wednesday 15 July
- GP & PHC Conference – Driving Change, Melbourne
- Workshop: Skill Building – Writing for Publication
- AAGP Dinner Speech on Futurology

Thursday 16 July
- Keynote Speaker at Australian Association of Academic General Practice
- Plenary Driving Change in Research Networks
- Seminar with Dougie Boyle – Record Linkage

Thursday 23 July
- University of Adelaide
- Seminar in the DGP - Networks and critical mass

Friday 24th July
Tri-state Workshop Flinders University: “New data from old: linking primary and secondary care data in research from WOSCOPS to DARTS and SHIP”

Monday 27th July
Public seminar at ANU: *E-health: one giant leap for the health system*

Wednesday 28th July
Clinical trials in general practice: the case of Bell's Palsy
OBSERVATIONS

E-HEALTH

I was already aware that Australia has a significant e-health capability and witnessed a developing capability to extract detailed information from primary care datasets (Hawkins Practice Mount Gambier, and new tools to link the data in a secure and confidential manner (GHRANITE)\(^3,\)\(^4\)). I also heard from colleagues in Adelaide and Perth about plans to use record linkage techniques for primary care and research data. As the National Health and Hospitals Reform Commission suggests in its final 9 recommendations, more could be done to increase the contribution to clinical care and quality improvement from developments in e-health. In making a comparison between the current situation in Scotland where informational continuity has been a policy for more than a decade the current situation could be summarised as in Table 1 below\(^5\).

<table>
<thead>
<tr>
<th>SCOTLAND</th>
<th>AUSTRALIA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Community Health Index number - a unique patient identification number</td>
<td>No Unique identifier</td>
</tr>
<tr>
<td>NHS - GP’s familiar with health research – track record</td>
<td>Private general practice – easier to say no</td>
</tr>
<tr>
<td>GP System accreditation (~6 GP systems in UK – formerly ~ 100)</td>
<td>No accreditation - ~20 GP systems in Australia</td>
</tr>
<tr>
<td>GP’s have comfort in the quality of their systems</td>
<td>At procurement, GP system quality and cost can be difficult to quantify</td>
</tr>
<tr>
<td>Mandated interface standards</td>
<td>Standards but no mandate</td>
</tr>
<tr>
<td>Mandated clinical dataset definitions and coding system</td>
<td>No standards – SNOMED-CT possibly on the way</td>
</tr>
<tr>
<td>Quality and Outcomes Framework (QOF) in depth data reporting and care standards linked to payment</td>
<td>Very minor reporting requirements, payments minor</td>
</tr>
<tr>
<td>Population concerned about privacy but in general expect data to be used for research</td>
<td>Confidentiality and privacy – especially in indigenous communities is a public debate</td>
</tr>
</tbody>
</table>

If the ‘partial takeover’ option for the health service outlined in the final NHHRC report is adopted then greater opportunities for improved clinical care, quality improvement and research will be possible as summarised in Table 2. Based on international experience these seem audacious but achievable goals.

<table>
<thead>
<tr>
<th>AUSTRALIA NOW</th>
<th>AUSTRALIA IN 1-3 YEARS</th>
</tr>
</thead>
<tbody>
<tr>
<td>No Unique Identifier</td>
<td>Person- controlled Electronic Health record likely to require a unique ID</td>
</tr>
<tr>
<td>Private general practice easier to say no</td>
<td>Increased accountability</td>
</tr>
<tr>
<td>No accreditation - ~20 GP systems in Australia</td>
<td>System accreditation</td>
</tr>
<tr>
<td>At procurement, GP system quality and cost can be difficult to quantify</td>
<td>National Standards</td>
</tr>
<tr>
<td>Standards but no mandate</td>
<td>Mandated interface standards</td>
</tr>
<tr>
<td>No standards - SNOMED-CT possibly on the way</td>
<td>Mandated clinical dataset definitions and coding system</td>
</tr>
<tr>
<td>Very minor reporting requirements, payments minor</td>
<td>Performance related pay</td>
</tr>
<tr>
<td>Confidentiality &amp; privacy – especially in indigenous communities is a major public debate</td>
<td>Population concerned about privacy</td>
</tr>
</tbody>
</table>
An additional benefit which the Australian primary care research community would derive if these ambitions are realised is the research potential from linking clinical data to other administrative research databases as can be seen from experience in Scotland and Scandinavia. Failure to act on this issue would place Australian researchers in many fields across the translational spectrum at a considerable disadvantage to their colleagues in other developed countries.

For policymakers the advantage would be better measurement of the performance of the health system, including clinical outcomes and allowing for analysis of the variance between providers.

RESEARCH NETWORKS

There are many varied research capacity building strategies being undertaken across Australia with a variety of aims and productivity. It is clear to me that the support provided for inexperienced researchers has often led to worthwhile engagement between academic departments and local health service colleagues working in clinical and management roles. In several cases the availability of PHCRED fellowships has made a positive contribution to the local workforce. The vertical integration of a range of academic activities in some practices: undergraduate teaching, postgraduate training and research coordinated by local disciplines of general practice is already providing a critical mass which is likely to ensure sustainability for these groups. Another strong feature of APHCRI’s portfolio is the encouragement of international collaborations.

The National Health and Hospitals Reform Commission has recommended that more of the extra $100 million it proposes for health research should be spent to promote research and uptake of research findings in clinical practice. They recommend that clinical and health services research be given higher priority and that the Commonwealth increase the availability of part-time clinical research fellowships across all health sectors to ensure protected time for research. When considered in combination with the increasing emphasis on prevention and primary health care in recent policy changes this creates a positive environment for the PHC academic community to further increase its ability to provide high quality evidence. I suggest that further consideration be given to the following:

FOCUS

(a) Some groups appear to permit, or are required by stakeholders to undertake, a wide diversity of research themes to be pursued within their group when most international evidence suggests that restricting the range of research activities to areas of current or emergent strength facilitates the development and maintenance of consistently high quality research.

(b) Acceptance of this principle means that some groups will develop a national or international lead in particular areas of primary care research. This may often be in areas where the local university or health service already has a significant track record. In other countries such as Scotland and the Netherlands it has proven mutually advantageous to the groups with more focused interests and others with different interests to encourage affiliation of new and part-time staff to the groups where the highest level of expertise is to be found.

LEADERSHIP

(a) Succession planning for retirement was an issue for some colleagues I spoke to.

(b) Apparent gaps in the career ladder for primary care academics in all clinical professions and many scientific disciplines relevant to primary care suggest that a review is required.
to avoid a significant manpower problem in academic leads for teaching and research in 7-10 years.

CRITICAL MASS

(a) Some research groups are currently too small to be sustainable at present.

(b) Greater national co-ordination of network activities could enable high quality research to be undertaken across Australia.

If infrastructure funding could be more clearly linked to research performance then a positive feedback cycle contributing each of the three areas highlighted above might be more readily achieved.
PLANNED PUBLICATIONS ARISING FROM THE VISIT

Record linkage of primary care data: Medical Journal of Australia with Dr D. Boyle and Professor M. Kidd

APPENDICES

EXAMPLES OF PRESENTATIONS:

i. Conference Plenary: Research Driving Change in Scottish Primary Care
ii. Public lecture ANU: E-Health: one giant leap for the health system
iii. University of Adelaide Seminar: Primary Care Networks and Critical Mass
REFERENCES


3 WA

4 Ghranite

5 Guthrie wyke info cont
