

The Academic Fellows Scheme in South Wales (UK): a response to the inverse care law

Kevin Thompson MRCGP MSc (Ed.) DPM
General Practitioner and Director of Academic
Fellows Scheme, Cardiff

Harry Ahmed MBBCh MRCS MRCGP
General Practitioner and NIHR Doctoral
Research Fellow, Cardiff

Chris Butler FRCGP
General Practitioner and Professor of Primary
Care, Oxford and Cardiff

Adrian Edwards MBBS MRCP MRCGP PhD
General Practitioner and Professor in General
Practice, Cardiff

Helen Houston MBBCh MD DCH DRCOG
FRCGP
General Practitioner and Professor of General
Practice, Cardiff

Paul Kinnersley FRCGP
General Practitioner and Director of Clinical
Skills, Cardiff University Medical School

Katie Phillips MRCGP MPH
General Practitioner, Clinical Teacher,
Researcher and former Academic Fellow, Cardiff

Katherine Savage MBChB MRCS MRCGP MSc
DRCOG DFFRHC
General Practitioner, Clinical Teacher and
former Academic Fellow, Cardiff

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INTRODUCTION

Compared with their counterparts in more affluent areas, patients in deprived areas die younger, are sicker for longer before they die, and present more complex problems to primary care.^{1,2} Furthermore, people in areas of socio-economic deprivation are often underserved, as primary care is relatively understaffed and under-resourced and less able to meet patients' needs than primary care in more affluent areas.³

Important barriers to achieving high-quality primary care in deprived areas are higher levels of complex

clinical problems and multi-morbidity, which increase demand for service delivery time. Consequently, time available for service development and quality improvement is also limited, and there are difficulties with training and retaining staff.^{4,5}

Rhondda Cynon Taff, Merthyr Tydfil and Blaenau Gwent are among the most deprived areas of Wales and the United Kingdom, with large proportions of the region in the lowest quintile of the Welsh Index of Multiple Deprivation. Several health indices are amongst the highest in Wales such as standardised mortality rates and rates of unemployment for 16–64-year-olds.⁶

In 2001, Cardiff University and the Welsh Government set up the Academic Fellows' Scheme to address some of the difficulties faced by primary care in deprived areas of Wales, particularly Rhondda Cynon Taff, Merthyr Tydfil and Blaenau Gwent. The Academic Fellows Scheme in South Wales employs recently qualified GPs as academic fellows (AFs). The scheme aims to provide developmental support to general practices in deprived areas of South Wales, whilst promoting the professional development of the AFs in teaching and research. In this paper we describe the background to the scheme and its performance and achievements over the ten years since inception.

CONCEPT AND AIMS OF THE ACADEMIC FELLOWS' SCHEME

The scheme aims to attract enthusiastic newly qualified GPs who are committed to service development, research and teaching. Fellows spend two days a week working as front-line GPs in areas of socio-economic deprivation, freeing up host GPs to undertake a structured programme of service improvement. Fellows spend the remainder of their time at the Cochrane Institute of Primary Care and Public Health at Cardiff University School of Medicine (<http://medicine.cf.ac.uk/primary-care-public-health>) undertaking further professional qualifications, developing and delivering undergraduate and postgraduate teaching, and participating in research.

Any practice in a deprived area of South Wales can apply to the scheme. Practices submit an initial application form outlining practice structure and function, and confirming that the majority of their patients live in areas of high deprivation.⁵ Following acceptance, practices complete a proposed practice development plan (PDP) stating intended improvements, timescales, personnel involved, and outcome measures. Practices meet with the scheme director at the start, at three months, and at six months to review progress and update PDPs. Host GPs are expected to present their practice developments at the annual general meeting to all participants and stakeholders.

Benefits of the scheme are multidirectional. GP practices in deprived areas benefit from time and support from the AFs. Protected time away from

front-line service delivery has enabled GPs in these practices to undertake clinically important and innovative service improvement projects that otherwise would not be possible. The AFs, as newly qualified GPs, gain further training and experience in an academic environment at the start of their careers. They are also exposed to working in areas of real need which, without the mutual benefits of the scheme, may not have attracted them previously. Through the work of the Fellows, the university establishes links with historically hard-to-reach communities and can utilise these for research and teaching purposes.

ACHIEVEMENTS

Host practices

To date, the academic fellows scheme has employed 28 Fellows and supported 32 general practices. An evaluation in 2007 by the Welsh Institute of Health and Social Care concluded that the scheme was achieving its aims, with considerable impact on general practice in deprived areas.⁷ Reports from supported practices reflect a conscientious and effective use of the time provided, with exciting and innovative service improvement projects completed and implemented on schedule. Projects ranged from addressing service gaps for local populations (such as developing and implementing enhanced contraceptive services), to addressing issues of national importance, such as reducing benzodiazepine and opiate prescribing (Box 1). A GP who has benefited from the scheme expressed: 'When I took over a failing practice eight years ago there was a great deal of work to be done to bring the practice to an acceptable standard, and much of what has been done would not have been possible but for the invaluable support given to me by the academic fellows scheme'.

Fellows

The scheme has succeeded in meeting the career needs of the academic fellows. Fellows have developed novel ways of delivering core undergraduate medical teaching such as collaborating with a theatre company to develop a student-selected component (SSC) for third-year students around the use of drama to deliver health promotion and public health messages. Another exciting initiative was the introduction of gynaecological teaching associates, volunteers trained to teach medical students intimate examination using their own bodies.⁸ These innovative approaches to teaching have led to fellows, and students supported by fellows, winning Cardiff University teaching prizes.

Fellows have participated in research with 26 (96%) publishing papers in peer-reviewed journals such as the *BMJ*, *British Journal of General Practice*

Box 1 Examples of service improvement projects undertaken by host practices

Work to progress and maintain national standards, for clinical care

- Reducing the prescribing of benzodiazepine and establishing chronic disease clinics.

Improved clinical services beyond national standards for care

- Reviews and improvements in care homes, drug and alcohol projects, palliative care services and setting up enhanced services.

Practice development

- Organising administrative staff, developing journal clubs, regular meetings and teaching sessions for practices.
- Achieving the RCGP Quality Practice Award (the first practice in Wales to do so).

Personal development

- Personal qualifications: for example, palliative care, family planning and therapeutics diplomas. Involvement in Local Medical Committees or becoming advisors for Local Health Boards.

Teaching

- Eight practices have become undergraduate teaching practices.

Needs assessments and other novel projects

- One practice has undertaken a full needs assessment to investigate gaps in care in the local community.
- Practices have also established links with research projects and undertaken recruitment and data collection as part of large randomised controlled trials.

and *Cochrane Database of Systematic Reviews*. All 28 fellows gained further postgraduate qualifications, ranging from Postgraduate Certificates in Medical Education to Masters in Public Health (Table 1). Several fellows used their research time to 'pump-prime' applications for further research funding with successful awards of project grants and research fellowships from the Medical Research Council and the National Institute of Health Research.

Table 1 Postgraduate qualifications obtained by Academic Fellows 2001–2013

Level	Subject	No.
MSc	Public Health	7
MSc	Medical Education	3
MSc	Preventive Cardiology	1
Dip	Epidemiology	3
Dip	Medical Education	1
Dip	Public Health	1
Cert	Medical Education	13

For the South Wales' valleys

Seventeen (61%) former AFs continue to work in general practices located in deprived areas in South Wales. This is a significant achievement, as these areas have traditionally struggled to recruit and retain GPs. Former AFs have contributed widely to their new practices; eight former AFs teach medical students, four have become GP appraisers and one has become a practice lead for research. Two-thirds of the ex-AFs have continued part-time employment with Cardiff University (six in research and 11 in teaching) maintaining and strengthening the academic links between their practices and the school of medicine.

CHALLENGES

Host practices found the process of completing a practice development plan (PDP) challenging. PDPs would often focus on service delivery rather than service development. The scheme addressed this in several ways:

- 1 Introducing a structured, outcome-oriented application form which made explicit what changes were intended, who would do it, how long it would take, and how outcomes would be measured.
- 2 Insisting that projects were for service *development* not delivery except where limited delivery was required to pilot and assess feasibility of implementing the service into routine practice.
- 3 Encouraging practices to collaborate with their intended AFs and the scheme director during the PDP phase to ensure all parties were satisfied with the proposed development plan.

Challenges for the AFs mainly centred on settling into the academic environment. In addition to their general practice workload, the AFs needed to identify a research project, learn to design and deliver teaching, and pursue a postgraduate diploma or masters. This demanded the acquisition of time management skills and the ability to identify and address priorities. This was addressed by assigning academic mentors and encouraging AFs to join research teams based on their own interests. Formal courses were organised at the start of the posts targeting research methods and teaching skills.

Challenges for the scheme include the organisational and policy changes in general practice such as the introduction of the Quality and Outcomes Framework and changes to out-of-hours' work. The scheme has therefore needed to be fluid and adapt to support the various demands placed on already burdened GPs and to be able to continue to meet their requirements. Projects have changed over time, but a strong feature of the scheme has been to support practices in formulating a development plan that suits their requirements.

DISCUSSION

The academic fellows scheme, from a small but ambitious beginning, continues to grow in strength and in demonstrating positive outcomes. The scheme is meeting the needs of practices and fellows and, through the many novel and exciting completed PDPs, contributes to improving primary care in the South Wales valleys.

Supporting primary care in deprived areas is not a new idea. The Deep End Project is a network of roughly 100 general practices serving the most severely deprived populations in Scotland and works to promote primary care in these areas. This project has been used professionally and politically to lobby for change in policy and investment.⁹

The AFs scheme has adopted a more 'bottom-up' approach, showing how standards of care can be improved by supporting GPs to carry out service improvements important to their local population. The scheme has provided academic training to newly qualified GPs, exposed them to work in areas of deprivation and, inadvertently, has been pivotal in many of them continuing to work in these areas. Thus it has the potential to address the recruitment and retention challenges facing the profession. This has led to an increase in the number of practices in these areas offering medical student teaching and participating in research, vastly improving the connection between these practices and Cardiff University School of Medicine. Looking forward, this will surely be beneficial for future recruitment and retention of GPs and the quality of the primary care delivered.

THE FUTURE

The scheme will continue to support primary care in deprived areas of South Wales. A Scheme website (www.pairedpractices.co.uk/) has been set up to allow practices to share knowledge and their experiences of the scheme and, most importantly, their PDPs. GPs who have completed PDPs can offer to mentor practices new to the scheme, providing advice on PDPs and addressing difficulties practices may encounter in achieving their aims. Through this forum, we hope to create a network of practices and GPs with expertise in service improvement in primary care in deprived areas.

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We feel the key features behind the success of the scheme are the good relations we hold with all the stakeholders, in particular the continuing confidence and financial backing of the Welsh Government, who have demonstrated a long-standing commitment to service improvement in areas of deprivation.

References

- McLean G, Gunn J, Guthrie B, Watt GC, Blane DN and Mercer SW (2014) The influence of socioeconomic deprivation on multimorbidity at different ages: a cross-sectional study. *British Journal of General Practice* **64** (624): e440–7.
- Mercer SW and Watt GC (2007) The inverse care law: clinical primary care encounters in deprived and affluent areas of Scotland. *Annals of Family Medicine* **5** (6): 503–10.
- Mercer SW, Guthrie B, Furler J, Watt GCM and Tudor Hart J (2012) Multimorbidity and the inverse care law in primary care. *BMJ* **344**: e4152.
- O'Brien R, Wyke S, Guthrie B, Watt G and Mercer S (2011) An 'endless struggle': a qualitative study of general practitioners' and practice nurses' experiences of managing multimorbidity in socio-economically deprived areas of Scotland. *Chronic Illness* **7** (1): 45–59.
- Hastings A and Rao M (2001) Doctoring deprived areas. *BMJ* **323** (7310): 409–10.
- The Welsh Government *StatsWales*. <https://stats.wales.gov.uk/Catalogue> (accessed 14/11/14).
- Beddow T, Longley M and Hailey S (2007) *Evaluation of the Academic Fellows Programme offered by the Department of General Practice, University of Wales*. Welsh Institute of Health and Social Care: Cardiff.
- Savage KR, Kinnersley P, Monrouxe L, Tristram A, Metcalf E and Fiander A (2013) *Learning the Pelvic Examination with a Gynaecology Teaching Associate: the students' experience*. Conference Proceeding at the Association of the Study of Medical Education Annual Scientific Meeting, Edinburgh, 10–12th July 2013.
- Watt G (2011) GPs at the deep end. *British Journal of General Practice* **61** (582): 66–7.

Correspondence to: Susan Evans, Administrator, Cardiff University School of Medicine, Cochrane Institute of Primary Care and Public Health, 3rd Floor, Neuadd Meirionydd, Heath Park, Cardiff CF14 4XN, UK. Tel: +44 (0)2920 687195; email: EvansS31@cardiff.ac.uk

ProjectPal: linking supportive supervisors to enthusiastic trainees

Medical student Harkaran Kalkat and GP academic Graham Easton explain how an online matching system led to them working together on an education project for this journal.

Harkaran Kalkat

2nd year medical student, Imperial College School of Medicine

Dr Graham Easton MBBS MSc MEd FRCGP

General Practitioner, Lead for Education Research, Department of Primary Care and Public Health, Imperial College, London

THE STUDENT VIEW

I was keen to do a small research project to fine-tune key skills such as time management, organisation and working collaboratively. And as a second-year medical student, there was the added incentive to boost my CV! But this is easier said than done. The biggest challenge was to find a suitable project, with someone willing to supervise me. Fortunately, I found ProjectPal: an online platform, where supervisors looking for help with projects can advertise to find enthusiastic students wanting to get involved (www.projectpal.org/). It was there that I found the opportunity to undertake a project for this journal under the supervision of Dr Easton. The objective was to analyse readership and usage statistics of certain articles and sections in the journal. This was challenging, both because of the volume of work and the time management skills required to undertake it during term time. Nonetheless, I completed the project by the deadline and was given the chance to present my findings to the editorial board. In the end, I found the project interesting and had a great experience, with the added benefit of receiving a letter of thanks from the editorial board – valuable evidence to add to my portfolio!

THE GP ACADEMIC VIEW

Lots of our students are keen to do some research – and we often have suitable projects going on in our department. The trouble is, the students don't always get to hear about what we're doing, and it can be hard to find students to help who are keen on your specific project and available to spend a little time on it. I heard about ProjectPal at one of our in-house teachers' conferences and thought it sounded like a great idea – an online matching system for academics who could do with a capable student to help with their project, and students keen to help out. ProjectPal is currently hosted and run by Imperial College School of Medicine; there are a few similar websites affiliated to universities in the US, but no others in the UK that we are aware of. Once it is fully established at Imperial, the developers may consider expanding it to other UK institutions. I entered some basic details of a project for the editorial board of *Education for Primary Care*, explaining what it was about, what it would involve, and the deadline. Within a week, I had an email telling me that someone had replied. It was Harkaran, a second-year medical student. We met, talked through the project, and he presented the data at our editorial board meeting, sparking a useful discussion about publication strategies for the future. Looking back, it was a great way to match us up – he has had a valuable experience with evidence for his CV, and we were able to do a small project that wouldn't have been possible without his hard work. Without the matching system I don't think I would have been able to find someone who was interested and able to help so quickly.

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