Reshaping the workforce to deliver the care patients need

Research report

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In association with



About this report

Having the right number of appropriately skilled staff is a critical determinant of the quality and efficiency of health care. Yet there is a growing gap between patient needs and the skills and knowledge of the workforce that cares for them. This report, which was commissioned by NHS Employers, gives practical guidance to those wishing to reshape their workforce; identifies key enablers and obstacles to change, with lessons for local leaders; and provides recommendations for national and local bodies about key actions to support change. The report draws on a review of relevant literature, interviews with a wide range of stakeholders, a survey of local Health Education England leaders and a number of short case studies.

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Executive summary

Reshaping the workforce to support new models of care is a huge opportunity, but also a huge organisational development challenge – particularly with regard to the non-medical workforce. We argue that organisations need to begin with a deep understanding of patient needs, and then train, recruit and skill the workforce to meet those needs. This report explores how organisations can do this, and the benefits that would result.

- The NHS needs to evolve from an illness-based, provider-led system towards one that is patient-led, preventative in focus and offers care closer to home. The *Five Year Forward View* sets out an ambition to deliver new models of care that break 'out of the artificial boundaries between hospitals and primary care, between health and social care, between generalists and specialists' to deliver care that is coordinated around what people need and want. However, without radical change in the workforce, this ambition will fail.
- There is an urgent need to reshape the NHS workforce to equip it to meet the changing demand from the population it serves and deliver the vision set out in the *Five Year Forward View*. With a workforce of over 1.3 million people, a very small proportion of whom are fresh from medical or nursing school, this is not just about changing medical or nursing school curricula.
- There are opportunities to develop the current workforce at all grades: from redeploying support staff, extending the skills of registered professionals and training advanced practitioners. Opportunity also comes from new roles, such as the physician associate, but the numbers are small. The biggest opportunity to reshape the workforce lies in developing the skills of the current workforce, particularly the non-medical workforce. But this presents the NHS with a huge organisational and workforce development challenge.
- This report focuses on these opportunities and challenges, but also recognises the vital
 importance of a training pipeline that secures sustainable numbers within all parts of
 the professional workforce.
- The support workforce is large and highly flexible. And short training times mean that numbers can be expanded relatively rapidly. There is good evidence that support workers can provide good-quality, patient-focused care as well as reduce the workload of more highly qualified staff. Investment here could provide a cost-effective and rapid solution to mitigating some of the pressures on more senior staff. Support roles can also widen participation by providing a route for those who do not have academic qualifications to become professionally qualified.
- Extending the roles of the non-medical professional workforce provides opportunities to manage the growing burden of chronic disease more efficiently and effectively. Extending roles can enrich the work of professional staff and make their jobs more rewarding. There is some evidence that these new ways of working could release some savings and help to bridge the workforce gaps that are forecast, particularly in primary care.

- Advanced practice roles offer opportunities to fill in gaps in the medical workforce; improve clinical continuity; provide mentoring and training for less experienced staff; as well as offering a rewarding clinically facing career option for experienced staff. The roles can be developed relatively quickly, in around three years. However, developing advanced practice roles can be expensive and if done at scale will require a strong supporting governance structure.
- Physician associates represent a new cadre of staff with the potential to address a number of workforce challenges. The training provides a relatively rapid route into the NHS for graduates keen to undertake a clinical role and opens up a new workforce pool to the NHS. However, the potential numbers in the immediate future are relatively small. Also, their impact is limited by the lack of a regulatory framework, which prevents physician associates from prescribing and ordering tests. Furthermore, although the training period is short, the role requires an extended period of supervision before its full benefits are realised.
- Reshaping the NHS workforce offers many opportunities. It can deliver benefits for
 patients through more patient-focused care and improved health outcomes. It can
 deliver benefits for staff through more rewarding roles and enhanced career pathways.
 It can also deliver benefits for NHS organisations through greater efficiencies,
 helping to address potential workforce gaps and reducing reliance on agency and
 temporary staff.
- However, reshaping the NHS workforce also carries risks. There is evidence that without careful role and service redesign, new and extended roles can:
 - increase demand
 - supplement rather than substitute for other staff
 - cost rather than save
 - threaten the quality of care
 - fragment care.
- We anticipate that, in the future, care will be supplied predominantly by non-medical staff, with patients playing a much more active role in their own care.
 Medical staff will act as master diagnosticians and clinical decision-makers. All staff will be supported by increasingly intelligent medical and information technologies.
- Large-scale workforce redesign is hard and requires commitment from both national policy-makers and local leaders. We have identified 10 important lessons for organisations seeking to redesign their workforce. Local leaders must:
 - be realistic about the time and capacity needed to support change
 - create a receptive culture for change
 - support transformation with a strong communications and change management strategy
 - build roles on a detailed understanding of the work, staff skills and patient needs
 - invest in the team, not just the role
 - ensure robust triage mechanisms
 - develop and invest in a training capability
 - build sustainability for new and extended roles
 - evaluate change
 - adopt a systematic approach to workforce development and change.

- NHS boards need to 'up their game' around workforce development and planning. This includes:
 - ensuring that workforce development (properly resourced) is a central part of the local sustainability and transformation plan
 - providing dedicated senior leadership and front-line staff with protected time to support workforce development and planning
 - putting in place strong supporting systems and governance structures, including supervision of the new and extended roles
 - creating a culture that supports experimentation and change
 - cultivating links with local workforce and training bodies.
- There are also a number of important areas where national support is needed. Based on our research we would recommend the following:
 - the Health Education England budget and specialist workforce planning expertise should be protected by ring-fencing monies to support local workforce redesign
 - national competence frameworks are needed for staff in extended and advanced roles
 - there should be a dialogue between the professional regulators and system regulators to ensure that there is no 'regulatory gap' and that new and extended roles have safe governance arrangements
 - Health Education England should work with NHS Improvement and the Care
 Quality Commission to ensure that planning assumptions, new workforce models
 and inspection requirements are aligned and clearly communicated
 - the Department of Health should review the current legal indemnity arrangements for primary care staff with new and extended roles to find ways to make legal indemnity easier to obtain and more affordable
 - the underlying needs analysis for, and impact of, workforce redesign should be a national research priority
 - Health Education England should consider how it can support the dissemination of good practice examples.
- The financial context in which organisations are currently operating makes this agenda particularly challenging. There is no headspace in terms of time or resources, yet this is exactly what is needed. National and local training budgets are being cut at the point that they require expansion.
- This agenda is not a 'nice to do'. It is essential if the NHS is to find a sustainable balance between available funding, patient needs and staff needs.

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Glossary

Term	Definition
Accreditation	Formal recognition that a health care organisation or provider is fit to carry out specific activities or processes in a reliable way.
Agenda for Change	System used by the NHS to structure staff pay, whereby individual posts are allocated to bands that correspond to pay scales.
Calderdale Framework	A systematic method for reviewing staff skill mix, developing new roles and identifying new ways of working in order to ensure safe, effective care.
Care Certificate	A set of standards that health and social care workers agree to adhere to in their daily working life.
Care Quality Commission (CQC)	Independent regulatory body that monitors and inspects health and social care services in England to ensure they are safe and of sufficient quality.
Commissioning for Quality and Innovation (CQUIN)	Framework that encourages care providers in England to achieve goals specific to their local area by linking the amount of total funding they receive to their ability to achieve those goals.
General Medical Council	The regulator of the medical profession, responsible for setting standards in the practice of medicine, overseeing medical training and providing professional protection for doctors.
Health and Care Professions Council (HCPC)	Independent, UK-wide regulatory body responsible for setting and maintaining standards of professional training, performance and conduct of health care professions.
Health Education England (HEE)	Department of Health-sponsored public organisation that exists to educate, train and develop the workforce in the health sector.
Indemnity	Security or protection against a loss or other financial burden (e.g. professional liability).
National Qualifications Framework (NQF)	A system that sets out the level at which any professional qualification in the UK can be recognised. This system has now been replaced by the Qualifications and Credit Framework (see entry on this below).
Nursing and Midwifery Council (NMC)	Independent body that sets standards of education, training, conduct and performance for the nursing and midwifery professions in the UK.
Qualifications and Credit Framework (QCF)	System for education qualification in England, Northern Ireland and Wales that sets out the level at which any professional qualification in the UK can be recognised.
Registration	Process that all health professionals must undergo in order to obtain acknowledgement that they are fit to practice in a given discipline.
Regulation	Official oversight of the safety and quality of health care professionals' work by statutory bodies.

Foreword

Patients and their families rightly expect the best that the NHS can deliver, both in terms of outcome and experience. An effective workforce where skills and competence are aligned and support the new service models we need to improve quality, financial efficiency and the long-term wellbeing of our communities is a significant area of focus.

That's why this work that we commissioned from the Nuffield Trust is so important. As the voice of workforce leaders in the NHS, we were keen to investigate where the balance of opportunity lies between developing new roles and the development of roles that already exist. We were also clear that the answers to many of the questions that are being posed about the future NHS workforce are already being answered in NHS organisations up and down the country. The challenge is to learn and apply the lessons from these exemplars.

Reshaping the workforce to deliver the care patients need therefore provides some very impressive specific and practical examples of how the introduction of new roles has enhanced care. These case studies are central to the conclusions that are drawn. The report gives very clear and compelling direction on where extending the skills of existing staff can support service development, and stresses the actions that must be taken to support future innovation elsewhere in the NHS.

We will work on behalf of employers in the NHS to make the case for these conclusions to be acted upon.

Daniel Mortimer, Chief Executive, NHS Employers

Although it might seem obvious that the success of any health system depends on its staff, the workforce has received very little research or policy attention. It has often been taken for granted, and we are arguably now paying the price. This is why the Nuffield Trust has made the workforce one of its core priorities and why we were so pleased to be asked by NHS Employers to carry out this work.

One often hears recommendations to change training approaches or to develop new staff. But our research shows the huge benefits to be obtained – for patients and staff – from development of the current non-medical workforce. It also finds that there is a need for investment, and that change will need to be carefully managed if the full benefits are to be realised.

A key conclusion emerging from the debate at Nuffield Trust's recent health policy summit was unashamedly straightforward: 'It's the workforce, stupid!'. Developing the capability and capacity of NHS organisations to create change in this area should be a key priority for boards. As our work shows, the hard labour of workforce redesign is carried out at a local level. But delivering the scale of change that is needed safely and sustainably is complex, and takes time, so it is imperative that national bodies play their part in actively supporting this vision. We hope that this report will help to communicate these important messages far and wide.

Nigel Edwards, Chief Executive, Nuffield Trust

1. Introduction

'We can design innovative new care models, but they simply won't become a reality unless we have a workforce with the right numbers, skills, values and behaviours to deliver it.' (NHS England, 2014, pp. 29–30)

Having the right number of appropriately skilled staff is a critical determinant of the quality and efficiency of health care. Yet there is a growing gap between patient needs and the skills and knowledge of the workforce that cares for them. The current workforce was trained for a model of acute, episodic and single-disease-based care. But those placing the greatest demands on the health service are people with multi-morbidities, many of whom are old and frail.

The NHS needs to evolve from an illness-based, provider-led system towards one that is patient-led, preventative in focus and offers care closer to home (NHS England, 2014). The *Five Year Forward View* sets out an ambition to deliver new models of care that break 'out of the artificial boundaries between hospitals and primary care, between health and social care, between generalists and specialists' (NHS England, 2014, p. 6) to deliver care that is coordinated around what people need and want. Without radical change in the workforce, this ambition will fail.

With a workforce of over 1.3 million people, only 10 per cent of whom are doctors, and only 0.5 per cent are recent medical graduates, this is not only about changing medical school curricula. Reshaping the workforce to support new models of care is a huge opportunity but also a huge organisational development challenge, particularly with regard to the non-medical workforce. We argue that organisations need to begin with a deep understanding of patient needs, and then train, recruit and skill the workforce to meet those needs. This report explores how organisations can do this, and the benefits that would result.

We draw on a review of relevant literature, interviews with a wide range of stakeholders, a survey of local Health Education England (HEE) leaders and a number of short case studies (see Appendix 1 for a more detailed summary of the methods).

The report aims to:

- give practical guidance and help to those wishing to reshape their workforce
- identify key enablers and obstacles to change, with lessons for local leaders
- produce recommendations for national and local bodies about key actions to support change.

Above all, we hope that the report will help local leaders address the questions posed by the latest NHS planning guidance:

What is your plan to develop, retrain and retain a workforce with the right skills, values and behaviours in sufficient numbers and in the right locations to deliver your vision for transformed care? How will you build the multidisciplinary teams to underpin new models of care? How ambitious are your plans to implement new workforce roles such as associate nurses, physician associates, community paramedics and pharmacists in general practice?' (NHS England, 2015, p. 20)

Context for change –a need to invest in the current workforce

There are over 1.3 million people working in the NHS in England, working in over 300 different types of jobs (HEE, 2016a). A further 1.45 million people are working in social care (Skills for Care, 2015a), the majority in support roles. Figure 2.1 gives a breakdown of the health care workforce for the NHS in England. Over 50 per cent are professionally qualified clinical staff, while a quarter provide support to clinical staff. In Appendix 2 we provide details, for each of the main clinical professional groups, of their numbers, regulatory framework, professional standards, training pathway and pay.

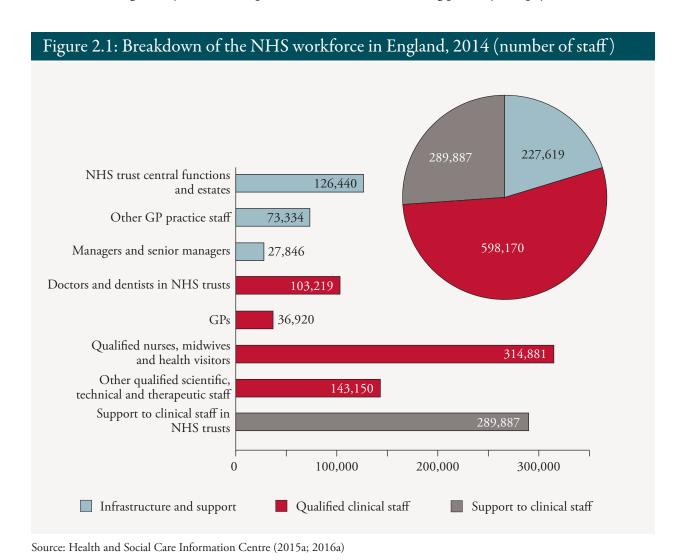
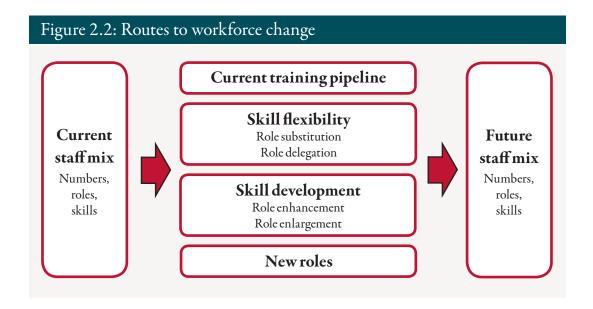


Figure 2.2 lays out the potential routes to workforce change. Traditional workforce planning has focused on the training pipeline. However, with only around 8,000 doctors graduating from medical school each year, and 30,000 nurses and allied health professionals graduating each year, this would do little to influence the behaviour and ways of working of the current 1.3 million-strong workforce. The majority of the staff working in the NHS today will still be in it in 10 years' time, so the development and extension of skills within the current workforce needs to be a central part of any workforce strategy. New roles, such as physician associates, will also play a part, although the numbers are small. There are currently around 250 physician associates working in the NHS, with plans to increase this number by over a thousand (HEE, personal communication).



HEE – the body that holds the central training budget for the NHS – is providing some support for workforce change. All of the local offices of HEE are investing in new and extended roles (HEE survey findings – See Appendix 1). As Table 2.1 shows, the roles are at all levels and in all health care settings. However, the proportion of HEE's budget that is given to this activity is very small. In 2015/16 it amounted to just 4 per cent of HEE's total budget – £205 million (HEE, 2015a) – with a prospect of a significant reduction in 2016/17 given the planned cut in HEE's budget for its general workforce development activities as a result of the spending review (HEE, 2016).

Table 2.1: Local Health Education England investment in new and extended roles		
Role level	Role sector	Percentage of responses from LETBs (N=111)
Advanced	Acute care practitioner Emergency care practitioner Primary care practitioner	8.1% 6.3% 5.4%
Assistant practitioner	Acute care assistant practitioner Community care assistant practitioner Mental health assistant practioner	5.4% 5.4% 4.5%
Physician's associate	Acute care physician's associate Primary care physician's associate Emergency care physician's associate	5.4% 4.5% 2.7%
Apprentice	Acute care apprentice Primary care apprentice Mental health apprentice	5.4% 4.5% 3.6%
Extended practice	Emergency care extended professional practice Primary care extended professional practice Acute care extended professional practice	3.6% 3.6% 2.7%

Source: Local HEE leader survey findings (see Appendix 1). LETB = Local education and training board.

There are two additional challenges that set the context for, and further fuel the need for, workforce change. These are:

- growing workforce gaps
- an NHS budget that is failing to keep pace with the health care needs of a growing population.

"I've got parts of Yorkshire and Humber where I can't get many GPs and, unless I'm going to deliver care from an empty chair, I've got to deliver care from a chair with somebody different in it." (Mark Purvis, GP Director, Health Education England working across Yorkshire and the Humber)

Across health and social care, organisations are facing difficulties with recruitment and retention, resulting in a growing use of expensive agency and locum staff.¹ There are particular problems in some areas of nursing and medicine. Turnover rates among newly qualified nurses are particularly high in both the NHS, at up to 34 per cent (Finlayson and others, 2002; HEE, 2014), and adult social care, at over 25 per cent (Skills for Care, 2015a). There are forecast gaps in the senior medical workforce in primary care, emergency care, geriatrics and psychiatry, all specialties where the needs are high and growing (Imison and Bohmer, 2013). The junior doctor workforce is also declining in number as the recent expansion in the consultant workforce comes to an end and the expansion of doctors in training required to deliver this is reversed. This underlines the importance of the training pipeline as part of an overall workforce strategy. We must plan for levels of training that address gaps created by leavers and changes in patient needs.

^{1.} www.parliament.uk/business/publications/written-questions-answers-statements/written-question/Commons/2014-10-22/211600/

"This great interest in the 'gap' between registered and health care support workers coincides with the huge financial pressure that we have in the health service." (Howard Catton, Head of Policy and International Affairs, Royal College of Nursing)

The NHS faces a £22 billion gap in its finances by 2020 (HM Treasury, 2015). Demand for NHS services, from a growing and ageing population, is projected to rise by 6.6 per cent by 2020.¹ In social care, a gap between demand and available funding of between £2.8 billion and £3.5 billion will emerge by 2019/20. In many areas, the remaining front-line staff are left to absorb the rising demand for care into their day-to-day workload, a challenge that is magnified as the demand for workforce time is estimated to be growing at twice the rate of the overall growth in population (CfWI, 2015). Staff burnout is becoming a significant risk in many settings (Clay and Stern, 2015; Hassan and others, 2013).

"[W]orkload is a driver in general practice, the BMA [British Medical Association] survey from earlier this year showed a 60 per cent increase in consultations over the last 10 years, a significant increase, almost doubling of the amount of administrative work we do and trebling of the amount of blood tests and other results that we handle." (General practitioner)

These pressures may create a burning platform for change and innovation, but they also risk becoming the dominant drivers of change. We must not lose sight of the more fundamental requirement to adapt the workforce to better support patient and population needs.

The focus of this report is on change to non-medical roles, as it is these roles where the majority of current activity is focused. We recognise that there are important debates to be had about medical training and career pathways but we do not address these issues here. We also recognise the significant role that patients potentially have, both through increased self-care and through peer support. Again, this is not explored in depth.

Figure 2.3 provides an overview of the non-medical workforce in terms of the estimated percentage of staff at each Agenda for Change (AfC) pay band level. AfC is the national NHS pay spine. Staff are placed into one of nine pay bands on the basis of the knowledge, responsibility, skills and effort required for their job.

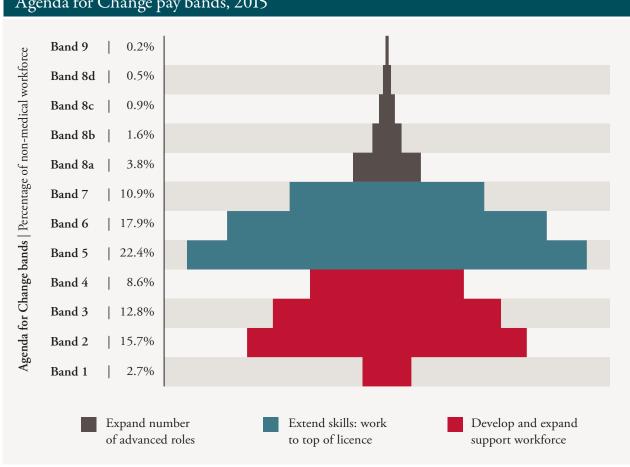


Figure 2.3: Overview of the non-medical workforce – estimated distribution across Agenda for Change pay bands, 2015

Source: Health and Social Care Information Centre (2016b). Staff of unknown band not shown.

We have identified three significant areas of opportunity across the nine pay bands:

- At the lower pay bands (shown in red in Figure 2.3) there are many opportunities for support staff, who are not professionally qualified, to receive additional training to enable them to take on more caring responsibilities (see Chapter 3). These opportunities will also provide a route for these staff into more formal professional training.
- In the middle pay bands (shown in teal in Figure 2.3) there are many opportunities for staff to extend their clinical skills taking on tasks not traditionally within their scope of practice, or taking on tasks traditionally carried out by other professionals (see Chapter 4).
- At the higher pay bands (shown in grey in Figure 2.3) there is significant scope to
 expand and develop more advanced professional roles (see Chapter 5). These not only
 provide career enhancement opportunities for staff at lower pay bands but also enable
 non-medical staff to take on tasks and roles traditionally undertaken by doctors.

In addition to exploring the opportunities within the current non-medical workforce, we also look at physician associates, given the high level of interest in their potential role (see Chapter 6).

Structure of this report

In Chapters 3 to 6 we provide an overview of the scope for change, including some exemplar case studies. Each of these chapters ends with a summary of the available evidence, highlighting the important opportunities and challenges, and a selection of useful resources for developing these roles. This draws on the literature, our case studies and interviews. In Chapter 7 we summarise the opportunities from developing the non-medical workforce while in Chapter 8 we look at the risks from new and extended roles. In Chapter 9 we set out 10 lessons for local leaders as they seek to reshape the workforce. In Chapters 10 and 11 respectively we present our recommendations for boards and national bodies. In Chapter 12 we look at what the future holds and finally we draw the report to a close in Chapter 13.

A note on terminology

Our research has found that the line between 'extended roles' and 'advanced roles' is extremely blurred. For the sake of clarity, in this report 'extended roles' mean roles where registered professionals take on tasks not traditionally within their scope of practice but which do not require training to Master's degree level. 'Advanced roles' meanwhile refer to those roles that require registered professionals to undertake additional training at Master's level or above.

3. Developing the support workforce

Scope for change

"I think it is the band 1 to 4 workers that (a) are the big numbers and (b) can make the big difference." (Mark Purvis, GP Director, Health Education England working across Yorkshire and the Humber)

The support workforce is diverse. It includes clinical support staff such as health care assistants, as well as administrative support staff, cleaning and catering roles, porters, security staff and others. There are 370,486 clinical support staff in NHS Hospital and Community Health Services (working at AfC band 1–4 level) (HSCIC, 2015b). The majority of the 1.16 million employees in adult social care also work at this level (Skills for Care, 2015b).

Benefits of change

Equipping staff at this level with additional skills can enable more patient-focused care, provide a step towards a longer-term NHS career, as well as helping to address professional workforce gaps (Skills for Health, 2015a). Opportunities to develop staff at this level are being exploited in all areas of the NHS – primary and community care, secondary care and mental health services. Examples include:

- using pharmacy technicians for medicine optimisation in primary care
- having care coordinators in the community
- employing assistant practitioners to support radiographers (Wilson, 2006).

The roles exciting some of the greatest interest are those at AfC band 4 level. These roles have the potential to reduce the workload of professionally qualified staff and so ameliorate professional workforce shortages, although, as we discuss in this report, roles need to be carefully designed and implemented if their full potential is to be realised. The case study we present in this chapter (p. 19) focuses on associate practitioners working in community mental health teams. We selected it because it is an example of band 4 staff working alone to carry out a discrete task, with positive outcomes.

First step on the 'skills escalator'

The potential of roles at this level is maximised if they are part of a comprehensive career framework and 'skills escalator', stretching from AfC band 1 to band 4 and beyond.

"Band 1 to 4s... [are] the motor for the rest of the workforce. So, if we can get them in at apprentice [level] and develop really sparkly people and get them decent, proper education and training... they've got quite a lot of potential to go into some quite advanced clinical roles eventually." (Mark Purvis, GP Director, Health Education England working across Yorkshire and the Humber)

Typically, only AfC band 4 roles require any formal education or qualifications (Spilsbury and others, 2011), although over a quarter of the support workforce are qualified to Level

4 of the National Qualifications Framework (Skills for Health, 2015a). Skills for Health recommends that assistant practitioners should be trained at Level 5 in the Qualifications and Credit Framework.¹

Training

Skills for Health has identified a range of training opportunities to develop the support workforce, far beyond mandatory and statutory training requirements. These include:

- training in 'customer handling' to go the extra mile for patients
- support to exercise a greater degree of autonomy (particularly for band 4 assistant practitioner roles)
- developing skills outside professional siloes (for example, nail care outside podiatry to maintain patient wellbeing)
- training to coordinate care across the health and social care sector (Skills for Health, 2015b).

Skills for Health (2015b) emphasises the importance of caring attitudes for support roles and suggests that a more rigorous assessment of candidates is needed as they enter the sector.

Band 4 roles – assistant practitioners

Assistant practitioners (sometimes referred to as associate practitioners) are higher-level support workers who complement the work of registered professionals and work across professional groups (Spilsbury and others, 2011). They typically work between health care assistants and registered nurses, taking on clinical tasks and responsibilities that a health care assistant would not. The fact that they are not regulated has sparked debate, given the clinical responsibility they often have, and sound governance mechanisms are needed to support them (see 'Challenges' on p. 23).

A consultation to explore the possibility of a band 4 nursing associate role is being carried out by HEE. The role would bridge the gap between senior health care assistants and registered nurses. The Department of Health has proposed that they would be trained on the job via an apprenticeship, leading to a foundation degree. It is unclear whether the role would be regulated or not, but these issues will be explored as part of the consultation.²

Assistant practitioners are being developed in a range of settings. For example, a shortage of radiologists drove Taunton and Somerset NHS Foundation Trust to employ three assistant practitioners in its radiology team, complemented by two radiographers working as advanced practitioners. The assistant practitioners were trained in-house to National Vocational Qualification (NVQ) Level 3 standard. The new model has made the service more efficient, eliminating bottlenecks for ultrasounds and biopsies. As a result, the unit has been able to offer more one-stop clinics, decreasing the number of visits to clinic per patient (Wilson, 2006).

A 'community navigator' role has been developed in Northern Ireland (see Box 3.1) to help older people make the most of the available resources in the community and so help to keep them healthy and out of hospital.

 ^{&#}x27;Core Standards for Assistant Practitioners', http://www.nhsggc.org.uk/media/221012/hr_career_framework_app_11.pdf

^{2.} https://www.hee.nhs.uk/our-work/developing-our-workforce/nursing/have-your-say-new-support-role-nursing

Box 3.1: Community navigators, Southern Health and Social Care Trust, Northern Ireland

Northern Ireland's Southern Health and Social Care Trust has created a community navigator role, which aims to support older people in maintaining and improving their health and wellbeing. The navigators provide up-to-date information and advice to all those referred to the service, signposting relevant care pathways, other organisations and specialist contacts for further support if appropriate. This includes a wide range of community support, including befriending, household maintenance, transport, state benefits, district nursing and community-based activities. For a job description, see: https://tools.skillsforhealth.org.uk/roles_directory/.

 $Source: Skills for Health (www.skillsforhealth.org.uk/index.php?option=com_mtree\&task=att_download\&link_id=67\&cf_id=24)$

Good examples of the 'skills escalator' approach can be found in Liverpool Heart and Chest Hospital and Sheffield Teaching Hospitals. In Liverpool, a band 2 health care assistant can develop into a registered nurse via a band 4 assistant practitioner role. Employees undertake internal training, supported by funding from Health Education North West, and are then able to apply for other band 4 or registered nurse positions.

"We work with young people in further education to help them get the requisite A-Levels and grades to get into, say, RN [registered nursing], but we'd also say to them, 'There are other opportunities'... [for example] coming in as a health care support worker and then thinking about how you... progress." (Chief nurse, Sheffield Teaching Hospitals)

Case study example

Band 4 associate practitioners in community mental health teams

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce.

Context

Bradford District Care NHS Foundation Trust provides mental health, learning disability, community health and dental services. It has nearly three thousand staff, over 200 in-patient beds and serves Bradford, Airedale, Wharfedale and Craven.

Timeline

Bradford District Care employed four associate practitioners in 2014 to carry out physical health checks. This was preceded by a secondment of the mental/physical health lead to primary care in 2009 to assess how physical health checks were carried out by GPs, and the development of a Mental Health Physical Review template in 2012.

Overview

"We looked at what skill would be needed in order to deliver the physical health check element... and after reviewing a number of job descriptions and things decided that actually we could go for something different, we didn't need a qualified nurse, but we needed somebody that was competent and able to take physical assessments such as ECG/s] [electrocardiograms], phlebotomy etc." (Service manager, Bradford District Care)

Realising that those with serious mental illness were not receiving adequate physical health assessments (and the reflection of this in Commissioning for Quality and

Box 3.2: Physical health check tasks undertaken by associate practitioners

- Temperature taking tympanic
- Heart rate recording
- Respiratory recording
- Blood pressure recording
- Oxygen saturation/pulse oximetry
- Height recording
- · Weight recording
- · Body mass index (BMI) recording

- · Peak flow recording
- · Obtaining a standard urinalysis
- · Obtaining a 'clean' urine specimen
- Obtaining a 24-hour urine sample
- Use of the Malnutrition Universal Screening Tool (MUST)
- Blood tests
- · Carrying out an ECG

Innovation – CQUIN – payments), the trust employed four band 4 associate practitioners to carry out physical health checks (see Box 3.2).

Assessments are carried out on patients who have been prescribed anti-psychotic medication for the first time, those on a high dose of anti-psychotic medication and anyone referred from the community mental health team caseload.

The trust has not found the associate practitioners' lack of regulation to be problematic. They are managed by an advanced practice nurse, who is not part of the community mental health teams. The associate practitioners are monitored weekly by the nurses in the clinic and have a monthly meeting outside the clinic to discuss any issues. Training takes place in-house, other than training for ECGs and phlebotomy. Associates are closely supervised by a nurse until they have shown themselves to be proficient in all required competencies. Managers felt, given that they are fully trained to undertake their role (and that GPs read and interpret the results of the check), the associate practitioners would be accountable if something went wrong – despite the fact they are not professionally regulated.

The trust thought hard about what was needed to carry out the physical health checks. Using the Calderdale Framework, which sets out seven steps for reviewing skill mix and roles (Smith and Duffy, 2010),¹ they developed a list of competencies and took the decision that band 4 staff could be trained to carry out the health checks, although other options were also considered. This meant that the role was developed based on required competencies, and all stakeholders were aware of what the role consisted of.

As a result of this approach, more patients with serious mental illness are receiving physical health checks and getting better access to smoking cessation, weight management and support to control high blood pressure. The trust has also received positive patient feedback.

"We've had quite a lot of positive feedback from patients that we've seen, because we do the clinic appointments ourselves so there's no waiting times, people are straight into appointments so that reduces their anxiety levels." (Associate practitioner, Bradford District Care)

Table 3.1 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Table 3.1: Case study summary: band 4 associate practitioners in community mental health	
	Key points
Impact	 More patients with serious mental illness receiving physical health checks Reduction in 'do not attends' for physical health checks Positive patient feedback
Enablers	 Local education and training board and clinical commissioning group funding Good relationships with GPs, enabling service-level agreements to be put in place and liaison between associate practitioners and GPs over any issues Supportive management, directors and CEO Robust, systematic template that had been piloted and rolled out for clinicians to follow in both primary and secondary care Freedom to set up physical clinics
Barriers	 Professional resistance – some medics and consultants did not think that band 4 staff should be doing the physical health checks Some resistance from GPs who felt that the physical health checks were adding to their workload, and that issues identified in secondary care should be followed up in secondary care (these issues have since been resolved)
Advice for others	 Recruit an engaged team with drive, determination and passion Gain leadership support and buy-in to the new approach Ensure clear communication across all involved

Summary of the evidence

Opportunities

Improved patient experience

"For the patient themselves one of the core benefits of the support workforce is that they very often are local people, they tend to gel and communicate really well with the people that they're looking after... and [they] tend to stay longer, so continuity [is also improved]." (Tanis Hand, professional lead for health care assistants and assistant practitioners, Royal College of Nursing)

Support workers can focus on providing fundamental care and in some cases can fill existing gaps in care delivery to improve patient experience. One example is using assistant practitioners to help patients with chronic obstructive pulmonary disease, who are unable to go to hospital, with education on breathing and clearing the chest (Miller and others, 2009). Similarly, associate practitioners in the Bradford District Care case study addressed a service gap, which meant that mental health patients faced shorter waits for health checks. There are also opportunities for assistant practitioners to bridge the gap between sectors and professional boundaries, as in the care navigator role, reducing care fragmentation. There is evidence that, particularly in intermediate care settings and in teams supporting older people, a higher proportion of support workers can improve outcomes (Dixon and others, 2010; Nancarrow and others, 2010).

Service and efficiency improvements

Assistant practitioners can also be a means to expand service capacity (Miller and others, 2015). Taunton and Somerset's four-tier model in radiology (using both advanced and assistant practitioners) made the department more efficient, which allowed it to offer more services (Wilson, 2006).

"There is going to be a gap between what the system would like in terms of nurse numbers and what's currently available and it's a question of how we manage that gap. Part of it I think is potentially around a new nurse role, but then of course there might be other people who can contribute to the work... Particularly about increasing health care assistant numbers." (Mark Purvis, GP Director, Health Education England working across Yorkshire and the Humber)

The support workforce can also take on some of the tasks currently being done by the professional workforce. There are particular opportunities in the nursing workforce (Karstadt, 2010; Ringerman and Ventura, 2000). These include support for nursing in primary care (Jeffreys and others, 1995), community care (Richards and others, 2000) and hospital care (Spilsbury and others, 2011). There is some evidence that health care assistants can take 12.5 per cent of the nurse workload (Wanless, 2002). Furthermore, additional support workers in primary care can improve patient access and provide enhanced services without compromising patient care (Bosley and Dale, 2008).

In many instances, assistant practitioners are working autonomously (rather than supporting registered professionals), including in community mental health teams (see the case study in this chapter), ophthalmology, oral surgery (for example, therapy work and x-rays) and orthopaedics (Miller and others, 2015). They tend to be a stable workforce with high retention levels (Miller and others, 2015).

New pathways into health care roles

The 'skills escalator' approach provides new routes into health care, allowing employees to start in a band 1 role and work their way up. The band 4 assistant practitioner role also provides a trajectory for those who do not have the qualifications to directly enter an undergraduate nursing course (Karstadt, 2010).

"There's a very important point for us in terms of providing support workers with a career framework, with a ladder, with step-on, step-off points as well, which absolutely would enable you to move from a higher health care support worker into preparation to be a registered nurse." (Tanis Hand, professional lead for health care assistants and assistant practitioners, Royal College of Nursing)

The chance for job growth and career progression improves job satisfaction (Bach and others, 2008).

Box 3.3 summarises the opportunities offered by the support workforce.

Box 3.3: Summary of the opportunities offered by the support workforce

- Improved patient experience
- Service and efficiency improvements
- · New pathways into health care roles

Challenges

Lack of role clarity

Health care assistants and assistant practitioners lack a nationally defined scope of practice and local roles are often not well defined (Miller and others, 2015). This can cause uncertainty about task responsibility (Spilsbury and others, 2011; Wilkinson and Smith, 2008). When band 4 staff work between health care assistants and registered nurses, the lack of definition can worsen role confusion (Spilsbury and others, 2011). It also limits the transferability of skills across settings (Miller and others, 2015). Organisations need to carefully define new and extended roles and communicate this to all stakeholders involved – including patients.

Lack of national competency frameworks and regulation

Competency frameworks for these roles are generally lacking, although Skills for Health has developed a core competence and knowledge framework for assistant practitioners as well as national minimum training standards and core standards. In addition, HEE has developed an implementation tool for local employers seeking to develop the health care support workforce.¹

The Royal College of Nursing is also keen to see the Care Certificate² introduced across the board, which provides minimum standards for non-registered staff supporting registered professionals:

"We're very, very keen on the introduction of the care certificate, because we've highlighted that there were very, very many health care support workers who had minimal and sometimes no preparation or training or education whatsoever." (Tanis Hand, professional lead for health care assistants and assistant practitioners, Royal College of Nursing)

The band 1–4 workforce is not regulated. This has raised concerns about who is accountable if something goes wrong; the quality of some training; and ultimately whether patients in their care are safe (Thurgate and others, 2010). The reluctance of senior staff to hand off tasks can also be exacerbated by a lack of registered status (Godson, 2010; Spilsbury and others, 2011).

Understanding the implications for nurse staffing ratios

There has been recent policy focus on nurse staffing numbers, with encouragement for NHS organisations to meet minimum nurse staffing ratios. There is evidence that higher numbers of registered nurses are associated with better patient outcomes (Esparza and others, 2012; Hart and Davis, 2011). On the other hand, a recent review found that increasing the number of health care support workers did not reduce mortality rates (Griffiths and others, 2016). Griffiths and others (2016) concluded that the support workforce could not substitute for registered nurses in ensuring patient safety.

However, reviews carried out by the National Institute for Health and Care Excellence (NICE) also found that:

• there is no evidence that specifically describes how minimum staffing levels or ratios may support safer nursing in community care settings (Fields and Brett, 2015)

^{1.} https://www.hee.nhs.uk/sites/default/files/documents/HEE%20Talent%20for%20Care%20-%20Partnership%20Pledge%20Action%20Plan%20Mar%202015_0.pdf

^{2.} www.skillsforcare.org.uk/Documents/Learning-and-development/Care-Certificate/The-Care-Certificate-Standards.pdf

- there is a lack of UK research to identify relationships between nurse staffing configurations and patient safety outcomes in Accident & Emergency (A&E) (Drennan and others, 2014)
- there is no high-quality evidence to describe how management systems should support safe staffing for nurses and midwives (Rutter and others, 2015).

Due to the paucity of evidence, NICE could not recommend a nurse-to-patient ratio, but did highlight that dropping below a ratio of one to eight can raise a red flag in certain circumstances.

This presents a significant challenge if organisations want to expand the support workforce and potentially change their registered nurse staffing levels. What level of additional support would be required to change the number of professional staff? How many support workers can a professional safely support? More evidence is needed. These challenges have dampened enthusiasm for extending support roles in in-patient settings (Miller and others, 2015). In the absence of national guidance, leaders need to formally evaluate any local changes and demonstrate their safety, particularly if they are to satisfy the Care Quality Commission.

"If they can show me that they have applied evidence that says here are my patients, here is what the workforce needs to look like, a creative approach to workforce, then that would be absolutely brilliant." (Ellen Armistead, Deputy Chief Inspector of Hospitals, Care Quality Commission)

Fragmentation of care

Making care too task-based carries risks. Some tasks that could theoretically be done by others actually contribute to care delivery as a whole. For example, a nurse (as opposed to an assistant practitioner or health care assistant) performing observations on a patient may be simultaneously screening them for tissue integrity.

"So we've constantly got to see that we're not making the care task-based and quite interrupted for the patient... I think fragmentation of care is a real risk, I think that we could easily slip into repetition, not substitution." (Chief nurse, acute trust)

Professional resistance

Nurses can feel threatened by the rapid up-skilling of health care assistants and other support workers (Bach and others, 2008; Wilkinson and Smith, 2008). Some worry that they are intended to substitute or provide an alternative to the registered nursing workforce, and resist delegating tasks (Bosley and Dale, 2008). Many are concerned that assistant practitioners and health care assistants are only being introduced to save money. Any engagement strategy will need to address these concerns.

Box 3.4 sums up the challenges for the support workforce.

Box 3.4: Summary of the challenges for the support workforce

- · Lack of role clarity
- · Lack of national competence frameworks and regulation
- Understanding the implications for nurse staffing ratios
- Fragmentation of care
- Professional resistance

Box 3.5 lists some useful resources for developing the support workforce.

Box 3.5: Useful resources for developing the support workforce

- An action plan and implementation tool for the development of the healthcare support workforce (Talent for Care, developed by HEE)
- Skills for Health Working Paper 2: How we can act now to create a high quality support workforce in the UK's health sector
- Core Competence and Knowledge Framework for the Assistant Practitioner Higher Level Apprenticeship (Skills for Health)
- National Minimum Training Standards for Healthcare Support Workers and Adult Social Care Workers in England (Skills for Health)
- Apprenticeship Standard for Assistant Practitioner (Health) (Department of Health)
- Core standards for assistant practitioners

Conclusion

The support workforce is highly flexible. The short training times mean that numbers can be expanded relatively rapidly. There is good evidence that support workers can provide good-quality, patient-focused care. They can reduce the workload of more highly qualified staff. But support workers should not be seen as a substitute for registered nursing staff in an acute hospital setting.

If there is a lack of role clarity and a lack of clear differentiation of tasks between the support worker and the professional they are supporting, this can undermine the potential benefits. There is not enough good evidence to draw definitive conclusions about whether developing the support worker staff group would save significant amounts of money. But, investment here could provide a cost-effective and rapid solution to mitigating some of the pressures on more senior staff.

Many of the people we interviewed called for band 4 staff to be regulated. This would standardise training and reassure professionals and patients about their competence. The risk of regulation is that it could reduce the potential flexibility of this workforce and, given the limits of regulation, not provide the safeguards looked for.

Finally, roles at this level can offer a stepping-stone to becoming registered professionals, providing rewarding career opportunities and widening access.

4. Extended roles

Definition

We define 'extended roles' as registered professionals taking on tasks not traditionally within their scope of practice but which do not require training to Master's degree level.

Opportunities for extended roles

As highlighted earlier, the health service needs to adapt to the growing burden of chronic disease in the population. Patients, often with multiple co-morbidities and complex needs, require a different type of professional who is not tied by traditional boundaries and has a broader range of skills. Extended roles offer the opportunity to develop staff to better meet patient need and enhance interdisciplinary working. They can maximise the use of staff skills and encourage professionals to work at the 'top of their licence'.

"There would certainly be benefits in taking a fresh approach to workforce development, for example developing the essential competencies needed to deliver high-quality care rather than focusing on existing professional labels. This could be applied to the treatment of long-term conditions where medical intervention is often quite minimal. If the skills and expertise for those professionals involved were appropriately developed and supported, this could potentially lead to more efficient and effective care, improving outcomes for patients." (Elaine Buckley, Chair, Health and Care Professions Council)

There are numerous current examples of staff working in extended roles. For example:

- in primary care, nurses are successfully taking on extended roles in chronic disease management (Martínez-González and others, 2015)
- pharmacists are extending their role in a wide range of settings, including primary, community, mental health (Rubio-Valera and others, 2014) and acute inpatient care, improving prescribing and medication adherence
- paramedics have taken extended roles in urgent and emergency care across hospital and community settings
- physiotherapists can take on many of the musculoskeletal problems seen in primary care and safely manage cases in A&E departments (McClellan and others, 2012)
- radiographers have a long history of extending their skills to tasks typically performed by radiologists, particularly X-ray interpretation, as well as performing intravenous injections and barium enemas (Price and others, 2007) evidence suggests that this can be done safely in the context of breast screening programmes (Van den Biggelaar and others, 2008; Wivell and others, 2003).

In the Netherlands, Buurtzorg Nederland has developed a model of community care, where nurses working in self-managed teams take on responsibility for the holistic care of their patients (see Box 4.1).

Box 4.1: Buurtzorg Nederland

Buurtzorg Nederland is a Dutch home care organisation, which provides an example of staff working successfully outside of their traditional scope of practice. The organisation is non-hierarchical and is made up of several independent teams, of up to 12 nurses each. They are responsible for all organisational activities, including education, finance and planning. This approach has resulted in shared values and a sense of community across the organisation, leading to satisfied employees (de Blok, 2013). Surveys have shown that the organisation has the most satisfied workforce of any Dutch company with more than 1,000 employees (The Commonwealth Fund, 2015). Buurtzorg is also a low-cost provider of home care services, although evidence suggests that when other services are factored in, total per-patient costs are average for the Netherlands (KPMG, 2015).

Training and regulation

Staff in extended roles are generally trained and assessed in specific competencies by their employing organisation or partner higher education institution to achieve a defined extended scope of practice. As registered professionals, they are regulated by their own statutory body (either the Nursing and Midwifery Council or the Health and Care Professions Council) and may be subject to local governance procedures to ensure the maintenance of their extended competencies.

Pay

Pay varies widely depending on the scope of practice and the employer, but typically staff in extended roles will be on AfC pay bands 5–7. (Staff in advanced roles are usually on pay bands 7–8c.)

The case studies described below provide examples of nurses, social workers, pharmacists and other allied health professionals – including paramedics – taking on extended roles in primary and community care settings.

Case study examples

The holistic worker (Nottingham CityCare Partnership)

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce.

Context

Nottingham CityCare Partnership ('CityCare') is a social enterprise that delivers more than 65 nursing and health care services in and around Nottingham. It employs around 1,600 people over 26 sites.

Timeline

The extended competencies for the holistic worker were first created around the end of 2011 and were rolled out in the urgent care team throughout the first six months of 2012. Since then they have been a part of that team's standard induction for new starters and rolling training programme. The plan is to extend the competences across the whole organisation.

Overview

The urgent care team assesses patients at risk of a health or social care breakdown and then supports them in their home with the aim of preventing an admission to hospital or a care home. If a health or social care intervention is required, the team will arrange it. Within eight months of starting this new service, it became clear to those working in the team that they required a broader range of skills.

CityCare therefore developed the 'holistic worker' – a new breed of health care professional that is able to assess a patient's complete care needs. They are a registered professional by background – a nurse, physiotherapist, occupational therapist or social care worker working at AfC bands 5–6 or equivalent. They are then trained up to 'assistant practitioner' level (AfC band 4) across all four disciplines, thus having a broad range of skills outside their initial area of expertise. In addition, the urgent care team employs holistic assistant practitioners who are trained to band 4 level across all four disciplines.

In order to determine what competencies the holistic workers needed, CityCare took a pragmatic approach and asked the workers themselves, along with their managers, to determine what they needed to learn.

"So we've said to team managers, 'Think, with your team, would you generate the opportunity to be involved in this type of intervention within your daily practice? If the answer is yes then it's highly likely that you need to do that competency." (Assistant director, CityCare)

CityCare used the Skills for Health assistant practitioner framework¹ and the Skills for Care social care competency framework² to identify exactly what skills would be relevant for their holistic workers. It took relevant competencies, described them in detail and grouped them together in a holistic worker competency manual. Training is a mixture of classroom-based and theoretical teaching in protected teaching time, followed by practice under supervision in the field. Once observed to be competent in a skill, an assessor (a registered professional in that discipline) will sign off the holistic worker for that particular skill.

Holistic workers are registered professionals and so maintain registration with their 'home' regulators. As the additional competencies are attained at band 4 level, there is no requirement for further registration. Although there are mechanisms in place for the review and updating of competencies, the role requires individual staff members to recognise the limits of their competence or decide if their skills need refreshing.

The new role has enabled more effective working, promoted diversification and developed the team. All team members report more confidence in dealing with unexpected situations and have a deeper understanding of the skills of colleagues. It has also led to more efficient use of resources: more can be done in a single visit. It has been so successful that CityCare will be expanding the model to all multidisciplinary community teams, a process led by a dedicated manager and steering group. The competencies are being expanded and refined and 450 clinical staff will be trained in the model. CityCare has minimised training costs by capitalising on existing skills in the team and allowing team

^{1.} http://www.skillsforhealth.org.uk/images/standards/apprenticeship-frameworks/england/Assistant%20Practitioner%20Higher%20Level%20Apprenticeship.pdf

 $^{2. \} http://www.skillsforcare.org.uk/Documents/Learning-and-development/Core-skills/How-to-support-core-skills.pdf$

members to train each other. The roll-out will be evaluated to formally assess the impact on patient care and resource use.

Table 4.1 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Table 4.1: Case study summary: the holistic worker in community care		
	Key points	
Impact	 More coordinated and efficient care, leading (anecdotally) to fewer visits More confidence among staff Won an HSJ Value in Healthcare Award Formal evaluation is planned, going forward 	
Enablers	 Openness about the motivation of and reason for change, helping staff to see why the change was required Staff who have had their role extended are able to advocate and champion the process and benefits A promotional video helps to disseminate information Teams who will be trained in the holistic model are given time and notice about the plans Leaders are given dedicated time to support the change Senior management within the organisation are supportive and positive about the programme 	
Barriers	 Resistance from some professionals about not wanting to work outside their traditional scope of practice Takes time to train and gain competencies 	
Advice for others	 Recognise the improvements that this model can bring to patient care and use this to bring about change Engage staff and ensure buy-in to the process – meetings and circulated information, such as videos, can aid this process Allow individual teams to determine the competencies they require based on the type of service they deliver Give managers in charge of implementation dedicated time and resources 	

Paramedic practitioners in the ambulance service (South East Coast Ambulance Service)

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce .

Context

South East Coast Ambulance Service (SECAmb) is a large ambulance trust covering 3,600 square miles across Kent, North East Hampshire, Surrey and Sussex, employing 3,661 staff.

Timeline

SECAmb started training paramedic practitioners in 2006, after developing a curriculum and course in partnership with St George's, University of London.

Overview

The service observed a significant shift in its workload, from providing solely an emergency service to mainly dealing with patients with long-term conditions. This led

to a realisation of the need for a new extended role that could deliver care differently – the paramedic practitioner (PP). PPs train on an 18-month part-time course and an eightweek GP placement.

"If you are moving any profession into an enhanced role you bridge the gap in physical assessment and clinical decision-making... so we took that as the core and all PPs still do those modules. What we then did was look at the practicalities of what they were making the decisions about, so they were making decisions about minor illness, minor injuries, elderly people, some mental health. Therefore we made four core modules: assessment skills, decision making, minor injuries, minor illnesses, because they were the clinical caseload that we felt that the PPs could work to and these were patients if you could deal with them in the community, would be much better left at home." (Chief nurse, SECAmb)

Box 4.2 gives further details on the role of the PP.

Box 4.2: Paramedic practitioner: role description

- · Assess and treat patients with chronic illness
- Assess and treat patients with minor illness/injury, including performing therapeutic procedures such as joint immobilisation, medication administration (patient group directions), injections and wound management
- · Respond rapidly to emergency calls
- Refer patients to specialists or hospitals if needed
- · Promote health
- · Work collaboratively with community teams
- · Follow up, with repeat review of the patient if necessary
- · Participate in the development and clinical supervision of staff and students
- · Assist in audit and quality improvement

'On the road': PPs can operate out of an emergency response vehicle (such as a car or 4x4), attending emergency calls at a patient's home. They can attend alone, or with an ambulance crew who can call on their advanced training to aid with decision-making and treatment, potentially preventing a hospital referral.

In the emergency operations centre (EOC): PPs can staff desks in the emergency call centre, primarily giving advice to crews on the road. They can be called by crews who would like to discuss a case and get a senior opinion or they can prompt crews to call them – via the IBIS system (see below – a form of electronic health record) – to proactively give advice. PPs are versatile clinicians who can effectively operate in other settings, for example, primary care (either consulting in practice or performing home visits), emergency and urgent care or acute inpatient care. PPs often work in a mixture of these settings – for example, working a couple of days a week in a GP practice and the other days for an ambulance trust, doing a mixture of community and EOC work.

In addition, SECAmb uses the IBIS computer system, which contains a limited patient record of relevance to ambulance crews. This has been found to be an extremely useful clinical tool and enables the PPs to add value to a large number of clinical situations by providing remote clinical advice to crews on the road based on the patient's background information held in IBIS.

Mentoring and ongoing supervision are in place for PPs, but are relatively limited and continue to develop. This can create tensions, especially if managers do not fully understand the PP role, although the lack of formal clinical supervision is not perceived to be a major issue due to the highly autonomous nature of existing paramedic practice.

Staff interviewed were very enthusiastic about what PPs can offer the ambulance service and the benefits they can provide in terms of career progression and development. Furthermore, data from SECAmb demonstrate that:

- on average, PPs have a 20 per cent lower conveyance rate (referring patients to hospital) than other paramedics
- PPs with specifically triaged patients have a further 10 per cent lower conveyance rate
- PPs attract fewer complaints than other paramedics.

Table 4.2 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Table 4.2: Cas service	se study summary: paramedic practitioners in the ambulance
	Key points
Impact	 Lower conveyance rates (referring patients to hospital) Low level of complaints despite high caseload Job satisfaction and attractive career pathway for paramedics Clinical support is provided to paramedics on the road
Enablers	 Detailed analysis of what patients needed from PPs allowed an effective education and training programme to be designed Use of a clear career framework attracts staff Deploying PPs to selected patients allows them to be allocated to those cases where they can have maximum impact Technology (IBIS system) provides PPs with tools to add maximum clinical impact
Barriers	 Demands on the service, including targets, may hinder the ability to deploy PPs to particular patients Initially some resistance from existing staff about the new role Lack of formal line management and senior PPs for supervision
Advice for others	 Before introducing the role, have a clear idea of what PPs can do and base training, education and deployment around this Deploy PPs to selected cases based on where they can have maximum impact Use existing frameworks and pathways (for example, the Paramedic Career Framework) in order to facilitate the development and sustainability of new roles It takes time and investment to develop new extended roles effectively; be prepared for middle-term gains

 $Source: www.collegeof paramedics.co.uk/downloads/Post-Reg_Career_Framework_3rd_Edition.pdf$

Pharmacy and paramedic practitioners in primary care (Haxby Group Practice)

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce.

Context

The Haxby Group Practice consists of 10 GP surgeries across York and Hull. It is led by 21 GP partners and one non-clinical partner and delivers care to almost 50,000 patients.

Hull is an under-doctored area and in 2015 only 50 per cent of training posts in Hull were filled. The Haxby Group Practice faced increasing difficulty in recruiting GPs and was experiencing a growing clinical and administrative workload. Diversifying its workforce was one route to addressing these pressures.

Timeline

Haxby Group Practice employed its first pharmacy practitioner in 2012, followed by a second in 2015 (who is managed by the first) and a third joined the team in early 2016.

Two primary care (paramedic) practitioners were employed in 2015, although one has since left the organisation.

Extended role for a pharmacist

An extended role for a pharmacist came out of a time and motion study in the practice, which showed that a large proportion of GP time was spent re-authorising and managing prescriptions. This, alongside established close working with community pharmacy, triggered the decision to employ a pharmacist in the practice to take on this work. The Haxby Group Practice now employs three pharmacists who cover the 10 surgeries. The pharmacists' main role is medicines management, either remotely (over the telephone) or face to face. They also have a role in conducting prescribing audits and dealing with regulatory issues.

Internally, raising awareness of the pharmacist practitioner role consisted of "educating the right people" through email, team meetings and clinical meetings. It was important that the onsite community pharmacy in the group knew exactly what the role entailed, and could approach the pharmacist directly for any medicines management queries.

For the pharmacists, one of the GP partners conducts an annual appraisal with 360-degree feedback. There are also regular formal and informal review sessions. Any prescribing issues are taken to the prescribing lead in the practice.

After employing the first pharmacist, the practice realised that the pharmacist could manage to do, in 35 hours a week, work that was taking the GPs 60 hours a week. The quality of medicines management has also improved with quicker, more reliable prescribing; reduced polypharmacy (the use of multiple medications by a patient); and more patient and professional education. Medication errors or adverse incidents have not increased.

Extended role for a paramedic

An extended role for a paramedic – called 'primary care practitioner' – came about because one of the group partners had personal experience of working with paramedics and saw an opportunity to use them in the practice. This was facilitated by using local HEE office funding for advanced clinical practitioner roles. The primary care practitioner works across three GP surgeries and primarily deals with same-day appointments. All

patients on the primary care practitioner's list are triaged by GPs and have been deemed appropriate to be seen by them.

As the role is patient facing, significant effort was put into raising patient awareness about it. It was featured on the BBC's Look North regional television news programme as well as in local newspapers, in the patient newsletter and on social media. The group employs a public relations company to help disseminate messages externally. Awareness was also raised through the patient participation group.

The primary care practitioner had a month-long induction where they sat in with GPs and since then they have structured debriefs following every clinic. They are also able to seek guidance or supervision from GPs whenever anything arises during a consultation – the GPs have allocated time built into their clinics to support this. Once every two weeks the primary care practitioner also has a formal tutorial with a GP to cover any issues that have arisen.

The primary care practitioner has only been in post for six months and so outcome data are unavailable. The cost-effectiveness of the programme remains unclear given the supervision time required, and the longer appointment times of the practitioner.

Table 4.3 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Table 4.3: Case study summary: pharmacy and primary care practitioners

in primary care		
	Key points	
Impact	 Extended role for the pharmacist Significant reduction in GPs' medicines-related workload Improved medicines management Cost-effective – net savings to practice Extended role for the primary care practitioner Some reduction in GPs' acute/urgent assessment workload Cost-effectiveness is uncertain 	
Enablers	 Culture of innovation and education Funding from local HEE office for advanced practitioner training Supporting communications strategy Instant messaging facilities (SystmOne) Scale of large group practice 	
Barriers	 Obtaining necessary professional indemnity cover for primary care practitioner role Lack of supporting guidance for development of new and extended roles Current regulatory barriers to paramedic prescribing Lack of people with advanced practice skills (and so requires training on the job) Lack of time to do necessary development work 	
Advice for others	 Ensure that the whole team is bought into the concept Put strong governance mechanisms in place – clinical supervision and 	

mentorship for new and extended roles

Be prepared to be flexible and adapt roles to local circumstances

Summary of the evidence

Opportunities

Improved patient experience and outcomes

Patients with multiple chronic conditions require more holistic care. Extended roles, with a scope of practice across traditional boundaries, can deliver this. Our case study sites also report improved patient experience:

"At the end of the day it's providing a better experience for those patients, they're not having a hundred different assessments completed or having to tell their story five times over to many different people." (Holistic worker, Nottingham CityCare)

More proactive and systematic care of patients with chronic disease by nurses (Carter and others, 2009; Clark and others, 2010; Wagner and Edward, 2000) and pharmacists (Blenkinsopp and others, 2003; Machado and others, 2007) can also improve medication adherence and outcomes.

More efficient use of staff time and resources

Equipping staff with a broader range of skills and encouraging them to practise at the 'top of their licence' provide opportunities to do things more efficiently and delegate tasks from one professional to another, particularly from medical to non-medical staff. This can allow medical staff to focus their time on patients who need it most.

"[Staff working in new roles are] allowing the GPs more time with patients. So you've got somebody who's going to take some of the pressure off... those GPs can then spend the time with the patients that really need it." (GP practice manager)

One study has estimated that up to 70 per cent of primary care physicians' work could be taken on by other health care professionals such as nurses or allied health professionals (Dubois and Singh, 2009). For example, a systematic review has found that direct access to physiotherapists (rather than patients with musculoskeletal complaints needing to be referred by a GP) leads to improved patient outcomes and decreased costs (Ojha and others, 2013). Trained physiotherapists are as competent at assessing orthopaedic outpatients as post-fellowship junior orthopaedic surgeons and consultations with physiotherapists have been found to generate lower hospital costs due to fewer X-ray or surgery referrals (Daker-White and others, 1999). Radiographers can successfully diagnose from x-rays (Hughes and others, 1996) and the complication rate for radiographers performing barium enemas is similar to that for radiologists (Bewell and Chapman, 1996).

Evidence from our case studies suggests that paramedic practitioners transport fewer patients to hospital while the introduction of the holistic worker is predicted to reduce the number of visits by community workers.

"In the urgent and emergency care review we looked at the role of pharmacists in general practice, the role of paramedics with enhanced skills, retraining people in the community outside of primary care... If you look at, for example, investing in paramedics, the evidence suggests after some investment you do get a financial yield. Within five years you should release hundreds of millions of pounds a year. That could give us the headspace to think about secondary care shifts." (Professor Keith Willett, Director for Acute Episodes of Care, NHS England; seminar participant)

However, it is important to note that role design and implementation can have a significant influence on the net impact of new and extended roles. Extended roles do not always result in cost savings (see 'Challenges' below).

Improved job satisfaction and staff experience

Professionals undertaking extended roles report greater job satisfaction (Dubois and Singh, 2009) and value the continued learning and professional development (Wilson, 2006). These findings are echoed by our research, which shows that those working in extended roles enjoy their new roles and the associated personal development. New and extended roles can also have a positive impact on existing staff, reducing work pressure and improving job satisfaction (Richards and others, 2000; Richardson and others, 1998).

See Box 4.3 for a summary of the opportunities offered by extended roles.

Box 4.3: Summary of the opportunities offered by extended roles

- · Improved patient experience and outcomes
- · More efficient use of staff time and resources
- Improved job satisfaction and staff experience

Challenges

Time and money needed to develop the extended roles

It takes time and money to develop new extended roles (Richards and others, 2000). For example, Nottingham CityCare estimates that it will take two years and £20,000 to roll out their holistic worker model across all community teams in and around Nottingham.

Extended roles may cost more or increase demand

Staff working in extended roles may take longer to complete tasks, spend more time with patients, recall them at higher rates and carry out more investigations (Bosley and Dale, 2008; Delamaire and Lafortune, 2010; Dubois and Singh, 2009; Walsh and others, 2005). Hence, extended roles may not be cost-saving (McClellan and others, 2013; Sibbald and others, 2004). Radiographers reporting X-rays tend to over-report, compared with radiologists (Hughes and others, 1996; Johansen and Brodersen, 2011), leading to higher false-positive rates. It is feasible that these effects could attenuate over time, but a lack of long-term evaluations makes it difficult to draw clear conclusions (Sibbald and others, 2004). Evidence from the literature also suggests that delegation from GPs to others will only reduce the GP workload if they cease performing the delegated tasks (Laurant and others, 2009). Furthermore, there is a risk that, without careful planning, staff working in extended roles might simply duplicate the work of others (Laurant and others, 2004).

Resistance from other professionals or patients

An unwillingness of staff to work outside professional boundaries was a recurrent theme throughout our research and is widely reported in the literature. This could be due to a variety of reasons – for example, concern about having to take on more work and worries about professional liability were commonly cited. Senior clinicians or managers may also be resistant to change, and this can affect organisation-wide change. One of our interviewees reflected on how a pilot of paramedic practitioners had succeeded at their GP practice but had not worked elsewhere:

"GPs wouldn't engage [in other practices]... The one thing that we made clear to our GPs was that, if they wanted this to work and they wanted the help, which was going to give them more time with their patients, then they needed to engage with them. And it's really been good." (GP practice manager)

Patients may also be sceptical of staff without traditional professional identities and there is evidence that, while satisfaction may be high, patients may not always return to consult someone in an extended role (Banham and Connelly, 2002). However, there are examples that show that, with time and education, patients will accept new and extended roles (Dyer, 2008; Dyer and others, 2014) – something demonstrated in our case studies of pharmacy and paramedic practitioners in primary care.

Depleting and overburdening staff undertaking traditional roles

While extended roles offer opportunities to develop and expand the practice of professionals, there is a risk that staff moving to work in extended roles might leave the traditional roles understaffed.

"We have a shortage of radiographers as well as radiologists in the country, so we haven't got a huge spare capacity in radiographers to take on extra roles at the moment." (Giles Maskell, President, Royal College of Radiologists)

It could also result in staff being expected to take an additional workload without loss of their existing work. Again, in radiography, radiographers have previously reported unreasonable management expectations as they take on extra jobs (Price and others, 2002).

Lack of a clear regulatory framework

In general these new extended roles are not formally recognised by professional regulators. This can leave staff anxious as to whether they are operating outside of their professional scope of practice and therefore make them unwilling to take on the new role (Dower and others, 2015). There appears to be an expectation within the professional regulators that organisations and system regulators such as the Care Quality Commission will ensure appropriate training and supervision. However, the current regulatory frameworks offer little scrutiny or guidance in this area.

Professional indemnity in primary care

There is no crown indemnity cover in primary care, so GPs have to seek this cover from commercial insurance companies for staff working in their practice. The costs of this cover can be very high for new or extended roles.

"I think one of the biggest risks for us... is medical indemnity... because I cannot get a radiographer to be covered... And I've just had a quote for one of my paramedics, who is just as qualified as any of my nurses... [the insurance is] more than for the GPs!" (GP practice manager)

Box 4.4 sums up the challenges for extended roles, while Box 4.5 lists some useful resources.

Box 4.4: Summary of the challenges for extended roles

- Time and money needed to develop the extended roles
- · Extended roles may cost more or increase demand
- Resistance from other professionals or patients
- · Depleting and overburdening staff undertaking traditional roles
- Lack of a clear regulatory framework
- · Professional indemnity in primary care

Box 4.5: Useful resources for extending roles

- 1. The Calderdale Framework
- 2. Six Steps Methodology to Integrated Workforce Planning (Skills for Health)
- 3. Core skills training framework (Skills for Health)
- 4. Skills for Health tools (including workforce reconfiguration tool and competence search tool

Conclusion

Extending the roles of the non-medical workforce provides opportunities to manage the growing burden of chronic disease more efficiently and effectively. It also provides opportunities to enrich the work of professional staff, providing more rewarding roles. There is some evidence that these new ways of working could release some savings. Also, extended roles could help to bridge forecast workforce gaps, particularly in primary care.

In order to realise these opportunities, careful attention needs to be paid to role design, team working and governance. Without this, there is the risk that extended roles will supplement rather than substitute for other workers, and fragment rather than integrate care. There are also challenges around the lack of recognition for these new extended roles by professional regulators and the lack of crown indemnity cover in primary care.

5. Advanced roles

"I'm quite clear that we have to create advanced practice roles, not just because of [the shortage of junior] doctors but because there's a need to give more holistic patient care." (Lisa Bayliss-Pratt, Director of Nursing, Health Education England)

Definition

There is no standard, accepted definition of advanced practice. For the purpose of this report, advanced practice refers to any role that requires a Master's degree in advanced practice.

Advanced practitioners come from a range of professional backgrounds (typically nursing, pharmacy or paramedic). They are known as advanced clinical practitioners (ACPs), advanced nurse practitioners (ANPs) (if from a nursing background) or simply advanced practitioners.

"We called [advanced clinical practitioners] that [because]... we wanted not just nurses but people from a number of disciplines." (Senior manager, acute trust)

Opportunities and benefits from developing advanced roles

Advanced roles are emerging in all sectors at a rapid pace. In primary care, advanced nurses can lead and run a primary care practice, although this is exceptional. More common are advanced roles in the management of people with long-term conditions and minor illness (Primary Care Workforce Commission, 2015). In secondary care, a shortage of junior doctors is driving a significant growth in advanced practice roles (Miller and others, 2009). This was the primary driver for both the Sheffield Teaching Hospitals NHS Foundation Trust (see the case study example below) and the Heart of England NHS Foundation Trust in developing ACPs. ACPs have been deployed across their organisations – in A&E, acute medicine, paediatrics, general surgery, Hospital at Night services and cardiology, among others. In radiology, a shortage of radiologists has driven a 'four tier' model – staffed by assistant practitioners, practitioners, advanced practitioners and consultants (see Denton and Wivell, 2008). There are also increasing opportunities for nurse specialists to bridge the gap between primary and secondary care, providing specialist advice to GPs and playing a greater role in follow-up care (Edwards and Imison, 2014).

Advanced roles are also being used to address workforce shortages in mental health services, particularly junior psychiatric doctors. A mental health hospital in Kilmarnock has used ANPs in its Hospital at Night service to fill a gap in out-of-hours care (Gilfedder and others, 2010). Similarly, Bradford District Care NHS Foundation Trust has employed ANPs in community mental health teams. The ANPs are able to take their own caseload (which is attached to a consultant psychiatrist) and see individuals in an outpatient setting. The approach has resulted in fewer acute admissions.

Nurse consultants have also been introduced to improve patient outcomes, strengthen leadership and provide a clinical career path for senior and experienced nurses (Drennan and Goodman, 2011). The role blends education, research and management. Unlike

advanced practitioners, they must have, or be working towards, a PhD and have postgraduate research training.¹

Regulation

Advanced practitioners continue to sit on their original professional register. Most advanced roles are therefore under the regulatory banner of the Nursing and Midwifery Council or the Health and Care Professions Council.

Pay

Advanced practitioners typically start on AfC pay band 7/8a, although this varies.

Case study example

Many advanced roles are being developed in an ad-hoc fashion, within and across organisations. We have selected Sheffield Teaching Hospitals NHS Foundation Trust as a case study as it has developed a faculty for advanced practice to standardise the ACP role across the organisation.

ACPs at Sheffield Teaching Hospitals NHS Foundation Trust

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce.

Context

Sheffield Teaching Hospitals NHS Foundation Trust employs approximately 16,000 staff. The trust provides a range of tertiary, secondary and community services to the population of Sheffield.

Timeline

The trust developed its first ACPs in 2006 to help compensate for the loss of junior doctor hours as a result of the European Working Time Directive. The role was developed at scale in 2012, to help fill the growing gaps in junior doctor rotas.

Overview

The trust defines ACPs as:

"... a professional who has acquired the expert knowledge base, complex decision-making skills and clinical competencies for expanded practice, the characteristics of which are shaped by the context and/or country in which s/he is credentialed to practice. A master's degree is essential for entry level." (Health Education Yorkshire and Humber, 2015)

This is in alignment with the local HEE office's definition of an ACP role. There are 70 to 80 ACPs working across a range of services, including critical care, operating theatres, A&E, renal services and haematology services. ACPs are expected to use expert knowledge for complex decision-making.

"Because of some of the pressures currently, where F1s and F2s [foundation year 1s and foundation year 2s] are being taken out of the system and the funding's been taken out as well, it became almost... another crisis point in the trust... [We realised] we really can't provide the standard of care if we don't do something, and because it was a doctor medical gap, it had to be advanced practitioners really." (Education commissioning manager, Sheffield Teaching Hospitals)

^{1.} http://nursingcareers.nhsemployers.org/browse-segments/acute-and-critical-care/level-8-clinical/nurse-consultant.aspx (accessed 28 January 2016).

ACPs undertake a two-year, part-time, modular Master's degree in advanced professional practice at Sheffield Hallam University. The trust worked closely with the university to tailor the modules on the course and it supplements the university's modules with in-house training modules. Each ACP trainee has a consultant supervisor who signs off the trainee as they go through the programme, and a mentor who acts as a second port of call if the supervisor is unavailable. The trust has received a total of £4.35 million from the local HEE office to pay for the training and backfill of 60 ACPs.

The trust has developed a Faculty Board for Non-Medical Advanced Practice covering the South Yorkshire region. The role of the faculty is to act as the quality assurance mechanism, setting training standards, supervision requirements, role definitions and job descriptions. The faculty is also helping to build a supportive organisational culture.

"[The faculty makes] sure that cultural changes are happening, that attitudes are hopefully welcoming, the workforce is there to accept these roles and enable them to work as part of the team." (Chief nurse, Sheffield Teaching Hospitals)

Sheffield Teaching Hospitals raised awareness of ACPs internally through an intense communication plan, staff meetings and handbooks. This was helped by support from consultants.

A comprehensive evaluation of ACPs in the trust has not been carried out, primarily because they have not been in post very long. However, anecdotal feedback from junior doctors working with ACPs and other staff has been positive.

"In cardiothoracic they do not have any delays with TTOs [to take out – prescriptions for medicine given to a patient on discharge from hospital] because practitioners write up the prescriptions overnight. It's the only area that they're meeting the target and getting timely TTOs written because the ACPs are writing them." (Nurse director, Sheffield Teaching Hospitals)

Table 5.1 on page 41 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Summary of the evidence

Opportunities

Improved patient access and experience

Benefits of advanced nurses in primary care include:

- improved access (Martin-Misener and others, 2009)
- more frequent follow-up care (Peltonen, 2009)
- reduced hospital admissions (Griffiths and others, 2004)
- increased patient satisfaction (Sibbald, 2009).

"For somebody who has forgotten to take their medication for several days and has started deteriorating, at one point they would have been admitted but [now] that can be managed in their own home through the advanced nurse practitioners." (Senior manager, mental health trust)

There are similar benefits in secondary care. Clinical nurse specialists are associated with a lower length of stay (Newhouse and others, 2011) and an evaluation of the implementation of ANPs at Barnsley Hospital NHS Foundation Trust found numerous examples of patients receiving more timely care (McDonnell and others, 2015).

Table 5.1: Case study summary: advanced clinical	practitioners in
secondary care	

	Key points
Impact	Anecdotal feedback has been positive
Enablers	 Local HEE office funding Coordinated organisational approach – a faculty board has been established to quality assure ACPs and ensure internal standardisation Strong buy-in (at clinical and board levels) supported by medical champions Strong partnerships with Sheffield Hallam University Strong mentorship and supervision programme (supported by willing and enthusiastic consultants) Education commissioning manager that could devote significant time to the process
Barriers	 Retaining ACPs due to other health care organisations in the area paying higher rates and ensuring that there are suitable permanent post-training posts Some staff are sceptical of the new role Some consultants are unwilling to act as supervisors due to the time commitment
Advice for others	 Understand why you need the new role Engage with stakeholders from the very beginning (local HEE office, executive board, staff) and ensure buy-in at all levels Use clinical champions to cement support

"I had three consultants who couldn't decide what was wrong with this patient and [the ACP] nailed it." (Senior manager, acute trust)

"[A simulation trainer] said that it was really clear that the [ACPs] were nurses because on top of the good assessments that they were doing they also had that caring aspect to the role, which is good." (Nurse consultant, acute trust)

Help to address medical workforce shortages and associated locum costs

Advanced practitioners can safely substitute for doctors for a range of conditions and settings. In primary care, advanced nurses can manage chronic disease, undertake preventative health care and provide first care contact for patients with minor illness to the same standard as GPs (Sibbald, 2008; 2009). The Heart of England NHS Foundation Trust built a business case for the development of the ACP, which showed that investment in ACPs would be a means to reduce high medical locum costs.

Professional continuity

Unlike junior doctors, ACPs do not tend to rotate throughout the hospital, which means they bring a sense of continuity to a department. They are also there to manage the department on a day-to-day basis when junior doctors are unavailable. One site we spoke to had used ACPs to reduce the need for agency or locum staff, which has also improved continuity and removed the need for ongoing organisational 're-learning' as staff move on.

New career opportunities and improved staff satisfaction

The ACP role allows nurses and paramedics to advance through the career framework, while maintaining face-to-face contact with patients. For many, that is a key attraction of the role and helps to retain staff. Garry Swann, manager of ACPs at the Heart of England NHS Foundation Trust, described the ACPs as very loyal, perhaps because there are few opportunities for them to have such a fulfilling role elsewhere.

"To progress in the ambulance service it takes you away from the patient, it's very limited, it's more managerial... rather than being with the patient... I wanted to go into this role to remain with the patient." (Advanced clinical practitioner, acute trust)

"One of the problems in nursing is you have to decide your path... you get to a certain level, which is sister, and if you want to go any further you go into management, which is behind closed doors, not with the patient... for me, I certainly didn't want to not be with the patient." (Advanced clinical practitioner, acute trust)

Improved learning and development opportunities for other staff

An evaluation of implementing ANPs found that they had a positive effect on other staff they worked with, improving the confidence and competence of junior doctors and sharing knowledge with ward nurses (McDonnell and others, 2015). This is supported by other evidence, which suggests that middle-grade non-doctors can enhance the experience and training of medical staff (Dalby, 2015).

Box 5.1 sums up the opportunities offered by advanced roles.

Box 5.1: Summary of the opportunities offered by advanced roles

- Improved patient access and experience
- Help to address medical workforce shortages and associated locum costs
- Professional continuity
- New career opportunities and improved staff satisfaction
- Improved learning and development opportunities for other staff

Challenges

Funding training

Costs for ACP training programmes tend to be high, and little attention has been paid to how they could be reduced (Miller and others, 2009). Most we spoke to felt that external funding from HEE or other bodies may be required to support the development of advanced roles. The case study from Sheffield showed that the training and backfill cost for 60 ACPs was over £4 million. In addition, the trust needed to release senior clinical time for supervision and develop the supporting infrastructure for the advanced practice faculty.

Lack of a national regulatory or competence framework

As we found for many of the extended roles, there is no national competence framework or protected title for advanced roles. As a result, training for the roles varies and it can be unclear to a new employer, if someone wants to change jobs, what they are qualified to do.

Research has also found a lack of clarity around the advanced practitioner role and that many roles lack job descriptions (Miller and others, 2009).

"It does feel to me that [the ACP title should have] some level of protection...
[particularly because in] primary care, some of the people they call advanced
practitioners I wouldn't describe as advanced practitioners... we're still in territory
where, frankly, you could just make it up as you go along." (Senior manager, acute trust)

May deplete other parts of the workforce

Staff working in advanced roles may deplete the senior levels within their source professional group, unless there is ongoing training to fill these roles. If they are to be successful the roles need to be seen as part of an overall career ladder that ensures appropriate succession planning, so that as staff move up there are others to take their place. The current workforce shortages in nursing are likely to make this difficult.

Independent prescribing for paramedics

ACPs from a paramedic background are not able to prescribe independently, although this is currently under review by the non-medical prescribing board. Some of the sites we spoke to were enabling paramedic ACPs to prescribe from a very large Patient Group Direction (PGD) (an agreed medication to treat particular patient groups which does not require individual prescriptions). However, the PGD cannot cover everything and paramedic ACPs still run into problems when dealing with complex patients who require multiple prescriptions.

Professional resistance

There is a long history of medical resistance to advanced roles, although as junior medical workforce shortages grow, this may fall. In the past, doctors have expressed concern about:

- potential overlap in scope of practice and that their own jobs would be eroded
- legal liability in cases of malpractice
- whether advanced practitioners possess the necessary skills to meet patient need (Delamaire and Lafortune, 2010).

The lack of standardisation and clarity around advanced roles often fuels this resistance (Miller and others, 2009).

"When we started, doctors were very afraid of us because they thought we were there to take their jobs away from them." (Advanced clinical practitioner, acute trust)

Box 5.2 sums up the challenges for advanced roles.

Box 5.2: Summary of the challenges for advanced roles

- Funding training
- · Lack of national regulatory or competence framework
- · May deplete other parts of the workforce
- Independent prescribing for paramedics
- Professional resistance

Box 5.3 lists some useful resources for implementing advanced practitioners.

Box 5.3: Useful resources for implementing advanced practitioners

- Advanced Practice Framework (Health Education Yorkshire and the Humber)
- General Practice Advanced Nurse Practitioner Competencies (Royal College of General Practitioners)
- Emergency Care Advanced Clinical Practitioner Curriculum (Royal College of Emergency Medicine and Health Education England)
- Advanced Nurse Practitioners: an RCN guide to the advanced nurse practitioner role, competences and programme accreditation (Royal College of Nursing)
- Framework for Advanced Nursing, Midwifery and Allied Health Professional Practice in Wales (NHS Wales)
- Advanced Nursing Practice Toolkit (NHS Scotland)

Conclusion

Advanced practice roles offer opportunities to improve clinical continuity; provide mentoring and training for less experienced staff; offer a rewarding, clinically facing career option for experienced staff; as well as fill in gaps in the medical workforce. The roles can be developed relatively rapidly, in around three years.

However, developing advanced roles can be expensive and if done at scale will require trusts to develop a strong supporting governance structure. This could be hard for smaller trusts. Even though there may be a case to 'invest to save', if advanced roles are a means to reduce high spend on locums, the current financial climate, with curbs to trust expenditure and the anticipated cuts to HEE budgets, presents a major challenge to progress. There are also problems with the current regulatory framework. The absence of protected titles or a clear national competence framework opens up clinical governance risks, and is likely to inhibit advanced roles' portability and sustainability.

6. Physician associates

Definition

A physician associate (PA) is a 'dependent' health care professional who has been trained in the medical model and works with supervision of a doctor or surgeon'. There are a variety of terms used to describe PAs, but 'physician associate' is used in the UK – in the United States (US) the term used is 'physician assistant'.

Numbers

The role is relatively new to the UK, whereas in the US, PAs have been employed in health care since the 1960s. The first US-trained PAs started working in the UK in the early 2000s. Today there are roughly 250 PAs employed across the UK; HEE has commissioned a further 205 PAs in 2015/16 and 670 in 2016/17 (HEE, 2015). In addition, the National Physician Associate Expansion Programme (NPAEP) has been established to recruit 200 PAs from the US and deploy them to areas where there are no UK-based training programmes. However, this programme is facing difficulties attracting PAs to the UK. The Secretary of State for Health, Jeremy Hunt, has ambitious plans for the role PAs can play in the NHS, announcing in June 2015 that 1,000 PAs will be available to work in primary care by 2020. This would still represent less than 1 per cent of the primary care workforce.

Training

PAs are trained on a two-year postgraduate degree programme. There are fourteen UK universities offering these programmes, with a further nine planned (2016/17 academic year).⁵ Entry criteria vary but generally the requirement is a degree in a life sciences or health care subject. Students typically self-fund their course fees, although some local HEE offices offer funding. Teaching follows the 'medical model', with applied and theoretical medicine and a 50:50 split between didactic and clinical teaching. All PAs must sit the same national examination and have a broad, generalist base to their training.

Clinical supervision

As 'dependent professionals', PAs must practise within a supervised setting, but are not limited by sector or specialty. In order to capture the breadth of their potential use, we have provided case studies below of PAs working in secondary care and mental health. We have also provided a high-level example of PAs working in primary care, drawing on previous work by the Primary Care Workforce Commission.

Despite requiring ongoing supervision, PAs do have a degree of clinical autonomy, especially as they gain experience and trust grows within the team. They have a role in assessing patients, taking a history, performing examinations, undertaking procedures and

^{1. &#}x27;Dependent' in this context means that they work with the supervision and assistance of other clinicians.

^{2.} www.fparcp.co.uk/faqs/

^{3.} http://npaep.com/about-the-project/

^{4.} https://www.gov.uk/government/speeches/new-deal-for-general-practice

^{5.} http://www.fparcp.co.uk/faqs/#

formulating a management plan. They are often employed in roles where they undertake tasks similar to that of junior doctors. They are generally paid at around AfC pay band 7.

Regulation

PAs are not on a statutory register. As such they do not have a protected title and the UK training courses are not accredited. This is in direct contrast to the set-up in the US, where observers note the benefits gained from regulation and the ability of PAs to prescribe (Dalby, 2015).

While there is no statutory regulation, a PA 'managed voluntary register' (PAMVR) exists, which is administered by the Faculty of Physician Associates (FPA), part of the Royal College of Physicians (RCP). The FPA was formed in July 2015 following a collaboration between the UK Association of Physician Associates and the RCP. In order to maintain registration on the PAMVR, PAs must undertake 50 hours of continuing professional development every year (under strict criteria). It is recommended that employers require PAs that they employ to be registered on the PAMVR; however, this policy is not universally adopted.

A full, formal evaluation of the contribution of PAs to secondary care in England was commissioned in 2015, funded by the National Institute for Health Research, and is due for publication in 2018.¹

Case study examples

PAs in secondary care (St George's Hospital)

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce.

Context

St George's University Hospitals NHS Foundation Trust is a large provider of acute and community services in South West London. The associated medical school – St George's, University of London – runs one of the UK's leading PA degree programmes. Due to this close association, St George's employs a large number of PAs and currently has 10 to 15 PAs working across a wide range of departments (from urology to plastic surgery, and haematology to paediatric intensive care). This case study primarily focuses on the neurosciences care group (directorate) at St George's, which has funding for 10 PA posts and until recently employed the second highest number of PAs in the UK.

Timeline

The current PA programme at St George's was relaunched in 2008 following an earlier pilot between 2004 and 2006.

Overview

The decision to recruit PAs was primarily driven by a lack of junior doctors. In addition, a positive personal experience of a PA who rotated through the neurology department on an elective placement led to a decision to hire PAs on a permanent basis. PAs were chosen over other staff, such as specialist nurses, because there was less associated bureaucracy, giving the care group more autonomy and control over how they were employed. However, the trust has found the lack of statutory regulation frustrating, particularly due to the barriers it presents to prescribing and requesting ionising radiation (particularly important in neurology).

"So while they don't do the same on call as SHOs [senior house officers] because they can't replace SHO on calls, they can't prescribe, they can't order... ionising radiation, they can do the SHO tasks on the ward. So they can clerk people, they can take blood, put in drips." (Consultant, St George's Hospital)

The PA's role is to take on tasks traditionally performed by junior doctors. Within the neurosciences care group, PAs attend ward rounds, assess patients and organise aspects of the management plan. They are also able to undertake lumbar punctures, following careful consideration from the consultant body, and there is a view to increasing the scope to include routine outpatient work.

"I'm part of a medical team who assesses, examines, investigates and manages medical problems within the neurosurgery and neurology speciality under the supervision of consultants." (PA, St George's Hospital)

PAs have protected teaching and training on a weekly basis with the care group lead (a neurology consultant), enabling the department to quality-assure the PAs that they employ. An in-house appraisal system has also been developed.

During our research we found that both PAs and senior medical staff were very optimistic about the impact of the programme. Furthermore, PAs were enthusiastic about their role. In particular, it was felt that maintaining general knowledge, thus allowing flexibility and transferability of skills, was a particular advantage of the role. The benefits brought by continuity of care – particularly in an environment where junior doctors frequently move departments – was highlighted, while it was noted that PAs could have a positive impact on the confidence and development of other staff. St George's has carried out a formal evaluation but is planning to submit this for publication and so we are unable to share the results.

Table 6.1 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Table 6.1: Case study summary: physician associates in secondary care		
	Key points	
Impact	 Good feedback from patients and staff, although some existing staff may still hold reservations about the impact of PAs on their own training and work PAs have a high level of job satisfaction and are well regarded by consultants 	
Enablers	 Strong leadership Comprehensive postgraduate training and supervision programme with ongoing governance Strong consultant buy-in Flexibility for PAs to determine their own career paths 	
Barriers	 Concern from existing staff about role erosion and loss of training opportunities An inability to prescribe or request ionising radiation A lack of formal regulation 	
Advice for others	 Think carefully about the role and what you want it to do, ensuring that the two are aligned Choose the individuals wisely Plan how you will thoroughly engage the consultant body as well as staff at all levels throughout the department Implement more than one PA at a time Be proactive and put time and effort into training and development 	

PAs in mental health (Birmingham and Solihull Mental Health NHS Foundation Trust)

For further details, please see separate case study document at www.nuffieldtrust.org.uk/publications/reshaping-the-workforce.

Context

Birmingham and Solihull Mental Health NHS Foundation Trust (BSMHFT) offers a range of mental health services across the West Midlands. As far as we are aware, it is the only mental health trust in England that employs PAs.

Timeline

The trust has been employing PAs since 2011, and there are currently eight PAs in post (Gill and others, 2014).

Overview

The primary drivers for recruiting PAs were large gaps in the junior doctor workforce and issues associated with continuity of care, resulting from junior doctor rotations.

"We considered... the advanced nurse practitioner, which, obviously, a few units have. At the time, we felt the physician associate was a better option for us because they worked in the medical model." (Consultant psychiatrist, BSMHFT)

While a formal role analysis was not undertaken, BSMHFT was clear what it required from any new roles: the ability to perform mental and physical health assessments, take on some tasks previously performed by doctors and provide long-term continuity of care.

"They were basically medical roles... there's a big gap in medical components to the teams, things like physicial examinations... that was an area that the physician assistants [sic] were particularly competent [in]." (Deputy medical director, BSMHFT)

Senior leadership at the trust spent time understanding the training that PAs undertake and visiting universities in the US to explore whether or not PAs would be a good fit. They were impressed by the 'medical model' of training and felt that it was in line with their requirements.

PAs at BSMHFT are provided with ongoing training, particularly in mental health as the trust is very keen to develop their knowledge and skills in psychiatry. They can attend teaching for the core trainee doctors. A major facilitator in being able to provide the PAs with ongoing support and training was the size of the organisation and existing teaching structures already in place. Additionally, PAs have regular, ongoing, clinical supervision with a consultant psychiatrist and have the opportunity to discuss clinical problems and address personal concerns in a formalised manner.

A pilot study was performed prior to full implementation of the role – the five PAs hired in the pilot study were well received and were seen to be working effectively despite initial concerns from staff (Ostler and others, 2012). Since the pilot study, a formal evaluation has not been undertaken. However, the PAs we spoke to were extremely positive about their role, as were staff working with them.

Table 6.2 gives a summary of the case study in terms of impact, enablers, barriers and advice to others.

Table 6.2: Case study summary: physician associates in mental health		
	Key points	
Impact	 The pilot study found that PAs were well received, worked effectively and were seen as valuable team members PAs have a high level of job satisfaction and are well regarded by consultants 	
Enablers	 Enthusiasm from consultants – initially doing a small-volume pilot study only with consultants who were keen Help from the University of Birmingham to demonstrate what PAs can offer and to aid with job descriptions and role definitions Supportive team environment 	
Barriers	 Initial resistance and suspicion from some staff An inability to prescribe Inconsistent line management (due to gaps in consultant cover) 	
Advice for others	 Have a clear outline of the role and what it can and cannot do, which everybody has access to and understands Invest in engaging the consultant body Ensure regular clinical supervision for PAs and encourage and foster a peer-support network for the new role 	

High-level example: PAs in primary care

We did not undertake a formal case study analysis of PAs working in primary care. However, recent work performed by the Primary Care Workforce Commission has highlighted the use of this role at Fisher Medical Centre, a semi-rural GP practice covering a population of 14,000 patients in Yorkshire (Primary Care Workforce Commission, 2015).

The practice took on PAs as it was unable to fill a number of GP vacancies. It also faced difficulties in recruiting an advanced nurse practitioner. A positive experience of PAs working in primary care in the US led the practice to employ PAs. The practice originally recruited two PAs from the US before recruiting two further UK-trained PAs. However, the US-trained PAs have now left.

The PAs work closely with the GPs and support chronic disease management as well as urgent same-day appointments. These latter appointments are triaged by the GP on call who then works with the PAs to manage the patients. In addition, the PAs work with local care homes in an initiative to provide proactive care and education for care homes.

The practice was aware that patient buy-in to the new role was important and worked with its patient participation group to raise awareness. It also used direct correspondence and the local media, ensuring that those patients seen by PAs knew what the role was and what they could expect.

Fisher Medical Centre has been impressed with the PAs, praising their communication skills and how they have integrated into the practice team. Each PA takes up to 21 routine appointments a day, equivalent to 315 appointments a week or 13,860 appointments a year. Patients have been enthusiastic about the new role and the practice is in the process of collecting formal feedback from patients.

Summary of the evidence

Opportunities

Professional continuity

PAs are employed on a longer-term basis than junior doctors and are not subject to frequent rotations, leading to consistency that can benefit patients as well as other staff. They also have a broad knowledge base and are required to re-sit general examinations every five years, making them flexible workers able to apply their general medical knowledge to a wide range of clinical situations – as evidenced by our case studies.

"I think they have definitely filled a gap, particularly in terms of continuity of care... they are much more likely to provide that than the junior doctors are now." (Consultant, mental health trust)

Help address medical workforce gaps

With appropriate supervision, PAs are able to perform a number of tasks traditionally done by junior doctors (senior house officer grade) in hospitals and GPs in the community (Drennan and others, 2015; Farmer and others, 2009; Parle and others, 2006; Ross and others, 2012). PAs can therefore help to fill workforce gaps, although their current inability to prescribe and order tests is a major limitation. They may offer economic benefits depending on how their role is designed (Farmer and others, 2009).

Attract a new and motivated workforce

The PA is a role that is attracting passionate and skilled science graduates and could be viewed as an important vehicle to attract talent into the NHS. PAs have impressed those who have worked with and supervised them.

"By and large they're bright people and by and large they're enthusiastic and committed because they're a bit older, they've already done a first degree and it's often a positive choice to come and do it... so by and large I've been impressed with them." (Consultant, acute trust)

Improve learning and development opportunities for other staff

Our research suggests that PAs can contribute to the learning and development of other staff members – both by directly teaching and instructing but also by providing a service presence to liberate medical trainees' time for educational activities. This may be particularly pertinent for surgical specialties where trainee surgeons are required to perform a certain number of operations within constrained working time.

Box 6.1 sums up the opportunities offered by PAs.

Box 6.1: Summary of the opportunities offered by physician associates

- Professional continuity
- Help address medical workforce gaps
- Attract a new and motivated workforce
- Improve learning and development opportunities for other staff

Challenges

Lack of statutory regulation

As discussed earlier in this chapter, PAs are not regulated, although they can join the managed voluntary register. However, a lack of statutory regulation creates barriers for PAs around prescribing and requesting ionising radiation. This can limit the ability of PAs to work autonomously without the presence of a senior doctor and may affect their feeling of connectedness with the team.

Small numbers of PAs

There are around 250 PAs currently employed throughout the UK and, while there are plans for this to increase (HEE, 2015), there will be an associated lead time. Strategies to recruit PAs from the US have proven challenging and expensive and recent reports suggest that NPAEP has only managed to recruit small numbers (Matthews-King, 2016). Even if the government's ambitions to increase the numbers of PAs are realised, they will still represent a comparatively small proportion of the overall health care workforce.

Lack of peer support

A lack of peers can be a challenge for PAs themselves who, like many staff in new roles, may benefit from peer support networks. Small overall numbers may also mean that existing staff are not aware of what PAs are able to offer, potentially leading to misunderstanding, suspicion or anxiety about job 'replacement'.

Require investment in ongoing training and supervision

PAs train for two years after graduation with a science degree and are defined as 'dependent practitioners'. Ongoing professional support is therefore extremely important.

"I interviewed quite a few PAs for our posts, and there have been some... working in general practice. After a couple of weeks in general practice they have felt that they were now independent practitioners... but they don't know what's going on in the literature, they don't know guidelines and they are not really having any supervision." (Consultant, acute trust)

While PAs self-fund their training in the majority of cases, there is a financial cost associated with postgraduate development and both of our PA case study sites had invested substantially – in terms of teaching programmes and senior clinician time – in ongoing training.

Lack of a formal career path

Developing an interesting and sustainable career path for PAs presents a considerable challenge. While PAs currently enjoy working in a service provision role at SHO (junior doctor) level, the extent to which they will wish to do this for the long term needs careful consideration.

"Longer term, I don't know where the role is going... I think it's very early stages to know where the role is going." (Consultant, mental health trust)

However, PAs have been employed in the US for a number of decades and there may be cause to be more optimistic about the potential of creating sustainable careers for PAs in the NHS. HEE is currently reviewing the career framework of the PA.

"I would have thought, as an independent role, it had huge potential and certainly at the outset there's no more reason it should have less variety, stimulation, opportunities for development and research as any other medical role. So potentially it's a viable and sustainable role as has been seen in other countries where they've been used." (Harriet Gordon, Director, Medical Workforce Unit, Royal College of Physicians)

Box 6.2 sums up the key challenges for the PA role, while Box 6.3 lists some useful resources for implementing PAs.

Box 6.2: Summary of the challenges for physician associates

- · Lack of statutory regulation
- Small numbers of PAs
- · Lack of peer support
- · Require investment in ongoing training and supervision
- · Lack of a formal career pathway and career development

Box 6.3: Useful resources for implementing physician associates

- Curriculum and Competence Framework for the Physician Assistant
- Matrix Specification of Core Clinical Conditions for the Physician Assistant by Category of Level of Competence (Department of Health)
- Faculty of Physician Associates website (Royal College of Physicians)

Conclusion

PA training provides a relatively rapid route into the NHS for graduates keen to take on a clinical role and opens up a new workforce pool to the NHS. Those who we interviewed, both PAs and those who worked with them, spoke with enthusiasm about what the role can offer.

However, it is important to put the role into perspective. The potential numbers, in the immediate future, are relatively small. Their impact is also limited by the lack of a regulatory framework, which prevents PAs from independently prescribing and ordering tests. There is a danger that employers will see newly graduated PAs as a fully formed solution, able to slot into doctors' rotas. This is not the case – PAs study medicine for two years only and require postgraduate education, training and development. Finally, we believe that too little consideration has been paid to the career pathway of PAs. While it may be possible to create varied and fulfilling roles for PAs, both national and local conversations about how to ensure sustainability are crucial to the development of this profession.

7. Summary of the opportunities from developing the non-medical workforce

The evidence from the literature, our case studies and those we interviewed shows that there are considerable potential benefits from developing and reshaping the non-medical workforce, both professional and non-professional.

More patient-focused care

At its heart, any role redesign should begin with patient needs – what are those needs and how can a new or developed role better meet them? Our work found roles that aimed to meet patients' needs more comprehensively than in the past, such as the holistic worker developed by Nottingham CityCare. We also found that roles were designed to meet previously unmet patient needs such as the community navigator and the Bradford assistant practitioner.

Improved quality of care and outcomes

New and extended roles can also improve the quality of care and outcomes. For example, in intermediate care settings, higher proportions of support workers can improve the quality of care and patient outcomes. In primary care, pharmacists and nurses can improve outcomes through improved chronic disease management and medication adherence. In acute secondary and mental health care, advanced roles can improve access to care and reduce the use of hospital care.

Improved team working and support

Advanced clinical roles and PAs are long-term, not short-term appointments. As a consequence they provide greater continuity for the teams they work with and reduce the need for constant organisational re-learning as junior doctors and others move on. They can also provide support and learning for the medical and other staff they work with – both by educating them directly and by staffing the wards to allow them the freedom to attend training sessions.

Better use of resources

In some settings, such as in radiology and primary care, greater use of support staff can be a cost-effective way to expand service capacity. Empowering every member of staff to practise at the top of their licence means that more can be done with every patient interaction, leading to a more efficient use of resources. Use of experienced non-medical staff such as physiotherapists can also be a lot more cost-effective than using a doctor in training. However, as discussed in Chapter 8, it requires careful role and service redesign to maximise the cost benefits.

Help address workforce gaps

New and extended roles can alleviate pressure on existing staff and help address workforce gaps. Where organisations face large agency costs, this can result in cost savings.

New and more rewarding career pathways

Developing the support workforce through the 'skills escalator' model provides new pathways into the health care workforce, and can provide an attractive career framework for those entering the NHS at a young age. Similarly, continued learning and professional development through extended and advanced roles can lead to improved job satisfaction. Advanced roles also offer career advancement while maintaining patient contact. Finally, the PA role provides a new entry route into the health care workforce for talented science graduates, who are generally very motivated and satisfied with their role.

8. Summary of the risks from new and extended roles

New and extended roles may not always achieve the desired outcomes. There is strong evidence that without careful role and service redesign, new and extended roles can:

- increase demand and service costs
- supplement rather than substitute for other staff
- cost rather than save
- threaten the quality of care
- fragment care.

Increase demand and service costs

Where new or extended roles are used to provide an enhanced service, rather than manage the existing workload, demand may increase. For example, GPs with a special interest in providing minor surgery within primary care may encourage the treatment of patients who would not otherwise have been treated or who would have only made a minor impact on hospital workload (Kernick, 2003).

Supplement rather than substitute for other staff

New roles are often expected to substitute for existing staff, thereby reducing demand on existing resources and in some cases saving money. But this will only happen if existing staff stop performing the tasks that have been delegated to others, ensuring that new extended roles are genuine substitutes rather than complements (Bohmer and Imison, 2013).

Cost rather than save

The importance of the senior workforce cannot be underestimated. Substituting senior staff for cheaper alternatives has historically been used to reduce costs. But those in new or extended roles may take longer to complete tasks, spend more time with patients, recall them at higher rates and carry out more investigations than their senior counterparts (Bosley and Dale, 2008; Delamaire and Lafortune, 2010; Dubois and Singh, 2009; Walsh and others, 2005). Long-term cost evaluations are needed.

Threaten the quality of care

Higher numbers of senior staff are often associated with better patient outcomes. For example, evidence shows that a higher proportion of registered nurses contributes to improved patient outcomes, including reduced hospital-related mortality, length of stay, rates of urinary tract infection, upper gastrointestinal bleeding, hospital-acquired pneumonia, shock or cardiac arrest and failure to rescue (Esparza and others, 2012; Hendrix and Foreman, 2001; Kane and others, 2007; Lankshear and others, 2005; Needleman and others, 2002). This means that the configuration of teams needs to be thought about carefully and tested through small, local pilots.

Fragment care

Large, multidisciplinary teams that divide tasks by role and discipline have the potential to fragment care. This means that the patient has to see multiple professionals along their care journey, and staff must spend increasing amounts of time conferring with each other to coordinate care – thereby increasing costs. Evidence shows that for each additional practitioner caring for a patient, costs increase (see Bohmer and Imison, 2013). Up-skilling staff to be able to carry out a range of tasks along the patient pathway can enable a more holistic approach to care.

How do you reshape the workforce? Lessons for local leaders

We have identified 10 important lessons for organisations seeking to redesign their workforce. These are:

- Be realistic about the time and capacity needed to support change.
- Create a receptive culture for change.
- Support transformation with a strong communication and change management strategy.
- Build roles on a detailed understanding of the work, staff skills and patient needs.
- Invest in the team, not just the role.
- Ensure robust triage mechanisms.
- Develop and invest in a training capability.
- Build sustainability for new and extended roles.
- Evaluate change.
- Adopt a systematic approach to workforce development and change.

Be realistic about the time and capacity needed to support change

It takes time, investment and skill to reimagine the workforce and successfully implement change. Implementation can be particularly time-consuming; organisations that have successfully transformed their workforce have often embarked on long, multi-year journeys.

"[T]he transformation of our nursing team has probably happened over the last eight to ten years, developing the career structure, developing the training capability, ensuring that we can grow our own nurses." (GP partner)

However, when services and resources are stretched, investment in workforce or service redesign can be threatened, even though it will result in a more sustainable workforce and service in the long term. The message from our work is that reducing that investment is short-sighted. However, there is no reason to reinvent the wheel; there is a lot of good practice to learn from. Make the most of tools such as Skills for Health's library of proven 'new role templates' and look at what other organisations are doing.

"Somebody somewhere else has probably found a solution to your problems. It's just a case of finding it." (Medical director, acute trust)

Create a receptive culture for change

Skill-mix change requires a culture of innovation and strong organisational support.

"We encourage people to innovate and develop. So there is an internal mechanism and we run a very empowered decision-making process in clinical business units who are not completely autonomous but have a lot of power in decision-making about how they evolve and develop their staff for the various functions that they deliver on an operational basis." (Medical director, acute trust)

Clinical champions can help to advocate change and communicate the benefits to other clinicians.

"We had a really good lead consultant who said... I'll take responsibility for talking to my colleagues about the impact of us not having SHOs... and the fact that we need to do something." (Manager, acute trust)

Support transformation with a strong communication and change management strategy

"Ensure that... the change that you're projecting is going to be one which is... acceptable, not just to you and your patients, but more widely, across the system, because it's surprising how something that may be obvious in one environment is not understood or considered in another." (Professor John Howard, General Practice Dean, Health Education East of England)

Introducing a new or extended role can require a significant cultural change. A strong communication and engagement strategy is needed to inform employees and patients about the new role. This should articulate what the role can and cannot do, the functions it is serving and how it fits within existing team structures. It may be necessary to challenge current ways of working.

"At one point, we were asking our practice nurse to organise the referrals into hospital. Well, she couldn't because people wouldn't talk to a nurse: they'd only talk to a doctor." (Professor John Howard, General Practice Dean, Health Education East of England)

The change management strategy needs to encompass everyone working with the new role, not just employees working in close proximity. This can be challenging, but targeting existing networks can help with this.

"The professional networks to get the buy-in are extensive; it means working with colleges, it means working with providers. It's about engagement... You have to have a good message and you have to have methods of getting it across. It's no good just sending someone an email." (David Wilkinson, Postgraduate Dean, Health Education England working across Yorkshire and the Humber)

Build roles on a detailed understanding of the work, staff skills and patient needs

"Ensuring the teams have the skills they need to do the job... begins with identifying what the task of the team is and then the next step is identifying what skills are needed in order to enable a team to deliver that task. So it begins with the task and not with the people or with the role." (Michael West, Head of Thought Leadership, The King's Fund)

When redesigning the workforce, organisations need to begin with an in-depth understanding of patient needs and the skills and competences required to meet those needs, both now and in the future. Functional analysis can help an organisation to take a dispassionate view of service need (Skills for Health, 2015b). Using competency frameworks and tools such as Skills for Health's National Occupational Standards to match service need to roles will also help. Projections, benchmarking and scenario analysis can be useful in thinking through future need (Skills for Health, 2015b).

"If what you need at two o'clock on a Sunday morning is somebody who can change a catheter, that's what you need; you don't necessarily need a nurse." (Mark Purvis, GP Director, Health Education England working across Yorkshire and the Humber)

Building jobs based on competencies rather than traditional professional roles will also mean that people can be recruited from a wider pool of practitioners rather than just the nurse pool, for example. However, competency-based approaches require a note of caution.

"There was a time in the '90s when consultancies were going into hospitals and making task lists and thinking about how they could be redistributed. Remember, consultants said bed baths were menial tasks and that nurses should never do them. But in the hands of a skilled nurse a bed bath is a diagnostic, therapeutic exercise. It's not just washing the patient." (Seminar participant, The King's Fund)

This caution does not mean that a competency-based approach should be avoided. It means that when considering alternative roles to deliver care, small, local pilots are needed to make sure the new approach is the best way to address patient needs.

Invest in the team, not just the role

"You have to have the basics of teamworking in place in order that introducing the role... will be effective because it's like planting seeds in barren ground if you are introducing new roles... into teams that don't have objectives or don't review performance or are not clear about roles and tasks." (Michael West, Head of Thought Leadership, The King's Fund)

The quality of teamwork is directly and positively related to the quality of patient care, staff wellbeing and innovation in health care (Borrill and others, 2000).

The fundamental requirements of an effective team are (Borrill and others, 2000):

- strong team leadership
- clear objectives that are transparently linked to tasks
- clear roles and responsibilities for every team member (Vrijhoef and Thorlby, 2016)
- regular meetings to review performance and identify opportunities for improvement.

Without these elements, skill-mix change will not work. Team aims and objectives also need to be supported by organisational culture. If the stated team objective is to improve patient care, but the organisation appears to be focused on financial savings, team dynamics can come under threat.

Interpersonal team dynamics often contribute to the team's overall effectiveness. This means that team leaders should be mindful of recruiting suitable personalities in addition to skills and cognitive ability (McCallin and Bamford, 2007; Neuman and Wright, 1999).

Ensure robust triage mechanisms

It is vital to ensure that patients are correctly triaged so that the correct professional sees a case that is appropriate for their skills and that there is clinical supervision. Without this, patient safety could be compromised.

"Somebody who'd had a knee replacement could be managed by an appropriately trained assistant physiotherapy practitioner post-operatively...[but] if that service user actually had an artificial leg on the other side, had dementia and was foreign speaking, obviously then the physiotherapist would still keep that case." (Physiotherapist)

Develop and invest in a training capability

Training requirements for the health and care workforce are diverse. Some roles (for example, ACPs) will require on-the-job training and supernumerary status, while others will arrive fully trained, only in need of continuing professional development. If roles require bespoke training then partnerships with training providers, particularly higher education institutions, will be very important.

"You absolutely need to be working in partnership with [higher education institutions]. For instance, I wouldn't have been able to negotiate their entry criteria [without that partnership]." (Senior manager, acute trust)

"There were times when we realised that one of the modules... didn't really cover as much as we needed, so we worked with the university... they've been really, really helpful." (Manager, acute trust)

Large organisations may be at an advantage in delivering robust training and education. It means that a formal infrastructure can be put in place at scale, with dedicated education and training roles.

Build sustainability for new and extended roles

Creating clear career pathways is an important mechanism to ensure the long-term sustainability of new and extended roles and ongoing recruitment and retention of staff. An example of this is the 'skills escalator', which provides clear structure for progression, based on the attainment of new competencies. By developing pathways for progression, opportunities are created to fill workforce gaps at every level as new staff constantly move through the process.

"[Our career structure] is absolutely a really good recruitment tool... young people now have completely different career aspirations... and they want to be able to see a career trajectory." (Chief nurse, acute trust)

"We do attract... staff from up and down the country, there is a disproportionate amount of graduates seek to come to [us]... we are an attractive employer because we have the career framework." (Chief clinical officer, ambulance trust)

Conversely, if new and extended roles are created to meet a specific workforce demand without any thought as to the ongoing development of staff, it is unlikely to lead to an effective long-term solution.

"We stopped our [assistant practitioner] programme because there was nowhere to go with them, and we were training people... without a reasonable career pathway or progression." (Chief nurse, acute trust)

Finally, if staff are given additional skills or employed at an advanced level it is important that the role and function they perform within the organisation also change. For example, SECAmb has experienced challenges retaining its qualified paramedic practitioners who can feel that they are not given opportunities to use their higher level of training. Many PPs are subsequently leaving to work in GP practices where they feel they are more able to use their skills in chronic disease management.

"We've got to find out why [PPs] are leaving and initially we thought it was because they were offered more money and they are offered more money in primary care, but I think it's more to do with the fact that they're used more correctly than we use them. By that I mean they see more patients, they use more skills." (PP coordinator, ambulance trust)

Evaluate change

Organisations pioneering the use of new and extended roles have not, on the whole, thoroughly evaluated their impact. Most of the evidence is anecdotal in nature, lacking objective measurements and is not peer reviewed. Organisations should formally evaluate the impact of any new role to ensure that it is delivering the benefits anticipated and builds wider confidence in new ways of working. The Care Quality Commission would be willing to consider innovative workforce approaches, provided they are supported by evidence.

"Make sure your evidence base is strong, so why are you doing it, make sure that it is absolutely based on patient need... get your evidence right... there is enough evidence out there to build the case for a pilot with a regular cycle of evaluation." (Ellen Armistead, Deputy Chief Inspector of Hospitals, Care Quality Commission)

Adopt a systematic approach to workforce development and change

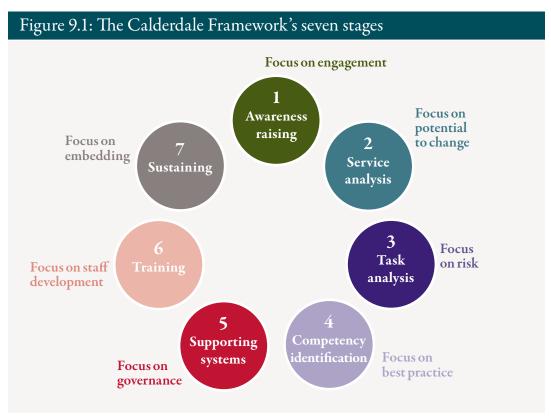
Organisations attempting to redesign their workforce should do so systematically and comprehensively. This will help to ensure that:

- new and existing competencies align with patient need
- appropriate supporting structures are in place
- necessary resources are given to change management.

Workforce planning tools can help with this. One such tool is the Calderdale Framework (see Figure 9.1 on page 62).

The framework sets out seven steps for effective skill-mix change (for more information on these steps, see Smith and Duffy, 2010):

- 1. Awareness raising
- 2. Service analysis
- 3. Task analysis
- 4. Competency identification
- 5. Supporting systems (for example, governance structures)
- 6. Training
- 7. Sustaining.



Source: www.calderdaleframework.com/the-framework/

Evaluations of the Calderdale Framework have demonstrated that it is able to facilitate the implementation of new and extended roles (Nancarrow and others, 2013). It is also associated with more effective and efficient use of new and extended roles, role flexibility, career development and role sustainability (Nancarrow and others, 2012).

The founders of the Calderdale Framework offer training, materials and ongoing support for managers hoping to use this system for the implementation of new or extended roles (see www.calderdaleframework.com).

A second tool is Skills for Health's 'Six Steps Methodology to Integrated Workforce Planning', which suggests the following steps (for more information on these steps, see Skills for Health, 2015c):

- 1. Defining the plan
- 2. Mapping service change
- 3. Defining the required workforce
- 4. Understanding workforce availability
- 5. Planning to deliver the required workforce
- 6. Implementing, monitoring and refreshing.

Plymouth Primary Care Trust was the first primary care trust to use this methodology when it introduced workforce planning across the whole organisation in 2007, which it found helpful.

"Using the Six Steps model, which has user-friendly tools, managers were able to see what they had in terms of workforce, what it cost and what they would need in the future. The guide gave us something we could use to benchmark and we developed a staged approach." (Assistant Director of Workforce Development, Plymouth Primary Care Trust; Skills for Health, 2015c, p. 43)

There are similarities between the two tools. They both emphasise the importance of:

- understanding exactly what is needed from the new workforce
- ensuring that the right competencies are in place
- evaluating change to guarantee sustainability.

These are the fundamental principles of success.

Recommendations for boards

The scale of the workforce development challenges means that every NHS organisation will need to 'up its game' around workforce development and planning. In this chapter we identify some of the key actions that can support this.

Workforce development

Workforce development is fundamental to delivering safe and effective care, and realising the vision set out in the Five Year Forward View (NHS England, 2014). It should be a major investment priority for boards in their sustainability and transformation plans. Developing the support workforce, empowering existing staff to take on new responsibilities and investing in advanced roles, all provide opportunities to redesign service delivery. But, successful skill-mix change will require investment to deliver.

Recommendation

Ensure that workforce development (properly resourced) is a central part of the local sustainability and transformation plan.

Dedicated senior leadership and staff

Boards need to ensure that there is dedicated senior leadership for workforce development and planning. Boards also need to ensure that managers on the ground have the necessary time and capacity. This could be through dedicated roles for workforce development or through building protected time and new responsibilities into existing roles.

"None of this will work if you don't have that [senior] level of support, it's too big to try and do from the bottom up." (Manager, acute trust)

Recommendation

Provide dedicated senior leadership and staff with protected to time to support workforce development and planning.

Governance structures and supporting systems

Boards need to ensure strong governance frameworks for new and extended roles. This may include new organisation-wide structures, such as a workforce and education committee that reports to the main board, if this was not in place previously. Governance should ensure appropriate clinical and managerial scrutiny of all new job descriptions and competency frameworks. There also need to be mechanisms to ensure that staff in new and extended roles are appropriately trained and supervised. Where roles are not regulated and employees have not undertaken extensive training, close supervision is even more important (McDonnell and others, 2015). Supervision should include not only regular meetings between staff and their supervisors but also opportunities and encouragement to seek more expert advice on clinical issues, at any time.

Recommendation

Put in place strong governance structures and supporting systems, including supervision of new and extended roles.

Culture of support

Senior leaders need to empower managers to seek opportunities for change and try new approaches. While boards should be focused on significant workforce developments, middle managers should have the freedom and autonomy to manage the new approach, and the flexibility to adapt it if it is not working as well as it could.

Recommendation

Create a culture of support for experimentation and change.

Links with key stakeholders

Boards should form relationships with those involved with workforce development in their local community and beyond. HEE is working across England to support employers in reimagining how their services are delivered through informational resources and financial assistance. It is essential to work closely with HEE and make the most of the support it can provide. It is also important to build relationships with local higher education institutions. Being able to shape training for new and extended roles, and ensure that it meets the requirements of the organisation, is a fundamental enabler of successful workforce change.

Recommendation

Cultivate links with key stakeholders.

11. Recommendations for national bodies

The hard labour of workforce redesign is done at a local level. This is also the primary source of innovation. But if we want to deliver the scale of workforce change needed, safely and sustainably, active support is needed from national bodies.

As well as the short- to medium-term actions we describe in this chapter, there are some who argue that a more root-and-branch review of the workforce and the current professional demarcations is needed. Future services will require a workforce that is much more flexible and adaptable.

"If we just set the bits that are unique about each profession, left the rest open so you could drop into them or could replace them with a higher grade in skill mix in nursing or bring pharmacy in, we would have a better chance of moving things forward." (Professor Keith Willett, Director for Acute Episodes of Care, NHS England; seminar participant)

Investment in national workforce planning and training

Developing staff to undertake new and extended roles and giving staff the necessary workforce planning capabilities, require funding for training and to backfill posts. The current financial context makes it hard, if not impossible, to find those monies within local budgets. It is striking how many of our case studies have been facilitated by funding from HEE. The proposed cuts to the HEE budget put this funding at risk. These cuts are short-sighted and counterproductive. They will undermine the capacity of the NHS to develop the new models of care anticipated in the *Five Year Forward View* (NHS England, 2014). We also heard concern that the loss of HEE's control of the budget (through staff bursaries) for non-medical training and the loss of the Centre for Workforce Intelligence were contributing to a progressive erosion of national workforce planning skills and capacity. As we highlighted at the beginning of this report, creating a sustainable training pipeline is a critical part of the overall workforce strategy.

Recommendation

The HEE budget and specialist workforce planning expertise should be protected, including ring-fenced monies to support local workforce redesign.

More consistent nomenclature and national competence frameworks

There are no national guidelines for the naming of new and extended roles. The consequence is a bewildering array of titles, many using similar terminology (see Figure 11.1) but describing very different roles. This is confusing for staff and patients. It also acts as a barrier to staff mobility.

In addition, there are few national competency frameworks for new and extended roles. An exception is the new framework developed between HEE, RCN and the Royal College of Emergency Medicine for the emergency care ACP (RCEM, 2015). This includes an agreed curriculum and a credentialing process managed by the Royal College of Emergency Medicine. This is a model that could usefully be used in other areas – for example, the use of paramedics and other staff in general practice to provide urgent care.

Figure 11.1: Examples of terminology for new and extended roles

Allied Health Professional Advanced Practitioner

New Therapy Assistant roles

Associate Practitioner

Assistant Practitioner in neonatal services

two roles were develped: a Level 5 Wellbeing Coordinator which manages the development and evaluation of the scheme, and client intervention; and a Level 4 Wellbeing Coordinator, which involves only client intervention

Introducting advanced practitioners in its orthopaedic assessment service resulted in dramatic benefits for NHS Dudley

New neonatal support worker role

Advanced Level Practitioner role

Band 4 Role of Assistant Practitioner for cancer care and palliative care

Senior Support Health Worker

new Level 3 Community Navigator role

Community hospice creates Therapy Assistant role to meet growing demand developing the role of the Acute Coronary Syndrome Nurse

Recommendation

We understand that HEE is planning to develop national competency frameworks for staff in extended and advanced roles. We would encourage them to see this work as a priority.

Professional regulation

Professional regulators can simultaneously be seen as the 'source of all our ills' and the 'solution to all our problems'. On the one hand, people lament the current professional demarcations and inhibitions, for example around prescribing. On the other, they seek professional endorsement and safeguards from regulators, for example for those in the support workforce taking on clinically based roles. There are significant issues too arising from frequently held misconceptions around regulation and what it does and does not permit, and what it does and does not assure.

"People make assumptions about what is in regulations... often false assumptions. A good example is when we wanted to use young people under 18 to work in an area. People said anyone under 18 could not be in direct contact with patients. When asked where is it written down? It was not." (John Rogers, Chief Executive Officer, Skills for Health; seminar participant)

The recent Law Commission proposals¹ offered an opportunity to simplify the current legal framework and give regulators more autonomy to respond to changes in professional practice. These proposals are currently on hold.

Professional regulators have generally been reluctant to recognise and regulate new and extended roles. They point out the limits to regulation and suggest that the safety of practice can be just as well if not better managed through local and system governance arrangements. The problem with this stance is that local and system governance

^{1.} www.lawcom.gov.uk/project/regulation-of-health-and-social-care-professionals/

arrangements are not currently designed to do this. For example, in neither Monitor's (now NHS Improvement) well-led governance framework nor the Care Quality Commission's key lines of enquiry are there questions about the governance and supervision arrangements for new and extended roles, particularly those with clinical responsibilities. This leaves a regulatory gap.

Recommendation

There should be a dialogue between the professional regulators and system regulators to ensure that there is no 'regulatory gap' and that new and extended roles have safe governance arrangements.

Role of sector regulators – NHS Improvement and the Care Quality Commission

In our research we found general concern about the mixed messages on workforce-related issues that can be received from sector regulators. For example, while trusts are being encouraged to think creatively about skill mix and consider new and extended roles, as in the latest NHS planning guidance (NHS England, 2015), there is widespread belief, backed up by some local experience, that the Care Quality Commission will not accept these models.

"I think we're at a turning point with this, a bit of a crisis moment because we are going to have to come up with innovative solutions to solve some of the workforce issues nationally, which necessarily don't fit into a regulatory tick-box environment... So the regulatory system and the inspection system needs to be aligned with innovative ways of service delivery." (Medical director, acute trust)

We spoke to Ellen Armistead at the Care Quality Commission about this issue. She was supportive of creative workforce solutions, providing their safety could be demonstrated:

"If somebody can demonstrate to us that here we are, we've assessed our patient needs, we know that their outcomes will be enhanced significantly by more physio hours and more OT [occupational therapy] hours and here is how we've replaced traditional staffing models with something more innovative, more based around patient need, then I would personally be absolutely delighted." (Ellen Armistead, Deputy Chief Inspector of Hospitals, Care Quality Commission)

Recommendation

HEE should work with NHS Improvement and the Care Quality Commission to ensure that planning assumptions, new workforce models and inspection requirements are aligned and clearly communicated. This may need to include further planning guidance and advice for trusts.

Legal indemnity in primary care

The challenge of getting affordable legal indemnity cover for new and extended roles in primary care was raised as an issue by a number of those we interviewed in our case study sites and elsewhere.

"I think there are massive issues around indemnity. And I know that the ... practice very nearly came unstuck because it hadn't completely bottomed the indemnity arrangements for this new group of workers." (GP practice manager)

"The time and money I spend on looking for indemnity for people that are working for us now... And I've just had a quote for one of my paramedics, who is just as qualified as any of my nurses – worked in the emergency [unit] and managed the unit as an emergency care practitioner, which they don't recognise – seven-and-a-half thousand pounds: more than the GPs." (GP practice manager)

Recommendation

The Department of Health should expedite a review the current legal indemnity arrangements for staff in primary care with new and extended roles.

National and local research and evaluation

We have argued, throughout this report, that the health and social care workforce needs to be better skilled and equipped to deal with the needs of the population it serves. The starting point of all local planning should be an understanding of those needs. Yet at a national level, a deep understanding of patient needs in different settings and the skills and knowledge required to meet those needs is missing.

"We haven't done a workforce review in the NHS in all the time I've been in it, which is 30 years, we haven't relooked at what patients need... we've never really stopped to think about what does the workforce need to look like in terms of managing the acuity of patients with all sorts of different diseases." (Ellen Armistead, Deputy Chief Inspector of Hospitals, Care Quality Commission)

National workforce plans are judged against current and forecast vacancy levels, not current and future population needs. Assessing those needs, and the workforce needed to support them, should be a national research priority.

There is also a worrying lack of evidence about the impact of skill-mix change and new and extended roles. There is no systematic evaluation of new and extended roles at a local or national level.

"There is a risk of spending a lot of money, commissioning new roles without a really good strategic plan about how we commission those in a way that can be evaluated and that will answer the questions about whether those new roles are really needed." (Amanda Howe, GP, Primary Care Workforce Commission, Royal College of General Practitioners)

Recommendation

The underlying needs analysis for, and impact of, workforce redesign should be a national research priority. There should be national guidance and support to enable those developing and implementing new roles at a local level to evaluate their impact.

Spread of good practice

The perennial challenge in the NHS is not the generation of innovative ways of working, but the spread of what has already proved successful. Skills for Health and Skills for Care both have a catalogue of case studies and examples of new and extended roles, but the degree of evidence that supports these, and their impact, is not always clear.

Recommendation

When developing national competency frameworks for extended practice and new and extended roles, HEE should consider how it can support the dissemination of good practice examples.

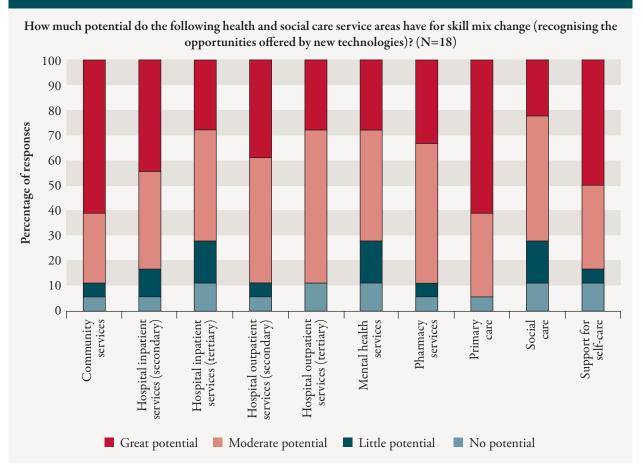
12. What does the future hold?

In this report we have mapped out the potential for skills development and workforce growth in four important segments of the workforce. But what do these changes mean for services? What are the other important trends driving workforce change and what will be their impact?

The implications for services

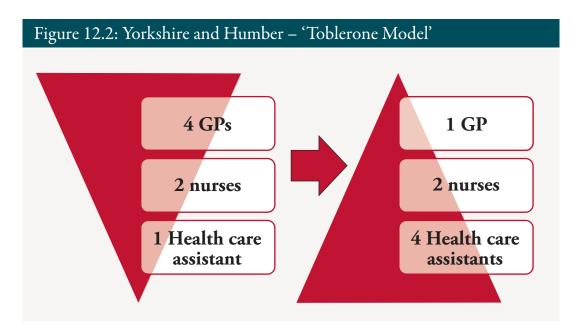
At the beginning of our research we held an expert seminar (for details, see Appendix 1). We asked participants about the scope for workforce change in different areas of service (see Figure 12.1). They saw significant potential in all areas of service, but particularly in primary and community services. Our research supports this early expert assessment.

Figure 12.1: Expert views on the scope for workforce redesign in different service areas



The traditional model of primary care can no longer be sustained. The growing population of people with chronic disease and multi-morbidity requires more proactive, holistic care. In addition, there are simply not enough GPs to sustain the traditional model. In Yorkshire and the Humber, HEE has developed different potential scenarios for future primary care teams – colloquially known as the 'Toblerone' model. It

envisages the potential for primary care to invert the traditional workforce pyramid in which four GPs are supported by two nurses and one health care assistant (HCA), to a 'transformational' model in which one GP is supported by two nurses and four health care assistants (see Figure 12.2).



However, different patient needs and different workforce pressures mean that there will be no one right model for the future primary care team. The Yorkshire and the Humber model also fails to capture the fact that there are significant opportunities to develop a much richer variety of roles in primary care.

Primary care practices will include a wider range of disciplines. As well as GPs, nurses and administrative support, primary care teams may include health care assistants, physician associates, paramedics, allied health professionals, social workers and others. Pharmacists will increasingly become a core part of the general practice team.' (Primary Care Workforce Commission, 2015, p. 12)

Community services are facing significant workforce challenges. The workforce is predominantly made up of nurses, nearly a quarter of whom anticipate retiring in the next five years (Bradby and McCallum, 2014; The Queen's Nursing Institute, 2014). The new models of care are also making new demands on the workforce, as seen in the Nottingham case study. However, there are opportunities to address these challenges through increased use of the support workforce and extended roles. There are also growing opportunities for advanced roles and/or self-managed teams, as in the Buurtzorg Model, 1 to lead care for a defined population or client group.

In mental health services, new and extended roles offer the opportunity to address 'parity of esteem' and care issues, particularly through meeting the long-neglected physical health needs of people with long-term mental health problems. Advanced nursing roles are also being used to improve the quality of urgent and emergency care in the community.

In secondary care, the biggest opportunities lie in using advanced roles for non-medical staff to address medical workforce shortages and support roles to address gaps in the non-

 $^{1. \ \} www.commonwealthfund.org/publications/case-studies/2015/may/home-care-nursing-teams-netherlands$

medical professional workforce, particularly nursing. There are risks in secondary care of 'robbing Peter to pay Paul' – particularly with advanced nursing roles. It is therefore very important that trusts develop a comprehensive workforce strategy that looks at role and career development across all disciplines and all grades.

Staff and teams working across organisational and sector boundaries

As the focus of health care work shifts from episodic to chronic care, and from inpatient settings to community settings, traditional notions of a team as a tightly bounded group located in one place and working on a defined and short-term problem or task are being replaced by a new model of a team. The new team is a loosely aligned group, whose members are often drawn from different organisations, sectors and locations, who come together for short periods of time to solve a set of problems for and with a chronic disease patient in the community. Understanding how to create structures that support loosely aligned and distributed teams, and helping providers to develop the skills needed in the workforce to operate in these teams, may turn out to be at least as important as – if not more important than – redistributing current tasks among old and new professional roles (Bohmer and Imison, 2013). There is also a need to think about how we can create a sense of belonging for staff working across boundaries with no clear organisational 'home'.

Developing skills in staff working outside of the NHS

A number of those we interviewed stressed the opportunities offered by developing skills in staff working outside of the NHS. There are opportunities to develop skills in a wide range of public and community-based services, including housing, education and the fire service. For example, people working in sheltered housing schemes can be given the skills to spot mental health problems in their tenants, signpost to services and refer to specialist mental health services when necessary. Another example is work in Manchester where the fire service has extended its fire prevention work to encompass the broader health and wellbeing agenda through its 'safe and well visits'.¹

Increasing role for volunteers

It is estimated that there are around three million people in England working as volunteers in health and social care, public and voluntary services (Naylor and others, 2013). The support offered by volunteers can improve people's experience of care and support more integrated care. Volunteers can be of particular value to those who rely most heavily on services, such as people with multiple long-term conditions or mental health problems. They can also provide a first line of response. For example, 'community first responders' are volunteers trained to attend emergency calls received by the ambulance service and provide care until the ambulance arrives.

Increasing role for peer support

The use of peer support workers in mental health services has resulted in very positive results. Typically previous service users themselves, there are well-evidenced examples of peer support workers:

- reducing rehospitalisation by 50 per cent (Chinman and others, 2001)
- reducing overall bed days (Lawn and others, 2008)

- improving social functioning (Yanos and others, 2001)
- shortening length of admission (Repper, 2013).

The Mental Health Foundation (2013) suggests that within 20 to 30 years they could make up 50 per cent of the mental health workforce. There is also the potential to save money. One study assessed evidence from the literature and used the data to model overall costs of peer support workers. Based on reduced bed days and peer support workers being paid in accordance with AfC pay band 3, it modelled a cost saving of £8.54 for every £1 spent (Trachtenberg and others, 2013).

Increasing role of self-care

It has been argued that 80 per cent of health care is self-care (Imison and Bohmer, 2013). Yet, to date, the NHS has done relatively little to develop the skills of staff, or provide other support, in order to help patients to improve the management of their own health and care. This is changing. Many areas, particularly in relation to primary and community services, are working to develop coaching skills in their staff. Patient portals, described below, and increasing opportunities for patient—professional telehealth will also help. Developing skills within patients will be an increasingly important part of the workforce challenge.

Impact of technology

Technology, particularly digital technology, has an important part to play in this agenda. It can support staff to work more flexibly, with greater patient focus, and at the 'top of their licence' (Imison and others, 2016). For example, shared electronic health records, accessible across multiple settings, can support care coordination and professional collaboration along the whole patient pathway. In addition, professional-to-professional telehealth enables staff to call on senior advice and expertise, at the point of care. Decision support tools can provide ready access to guidelines for a particular condition and more sophisticated tools can suggest likely diagnoses, recommended tests and potential treatments.

As patient portals become more sophisticated, and allow patients to book appointments online and view their test results, the role of administrative staff is diminishing – particularly in primary care. This provides opportunities to retrain these staff to take on more clinically orientated support roles. Patient portals can also include online service directories or decision trees to ensure that patients are supported by the most appropriate service or member of staff.

A vision for the future

Putting all of the above together is hard. But one author who has managed to capture much of what we have described, in the context of primary care, is Professor David Blumenthal.

'The paradox of the future health system is that we will have much more primary care, and primary care will be more important than ever, but it will be supplied predominantly by patients and non-physicians, with backup from specialized primary care providers who are master diagnosticians and clinical decision makers, powered by health information and organizational supports.' (Blumenthal, 2010, p. 22)

13. Conclusions

There is an urgent need to reshape the NHS workforce and equip it to meet the changing and growing demand from the population it serves. Our research has shown that this is a challenge that many areas are beginning to successfully grapple with, particularly through change to the current non-medical workforce.

Change is not easy. It takes skill, resources and persistence, and local leaders can expect local professional resistance. However, with careful attention to role design, teamworking and effective change management, the potential benefits are significant. Reshaping the NHS workforce can deliver benefits for patients through more patient-focused care and improved health outcomes. It can deliver benefits for staff through more rewarding roles and enhanced career pathways. It can deliver benefits for NHS organisations through greater efficiencies and helping to address potential workforce gaps.

The financial context in which organisations are currently operating makes this agenda particularly challenging. There is little headspace in terms of time and resources, yet this is exactly what is needed. National and local training budgets are being cut at the point that they require expansion. This agenda is not a 'nice to do'. It is essential if we are to find a sustainable balance between available funding, patient needs and staff needs. This is a message that the Department of Health and the Treasury need to hear loud and clear.

Appendix 1: Methods

At the outset of this project, in June 2015, we held a seminar on the opportunities and challenges afforded by skill-mix change. Table A1.1 sets out the seminar attendees.

Table A1.1: List of seminar attendees		
Name	Job title	Organisation
Prof Nick Barber	Consultant for Improvement Research Institute	The Health Foundation
Ms Amanda Bassett	Director of Workforce Insight	Allocate Software
Prof Richard Bohmer	International Visiting Fellow	The King's Fund
Mr Howard Catton	Consultant, Nursing and Health Policy	Royal College of Nursing
Ms Sue Covill	Director of Development and Employment	NHS Employers
Prof Vari Drennan	Professor of Health Care and Policy Research	Kingston University and St George's University of London
Mr Grant Fitzner	Economics Director	NHS Improvement
Dr Andrew Goddard	Registrar	Royal College of Physicians
Ms Becky Henderson	Senior Economist	Department of Health
Ms Suzanne Rastrick	Chief Allied Health Professions Officer	NHS England
Mr Garry Swann	Consultant Nurse and Clinical Director	Heart of England NHS Foundation Trust
Ms Karen Taylor OBE	Research Director	Deloitte UK Centre for Health Solutions
Mr Stephen Upton	Assistant Director, Urgent Care and Transformation	Nottingham City Care
Prof Stephen Welfare	Director	Stephen Welfare Associates Ltd

Prior to the seminar we sent all invitees (including those who did not attend the seminar) a short online survey. The survey was completed by 18 respondents in May 2015.

We also conducted six semi-structured interviews with a subset of survey recipients ahead of the seminar in order to understand the issues exposed by the survey in more detail. This preliminary research informed the research questions and approach for the substantive research, which commenced in August 2015.

We reviewed academic and grey literature to understand where and how skill-mix change has been achieved to date, as well as enablers and barriers to workforce redesign. Regarding the former, we used the search terms set out in Table A1.2 to search the HMIC, MEDLINE, Embase, Scopus, ISI and Google Scholar databases.

Table A1.2: Search terms	
	Search terms
	'Skill mix' OR 'skill-mix' OR 'personnel mix' OR 'substitut*' OR 'role change' OR 'delegat*' OR 'role redesign' OR 'new ways of working' OR 'workforce flexibility' OR 'role'
AND	'Health workforce' OR 'Healthcare workforce' OR 'workforce' OR 'staff*' OR 'resource' OR 'personnel' OR 'doctors' OR 'physicians' OR 'nurses' OR 'nurs*' OR 'Physician's associate' OR 'outpatient*' OR 'community' OR 'mental health' OR 'triage' OR 'public health' OR 'health promotion' OR 'population health'

The search returned 245 results. We reviewed titles and abstracts to identify articles of most relevance to our research and added to these articles through snowballing methods. We reviewed a total of 95 academic papers.

We identified grey literature through searching relevant websites such as Skills for Health (www.skillsforhealth.org.uk/), Health Education England (https://hee.nhs.uk/) and Google Scholar (https://scholar.google.co.uk/), as well as through our own experience and expertise.

We supplemented the literature review with semi-structured interviews with 23 key informants. Interviewees included senior representatives from the Royal Colleges, Health Education England, health care organisations that have successfully redesigned their workforce and several regulatory bodies such as the Care Quality Commission, the General Medical Council, the Nursing & Midwifery Council and the Health and Care Professions Council. The interviews were carried out between September and December 2015. We sought permission to name interviewees where we felt attributing a view to a particular organisation or individual would be useful. Where we have not sought permission, quotes have not been attributed.

We also surveyed all regional offices of Health Education England to understand which roles are being developed across the country. The survey was completed by one representative at each of the thirteen local offices in September and October 2015.

Next, we carried out seven case studies. We aimed to explore assistant, advanced and extended roles as well as physician associates across the primary, community, secondary and mental health sectors. We identified potential cases through interviews, literature, online searches and expert consultation.

The project was overseen throughout by an expert steering group with nine senior representatives from NHS Employers, Health Education England, Skills for Health, the Royal College of Nursing and academia among others. The steering group provided invaluable insight on the research approach, including bodies of literature to review, potential interviewees and case study sites. The group also reviewed drafts of the report and suggested opportunities for improvement.

Appendix 2: Overview of the current health and social care workforce

Tables A2.1 to A2.6 provide an overview of the current health and social care workforce. The sources for the tables are as follows:

- Social care workforce: Skills for Care (2015b). The data are for England and the numbers quoted are for job roles.
- NHS workforce: Health and Social Care Information Centre, October 2015 data for Hospital and Community Health Services in England (that is, excluding primary care) unless stated otherwise. Workforce data are given in terms of full-time equivalent unless stated otherwise.

Table A2.1: Care assistant workforce – Agenda for Change pay bands 1–4	
Role	 Wide variety of roles in different settings (clinical, therapeutic, community or domestic) providing personal care or support
Numbers	• 245k in the NHS – 22% of NHS workforce
	• 1.16 million in social care* – 75% of social care workforce
Regulatory framework (including capacity to prescribe)	No registration or fixed title
Professional standards	 There are national minimum training standards but these are not mandated or enforced by a regulator
Training	 From March 2015, a values-based Care Certificate has been rolled out across health and social care
Average pay	• AfC bands 1–4 or equivalent (range £15.1k – £22.2k)

^{*} Includes the categories 'care worker', 'community support and outreach', 'senior care worker', 'jobs for direct payment recipients' and 'other care-providing job role'.

Table A2.2: Registered nurse workforce	
Role	 Four fields of nursing practice: adult, children, learning disability and mental health
Numbers	 286k in the NHS – 26% of NHS workforce 49.5k social care – 3.2% of social care workforce
Regulatory framework (including capacity to prescribe)	 The term 'registered nurse' refers exclusively to a nurse registered with the Nursing and Midwifery Council (NMC) Can become a 'non-medical prescriber' following additional training. This is usually a demanding six-month course followed by an examination On successful completion, nurses can become an independent prescriber for any drug within their level of competence, including controlled drugs.
Professional standards	Professional standards are set and enforced by the NMC
Training	 Degree-level training (Bachelor's) on an accredited course at a UK university Typically takes three years although accelerated courses exist for those with existing degrees
Average pay	• AfC bands 5–8c depending on level of experience and seniority (range £21.7k – £67.8k)

Table A2.3: Allied health professional workforce	
Role	 Wide range of health care professionals, including occupational therapists, physiotherapists, speech and language therapists, radiographers, operating department practitioners, dieticians and paramedics
Numbers	 67k in the NHS – 6.2% of NHS workforce 21.5k occupational therapists in social care – 1.4% of social care workforce
Regulatory framework	 Statutory regulation – must register with the Health and Care Professions Council (HCPC) following completion of an accredited training course Physiotherapists, radiographers and podiatrists can become a 'non-medical prescriber' following additional training. This is usually a demanding six-month course followed by an examination. On successful completion they can become independent prescribers for any drug within their level of competence, excluding any controlled drugs.
Professional standards	Professional standards are set and enforced by the HCPC
Training	 Degree-level training (Bachelor's) on an accredited course at a UK university Typically takes three years although accelerated courses exist for those with existing degrees
Average pay	• AfC bands 6–8c depending on level of experience and seniority (range £26.6k – £67.8k)

Table A2.4: Pharmacist workforce	
Role	 Pharmacists work in a hospital or community setting, dispensing prescription medicines, advising other professionals on good prescribing practice and managing medicines Have a role in the purchase, manufacture and testing of medicines and performing audit and clinical
Numbers	• 15k in the NHS (April 2015 data) – 1.4% of NHS workforce
Regulatory framework (including capacity to prescribe)	 Statutory regulation – must register with the General Pharmaceutical Council (GPhC) following completion of an accredited training course and a pre-registration year in practice Can become a 'non-medical prescriber' following additional training. This is usually a demanding six-month course followed by an examination. On successful completion they can become independent prescribers for any drug within their level of competence, including any controlled drugs
Professional standards	Professional standards are set and enforced by the GPhC
Training	 Need to complete a Master of Pharmacy (MPharm) four-year degree course on an accredited training programme at a UK university, followed by a pre-registration year and registration examination There is no fast-track route
Average pay	 Depends on level of seniority. Typically start on AfC bands 6–7 (range £26.6k – £31k).

Table A2.5: Doctor workforce	
Role	 Doctors provide medical advice, administer treatments and perform procedures (including surgery) on patients in hospitals or the community Role varies widely depending on specialty and level of seniority
Numbers	• 108k in the NHS – 10% of NHS workforce
Regulatory framework (including capacity to prescribe)	 Registration with the General Medical Council (GMC) On graduation, provisional registration is granted for one year followed by subsequent full registration Can prescribe any medication, including controlled drugs, with full registration although local governance procedures may prevent junior doctors from prescribing certain medications (for example, chemotherapy)
Professional standards	Professional standards are set and enforced by the GMC
Training	 Doctors complete an accredited medical degree (lasting five to six years) at a UK university Fast-track courses (four years) are available for those with suitable existing degrees Following graduation there is a prolonged period of postgraduate training (minimum five years for a GP, 10 years+ for a hospital specialist)
Average pay	 Depends on level of seniority Starting basic salary £22.6k; starting salary for a consultant £74.5k. Can rise to £100k+ for some GPs or consultants

Table A2.6: Physician associate workforce	
Role	 Advanced practice role following a two-year degree programme PAs take on responsibilities traditionally undertaken by junior doctors
Numbers	Roughly 250 (headcount) working in the NHS across the UK
Scope of practice	 'Dependent professionals' – must practise within a supervised setting Supervisor is usually a consultant-grade doctor PAs can practise in any specialty, including mental health and primary care Despite requiring ongoing supervision, PAs do have a degree of clinical autonomy, depending on experience
Regulatory framework (including capacity to prescribe)	 PAs are not formally regulated and as such do not have a protected title A PA 'managed voluntary register' (PAMVR) exists, which is administered by the Faculty of Physician Associates (FPA), part of the Royal College of Physicians (RCP) In order to maintain registration on the PAMVR, PAs must undertake 50 hours of continuing professional development a year (under strict criteria) It is recommended that employers require registration on the PAMVR; however, this policy is not universally adopted
Training	 Two-year postgraduate degree programme Usually requires a second-class degree in a life sciences or health care subject (2.2 or 2.1 depending on the institution) and associated A-Levels and General Certificates of Secondary Education (GCSEs) Courses follow the 'medical model' and teach applied and theoretical medicine, with typically a 50:50 split between didactic and clinical teaching All PAs must sit the same national examination to graduate
Average pay	• Typically on AfC band 7 (range £31k – £41k)

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Candace has extensive senior management experience in the NHS, including at board level for providers and commissioners. She was Director of Strategy for a large acute trust and Director of Commissioning for a large health authority.

Candace worked on strategy and policy at the Department of Health between 2000 and 2006, including work for the Modernisation Agency leading a workforce modernisation initiative. She is currently a non-executive director of a large NHS foundation trust.

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Since joining the Trust in 2015 Sophie has focused on the health and care workforce and the use of digital tools in healthcare. Completed projects include analysing the potential of technology to improve service provision and workforce productivity and understanding the technological requirements for the future of primary care. Sophie is currently leading a project for NHS England on how digitally enabled patients are likely to impact on primary care services.

Prior to joining the Trust, Sophie worked as an Analyst at RAND Europe. Her work there spanned a diverse range of research areas, including health innovation and drug discovery, attitudes towards vaccines and strategic health policy. She conducted research for the Department of Health, Public Health England, Vaccines Europe and the Structural Genomics Consortium.

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Robert Watson is a junior doctor with an interest in health care policy and research. As part of his medical training at the University of Oxford, he undertook a Bachelor's degree in infection and immunity, sparking an interest in academic research. Following graduation from medical school, he worked as a doctor in North West London on the academic foundation programme, completing a number of hospital-based jobs at four London centres. In addition, he spent time conducting public health research at the Department of Primary Care and Public Health, Imperial College London. He enjoys writing and has authored 12 publications in peer-reviewed academic journals as well as two medical textbook chapters.

During his time at the Nuffield Trust, Robert worked on a range of projects, including exploring the issues facing emergency general surgery, deriving benefit from technology in health care and analysing new models of primary care. He enjoys bringing a clinical perspective to policy issues and developing new research skills. He is currently working as a volunteer doctor in Malawi and will be taking up an academic medical oncology training post in Oxford from August 2016.



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