Options for taking time out of specialty training

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ABSTRACT

Trainees in higher specialty training programmes may have the option to take time out of their training programme to enhance or broaden their skills and perhaps develop a sub-specialty interest. Traditionally, out of programme experience has been mostly taken by clinical academic trainees in order to undertake a higher research degree. However, there are a growing number of other ways to usefully spend time out of programme. This article is intended to highlight the range of opportunities and explain the modern processes for obtaining permissions to enable trainees to make good choices for themselves.

KEYWORDS: Out of programme experience, specialty training programme, scientific research, non-scientific research

Introduction

During specialty training, there is the opportunity to take a break from the standard programme to gain additional experience relevant to a future consultant appointment; for example, in scientific, clinical or educational research (usually with the aim of obtaining a higher degree), subspecialty or specialty experience, or a related subject outside of your usual geographical area, or other useful experience in leadership, education or policy areas.[1] These opportunities are not available to all and in many cases, will be awarded in open competition. Any specialty trainee contemplating taking time out of programme needs to be well organised and plan ahead if they are to maximise their chances of taking advantage of the opportunities available. To be granted time out of programme, the trainee must demonstrate how this experience will ultimately benefit patients and/or the health service.

Training is a formal process, overseen by the General Medical Council (GMC) through the auspices of the Joint Royal Colleges Postgraduate Training Board (JRCPTB) and run according to guidelines outlined in the 'Gold Guide'.[2] There is a formal process for applying for time out of programme and approval must be given by the postgraduate dean in your region,[3] who will request an opinion on the suitability of your proposed activities from the training programme director (TPD) in your specialty. Therefore, it is essential that trainees considering time out of programme speak to their educational supervisor(s) and the TPD early on. At a bare minimum, trainees should be planning their experience at least 18 months before they will actually go out of programme. In most regions, applications for time out of programme will need to be submitted at least 6 months prior to the intended start date and should contain full details of the experience, together with supporting evidence that they will be fully funded (eg letter detailing successful application for a fellowship). In most cases, time out of programme will be granted to start at the 'changeover' date of your specialty and is usually granted for a period of 12 months with the longest possible duration being 3 years.[3] Up to 12 months of specialty training can be counted towards your final Certificate of Completion of Training (CCT) or CESR (Certificate of Entry to the Specialty register), but only if you have applied for this recognition before starting your time out.

The GMC has issued guidance on taking time out of programme and a helpful summary from the British Medical Association may also answer other frequently asked questions.

Notwithstanding the formality of the process, taking time out of programme can be great fun, rewarding and a fantastic opportunity to learn new skills, meet new people and develop your curriculum vitae. Doing and learning about something new, establishing a project and supervisors, and potentially shaping your future career takes time and effort to organise. Projects or opportunities may arise by chance, but often you need to be extremely proactive about it. Self-motivation is required to organise and undertake this experience or postgraduate degree, so make sure you are doing it for the right reasons (Box 1).[4]

Trainees have told us that they are not aware of what opportunities are available or how to arrange experience.[5] This article aims to give you an idea of some opportunities that may be available, although any trainee with a vision might be able to create a suitable out of programme experience for themselves and, therefore, the list of opportunities described below are not exhaustive!

Scientific opportunities

Research is the acquisition of new knowledge by understanding a phenomenon at a fundamental level. Science is an intellectual challenge and totally different from clinical work.

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Box 1. Reasons not to take an out of programme experience

- To improve your CV
  There are far easier ways to improve your CV eg writing case reports, service quality improvement projects, attending trust management meetings etc.
- Because someone tells you to
  You will need to have self-motivation, diligence and dedication to complete a higher postgraduate degree.
- You might get a better consultant job
  A consultant job is usually offered to the applicant who is most suited to that particular role, therefore having experience (or a higher degree) in something that is not relevant to that particular post may not be an advantage in the job application process.
- To postpone having to apply for a consultant job
  Whether you take on a higher science degree, teaching fellowship or management/leadership role, you will need to have a great deal of dedication and commitment; it is not just time for an easy life!
- It sounds better than being on call
  Time is generally more flexible in an out of programme experience than working in the hospital, but with deadlines for papers, grants, or experimental research, you may find yourself working in the evenings and at weekends.

Why do research?

As medical research advances, scientific knowledge is developing rapidly so that what is taught at medical school may quickly become outdated and superseded or even demonstrated to be scientifically simplistic or wrong. Sometimes knowledge is replaced with an understanding or new practice that may also in time, turn out to be incorrect. There are many diseases we still do not fully understand, and time spent in research affords the opportunity to study these areas of uncertainty.

Any time spent in research will enhance your skills in time management, communication, prioritisation, delegation, written and oral presentation of findings, statistical analysis and inference; you will also have opportunities to attend conferences and publish your own research. You will find that your ability to critically appraise the literature will be markedly enhanced and your confidence at making difficult clinical judgements will be improved as a result.

What to look for when establishing a research project – the 'three Ps':

1 **Project** – choose a particular disease or subject area that you are interested in. It may be better to approach an established laboratory or group who have experience in the field you want to study. If you are not sure which subject to study, it is best to approach various departments of interest, as experienced researchers will have a programme of research within which there might be a suitable project.
2 **Person** – think about having at least two supervisors. It is helpful to have one who is well-known in the research field and has a clear track record of success; it is also helpful if another member of your supervisory team is more hands-on (particularly if your research requires new clinical skills or laboratory techniques that you will need to develop).
3 **Pounds** – discuss with your prospective supervisor how the project and any tuition fees will be funded. Projects may be pre-funded (eg industry or project grants) or you may need to apply for a clinical research training fellowship from a research council (eg Wellcome Trust, Medical Research Council or National Institute for Health Research) or a research charity (eg British Heart Foundation, Arthritis Research UK, etc). Postgraduate deans will need assurance that you will stand a very good chance of progressing your research and therefore will scrutinise applications very carefully based upon 'soft' money.

Box 2. Motives for choosing laboratory or clinical research

- Particular personal skills or interests you wish to use or develop
- Development of relevant new technologies or methodologies
- Deeper understanding of physiology and pathology
- Be aware laboratory projects may require new vocabulary and technological skills

When choosing supervisors, look at their publication record, grants awarded and the track record of their previous clinical research fellows or PhD students (you may wish to speak to other people they have supervised). Remember you will have to work closely with your supervisor over a long period, so it is important to assure yourself that you have identified someone with whom you can establish a good relationship, ideally an individual who is inspiring.[6,7] There are many different areas of research and some supervisors or projects lend themselves more towards a more clinical or laboratory based set-up.[8] Choose the type of research that most excites and interests you and that you will enjoy most (Box 2) and make sure to ascertain that the project could lead to a postgraduate degree (Box 3).[7]

Box 3. Postgraduate research degrees

- Master of Science (MSc), Master in Education (MEd), Master of Arts (MA) are mostly taught courses with a structured programme that may include a short research project – minimum 1 year full-time. These are often done part-time or as distance learning courses.
- Master of Philosophy (MPhil) is a postgraduate research degree that is completed in 1 year of full-time study.
- Doctor of Medicine (MD) and Doctor of Philosophy (PhD) are both postgraduate research degrees, but the main differences are time and funding: MD minimum 2 years, PhD minimum 3 years full-time.
- It can be difficult to obtain research council funding and larger charitable grants to undertake an MD.
- If you are considering a future career in a clinical academic post, there appears to be a growing tendency for universities to 'prefer' to appoint individuals with a PhD.

Basic science or translational research

There is undoubtedly a 'culture change' when moving from a clinical specialty registrar post into a laboratory research environment. It takes some time to settle in and learn all of the new skills. In the laboratory, there is less of the intense 'demands' of delivering patient care and it feels initially as if the pace is slower and that there are less immediate 'rewards' than in clinical medicine. You will find that self-motivation, diligence and determination are needed as you may experience disappointments from which you need to learn in order to progress. However, when you do make a 'discovery' it can be enormously satisfying and you may make a potentially important contribution to scientific knowledge.

Translational research may allow you to be part of the validation of new drugs or healthcare products and techniques and genuinely have a 'bench to bedside' approach in which you will maintain patient contact at the same time as doing basic science, but the possibilities for this vary, depending on the project.

The laboratory is not for everyone. It can be demanding, time consuming and expensive. You need to be well supported and have good mentors. As it usually lasts for a minimum of 3 years, you need to be passionate about the subject.

Clinical trials

It is increasingly possible for trainees to become involved in clinical trials, either during training or out of programme, in conjunction with a masters or higher research degree. Various UK universities offer postgraduate courses and degrees aiming to develop skills in clinical trials, including University College London, University of Brighton, the London School of Hygiene and Tropical Medicine and the University of Edinburgh. These programmes usually offer online or distance learning in a modular structure, promoting directed self-study, which enables you to time your study to suit your work commitments.

Working in this type of research allows the development of a range of skills as doctors participate in every aspect, including protocol development, screening for eligibility, obtaining consent, recruitment, maintenance of site paperwork in clinical research folders, follow-up assessments and responding to adverse events, data analysis and presentation of results. Trainees can potentially work in trials at any phase of development (phase I–III) and the opportunities will vary depending upon the nature of the trial. Trials offer a particularly good opportunity to learn about the rigorous processes underlying research governance within the modern NHS, enabling the doctor to involve themselves in clinical trial recruitment throughout their consultant career.

However, be aware that clinical projects and trials can take time to get going at the start. Ethical approval and patient recruitment may delay the start of a project.

Epidemiology

Epidemiology is the study of how often disease occurs in different groups or people, and why. This knowledge can be used in the prevention of illness, to organise healthcare services or generate hypotheses as to disease causation.

This is a research discipline that does not involve laboratory experiments. Epidemiologists undertake observational (cohort or case-control) and interventional studies or may derive data from 'natural experiments'. Data analysis and interpretation are core components of epidemiological research and, therefore, an interest in mathematics and applied statistics is important. Epidemiologists contribute significantly to public health policy and have the potential to make big impacts on disease at population level. People well suited to epidemiological research will be good at working in teams, have good communication skills, a sense of the 'bigger picture' and creativity with data. Many of the skills learned are transferrable to clinical practice. The skills developed can be applied to writing systematic review articles or meta-analyses and provide opportunities for working with guideline development groups or other advisory organisations such as the National Institute for Health and Care Excellence (NICE) or the Cochrane collaboration.

What happens after scientific research?

Following a postgraduate research degree, some trainees will choose to pursue a clinical academic career.[9] After completion of clinical training, you are eligible to apply for postdoctoral grants or fellowships leading to posts such as clinical senior lecturer, reader and professor or as an NHS consultant engaging in research, education and wider administrative duties.[4,9] The career of a clinical academic requires balancing clinical commitments with research[10] and can be challenging but also highly rewarding. Teaching is often a major part of a clinical academic's workload, as well as writing or refereeing papers and grants, editing journals, and contributing to committees who develop national guidance.

Should you not wish to continue with a clinical academic career, however, the skills you have developed during postgraduate research are highly transferable to any clinical consultant post.

Non-scientific opportunities

Pursuing a scientific career does not appeal to everyone, and there are many other opportunities that can augment and shape your future career.

Education

Teaching and education are integral to being a doctor. As a clinician, you are constantly educating fellow doctors and medical students, allied health professionals and patients. Qualifications in teaching are increasingly considered valuable among healthcare professionals. Every NHS trust has a director of medical education who will lead the education and development of all healthcare professionals. Such roles would usually go to doctors who have educational qualifications or have developed well-recognisable skills in the field. Moreover, there are roles, paid and voluntary, outside of trusts in the health education bodies (formerly deaneries) overseeing the quality of educational supervision and training at all levels. Therefore, if you are a keen educator, it might be worthwhile formalising your teaching skills with a fellowship in medical education (at a medical school, hospital, local education training board or other professional body) and by obtaining a formal qualification, eg PGCert, diploma or Masters.[12] Such fellowships are often advertised on deanery websites.

It is also possible to undertake qualitative or quantitative educational research dealing with pedagogic research or curriculum development or validating the role of new technologies in education.[13] Fellowships in medical education offer a range of opportunities to develop as an educator, including delivery of teaching (undergraduate and postgraduate), development of simulation programmes, designing curricula, assessment of learning and evaluation of the quality of education.[12,14]

A fellowship will give you an opportunity to challenge, change and influence current educational practice and gain a better understanding of educational theory. Such experiences will help you develop as a future educational and clinical supervisor, undergraduate tutor or for wider leadership roles in trust or health education bodies.

Clinical leadership (Darzi Fellowship)

The Darzi Fellowship Programme launched in 2008 and aims to develop clinical leadership in the early stages of a healthcare professional's career. The fellowships are currently hosted by the London Leadership Academy and involve a full-time 1-year post. The scheme is multiprofessional: open to doctors, dentists and other allied health professionals.

Darzi Fellowships are competitively awarded to a clinical department (in either primary or secondary care) who apply for the fellow to lead a 12-month project with specific aims around service redesign or improvement, quality and safety, building leadership capacity or clinical development and education. The fellow will study for a PGCert in clinical leadership contemporaneously.

Darzi Fellows gain unique experience in management and leadership, providing opportunity for them to work more closely with staff in NHS management roles, an opportunity not afforded to many specialty trainees. This facilitates a better understanding of NHS budgets and planning, commissioning, Commissioning for Quality and Innovation targets, and clinical governance including opportunities to work closely with the Care Quality Commission and Trust Development Authority. You may gain experience in appraisal, writing and evaluating business cases, and attending executive level meetings at which you will contribute your observations and ideas as an 'equal'. You will develop confidence in your leadership, good communication skills and have the opportunity to learn how to influence and negotiate.[15]

Applications are made via the NHS jobs website (www.jobs.nhs.uk/) or the London Leadership Academy (www.londonleadingforhealth.nhs.uk/programmes/fellowships-clinical-leadership-darzi-fellowships).

A similar program – Future Leaders Programme – also runs in Yorkshire and the Humber.

Working in the pharmaceutical industry

Pharmaceutical companies fund the development, testing and marketing of the drugs that doctors prescribe. A period of time spent working in this industry allows a trainee to gain greater understanding of applied biochemistry, pharmacokinetics and pharmacodynamics, as well as drug development and the clinical trials process.[16]

As a physician in a pharmaceutical company, you may be involved in anything from phase 0 or translational studies through to late stage drug development. You may be required to provide medical expertise to business development teams, general management, clinical expertise for operational issues or assistance with pre or post marketing programmes.[17] Opportunities for data analysis, oral or written communication and travel to national and international conferences may arise. Some companies will be able to tailor your time to your particular interests.

Working in industry may not lead to a higher degree or qualification, but instead provides a different type of insight into medicines and medicine management. You will gain skills in leadership and communication within teams that may include working with people in a variety of roles not generally experienced in the NHS, including basic scientists, marketing agents and business managers.[18] As with all out of programme experiences, your TPD will need to see clear assurance that the opportunities in the post will enhance your knowledge and skills.

Fellowships are sometimes advertised through the local education training boards or deanery websites. Alternatively, you can make contact with a physician currently working in a pharmaceutical company.

Public health and government policy

Annual opportunities for a fellowship as part of the national medical director's clinical fellowship scheme are available. These fellowships enable trainees to work in an NHS-affiliated organisation for a year; they will usually be commissioned to carry out one or more projects involving leadership, strategy, project management and health policy. Most specialty trainees will have limited exposure to public health or NHS policy and yet these are of vital importance to all practising consultants. A fellowship in the Faculty of Medical Leadership and Management (FMLM) will lead to skills in learned powerfulness, negotiation, strategy, patience, teamwork and building networks. Insight gained as an FMLM fellow would prove invaluable to any future NHS consultant.

You can contact the FMLM for more details.

Conclusion

Training programmes equip specialty trainees to meet their curricular competencies and demonstrate their competence to take up a consultant post. However, the role of a consultant in the modern NHS requires many skills in addition to clinical competence. Taking time out of programme may provide an opportunity to gain insight into some of these broader skills and help shape your future career planning. Such experience may be serendipitous but, for most people, careful advanced planning and preparation are essential. We urge you to consider whether time out of programme could be suitable for you and, if so, discuss this with other trainees or consultants, as well as your educational supervisor. You will need to justify the request for time out to the postgraduate dean so any proposal needs to be well planned and fully funded with clear benefit to patient care and/or the health service. ■

Conflicts of interest

The authors have no conflicts of interests to declare.

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