



## Career Histories of PhD Graduates Faculty: Biomedical Sciences

*Note: Blue = academic role*

PhD Subject or Department & Grad date	Current Job Title	Organisation & / or Job Sector	Previous Job (s)	PhD Essential for role?
Anatomy and Developmental Biology, 2006	Research Scientist	GlaxoSmithKline	post-doctoral researcher at UCL	yes
Eastman Dental Institute, 2006	Pharmaceutical Assessor	Medicines & Health Care Products Regulatory Authority	N/A	yes
Infection, 2008	Post Doctoral Research Scientist	Cancer Research UK	N/A	yes
Immunology and Molecular Pathology, 2005	Senior Research Officer	National Assembly for Wales	Postdoctoral Researcher (Institute not named)	yes
Immunology and Molecular Pathology, 2005	Senior Medical Communications Manager	A pharmaceutical company	Similar communications roles (details not given)	No
Immunology and Molecular Pathology, 2006	Clinical Research Associate	Chiltern International (Pharmaceuticals)	Not stated	No
Institute of Child Health, 2004	Postdoctoral Researcher	Institute of Ophthalmology. UCL	N/A	yes
Institute of Child Health, 2005	Clinical Psychologist	The NHS, Wales	Doctorate in Psychology, UCL	Desireable
Institute of Child Health, 2006	Postdoctoral Researcher	University of Oxford	Development Scientist, Amersham Biosciences	yes
Institute of Child	Management	Accenture	N/A	Not

Health, 2007	Consultant			stated
Institute of Child Health, 2008	Urology Fellow	Great Ormond Street Hospital	Paediatric surgical training, Great Ormond St Hospital	Yes
Institute of Child Health, 2008	Higher Scientific Officer	The Department for Environment, Food & Rural Affairs	1. Internship – Green Alliance 2. Specialist for House of Lords Science & Technology Select Committee	Yes
Institute of Neurology, 2005	Clinical Senior Lecturer	Neurosciences & Mental Health, Imperial College London	Clinician & Research work	Yes
Institute of Neurology, 2006	Senior Postdoctoral Researcher	Institute of Child Health, UCL	Postdoctoral Researcher, ICH	Yes
Institute of Neurology, 2007	Research Analyst	Bazian (Healthcare Consultancy)	Not stated	No
Institute of Neurology, 2007	Business Consultant	Deloitte	Not stated	Not stated
Institute of Neurology, 2007	Postdoctoral researcher	Physics, UCL	Not stated	Not stated
Institute of Neurology, 2007	Clinician	Institute of Neurology, UCL and The NHS	N/A	Yes
Institute of Ophthalmology, 2006	Senior Research fellow, Honorary Fellow	Moorfields Eye Hospital & Institute of Ophthalmology, UCL	Postdoctoral Research fellow, Moorfields	Yes
Institute of Ophthalmology, 2006	Consultant Ophthalmologist	St Thomas's Hospital	Not stated	Not stated
Institute of Urology, 2006	Consultant Neurologist	The NHS	Medical Doctor	Yes
Mental Health, 2004	Senior Lecturer	Centre for Disability & Social Inclusion, City University	Not stated	Desirable
Mental Health, 2006	Senior Lecturer	Psychiatry, Royal Free	Senior Lecturer	Not stated
Mental Health, 2007	Doctor	East London Foundation NHS Trust	Not Stated	Not Stated
Oncology, 2006	Lung Cancer Lead Nurse	Imperial College London	Not stated	Not stated
Oncology, 2008	IT Specialist	Barclays capital	Similar role, unstated investment bank	Yes
Primary Care & Population Sciences, 2003	Senior Lecturer	Epidemiology & Medical Statistics, UCL	Lecturer, same department	Not stated

Primary care & Population Sciences, 2004	Senior Lecturer,	Policy Studies & Early Child Development, University of Bristol	Research Associate, City University	Yes
Wolfson Institute of Biomedical Research, 2006	Research Support Officer	Institute of Cancer Research	Not stated	No (but beneficial)

## Career Case Studies: Further Details

### A. – PhD Anatomy and Developmental Biology, 2006

A. is currently a Research Scientist at GlaxoSmithKline and before this she was a post-doctoral researcher at UCL. Her PhD is essential for her current position and the key transferable skills she uses include scientific writing skills, communication, team work and computer programming skills. Although she faced no major challenges after graduation, finding a role took time. She found her current role from an email that was sent to Post-Docs at UCL. When she was at UCL she visited the Careers Service and had a face to face appointment with a careers consultant to talk about career options. She found this very useful. The key advice she would give to current students is to build up transferable skills such as writing and communication.

- *Specific courses attended: Careers Networking Event - Alternative Careers in Science.*

### S. – PhD Eastman Dental Institute, 2006

S. is the Pharmaceutical Assessor for MHRA, a government Agency; she has not held any roles prior to this. It is essential to have a PhD for this position, and she uses some of her technical skills and subject knowledge. The key transferable skills highlighted are project management, organisation, and independent thinking. The market competition was S.'s main challenge after graduation and she found her position advertised in a professional journal.

- *Specific courses attended: Walking the Line: An Interdisciplinary Workshop for Artists and Scientists, PhD Induction Programme for Biomedical Sciences and Life Sciences, How to Write a Good Scientific Paper, UK GRADschool Residential Courses, Problem Solving in Industry - with McKinsey, High-tech Entrepreneurship - Starting a Moneymaking, High-Tech Business with Minimal Funding, Planning your career in academia, Careers Networking Event - Careers in Science, International Organisations Day - at LSE, Your PhDilemmas: 1-2-1 Sessions for Research Students, The Bigger Picture: Navigating the Research World (Conference for Research Staff and Research Students), Project Management in the Research Context - Moodle Research Skills Module, Career Planning in the Sciences - Moodle Research Skills Module, Managing Your Research Supervisor or Principal Investigator - Moodle Research Skills Module, Careers Forum - Getting into Academia, APPMS Part 1 - Skills Self Assessment and Development Planning Workshop, Selecting a Conference, Presenting & Networking - Moodle Research Skills Modules, How to Perform well at Interviews.*

### E. – PhD Infection, 2008

After graduation, E. joined Cancer Research UK as a Post Doctoral Research Scientist. She found this role through personal networks. She called people she knew at Cancer Research UK to find out about opportunities and openings and was able to secure a role after graduating. Her PhD is essential for this role, as are her skills in laboratory work and analysis. The top transferable skills that Elizabeth highlights as important include: decision making, personal organisation and written scientific communication. The fast work pace at Cancer Research UK was a challenge for E. to adapt to having made the move from a very academic environment and learning new branches of science.

#### **E. – PhD Immunology and Molecular Pathology, 2005**

E. currently works for the National Assembly for Wales as a Senior Research Officer – a role she found through an advertisement in the Guardian. Before this she held a Post-Doc Research role (institute not named). A PhD is essential to the role she is currently doing, and the key transferable skills she highlights as important include: research methodology, gathering information, analysis, planning and organisation, and communication (verbal and written for publications). E. did not face any challenges after graduation when entering her first role as a post-doc researcher as it was within the same subject area/environment. She would advise PhD students not to restrict themselves to one area of study, but examine how your transferable skills can be used in other areas.

#### **E. – PhD Immunology and Molecular Pathology, 2005**

E. works in senior medical communications manager for a pharmaceutical company based in Asia. She has held similar roles since graduating from UCL. Although her PhD was not essential for her role, it is definitely useful. Subject knowledge and being able to write to a scientific audience is important. Being able to understand protocol and science, study design and effective written communications are key transferable skills. The only challenge E. faced when entering employment for the first time was the change from a lab-based environment to an office environment. The pace of work is much faster and she would advise current PhD's to be aware of this and be ready to learn fast. E. found her role through a recruitment agency that specialised in science communication roles. While at UCL E. attended a number of careers fairs.

#### **J. – PhD Immunology and Molecular Pathology, 2006**

J. is a Clinical Research Associate for Chilton International, a pharmaceutical company. She does not consider her PhD essential for this role but it gave her key transferable skills such as planning, organisation, communication, initiative and being innovative. She found her role through personal recommendations. She would advise current doctoral students to write a CV based on competency and explain how their skills are linked to the job description and can be transferred within that organisation.

- *Specific courses attended: Career Planning and Job Searching, CVs and Applications, Interviews and Assessment Centres.*

#### **S. – PhD from the Institute of Child Health, 2004**

S. is currently a scientific researcher for UCL's Institute of Ophthalmology. This is a post-doc research role, which S. went into straight after graduating after hearing from her PhD supervisor that the position was available (maternity leave cover). Although the position is in a different department from where she did her PhD, S. feels she has the right skills and subject knowledge. Her PhD was essential for securing her role, and as were her scientific techniques. Planning, independent research, communication and team work are essential transferable skills. S. would

advise current PhD students to practise their interview techniques, and where possible practice with a careers adviser.

#### **N. – PhD from the Institute of Child Health, 2005**

After completing her PhD in Child Health, N. went on to do a doctorate in psychology at UCL. She now works as a Clinical Psychologist in Wales for the NHS. Her PhD was desirable to securing her current position and has helped her stand out. She uses her understanding and experience in cognitive assessment research for report writing and to interpret research. Key transferable skills include communication – verbally to talk to various audiences and individuals, time management to meet deadlines and good organisation. She found her current role through networking. When she decided to move to Swansea, N. called various organisations and institutes to see what roles were available. N. knew what area of work she wanted to get into and did much of her career planning in her own time. She talked mainly to her supervisors about career options. N. advises current PhD students to think about transferable skills during their career searches and applications. Make sure you mention these as much as your area of research when interviewing for roles.

#### **A. – PhD from the Institute of Child Health, 2006**

A. is a Post Doctoral Researcher at the University of Oxford, a job he found by visiting the university website. Prior to that he was working as a Development Scientist with Amersham Biosciences. His PhD was essential for securing his current position, as were his technical skills and subject knowledge. He did not face any challenges with this role. The key transferable skills used on a daily basis include quick thinking, team work, communication, decision making, information gathering and flexibility.

- *Specific courses attended: Careers Skills Workshops for PhD students - Private Sector: KPMG, Funding / Career Opportunities for Research in the Sciences, Copyright and Intellectual Property*

#### **M. – PhD from the Institute of Child Health, 2007**

M. has recently been made redundant. Prior to this she was a management consultant at Accenture having undertaken a graduate training scheme there. The key skills and knowledge used included problem solving, specialist health knowledge and molecular understanding. One of the challenges M. faced following her graduation was understanding what consultancy involves and having to learn new things rapidly. M. used the Career Services to develop her business development and interview skills. She used the library to research companies. All of which were useful when moving from academia to the business world.

- *Specific courses attended: Careers Skills Workshops for PhD students - Private Sector: KPMG, Research in the Business Context, Introduction and Evaluating & Planning for New Ideas in the Life Sciences, Interview skills - with Price Waterhouse Coopers, Constructing a Business Plan for Bioprocessing and Life Sciences Projects, Intellectual Property Rights and their Application to the Life Sciences Industries, An Insight Into a Successful Biotech Company, Market Forces and Marketing Strategies in the Life Sciences Industries.*

#### **M. – PhD from the Institute of Child Health, 2008**

M. works as a Urology Fellow at Great Ormond Street Hospital. After graduation she did her paediatric surgical training at the same hospital. The key challenge she faced after graduation was to compete internationally to work for GOSH. She got her role by applying for the position via an advert. Without doubt M. considers her PhD as essential to her current role and uses her

subject knowledge on a regular basis. Key transferable skills identified include written communication for research publication, using evidence-based information in practice, and understanding of statistics. M. would advise current PhD to consider taking some time out and do some work experience while studying.

### **Z. – PhD from the Institute of Child Health, 2008**

After her PhD Z. completed an internship at Green Alliance and then worked as the Committee Specialist for the Science and Technology Select Committee for the House of Lords. Her current role is working for Defra as a Higher Scientific Officer which she found advertised in the Guardian. Although her PhD is essential for her role she does not use her technical skills, rather there is more of a focus on her transferable skills in communication, team work, decision making, planning and organisation and independent research. After graduating the main challenge that Z. faced was boredom. While at UCL she did use the Careers Service to help her explore various career options. She found the service very useful. She advises PhD students to aim high and not to settle for something below your capabilities.

- *Specific courses attended: APPMS \* Part 2 - Personal & Professional Management Skills Residential Course, APPMS Part 1 - Skills Self Assessment and Development Planning Workshop, Careers Networking Event - Alternative Careers in Science, PhD Employers Forum - Government and Social Policy, PhD Employers Forum - Economics, Engineering and Science.*

*\* = APPMS: 'Advanced Personal & Professional Management Skills programme' run by The Graduate School*

### **B. – PhD from the Institute of Neurology, 2005**

B. is a Clinical Senior Lecturer for the Division of Neurosciences and Mental Health at Imperial College London. This academic post was secured by a 5-year clinician scientific fellowship. Prior to this Barry worked as a clinician in addition to his research work. Throughout his career, since graduating, his PhD has been essential in securing his positions and he uses his subject knowledge and clinical skills daily. The key transferable skills he also uses include quick thinking, team work, communication, decision making, information gathering, planning and organisation, flexibility and independence. Apart from having to compete for training post in clinical neurology, B. did not face any serious challenges finding a job after graduating. He found his current role by obtaining a fellowship through a grant application and interview. He does not have any advice for current PhDs as his background as a clinician gave him a vocational footing that perhaps many PhDs may not have.

### **M. – PhD from the Institute of Neurology, 2006**

M. is a Senior Postdoctoral Researcher at UCL's Institute of Child Health. Prior to this he was the Junior Post-Doc Researcher within the same department. He found this position on the UCL website. His PhD is essential for this role and subject knowledge is key when lecturing and teaching in seminar groups. Communication in all its forms is important and is the basis of his work. The key challenges M. faced after graduation was having to work independently from a team environment and no longer being 'spoon-fed' by his supervisors. The thought processes involved in postdoctoral research are different from those in a PhD. When at UCL Mark took part in the Graduate School three day workshop looking at transferable skills and careers paths. He also took part in statistical training courses and a planning a thesis workshop. He found this service useful and absolutely recommends current students to do this course. One key piece of advice he

would like to give current students is to build up transferable skills early on as they are important in the longer term and to start planning your career early as well.

**M. – PhD from the Institute of Neurology, 2007**

M. is a Research Analyst for Bazian – an evidence-based consulting and analytics agency, that supports the rational assessment, configuration and commissioning of healthcare services. Her scientific technical knowledge and understanding of critical appraisal is important for this role. Her PhD was not essential but has been beneficial. After graduation, M. did not face any particular challenges looking for employment. She found her current position through her personal networks.

**M. – PhD from the Institute of Neurology, 2007**

M. is a Clinician at the Institute of Neurology at UCL and for the NHS. This is a role he went straight into after completing his PhD. The role itself was advertised on the UCL website. As this is a research funded role, his PhD is essential to securing funds. Research is key and having an understanding of research methods is important. One of the immediate challenges Mark faced was making the transition from a medical background to a PhD.

**P. – PhD from the Institute of Neurology, 2007**

P. moved away from his area of study and is currently a business consultant for Deloitte. The skills and knowledge he uses from his PhD include organisational skills, self-discipline, self-motivation, time management and analysis. When entering employment P.'s main challenge was in understanding the business environment. As his PhD was in a different area, he had to pick up new skills, learn to analyse and ask different questions and develop many soft skills. P. knew he wanted to work in a different area and attended Career Services activities and consultancy careers fairs. He thinks positively of the support he received regarding consultancy and understanding of this area of work.

- *Other Specific courses attended: Your PhD Part 3 - Managing and Producing Your Thesis and Reports.*
- *Paresh had one mock interview with a careers adviser*

**R. – PhD from the Institute of Neurology, 2007**

R. is a post doctoral researcher in physics at UCL and is in a different department from the one where she did her PhD. Her PhD has prepared her for the next step both in terms of skills and knowledge. Although R. now works in a new department and in a different area of study many of the skills are transferable to the role she is doing and include research, communication, analysis and problem solving. R. has recently attended research staff- specific career seminars as a UCL staff member.

- *Specific courses attended: Introduction to MATLAB.*

**G. – PhD from the Institute of Ophthalmology, 2006**

G. is a Senior Research Fellow at the Moorfields MDT (Motion Displacement Test) Project, Moorfields Eye Hospital and an Honorary Research Fellow to UCL's Institute of Ophthalmology. Prior to this she was a Post-Doctorate Research Fellow in the Moorfields MDT project. Her current role led directly on from her PhD. According to G., her PhD was 'absolutely essential' to securing her current position. She is constantly using her PhD's technical skills and subject knowledge, and the key transferable skills she uses for her day to day work include decision making, quick thinking,

team work, communication, information gathering, planning and organisation and flexibility. G. believes that the research she is doing is challenging but her PhD equipped her to cope.

#### **S. – PhD from the Institute of Ophthalmology, 2006**

As a Consultant Ophthalmologist at St Thomas' Hospital, S. believes subject knowledge was both helpful and essential for her role. One of the key challenges she faced was the lack of surgical experience. During her PhD, she took two years away from surgical practice, and when entering her role after graduation she had to relearn surgical skills. S. always knew she wanted to work in Ophthalmology and spent some time on her own researching this career path.

#### **S. – PhD from the Institute of Urology, 2006**

Prior to his role as a Consultant Neurologist in the NHS, S. worked as a medical doctor – which he did while undergoing his PhD. His role is specialised and practical, his PhD was essential as was his subject knowledge. Key transferable skills for this role include problem solving, teamwork, communications, self confidence and information gathering. S.'s previous medical background meant that he did not have any problems after graduation when going back to work. S. advises current doctoral students to develop your networks and continue training in your field especially if it is medically-related.

#### **G. – PhD Mental Health, 2004**

Whilst completing her PhD, G. was also employed as a Senior Research Fellow at UCL. After graduating she moved into an Education and Research Lead/Senior lectureship post at the Centre for Disability and Social Inclusion at City University. For her role at City University her PhD was desirable as her job is mainly practitioner based, but a PhD is also essential for most lecturerships in social sciences. G. believes that her lifelong learning experience (15 years experience) developed as a contract researcher prior to her PhD provided her with key technical skills and subject knowledge. Key transferable skills highlighted by G. for her current role include communication, quick thinking, team work, decision making, information gathering and interpreting (not all were necessarily developed though her PhD, rather they are ongoing). Other key skills highlighted include management and leadership. After graduation, G. did not face any challenges entering employment because she already worked as a researcher before she did her PhD. She found her current role through personal networking. Whilst at UCL she took part in Graduate School teaching activities and some project management courses and found the service useful and relevant to her career development. G. would advise current PhDs thinking of going into academia not to get a fixed-term contract as it has limitations.

#### **M. – PhD Mental Health, 2006**

Currently M. works as a Senior Lecturer in Psychiatry at The Royal Free/UCL – a role he took on after graduating from UCL. He found this position through personal networks and was doing this while doing his PhD. His career experience and subject knowledge (not necessarily developed from the PhD) were more important in securing his current position. The main challenge M. faced when entering employment included having to learn a new role and applying existing skills. The key transferable skills for this role include quick thinking, team work, communication, decision making, independence, information gathering, planning, organisation and flexibility.

#### **J. – PhD Mental Health, 2007**

J. works for the East London Foundation NHS Trust as a doctor. Key skills and knowledge essential for his role include statistical analysis, organisational skills and time management. J. did not face any employment challenges after graduation as he was working in the same role whilst doing his PhD, although he did find juggling his PhD whilst working exhausting at times. J. took part in Graduate School activities especially those related to his work. He found it informative and useful as it opened him to different ideas not specific to his academic subject.

- *Specific courses attended: Understanding Statistical Concepts in Clinical Research workshops 1 and 2, Likelihood and Probability in Scientific Inference.*

#### **J. – PhD Oncology, 2005**

After graduating, J. became a Consultant Oncologist for the Belfast Trust. As a practising doctor, J. believes that her PhD was not essential but was useful in developing her understanding and speciality in the medical field. The key transferable skills used in her role include problem solving, communication (verbal and written), team work and the ability to analyse and check information, particularly medical. J. found her current role through personal networking (doctor's network). She would advise PhD students in the medical field to keep up to date with your medical background skills and practices. Returning to work after spending a few years in an academic environment means that it can take a while to re-adjust, so try to keep your knowledge up to date.

#### **A. – PhD in Oncology, 2006**

A. has a medical background and pursued in PhD in the area she specialises in 'lung cancer'. A. currently works for Imperial College and is the Lead Nurse for Lung Cancer. She says that all the skills and knowledge she got when completing her PhD are being used in her present role. She didn't face any particular challenges after graduation as she was already working in the area.

#### **M. – PhD Oncology, 2008**

M. works as an IT specialist for Barclays Capital. After graduation M. began with a similar role for a different bank. He found this role through a specialist IT recruitment agency. M. believes that his PhD was essential in securing his current position. Although it is far removed from Oncology, M. uses his understanding of the IT components learned through his PhD in this role. He also says his skills in research – both gathering and checking information and communications (being able to translate subject specific information into Layman's terms) and problem solving, are vital transferable skills he developed during his PhD and are used in his day to day work. Whilst at UCL, M. attended an IT specific careers fair. M.'s key advice to current PhD's is to focus on finishing your thesis before considering taking on a job role. Where possible take some time out to think carefully about what career to pursue and research different roles if it is outside your area of study.

- *Specific courses attended: As part of the Introduction to Business & Entrepreneurship programme: Doing Business on the Internet, Marketing, Your Hi-Tech Start-up, Business Plan & Market Research, Raising and Making Money. Other Graduate School activities: Introduction to MATLAB, Introduction to Mathematica, Your PhD Part 3 - Managing and Producing Your Thesis and Reports, Copyright and Intellectual Property. Careers Service activities: How to Perform Well at Interviews, Team Working - with Procter and Gamble, How to Assess your Skills and Plan your Career.*

#### **F. – PhD Primary Care and Population Sciences, 2003**

F. worked initially as a lecturer in Epidemiology and Medical Statistics at UCL but has since moved on to become a Senior Lecturer in same department. For this role, F. uses technical methodology

and some subject specific knowledge developed during her PhD. She did not face any challenges when entering employment after graduating as she was also working whilst doing her PhD.

#### **P. – PhD Primary Care and Population Sciences, 2004**

After leaving UCL P. worked as a Research Associate at City University and then became a Senior Lecturer in Policy Studies and Early Child Development at the University of Bristol. For both roles her PhD was essential and she found her current role through personal networks. She uses research methods learnt from her PhD in her current role. She did not face any challenges in securing either position.

#### **C. – PhD from the Wolfson Institute of Biomedical Research 2006**

After graduation C. took some time off before pursuing her career. She now works as a Research Support Officer for the Institute of Cancer Research. Although her PhD was not essential for the role, it was beneficial. Subject knowledge is important, but also transferable skills such as time management, presentation, critical review and organisation. C. knew she did not want to pursue a post-doctorate and the challenges she faced when moving from academia to the private sector included technical training, understanding new team dynamics, and writing. She found the role through her personal networks and contacts gained through her PhD. Whilst at UCL, C. attended a number of career talks on alternative career paths for PhD graduates. She found this extremely useful and encourages all PhD students to do so, especially if they are uncertain about what they want to do after they graduate. She also encourages PhD students to get as much alternative experience to build up your understanding of different fields of work and to build your networks.

- *Specific courses attended. Graduate School: Good Writing for Scientists. Careers Service: Career Planning and Job Searching, CVs and Applications, Interviews and Assessment Centres.*
- *Claire had a 60 minute careers discussion with a careers adviser*