

N. PhD Physical Sciences, 2010

Faculty:

- Mathematical & Physical Sciences

Current Role:

- Research & Development Engineer

Sector:

- Higher Education
- Engineering & Technology

N. is currently a Research & Development Engineer for a UK based technology company that specialises in the development and manufacture of photomultipliers. Between April 2010 and December 2011, N. was a Postdoctoral Researcher. He has been in his current position since 2012. Since graduating with a PhD his career choices have been motivated by obtaining a permanent full-time position rather than postdoctoral contracts. The opportunities to use the knowledge and skill gained through his PhD and to seek greater financial reward have also shaped his career ambition.

N.'s PhD, which is essential to his current work, examined diamond-based nanostructures for electronic applications. This involved research into chemical vapour deposition of diamond coatings, doping of said coatings to produce p-type delta doped diamond layers (5nm) for high power frequency transistors and a study of their physical and chemical properties.

N. explains that his PhD gives him credibility with key stakeholders and also contributes to his career progression. His PhD developed transferable skills which are essential for his role in research. These include presentation skills, project management, meeting deadlines, technical problem solving, writing, networking and understanding how to work effectively with people from different cultural backgrounds. Examples of how these skills were developed during his PhD include academic writing and giving presentations at conferences twice yearly. N. says that all of the skills he acquired were gradually developed and improved with the help of his supervisor. He adds that networking can be an important asset because meeting fellow scientists can inform your own research activity, lengthen your list of contacts and increase the opportunities for collaboration, which can be especially useful when applying for funding. N. highlights the relevance of project management as, 'a major part of any science based PhD as one must manage equipment and develop relations with those who can help you use equipment outside your control.'

When searching for jobs after graduation, N. was not required to gain further qualifications or additional work experience. The job hunting methods he used included talking to recruitment agencies and searching for job adverts online.

For current PhDs about to enter the jobs market in industry N. thinks it is advantageous to have enhanced your ability to problem-solve by compiling succinct technical reports and giving effective presentations while you have studied.

While he was studying N. recalls trying to broaden his technical skills by learning to use different processes; one reason for doing so was to stand out when applying for jobs in industry. N. identifies 'the key to completing a successful PhD is to select a supervisor that has a good track record of graduating PhDs. Many talented students do not make it through purely because of this.' Whether you have a PhD or you are considering one, N. urges you to think long-term when deciding on a career path.

■ Tags: Mathematical & Physical Sciences, Engineering & Technology, Higher Education, Researcher, Non-Academic