

Making a Transition from Academia to Industry

Dr Vishakha Mangale | 26 JUNE 2010 | filed under: Jobs

Making a Transition from Academia to Industry.



Dr Vishakha Mangale
Project Leader,
GE Healthcare,
Medical Diagnostics,
Bangalore

I received my PhD degree in December 2003 in Biochemistry, Reproductive Biology from National Institute for Research in Reproductive Health (ICMR). I worked as a post-doc with Dr Shubha Tole at Tata Institute of Fundamental Research till Oct 2007. We set up a challenging technique - making embryonic stem cell chimeras to study the effects of mosaic gene inactivation in the developing brain. I spent several months at a collaborator's lab in Hyderabad to learn this technique and transferred it to Dr. Tole's lab in Mumbai. I enjoyed this new line of research and the data we obtained was very exciting, hence time flew by. After more than 3 and ½ years of post-doc experience, and a first author paper in Science to show for it, it was time to move on and start an independent career.

Not many job opportunities were available in biotechnology industry in India till last decade. However India has made tremendous progress in the area of Biotechnology in this decade. Completely new arena of bright career has opened up in India. Biotechnology sector is offering deserving candidate jobs in their own country, with salaries that can match global market. This has caused a lot of talent retention and talent return back to India. With so many lucrative opportunities coming up in Biotech industry, I was inclined towards joining industry, though I had not completely closed the option of continuing in academics.

I took opinion from several people who were established in academics as well as industry, to gauge the pros and cons of being on either side. Most evident facts that came out were the "salaries in academics could not match the salaries in industry", followed by "loss of free will in industry to work in a particular area of interest". So I had to take a call keeping in mind that 1) Money is important but it is not about only money 2) What ever I choose, my scientific temperament has to stay alive and thrive. 3) How can I make best use of my PhD and post-doc education and training?

I had been in academics for many years now and seen lives of academicians very closely. Industry was more mysterious and intriguing. In this decade, I have also seen eminent rise in industrial partnerships with international players, and multinational companies moving to Indian grounds to set up their R&D and manufacturing sites. Indian government has also provided tremendous support for growth of biotechnology sector. Keeping all these facts in mind, I decided to set out to try a new career, a new way of life. So I started applying to industries of my interest, which would allow me to work in area of biomarker discovery using genomics and proteomics tools. I was interviewed at 5 industries out of which 2 invited me to join them. It took me more than 6 months of applying before I landed up getting a job of Research Scientist with GE, Global Research Centre, Biosciences lab at John F Welch Technology Centre, Bangalore. I used to present at scientific forums, but other than technical presentation, in industry I had to face several rounds of interviews, with technical and non-technical interviewers and of course HR.

I came to Bangalore in Nov 2007. My husband joined me at Bangalore only after 6 months as he was writing his Ph.D. thesis. He joined as Application Specialist at Micro division of Carl Zeiss India.

His job is to conduct educational lectures, trainings and workshops. Learn high-end microscopy and software and help the scientist understand applications of the microscope. He also demonstrates experiments and the software and help scientist troubleshoot their experiments and make best use of Zeiss equipment in their research. Both of us enjoy teaching. I use to enjoy teaching graduate students at TIFR. Here in industry, other than research I enjoyed my role in “Education and Training”, where I trained customers on Proteomics platform. Today I work with R&D group for Medical Diagnostics business of GE Healthcare and work mostly on discovery projects. Other than research my job includes generating new project ideas, writing reports, making presentations to peers, various committees, clients, collaborators, management etc, attending meetings, interviews, giving expert opinions/consultations and conducting environment health and safety audits. A typical day starts with checking and replying to mails, after which plan for the day is chalked out with the team. This is followed by experimental and other work and meeting to discuss project progress with other project leaders and manager. Meeting with collaborators and counter parts in UK and US are late in afternoon. Day ends by replying to e-mails and reporting results in lab notebook or sending out weekly or monthly reports to peers, collaborators, stakeholders and manager.

Some facts which I learnt being in industry are “one doesn’t have to search for grants to fund your project” but one has to work in “companies area of interest” and many a time there may be a set agenda especially for beginner in industry. One has to remember that research in industry is “product driven”. However with little smartness and innovation one can create new ideas, which are interesting to the employer and which can get translated into real projects.

Some of the project results can also be presented in scientific meeting or can be published in journals. But unlike academics you might not be able to publish or present all the information, as it might be privileged information and might jeopardize the company’s plans. Also, any information that will be published needs to be screened by the legal department prior to release.

There is a widespread notion that there are certain privileges that one loses on joining industry. Flexitime option, which is considered as a major advantage of being in academics, does not exist in most Indian companies. However many multinational companies allow employees flexitime option, depending on nature of work. Awards and rewards in industry are something that can give a moral boost as well as recognition in the company. Crèche at work place has also made life easy for many working mothers. Some companies also allow “work from home” option, but this will depend upon the nature of work. I could avail “work from home” option for sometime during my pregnancy when lab work permitted. Also there are “would be mother parking lots” and a room for “would be mother to rest and lactation room” at JFWTC. Many companies are recognizing the need of having such facilities on their campus and are helping their women employees grow in their career. Expectant mothers like me are making best use of these facilities and can be at peace about baby care, when at work.

Not all companies in India abide by labour policies. Hence choosing a correct employer will save frustration if any later on. It is best to talk to people, who are already working with the company that you intend to join. India has a large reservoir of scientific manpower, network of research labs and growing capabilities in manufacturing and clinical research. Many multinational companies have recognized the potential of India and Indian researchers. Hence opportunities are many but choosing the best one will take reasonable amount of time.

When I decided to join industry, I had given myself 2 years time to revert back on my decision. This is my third year with GE. I am leading projects and enjoying every bit of my work. GE has helped me grow professionally as well as personally. Special trainings at GE have and will help me walk the scientific career path and achieve much more in years to come. Flexing your style to work with team members and art of delegation are two very important qualities needed to be able to grow in industry. In multinational companies there are many avenues to grow, like scientific, technical, managerial career path, but one needs to make choices at different points in career. For now, I have chosen a scientific career path and hope to manage number of business portfolios comprising of several projects in years to come. Wherever I am on the professional ladder, one thing that has remained common inspite of all the changes and the transition from academics to industry is “passion for science”.

- [Jobs](#)

Source URL: <http://www.indiabioscience.org/article/vishakha-mangale>