



Student: Giovanni Pasquino
Royal Holloway University
Placement: Tranquillity
Aerospace Ltd.
Role: Electronic Testing and Design

“I think it has given me the opportunity of getting to know a different type of work environment from the academic one. It has helped me discover new areas which I could be interested in, such as electronics. ”

“Giovanni is a good example of someone who has really benefited from a placement.” - Academic Supervisor

What is the subject of your PhD?

My PhD focused on magnetism in condensed matter. In particular, I studied the magnetic properties of different material using the neutron scattering technique.

Why did you decide to do a placement?

I found out about the possibility of this placement during a GRADnet Winter School organised by SEPnet. We took part in an industry challenge which involved creating a rocket for sending satellites into space which I found very interesting. I thought the placement would be a great chance to be involved in an interesting job completely different from the main subject of my PhD. It would be a good opportunity to learn and develop other skills and at the same time this would be a starting point to finding a permanent job.

Describe a typical day on placement:

I worked essentially on the electronic section of a rocket to send into sub-orbit. This rocket uses steam as a propeller. The main engine and the complementary sections of the rocket are controlled by electronic boards, in particular Arduino boards, and the master board is an Intel Edison board. I essentially tested these boards in order to obtain the required control. These boards can be programmed using a language very similar to C++. Thus on a typical day I developed electronic circuits involving Arduino boards and programmed them for specific requirements. I designed and developed some parts of the electronic circuits. To draw the circuit I used the software AutoCad then soldered the various components on to a specific board.

What skills and knowledge do you feel you have learned during the placement?

I did not learn a specific skill but I gained experience of a work environment and working as part of a team. I used some of the skills learnt during my student career such as programming. I have become more confident in my personal skills and in my use of the English language (I am not British).

How do you think doing a placement has benefited you for the future?

I think it has given me the opportunity of getting to know a different type of work environment from the academic one. It has helped me discover new areas which I could be interested in, such as electronics. I can also update my CV with work experience and this could be really important for obtaining a permanent job.

What advice would you give to a PGR student who might be interested in seeking a placement?

I think good advice would be to apply for this kind of opportunity during the final part of a PhD when the thesis is almost finished or while making thesis corrections as in my case. In this period a student has some free time which can be put to good purpose such as doing a placement which can be quite exciting.