

## The Undergraduate Ambassador Scheme (UAS) as a Final Year Project at Bristol ChemLabS

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[www.chemlabs.bris.ac.uk/outreach/chemnet/Chemnet\\_recent.html](http://www.chemlabs.bris.ac.uk/outreach/chemnet/Chemnet_recent.html)

### UAS Overview

The School of Chemistry participates in the Undergraduate Ambassadors Scheme (UAS) and has a group of 6-7 final year chemists participating in the 'Schools Project' each year. The undergraduate chemists go into local schools to work as teaching assistants and to act as role models.

The UAS is a national scheme. It is designed to:

- Encourage a new generation of scientists
- Provide key skills to undergraduates
- Supply role models for pupils
- Give support to teachers



### What do the Undergraduates Gain from this Experience?

Participating undergraduates will have gained substantial experience of working in a challenging and unpredictable working environment. The transferable skills they will have had an opportunity to attain include:



- **Understanding the needs of individuals.**
- **Interpersonal skills when dealing with colleagues.**
- **Public speaking and communication skills.**
  - **Staff responsibilities and conduct.**
    - The ability to improvise.
    - Team-working.
  - Standard teaching methods.
  - Giving (and taking) feedback.
- **Organisational, prioritisation and negotiating skills.**
- **Preparation of lesson plans and teaching materials.**
- **Handling difficult and potentially disruptive situations.**

They will have gained experience of answering questions about their subject and will be able to assess and devise appropriate ways to communicate a difficult principle or concept. They will also develop a better understanding of and confidence in their own degree subject.

*"Doing this project made a lot of sense for me as I knew I wasn't after a career in chemical research and teaching was, and still is, what I want to do.*

*Had I not done this project it may have been difficult to get teaching experience this year as well as spending hours in a lab.*

*As the project was so open-ended a lot of initiative and creativity was needed but this was an enjoyable challenge. Going back to basics and seeing science from the perspective of a primary school pupil helped me develop a fresh approach to science."*

Jane Boyes

### What is involved?

- **Classroom observation and assistance:** Initial contact is made with the teacher and students as a classroom assistant, watching how the teacher handles the class, the lesson structure, the level of science taught and offering practical support to the teacher in the laboratory.
- **Teaching assistance:** The teacher assigns the undergraduate actual teaching tasks which vary depending on specific needs and the undergraduate's own ability as it develops over the two terms. This could include offering problem-solving coaching to a small group of higher ability students, practical demonstrations or taking sections of a lesson for the whole class.
- **Special projects:** The undergraduate devises a project on the basis of discussion with the school and Bristol ChemLabS School Teacher Fellow and their own interests. The project must be useful to the school or Bristol ChemLabS as a minimum.
- **Extra-curricular projects:** The undergraduate may be supervised in helping to run an out-of-timetable activity such as a science club, coaching periods for higher ability students or engaged in a chemistry outreach event.



### Assessment

The UAS chemistry students record their experiences in a 'Reflective Diary' (the equivalent of a laboratory notebook), give a presentation to peers and produce a written project report.

Examples of presentations may be found at:

[www.chemlabs.bris.ac.uk/outreach/resources/UAS\\_Presentations.html](http://www.chemlabs.bris.ac.uk/outreach/resources/UAS_Presentations.html)

### References

This information was adapted from Overview Document for Schools, UAS, 2007  
[www.chemlabs.bris.ac.uk/outreach/UAS\\_Overview\\_Document\\_2007.pdf](http://www.chemlabs.bris.ac.uk/outreach/UAS_Overview_Document_2007.pdf)