

T Level Laboratory Science Overview

Summary

This T-Level course is for students who are passionate about making a difference. Specialising in Laboratory Sciences, this course provides you with the fundamental theory, safe behaviours, and practical skills required to excel in the science sector. You'll gain a comprehensive understanding of how the industry works, core scientific knowledge and concepts, covering Biology, Chemistry and Physics. As well as key regulations including best scientific laboratory practice, health and safety, and information management

Students will be able to utilise specialist equipment in bespoke classrooms and laboratory and take part in classes where they will learn about a wide range of important factors to prepare them for transition to industry.

Industry Work Placements play a vital part of the T-Level programme and students will spend over 315 hours with 1 or 2 employers over the 2 years. The knowledge and skills taught and developed in the classroom can be refined during this time and designated industry professionals will support students to progress and become competent.

Upon completion of this qualification students will have threshold competency meaning that they will be ready to enter the workforce but will require further training once they have done so.

As this T-Level qualification is the equivalent to 3 A-Levels and carries the same amount of UCAS points as these, progress onto a related university course is a possibility.

Course Structure

This is a Level 3 qualification providing learners with the knowledge, skills as well as behaviour and attitudes required to progress into skilled employment, technical training or onto higher education.

Students complete a minimum of 315-hours of industry specific work placement over both years of the qualification. This work placement is designed to fully support the learning and progression of students throughout the course in science industry related knowledge and application of skills.

Students can expect to cover the following content over the two years of the qualification:

Core scientific knowledge of biology, chemistry and physics, studying a range of topics from cells, microbiology and immunology, structure of materials and chemical properties, chemical analysis of substances, electricity, magnetisms, particles, radiation and kinetic changes

Scientific analytical techniques

Scientific methodology

Experimental equipment and techniques

Understanding the science sector.

As well as learning about specialised units in the second year linked to scientific skills, techniques, data collection and analysis and how to identify and resolve issues with laboratory equipment.

Assessment

Similar to other T Level qualifications, students are assessed through a variety of methods. In Year 12, students will sit the employer-set project, a controlled assessment consisting of digital written tasks as well as recorded role plays. Two written exams will also be sat in the Summer of the 1st year.

Year 13 students are assessed by completion of literature reviews, risk assessments, practical assessments and data analysis tasks.

Progression

T Levels are equivalent to 3 A-Levels and so hold the same number of UCAS points. Successful completion can lead to:

- Progression onto a full degree in nursing or a selection of other health-related degree courses
- Progression onto a nursing degree apprenticeship.
- Science Technician, e.g. quality control, research and development
- Clinical Laboratory Technician
- Industry and Manufacturing Technician
- Science Technician in the Education sector