

## **Synopsis of the Science department at The Bemrose School.**

The Science department at The Bemrose School has a wide range of experienced and enthusiastic teachers from a variety of backgrounds, some of whom have experience working in other professions before entering teaching, which they can call on to help make science relevant to student's lives and help bring science to life.

### ***Curriculum Vision***

At Bemrose School we want a curriculum that encourages enquiry and to foster an enthusiasm to find out more and to ask the question 'why?' We want a curriculum that develops an enquiring mind and encourages a healthy scepticism. We want students to enjoy learning about science and to encourage a passion for life-long learning that can be shared with their families as they journey through their lives. We want them to develop into critical thinkers that will allow them to be able to question and make good judgements about what they read in newspapers and see on the news. We also want to develop students that can communicate clearly and confidently in a range of situations.

We want to teach them 'powerful' knowledge that takes them beyond their own everyday experiences by sharing with them knowledge that they're unlikely to learn outside of the science classroom that will allow them to compete academically with their peers across the country enabling greater social mobility. We want students to develop a scientific knowledge that they can apply to their lives, making sense of the world around them, that they can use in their jobs, knowledge they can share with their families. We want them to think and see the world like scientists and to develop practical skills, bringing theory to life, fostering the scientists of the future.

Trips are offered to different groups in all Key Stages and we have afterschool 'period 6' lessons for students that wish to develop their understanding further and to deepen their knowledge.

Our ethos is to work smart. We aim to provide the best possible structures to help our students succeed and support them in their learning journey. We offer various revision events before and after school and during the holidays for students who need that extra boost and we are proactive in tracking students' progress closely to allow us to highlight and help students that require extra support to achieve their potential.

### ***Science Resources***

We have great resources with 9 brand new labs, equipped with 75inch plasma interactive screens and teaching aid such as visualizers in every lab to help teaching and learning and to bring technology into the classroom.

The professional development of teachers in the school, and in the department is at the heart of the school ethos. At our most recent Ofsted, inspections it was commented that:

*'Teachers are extremely complimentary about the support and professional development they receive ... [they] told inspectors that their confidence as practitioners was 'really developing' as a result of this work.'*

In Years 7, 8 and 9 (up until January) students, follow the KS3 Science programme of study "Activate Science". The programmes of study cover the National Curriculum areas of Biology, Chemistry, Physics and Working Scientifically. There is a specific focus on investigative skills and the development of the scientific method.

In January, Year 9 students move on to more challenging key stage 4 topics and get a chance to develop their scientific skills needed for GCSE.

In the second half of Year 9 and in Year 10 and 11 students will follow the KS4 programme of study to prepare for either Combined Science (Trilogy) AQA GCSE or Triple AQA Science (if chosen as an option).

In Years 12 and 13, we offer Pearson BTEC Level 3 National Extended Certificate in Applied Science and Forensic and Criminal Investigations that students can study depending on entry requirements. We have aspiration to offer Biology, Chemistry and Physics into the future at A' level. Students that achieve a grade 4 or higher in Combined or Triple Science GCSE can study.