



Watford Grammar School for Girls

Department Information

Mathematics

The Mathematics Department is a large, well-established, enthusiastic and friendly department of experienced teachers. All of these are Mathematics specialists who work together very well as a team, with an ethos of transparency and support. The department is also fully engaged in training new teachers and regularly enjoys supporting colleagues through both the School Direct and PGCE routes, with further support in place for ECTs. The Department has its own building - opened in September 2009 with 10 teaching rooms and a staff room. Each classroom has an interactive whiteboard.

In Year 7 the teaching groups are mixed ability form groups until the autumn half term. The students are then put into two half year bands of sets based on ability. From Year 8 to Year 11, the students are taught across the year in sets. The set size is dependent upon the ability of the students and can vary in size from 10 to 32 students. At Key Stage 4 we follow the Edexcel specification with approximately 80% of the cohort taking GCSE at Higher Level.

In the Sixth Form the Edexcel syllabus is followed. There are currently approximately 200 students taking A Level Mathematics with a substantial number also studying Further Mathematics. The current entry requirement for A-Level is a grade 7 at GCSE, with a grade 8 or 9 needed for Further Mathematics. We have recently introduced Core Maths, a level 3 qualification which is equivalent to an AS level. The entry requirement for Core Maths is a grade 5 at GCSE.

Across Key Stage 3 and 4 we have a range of resources to support teaching. This includes use of text books and online resources, such as Mathspad, Mathsbox, and Kerboodle. At Advanced Level we use the Pearson books for the Edexcel specification.

A wide and varied programme of extracurricular events is key to our work within the department. In the past we have had visits in the past from prominent Mathematicians including Matt Parker, Ben Sparks and James Grime. The Department encourages students to take part in the UKMT Mathematics Challenges, the Hans Woyda quiz competition and the Herts Team Maths Challenges

The school has an academic Sixth Form; students study A levels. We do not offer any vocational subjects or diplomas. Of the 200 students in year 13, approximately 95% will continue on to Higher Education. Some students will take Mathematics degrees. Other students will use their Mathematics for courses such as Economics or Science/Medical degrees. Increasing numbers of students are going on to study Engineering at Universities such as Cambridge, Edinburgh and Sheffield.

Broad Aims of the Department

- To foster a love of Mathematics through enthusiastic and well-informed teaching that inspires
- the students' interest and curiosity.
- To provide opportunities for all students to develop confidence in Mathematics as well as being challenged with new concepts and problems to solve.



Watford Grammar School for Girls

- To ensure that all pupils have a working knowledge of Mathematics, attain a qualification allowing them to access any future opportunities and possess the skills required to use Mathematics effectively in their Further Education and future career.

Additionally all members of the department must be able to :

- share ideas and work effectively as part of a team
- incorporate ICT into classroom teaching
- relate well to pupils and be prepared to give time to pupils outside normal lessons
- be involved in extracurricular Mathematics activities
- recognise the importance of good organisation and time management skills
- embrace the ethos of the school

This school is committed to safeguarding and promoting the safety and welfare of children and young people. All staff and volunteers are expected to share this commitment.