# **Brookfield Community School**



## MATHS AT BROOKFIELD

# "Every student a mathematician"

The Maths Department at Brookfield School is a hard-working and successful team, which is frequently at the forefront of developments in education. We are proud of our achievements, which we feel are a direct result of strong teamwork, sharing good practice and a commitment to providing the best opportunities for our students' success. As a school with a comprehensive intake, we work hard to meet the needs of all individuals who attend the school and aim to ensure that all make good or outstanding progress.

Based on the top floor of the main school building, we have enabled the creation of a clear identity and ethos. Colleagues consistently share resources and teaching and learning strategies and there is a positive and supportive level of professional discourse. The Department is well resourced with a wide range of texts books. We have access to laptop trolleys and all Maths rooms are equipped with Interactive whiteboards and internet access.

#### **Key Stage 3**

At Key Stage 3, groups are set according to ability. All groups follow a Mastery course based on a scheme of work developed using materials from the White Rose Hub which have been redesigned by Brookfield staff. These materials include problem solving, functional mathematics, rich tasks, thinking skills and computer software packages alongside numeracy strategy units. To this extent, KS3 fully prepares students for their GCSE courses.

### **Key Stage 4**

In Key Stage 4 students are taught in one setted block. We follow the AQA Linear syllabus as used by most schools across the Trust. In a similar way to Key Stage 3 the resources used to deliver lessons are largely those created and developed by Brookfield staff themselves.

Teachers follow their groups throughout Key Stage 4 to provide consistency in these crucial years. A highly structured and successful morning intervention programme is in place in Year 11 in order to support the whole school priority of raising attainment and progress of students in Maths. In addition to GCSE Mathematics we also offer to the top two sets the chance of studying the AQA Level 2 in Further Maths. This has been a real success for the last two years and we see this as an important part of our curriculum to improve the progress of high attainers.

#### **Key Stage 5**

We are one of the most popular A level subjects in the school and our Sixth Form students follow the AQA A-Level syllabus. We also have a Further Mathematics class, studying units including Further Pure Mathematics, Mechanics and Statistics. Teaching at Key Stage 5 involves engaging and challenging activities that are used to interest and enthuse students as well as developing understanding and practicing the skills that are required. This is in conjunction with promoting independence and the rigor needed to be successful in post-16 mathematics.

We also offer students the chance to study the AS Core Maths course again following the AQA syllabus.

In all our work at Brookfield we are driven by the goal of enabling students to achieve their best. We do this by focusing on teaching and learning and working collaboratively to create activities that allow students to develop independence, understanding and skills that prepare them for success in exams and when they leave Brookfield. This ensures Mathematics lessons at Brookfield are varied, engaging, challenging and effective. Work in lessons is supported by our weekly support session 'Maths Drop in' which provides students with an informal environment where they can get help or do homework.

In the next two years the department considers its main priorities to be:

- Developing and embedding a 5 year Mastery Curriculum.
- Developing high quality Mastery lessons so that they contain all of the "5 big ideas".
- Improve the progress measures for all students.
- Closing the gap between PP and non-PP students in terms of the progress made.
- Preparing students to be functional in mathematics problem solving skills both for the purpose of exam success and in the world of work.
- Teaching and learning development on questioning, providing quality feedback, independent learning and effective revision techniques.

Kevin Styles Associate Assistant Head 2021