## Year 10

## **Summer Second Half-Term**

Maths

This term we will be learning about Pythagoras' Theorem and Trigonometry. Students need to understand, recall and use Pythagoras' Theorem in 2D, including leaving answers in surd form and being able to justify if a triangle is right angled or not. Students will calculate the length of the hypotenuse and of a shorter side in a right-angled triangle, including decimal lengths and a range of units. Next, students need to understand, use and recall the trigonometric ratios and apply them to find angles and lengths. We will finish the term by looking at exam style questions combining both topics.

**English** 

Year 10 will be working through English language papers 1 and 2. Pupils will learn how to plan questions and structuring work evaluating the skills needed to answer different types of questions in both papers. Pupils will practise scanning and extracting language techniques under timed conditions. Pupils will practise writing in PETER paragraphs and continue to perfect the skill of embedding their quotations into their writing in a sophisticated manner. Pupils should start to master their own voice and command a clear rhetoric.

Science

Students will look at levels of organisation and gain an understanding of structural, functional and behavioural adaptation. Students will explore abiotic and biotic elements that affect ecosystems, such as the water cycle, carbon cycle, population increase, predation, pollution, deforestation, and global warming. Students will discuss how the composition of gases in the Earth's atmosphere has evolved through time, the role of greenhouse gases in global climate change, and the production and effects of atmospheric pollutants. Students will be able to describe the vector-scalar distinction as well as the differences between displacement, distance, velocity, and speed, and I will be able to solve velocity and acceleration issues (inc interpreting distance-time & velocity-time graphs).

Art

This term students are investigating the theme of Power and Weakness. They are Developing ideas and looking at the work of other artists. They will use a variety of media to achieve this. This work goes towards Unit 1 of their GCSE portfolio, which will conclude in January 2023.

**ICT** 

We will learn about the History of ICT in the context of the development of hardware and consumer electronics. Functional Skills Level 1 content: combine information within a publication for a familiar audience and purpose / evaluate own use of ICT tools.

Employability and enterprise:

To gain an overview of the range of opportunities in work and to set goals for a work experience placement.

To prepare for a range of situations that may arise during work experience.

To gain an overview of the rights people are entitled to, and their responsibilities, at work, including health and safety laws.

To evaluate the importance of maintaining a positive online reputation in relation to employment and work. To learn about the range of opportunities that exist in learning and work;

To learn about the experience of taking part in a work experience placement, including reflection on their expectations and concerns;

To learn about the documentation that is required by the school and/or the employer prior to, during and after work experience

To learn about expectations of work experience;

To learn about the attributes that lead to success on work experience;

To learn how to recognise inappropriate and/or unsafe expectations and develop a range of strategies to manage these;

To learn how to overcome challenges faced during work experience.

To learn about responsibilities in the workplace;

To learn how to manage practical problems that might occur during work experience;

To learn about health and safety in the workplace;

To learn about the rights workers are entitled to and how these are protected in the UK. To learn about the concept of having a 'personal brand' and how this can be managed online;

To learn about how social media can present both positive and negative messages to employers;

To learn about the importance of maintaining a positive online reputation.

To learn how to maximise what can be gained from work experience;

To reflect on what they learnt and developed during their work experience placement and how this might affect their future choices.

PE

**PSHE** 

Football - Students will develop a range of techniques of how to control and receive a pass. They will develop the correct techniques for striking the ball at goal. Students will learn how to dribble with both the inside and outside of their feet. We will be competing in matches from 1v1 - 5v5.

## Work Skills

Personal social skills (4hrs)

- These should be developed throughout the unit
- Appropriate and inappropriate behaviour what is generally acceptable and not, and look at different employment types to see where other points might be added
- How to interact appropriately with others at all levels
- How to deal with conflict in the workplace
- Everyday problem solving skills role play

## Citizenship

Theme E: Taking citizenship action.

This term we will investigate how our research informs the planning of our Citizenship Action Projects and learn how to complete an action plan clearly and thoroughly. We will also investigate the different types of campaigning methods available to us when running our Citizenship Action Projects and think about how different methods may be better for different target groups. We will also look at the difference between direct and indirect action. Finally, we will look at the important questions to answer to ensure we can assess and evaluate the impact of our Active Citizenship Projects.

**Catering** 

Pupils will be completing BTEC assessment paperwork and plans and then implementing skills and knowledge they have learnt in Home Cooking Skills to complete their Level 1 BTEC. They will complete and practical exam and taste each other's dishes. We will then reflect on our work and if there are any skills, we need to focus on developing. We will also discuss the benefits of learning how to cook for ourselves. Students will then annotate practical exam pictures explaining.