

Year 10

Autumn 1st Half-Term

Maths

This term we will be focusing on number. Students will be secure in their understanding of integers, place value and decimals, we will move on to a recap of factors, multiples and primes which will enable us to consolidate their understanding of indices, powers and roots. Students will be able to order and convert between FDP and be able to express a given number as a percentage of another number. We should be able to find a percentage of a quantity with and without a calculator and be able to use multipliers to increase or decrease. We will end the term by revisiting prime factor decomposition and use Venn Diagrams to calculate HCF and LCM of two or more numbers.

English

This term year 10 will be exploring the non fiction texts Touching the void, Tsunami and Shark attack. Pupils will examine character's thoughts and feelings through language and sentence structure. Students will learn how tension and excitement are created through close analysis leading to well structured paragraphs in response to a range of exam style questions. Pupils will compare and contrast a variety of techniques and styles used in 19thC and 20thC extracts in both fiction and non fiction texts. To ensure understanding of the writer's craft pupils will create a range of fiction and non-fiction texts to improve their writing skills. Year 10 pupils will also work towards their Functional Skills level 1 and 2 reading, writing and speaking and listening.

Science

Student will do the following; consider the main organelles and their roles in eukaryotic and prokaryotic cells giving examples of specialised cells with their adapted features as well as explain mitosis. Students will be able to explain the use of stems cells in animals and compare and give examples of diffusion, osmosis and active transport. Students will explain how enzymes are affected by temperature and substrate concentration. Students to explain how structure is related to the function of arteries, veins and capillaries, as well as major plant structures & cells. In chemistry, main features of an atom and the periodic table including how they were developed, common trends between different group, metals and non-metals and also complete/balance word and symbol equations (inc atomic mass and charge calculations). Different energy transfers and calculations will be completed. Pros and cons of different renewable and non-renewable energy sources shall be investigated. Students to define electrical charge, current, potential difference/ voltage and resistance are and calculate the majority of the value of these quantities by interpreting series or parallel circuits diagrams as well as interpret IV graphs.

Art

This term students are investigating the theme of Power and Weakness. They are creating mind maps, artist research pages and photomontage around the theme. This work goes towards their GCSE portfolio, which will be marked in Y11 or taken to their next school.

ICT

Students will learn the Legal Framework around ICT including Copyright law, Data Protection laws and Computer Misuse act. *Functional Skills Level 1 content: identify the ICT requirements of a straightforward task / interact with and use ICT systems to meet requirements of a straightforward task in a familiar context.*

PSHE

Health and Wellbeing - Mental health - We will be exploring mental health and ill health, stigma, and safeguarding health during periods of transition or change. We will learn tools for building emotional resilience and we will learn when and how to access support and treatment.

PE

Boxing - This term our boxing focus will be on footwork, stance, body-movement and defence. Discipline –students will begin to understand mental toughness and what it takes to be mentally tough.

Work Skills

Understand the key terminology associated with the unit – ‘Employer’ ‘Employee’ ‘Expectations’ and ‘Standards’. Awareness of the different aspects of H&S in the workplace (general and specific for practical areas). Highlight potential risks and hazards. Focus this on the area of career they are intending to follow. Responsibility of employer and employee.

Citizenship

Theme A: Living together in the UK. This term, we will explore the meaning of identity and how the concept of identity is shaped and how it can change over time. We will also delve into debates around identity in the UK and the ideas around a national identity and discuss the concept of British values. Finally we will analyse the changing UK population, in relation to its composition and the impact of a changing population on society.

Catering

Pupils will deepen their knowledge on diet and health. We will be learning about malnutrition and over nutrition and the different health conditions they can cause and how this will impact our lives. Pupils will also be introduced to Home Cooking Skills BTEC Level 1. We will look at Hand washing rules when preparing and cooking foods. Pupils will identify a dish they feel confident in making and will plan to make this for their friends.