

PCHS Curriculum Information

Course Title: Applied Science	Exam Board:AQA	Specification Code:360 GLH (TVQ01029)
<p>How will students be assessed?</p> <p>Students will sit 2 external exams at the end of Year 12 and submit 1 large unit of practical based coursework consisting of 6 smaller sub pieces. During the course students will be taught theory which they will then use to carry out their coursework.</p> <p>Unit 1 - Key concepts in science This is predominantly a theoretical unit in which learners develop their knowledge and understanding of key concepts in science and how they are applied in the medical, healthcare, food, environmental, chemical, pharmaceutical, material and automotive industries.</p> <p>Unit 2 - Applied experimental techniques Practical unit</p> <p>Unit 3 - Science in the modern world This unit will enable learners to develop their analytical, evaluative and critical thinking skills. These are important skills for scientists and technicians working in research, product development and scientific testing.</p>		

<p>Biology Unit 1 + 2 - Content and coursework Cell structure Transport mechanisms The heart Homeostasis Breathing and cellular respiration Photosynthesis and food chain productivity</p> <p>Unit 3 Science in the modern world</p>	<p>Chemistry Unit 1 + 2 - Content and coursework Atomic structure Bonding The Periodic table Colorimetry coursework Volumetric Analysis coursework Enthalpy changes Amount of substance</p>	<p>Physics Unit 1 + 2 - Content and coursework Useful energy and efficiency Electricity and circuits Resistivity Coursework Dynamics Specific Heat Capacity coursework</p>
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KEY CONTENT

Half Term 1

Unit 1 and 2 will be taught in parallel, theory will be taught and then backed up with the practical unit.
Taking physiological measurements (including peak flow, lung volume, heart rate)
Using respirometers to measure rate of respiration
Rate of photosynthesis
Atomic structure
Bonding
Specific heat capacity coursework.

KEY CONTENT

Half Term 2

Unit 1 and 2 will be taught in parallel, theory will be taught and then backed up with the practical unit.
Taking physiological measurements (including peak flow, lung volume, heart rate)
Using respirometers to measure rate of respiration
Rate of photosynthesis
The Periodic Table
Colorimetry coursework
Specific heat capacity coursework.

Half Term 3

Unit 1 and 2 will be taught in parallel, theory will be taught and then backed up with the practical unit.
Taking physiological measurements (including peak flow, lung volume, heart rate)
Using respirometers to measure rate of respiration
Rate of photosynthesis
Volumetric analysis coursework
Measuring resistivity coursework.

Half Term 4

Unit 1 and 2 will be taught in parallel, theory will be taught and then backed up with the practical unit.
Taking physiological measurements (including peak flow, lung volume, heart rate)
Using respirometers to measure rate of respiration
Rate of photosynthesis
Enthalpy changes
Measuring resistivity coursework.
Coursework should be complete by Easter.
Unit 3 will be formally taught but concepts will thread through all the previous terms

Half Term 5

Unit 1 and 2 will be taught in parallel, theory will be taught and then backed up with the practical unit.
Amount of substance
This Half Term will focus on any resubmissions of the coursework ready for the final hand in date of the 1st May 2023
Unit 3 will be formally taught but concepts will thread through all the previous terms

Exam preparation for unit 1 and 3

Half Term 6

Exam preparation for unit 1 and 3

Begin unit 4 theory to link in with unit 5 on the nervous system and reaction times.
Begin unit 6 theory and risk assessments on microbiology.