

Subject	Year	Term
Science	8	1
Topic		
8B1 The Body		
Content (Intent)		
Prior Learning: KS1 and KS2 National Curriculum and 7B1 The Basics of Life		
- To be able to label the main bones of the skeleton, to link the structure of bones to their function. - To describe the types of joint in the body, to be able to link movement to joint use - To identify the main muscles of the body, to describe the function of antagonistic pairs of muscles, to experiment whether there is a correlation between muscle size and performance - To build a model to represent our arm, to use equations to work out forces on Muscles, to link models to real life - To describe the reactants and products of aerobic respiration, to compare combustion to respiration, to link aerobic respiration to exercise - To be able to label the main structures in the lungs, to use a model and describe weaknesses and strengths, to explain inspiration and expiration - To define the term diffusion, to link adaptations to diffusion in organisms - Describe what happens during an asthma attack, to explain why asthma has a negative effect on the body, to explain the reason inhalers are prescribed to asthma sufferers - To describe the contents of cigarette smoke, to explain the effects of cigarette smoke and vaping on the body. - To describe how the function of different blood cells, to calculate how much of each cell there is in the blood, to be able to use models to explain the components of the blood		
Future Learning: 11B1 Cells & Cell Division and 11B3 Inheritance & Evolution		
How will knowledge and skills be taught? (Implementation)	How will your understanding be assessed & recorded (Impact)	
Demos: whoosh bottle and screaming jelly baby for respiration. Practical work: analysis of tendon insertion point and affect on load carried by arms. Dissection of the lungs (optional or demo) to show anatomy, required practical on how muscles work. Written: Notes and completed worksheets in exercise books. Data from reputable sources to be used to explain the dangers of smoking and vaping.	- 2 x Standard Homework Tasks: Level given. Written feedback. Response expected. -1 x End of Topic Test: Level given. Verbal feedback to class and individuals.	
How can parents help at home?		
Look at 8B1 topic resources on the VLE and use the CGP KS3 Study Guide provided. Use appropriate YouTube channels [Cognito, PrimroseKitten, KhanAcademy, FuseSchool, AmoebaSisters, Freesciencelessons] and documentaries [TV series: DNA, TED Talk: How we discovered DNA, Netflix: Breaking Boundaries The Science of Our Planet & Our Planet] Take an interest! Be curious and ask your child about their learning.		
Helpful further reading/discussion		
Reading Horrible science series BBC– Incredible human journey How the body works. The facts simply explained How to grow a human	Vocabulary Lists <i>Skeleton, joint, antagonistic pair, respiration, energy, trachea, bronchi, alveoli, capillary, asthma, inflammation, side effects</i>	Careers Links Medicine (doctor/ nurse) Physiotherapy general/ sports Personal training

