

Year 9: Curriculum Intent		
The geography department aims to provide year 9 students with a challenging and diverse curriculum. In year 9 our focus is on understanding how human and physical processes interact to influence, and change landscapes, environments and the climate; and how human activity relies on effective functioning of natural systems. This ‘big idea’ is supported by the foundational knowledge and skills during years 7 and 8. Students begin in our local area (similar to year 7) studying Etherow Country Park as an example of a small-scale ecosystem. A wide range of biotic and abiotic features are analysed with the concept of interconnection and interdependence, made more explicitly by analysing a range of physical and human influences. Global comparisons are then made through the study of the Tropical Rainforest and Hot desert biome. The ‘big idea; that human activity depends on effective ecosystem functioning is explored through deforestation in the Amazon Rainforest and tourism in the Thar Desert. In both places, economic activity depends on the effective conservation of these fragile ecosystems. Students are then encouraged to critically evaluate why this approach is often overlooked in the pursuit of rapid economic growth. Students then return to the U.K to consider the important role water has in shaping the physical landscape of the U.K through its river processes. Year 9 students are continually asked to reflect on how physical processes are interconnected to the human activity in different places and equally how human activity is interconnected to the physical processes. Students are asked to complete a variety of decision-making exercises where the sustainability of strategies to manage river flooding is assessed. Overall, year 9 students learn to appreciate interconnected different aspects of geography are from all over the world. All learning links back to the ELT connected curriculum concepts: Cause and effect, Power, Influence, Significance, Appreciation and Structures as well as the 6 Geography concepts: Place, Perspectives, Processes, Patterns, Change and Interconnections.		
Year 9 Essential Knowledge Summary		
Schemata 1: Ecosystems	Schemata 2: Tropical Rainforests	Schemata 3: Hot Deserts
Composite knowledge: Pupils will gain an understanding of how effective ecosystem function relies on the interdependence of all living and non-living components within it. Exemplification through the study of Etherow Country Park, Stockport. Component knowledge: Foundational knowledge: Declarative knowledge: • An ecosystem is a collection of plants and animals in an environment. • Biotic features are living • Abiotic features are non-living • A range of physical and human factors can change ecosystems over time. • Biomes are global ecosystems largely influenced by latitude. Procedural knowledge: • Identifying producers as well as primary, secondary and tertiary consumers on food chains and food webs. • Calculating changing biomass between trophic levels. • Interpreting climate graphs for a range of global biomes. • Extended writing (PEDaL paragraphs) Upper Hierarchical knowledge: • The importance of decomposers and nutrient cycling in ecosystems. • Reasons for energy loss through trophic levels. • Additional factors influencing global biomes: distance from the sea, ocean currents and altitude.	Composite knowledge: Pupils will gain an understanding of how Tropical Rainforests have high biodiversity due to their proximity to the equator. This biodiversity is under threat from resource exploitation yet sustainable management strategies do exist. Case study of the Amazon Rainforest. Component knowledge: Foundational knowledge: Declarative knowledge: • Located between the Tropics. • Hot and wet climate • High biodiversity. Home to 50% of the world’s plant and animal species. • Plants and animals have adapted to suit the climate. • Resource exploitation by humans is a significant threat to biodiversity. • A range of sustainable management strategies can help to protect biodiversity. Procedural knowledge: • Describing the distribution of Tropical Rainforests. • Completing climate graphs using climate data. • Describing climate making use of climate graph data. • Analysis of nutrient cycling in the Rainforest. • Understanding stakeholder viewpoints on deforestation. • Extended writing (PEDaL paragraphs) Upper Hierarchical knowledge: • How high biodiversity creates competition for sunlight and explains plant adaptations. • How the economic development of equatorial nations influences deforestation. • How geopolitical factors create limitations to sustainable management of Tropical Rainforests.	Composite knowledge: Pupils will gain an understanding of how Hot Deserts have low biodiversity due to their proximity along the Tropics. Despite significant climatic challenges, hot deserts still hold opportunities for human development. Case study of the Thar Desert. Desertification is a significant threat to semi-arid environments on the fringes of hot deserts. Component knowledge: Foundational knowledge: Declarative knowledge: • Located along the tropics • Hot and dry climate with large diurnal temperature range. • Low biodiversity. • Plants and animals have adapted to suit the climate. • Humans have adapted to the challenges of Hot Deserts to give opportunities for economic gain. • Desertification is a risk to semi-arid environments due to a range of physical and human factors. Procedural knowledge: • Describing the distribution of Hot Deserts • The difference between monthly average temperatures and diurnal temperatures. • Analysis of nutrient cycling in the Hot Desert. • The process of desertification and how physical and human factors contribute. • Extended writing (PEDaL paragraphs) Upper Hierarchical knowledge: • The influence of the Hadley cell on climate and diurnal temperature range. • The influence of infrastructure developments on the opportunities available in the Thar desert. • How economic development influences the impacts and management of desertification in the Sahel region of Africa.
Schemata 4: River Landscapes in the U.K		
Composite knowledge: Pupils will gain an understanding of how rivers help to shape the landscape of the U.K through a variety of processes. These processes will vary along the journey of a river and therefore result in distinctive landforms at various points along its course. Exemplification through the study of the River Tees. Rivers can be hazardous to nearby populations due to a range of physical and human factors. Management of river flooding is possible thanks to a range of hard and soft engineering strategies. Exemplification through the study of flooding in Cumbria. Component knowledge: Foundational knowledge: • Rivers can shape the landscape through erosion, transportation and deposition. • River processes are responsible for a variety of distinctive landforms along its course. • Flooding occurs due to a range of physical and human factors. • Hard and soft engineering strategies can be used to manage river flooding. Procedural knowledge: • Understanding how river landforms can change over time due to fluvial processes. • How flood hydrographs can be used to determine the risk of a flood occurring • Identifying river landforms on Ordnance Survey (O.S) maps and applying a range of map skills.		

• Using a range of photographs and Ordnance Survey maps to suggest reasons for the characteristics of flood hydrographs. • Extended writing (PEDaL paragraphs) Upper Hierarchical knowledge • How river characteristics influence human activity. • Assessing the sustainability of hard and soft methods of river engineering. • Appreciating the limitations of hard and soft river engineering in light of increasing extreme weather in the U.K due to climate change.	
Year 9 Final Composite Knowledge End Point	
• How effective ecosystem function is possible through interdependence. • How effective ecosystem function is threatened by a range of physical and human factors. • How human development of global ecosystems brings opportunities and challenges. • How river processes shape the landscape of the U.K • The hazards posed by U.K rivers and the sustainable management of these hazards.	