

GCSE Geography

Curriculum Overview 2020-2021

Core aims of the subject at Key Stage 4

“The study of geography is about more than just memorizing places on a map. It’s about understanding the complexity of our world, appreciating the diversity of cultures that exists across continents. And in the end, it’s about using all that knowledge to help bridge divides and bring people together.” –Barack Obama

At Brine Leas, we aim to create rounded human and physical Geographers. We challenge students to think, act and speak like those working in the field would. We can do this by quality first teaching which ensures students understand geographical principles and can apply them in a variety of familiar and unfamiliar contexts from around the world. We teach content in its totality and constantly vary topics between human and physical geography to provide a varied and balanced appreciation of the ideas, skills and topics in this discipline. Through sequencing the curriculum in such a specific way we ensure a breadth and depth of curriculum to enable students to continually develop understanding of the changing contemporary environments around them with an entwined approach to academic and personal development.

Our curriculum at Brine Leas goes far beyond what is taught in lessons, for whilst we want students to achieve the very best examination results possible, we believe our curriculum goes beyond what is examinable. Students have opportunities to participate in fieldwork in Birmingham and at Cardingmill Valley, Shropshire to apply the skills and knowledge beyond the classroom. Sixth Form geographers at the school undertake an extended residential North Wales fieldtrip to gain the confidence to undertake their own individual investigation on a topic of their choice. They deploy the skills learnt at Brine Leas to formulate an independent piece of work which is worth 20% of their final marks in Geography. These experiences promote personal development as students are gifted opportunities to develop a variety of transferable skills, including independent and group work and assessing risk. Fieldwork also encourages them to work ethically with members of the general public whilst collecting primary data. These challenging opportunities to work out in the field help students to prepare for learning beyond academia. Additionally to these field trip experiences, students have been provided with the opportunity to travel to Iceland, to add depth and breadth to the curriculum studied and to gain first-hand experience of these dynamic landscapes.

Our curriculum in geography forms a backbone to our ethos statement. Examples of how our curriculum supports the ethos statement are by providing stretch and challenge across a broad range of topics. The curriculum provides opportunities for collaborative working as well as independent learning to consolidate knowledge and understanding. Students are explicitly taught skill, knowledge, recall and the vocabulary needed to effectively explain and understand geographical issues in the past, present and future. This ethos is embedded into the curriculum to help provide lifelong learning opportunities beyond the confines of the classroom; all pupils will develop transferable skills to promote lifelong learning.

As a knowledge engaged curriculum we believe that knowledge underpins and enables the application of skills; both are entwined. As a department we define the powerful knowledge our students need and help them to recall it by using knowledge organisers and building in recall across the curriculum. Thus helping the students to organise, recall and learn the content within the geography curriculum.

We build the cultural capital of our students by helping them to understand the contemporary world around them, Students learn about how political decisions can cause changes in the world around them. They learn about the powerful economic forces around them that are bringing about changes to the way that will affect their future careers. Socially the students learn about how countries are at different stages of development and how the lives of people living there are different to their own lived experiences. Contrastingly, students are also given opportunities to develop community involvement through the study of the local workforce and economy and how this feeds into the national economic agenda.

Geography also helps to explain the many environmental issues that are changing the world in which these students live and how to make sense of these effects. This is delivered in a way in which students are motivated to become actively engaged in issues such that will impact on their futures and are inspired by key players in the field of environmental sustainability to ensure that the planet remains fit for purpose for all future generations. As a powerful bridging subject geography has strong cross curricular links to many of the cultural capital topics students are taught in School, such as stewardship in Religious Education.

Further rationale behind our curriculum design includes the alternating from human and physical geography topics regularly so that students get a chance make links between the natural and human worlds. The spiral design of the seven year curriculum is aimed at revisiting topics on several occasions to promote learners confidence and to develop in-depth transferable skills to prepare them for ongoing or lifelong learning. Each time students revisits a topic they are exposed to more complex content, building on what they have already learnt.

In summary, the aim of the curriculum is to ensure that all students can develop an understanding of the complexities of the relationships between the human and physical world, whilst developing transferable skills essential for sustained learning across the social, economic and environmental spheres.

Trips and visits

Students undertake two fieldtrips as part of their GCSE course. In Y10 students visit Birmingham to collect data from a human environment; in Y11 students visit Carden Mill Valley to collect data from a physical environment. Within both environments, students will be able to apply and deepen their understanding of human and physical concepts learned within the classroom.

Assessment

Students will be given a wide range of opportunities to apply their geographical knowledge, skills and concepts of the world through short answer and long answer questions. Over time, their performance will determine their predicted grades based on the core principles of GCSE Geography.

Homework

Students are set homework once a fortnight to embed and master the learning undertaken in lessons through a variety of activities

Clubs and/or intervention

Knowledge recall quizzes are used to improve long-term memory of geographical concepts through the use of knowledge organisers; revision packs are available in the run-up to mock exams; repetition of work to ensure mastery of the PEELLLA structure.

Parental/Carer support

Review children’s learning in books in order to aid revision for knowledge recall quizzes; watch the local and national news (the BBC app is useful to download); watch Newsround and relevant environmental documentaries; test students on the content included within knowledge organisers and work booklets.

Helpful sources of information

BBC news; BBC Bitesize – KS4 Geography
 TEXT BOOKS AND REVISION GUIDES

Year 10 Overview

Term	Knowledge	Assessment	Connections to learning	Connections to future pathways
Autumn 1	<p style="text-align: center;">Physical landscape of the UK – River Landscapes in the UK & Glacial Landscapes in the UK</p> <p>Rivers carry water and nutrients to areas all around the earth; they provide an excellent habitat for food for many of the earth’s organisms, and they provide fertile soils for people and govern where populations live. They play an important part in the water cycle, acting as drainage channels for surface water and a natural barometer for climate change and it’s impacts. They are also an important source of sustainable energy that can help to slow down the rate of climate change. They will revisit and study to a greater depth the processes and landforms that result from river processes, the causes and consequences of flooding and how rivers can be managed. Students will be able to revisit and consolidate their learning of river landforms when they visit Carden Mill Valley to collect data for their physical fieldwork, and they will be able to link their learning to the River Weaver within Nantwich where they live. It is</p>			

likely that students will be able to apply their knowledge to real-life examples of floods throughout the autumn and winter as they learn of events from the news.

Glacial environments will challenge the perceptions of climate change as communicated through the media, and enable students to understanding how past events over millions of years have led to the formation of spectacular upland landscapes in the UK and wider world where rivers often originate. They will be revisit and study to a greater depth to complex processes and macro-landforms and how these may change in the future due to climate change.

The UK has a range of diverse landscapes.

- An overview of the location of major upland/lowland areas and river systems.

- Knowledge of key words through closed questions.
- Knowledge of geographical content through closed questions
- Application of knowledge and skills: short answer and long answer questions.

Prior learning Population (Y7)
 ➤ Spatial distribution of population in relation to the physical landscape of the UK

 Connections to the Curriculum
 SMSC 1A, 1B

- Careers
- Hydrology and water supply
 - Hydrologist
 - River Engineer
 - Geology
 - Surveying
 - Soil survey
 - Mining and quarrying
 - Environment Agency
 - Town planning
 - National Parks Wardens
 - Landscape management
 - Engineer
 - Glaciologist

The shape of river valleys changes as rivers flow downstream.

- The long profile and changing profile of a river and its valley.
- Fluvial processes:
 - erosion – hydraulic action, abrasion, attrition, solution, vertical and lateral erosion.
 - transportation – traction, saltation,

- Knowledge of key words through closed questions.
- Knowledge of geographical content through closed questions
- Application of knowledge and skills: short answer and long answer questions.
- Application of knowledge and skills: short answer and long answer questions, including mid unit assessment.

Prior learning Rivers (Y7), and Coasts (Y9)
 ➤ Concepts of erosion (abrasion), transportation and deposition
 ➤ Upper course landforms of erosion (interlocking spurs, waterfalls, gorges)
 ➤ Middle course landforms (meanders and oxbow lakes)
 ➤ Lower course landforms (levees, floodplains and estuaries)
 ➤ Factors effecting flood risk (physical: precipitation, geology, relief; human:

- Future learning
- Natural Hazards
 - Geography
 - Engineer
 - Environmental Science
 - River Environments & their Management
 - River basin dynamics and river management with Geographical Information Systems Surveyor
 - River environments and their management
 - Hydrology

	<p>suspension and solution.</p> <ul style="list-style-type: none"> • deposition – why rivers deposit sediment. <p>Distinctive fluvial landforms result from different physical processes.</p> <ul style="list-style-type: none"> ➤ Characteristics and formation of landforms resulting from erosion – interlocking spurs, waterfalls and gorges. ➤ Characteristics and formation of landforms resulting from erosion and deposition – meanders and oxbow lakes. ➤ Characteristics and formation of landforms resulting from deposition – levees, flood plains and estuaries. ➤ An example of a river valley in the UK to identify its major landforms of erosion and deposition. ➤ Different management 		<p>urbanisation, deforestation, agriculture)</p> <ul style="list-style-type: none"> ➤ Storm hydrograph (rising limb, falling limb, peak rainfall, peak discharge, lag time, base flow) ➤ River management (hard engineering: dams & reservoirs, embankments; soft engineering: flood warnings & preparations, planting trees) <p>Prior learning Y9 Climate change</p> <ul style="list-style-type: none"> ➤ Global warming <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ Healthy Education 1F ➤ SMSC 1B, 2C,4A Fundamental British Values A 	<ul style="list-style-type: none"> ➤ Flood Risk Assessment, Modelling and Engineering ➤ Environmental Assessment and Control ➤ River Environments and their Management ➤ Environmental Water Management
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strategies can be used to protect river landscapes from the effects of flooding.

- How physical and human factors affect the flood risk – precipitation, geology, relief and land use.
- The use of hydrographs to show the relationship between precipitation and discharge.
- The costs and benefits of the following management strategies:
 - hard engineering – dams and reservoirs, straightening, embankments, flood relief channels
 - soft engineering – flood warnings and preparation, flood plain zoning, planting trees and river restoration.
- An example of a flood management scheme in the UK to show:
 - why the scheme was required

	<ul style="list-style-type: none"> • the management strategy the social, economic and environmental issues. 			
	<p>Physical fieldwork 'How does a river change downstream?'</p> <ul style="list-style-type: none"> ➤ The Bradshaw model; Changes in discharge, channel width, channel depth, velocity, bedload, particle size ➤ River Onny, Carding Mill Valley, Shropshire. ➤ Sampling methods: point/line/area sampling within systematic/ stratified/ random ➤ Data collection techniques: sediment size (longest axis), sediment roundness, channel width and depth, ➤ Presentation techniques: dispersion graphs, mean/median/mode, interquartile range, located proportional 	<ul style="list-style-type: none"> ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer questions based on unknown fieldwork ➤ Application of knowledge and skills: short and long answer questions ➤ Application of knowledge and skills: short and long answer questions in end of unit assessment 	<p>Prior learning of fieldwork data collection and presentation techniques and investigation structure (Y10)</p> <ul style="list-style-type: none"> ➤ Urban fieldwork 	

	<p>circles, cross-section diagram</p> <ul style="list-style-type: none"> ➤ Structure of investigation: Aim, hypothesis, location, risks, methods, presentation, analysis, conclusion, evaluation 			
	<p>Ice was a powerful force in shaping the physical landscape of the UK.</p> <ul style="list-style-type: none"> ➤ Maximum extent of ice cover across the UK during the last ice age. ➤ Glacial processes: <ul style="list-style-type: none"> • Freeze-thaw weathering • Erosion –abrasion and plucking • Movement and transportation – rotational slip and bulldozing • Deposition – why glaciers deposit sediment (till and outwash). <p>Distinctive glacial landforms result from different physical processes.</p>	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions, including end of unit assessment. 	<p>Prior learning Cold environments (Y7)</p> <ul style="list-style-type: none"> ➤ Concepts of weathering (frost shattering) ➤ Concepts of erosion (abrasion and plucking) ➤ Erosional landforms (hanging valley, corrie, arête, pyramidal peak, ribbon lake) ➤ Depositional landforms (lateral/medial/terminal/ ground moraine) <p>Prior learning of Rivers (Y7), and Coasts (Y9)</p> <ul style="list-style-type: none"> ➤ Concepts of erosion (abrasion), transportation and deposition ➤ Concept of Weathering (frost shattering) <p>Prior learning Ecosystems (Y8)</p> <ul style="list-style-type: none"> ➤ Distribution of tundra and polar environments <p>Prior learning Y9 Climate change</p>	

	<ul style="list-style-type: none"> ➤ Characteristics and formation of landforms resulting from erosion – corries, aretes, pyramidal peaks, truncated spurs, glacial troughs, ribbon lakes and hanging valleys. ➤ Characteristics and formation of landforms resulting from transportation and deposition – erratics, drumlins, types of moraine. ➤ An example of an upland area in the UK affected by glaciation to identify its major landforms of erosion and deposition. <p>Glaciated upland areas provide opportunities for different economic activities, and management strategies can be used to reduce land use conflicts.</p> <ul style="list-style-type: none"> ➤ An overview of economic activities in glaciated upland 		<ul style="list-style-type: none"> ➤ Global warming <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ Healthy Education 1F ➤ SMSC 1B, 2C,4A ➤ Fundamental British Values A 	
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	<p>areas – tourism, farming, forestry and quarrying.</p> <ul style="list-style-type: none"> ➤ Conflicts between different land uses, and between development and conservation. ➤ An example of a glaciated upland area in the UK used for tourism to show: <ul style="list-style-type: none"> • The attractions for tourists • Social, economic and environmental impacts of tourism • Strategies used to manage the impact of tourism. 			
Autumn 2	<p>Resource management</p> <p>Changing demographics and economic development is threatening the earth’s ecosystems and creating problems for resource distribution. Within this topic, students will develop an awareness of the uneven distribution of energy, water and food resources; the impacts and possible solutions to improving access to these resources. They will undertake an in-depth study into energy as it is a thought provoking topic that they can make links with the way they and their family lives in comparison to other parts of the world. They will focus on the issue of sustainability through meeting the needs of the present without reducing the ability of future generations to meet their own needs.</p>			
	<ul style="list-style-type: none"> ➤ Food, water and energy are fundamental to human development. ➤ The significance of food, water and 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions Application of knowledge 	<p>Prior learning of Population (Y7)</p> <p>Prior learning of Resource Management (Y8)</p> <ul style="list-style-type: none"> ➤ Global food, water and energy 	<p>Careers</p> <ul style="list-style-type: none"> ➤ Sustainability consultant ➤ Environmental consultant ➤ Environmental manager ➤ Environmental education officer ➤ Facilities manager

	<p>energy to economic and social well-being.</p> <ul style="list-style-type: none"> ➤ An overview of global inequalities in the supply and consumption of resources. ➤ The changing demand and provision of resources in the UK create opportunities and challenges. ➤ An overview of resources in relation to the UK. ➤ Food: <ul style="list-style-type: none"> • the growing demand for high-value food exports from low income countries and all-year demand for seasonal food and organic produce • larger carbon footprints due to the increasing number of 'food miles' travelled, and moves towards local sourcing of food • the trend towards agribusiness. ➤ Water: 	<p>and skills: short answer and long answer questions.</p> <ul style="list-style-type: none"> ➤ Application of knowledge and skills: short answer and long answer questions. 	<ul style="list-style-type: none"> ➤ Provision of food, energy and water in the UK ➤ Global supplies of food, energy and water ➤ Increasing energy supply <p>Prior learning of climate change (Y9)</p> <ul style="list-style-type: none"> ➤ Human causes of global warming <p>Prior learning of Globalisation (Y9)</p> <ul style="list-style-type: none"> ➤ Globalisation through the demand for cheaper products <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ SMSC: 1B, 1C, 1D 	<ul style="list-style-type: none"> ➤ Energy engineer ➤ Hydrologist ➤ Environmental Scientist ➤ Conservation scientist ➤ Agricultural consultant ➤ Plant breeder/geneticist <p>Future learning</p> <ul style="list-style-type: none"> ➤ Geography ➤ Biology ➤ Agribusiness management ➤ Agricultural research and statistics
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	<ul style="list-style-type: none"> • the changing demand for water • water quality and pollution management • matching supply and demand – areas of deficit and surplus • the need for transfer to maintain supplies. <p>➤ Energy:</p> <ul style="list-style-type: none"> • the changing energy mix – reliance on fossil fuels, growing significance of renewables • reduced domestic supplies of coal, gas and oil • economic and environmental issues associated with exploitation of energy sources. 			
	<p>Demand for energy resources is rising globally but supply can be insecure, which may lead to conflict.</p> <p>Areas of surplus (security) and deficit (insecurity):</p>	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions <p>Application of knowledge and skills: short answer and long answer questions.</p> <ul style="list-style-type: none"> ➤ Application of knowledge and skills: short answer 	<p>Prior learning of population (Y7)</p> <ul style="list-style-type: none"> ➤ Rural to urban migration <p>Prior learning, and future learning, of the changing economic world (Y9 and Y11)</p> <ul style="list-style-type: none"> ➤ Primary industries ➤ Economic migrants <p>Prior learning of changing urban environments (Y10)</p>	

	<ul style="list-style-type: none"> • global distribution of energy consumption and supply • reasons for increasing energy consumption: economic development, rising population, technology • factors affecting energy supply: physical factors, cost of exploitation and production, technology and political factors. <p>Impacts of energy insecurity – exploration of difficult and environmentally sensitive areas, economic and environmental costs, food production, industrial output, potential for conflict where demand exceeds supply.</p> <p>Different strategies can be used to increase energy supply.</p> <p>Overview of strategies to increase energy supply:</p> <ul style="list-style-type: none"> • renewable (biomass, wind, hydro, tidal, geothermal, wave and 	<p>and long answer questions, including formative mid-unit assessment and end of unit assessment.</p>	<ul style="list-style-type: none"> ➤ Urbanisation through rural to urban migration <p>Future learning of urbanisation (Y10)</p> <ul style="list-style-type: none"> ➤ Creation of green spaces in urban areas for sustainability 	
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	<p>solar) and non-renewable (fossil fuels and nuclear power) sources of energy</p> <ul style="list-style-type: none"> • an example to show how the extraction of a fossil fuel has both advantages and disadvantages. <p>Moving towards a sustainable resource future:</p> <ul style="list-style-type: none"> • individual energy use and carbon footprints. Energy conservation: designing homes, workplaces and transport for sustainability, demand reduction, use of technology to increase efficiency in the use of fossil fuels • an example of a local renewable energy scheme in an LIC or NEE to provide sustainable supplies of energy. 			
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<p>Spring</p>	<p style="text-align: center;">Urban issues and challenges</p> <p>Cities are the meeting points of politics, culture, capital, technology, ideas and people. They are the hubs through which everything passes. Students can learn about the various socio-economic challenges of urban areas, and opportunities for development that they</p>
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will not experience within the Cheshire town of Nantwich. This will broaden their knowledge beyond what they would normal experience but what they may do in the future when embarking upon education at a higher level or within their careers.

A growing percentage of the world's population lives in urban areas.

- The global pattern of urban change. Urban trends in different parts of the world including HICs and LICs. Factors affecting the rate of urbanisation – migration (push–pull theory), natural increase. The emergence of megacities.

- Application of knowledge and skills: short answer and long answer questions.

Prior learning of population (Y8)

- Population change (natural increase, migration)

Future learning of changing economies (Y11)

- Globalisation
- Changing industrial location

Careers

- Housing manager/officer
- Local government officer
- Town planner
- Transport planner
- Urban designer
- Retail
- Planning and development surveyor
- Sustainability consultant
- Community development officer
- Civil Service administrator

Future learning

- Geography
- Human geography
- Human geography and environment
- Urban planning
- Urban planning and development
- Geography and urban and regional planning
- Urban and regional planning
- Urban development planning
- Charity worker

Urban growth creates opportunities and challenges for cities in LICs and NEEs.

- A case study of a major city in an LIC or NEE, Mumbai in India, to illustrate:
 - the location and importance of the city, regionally, nationally and internationally
 - causes of growth: natural increase and migration

- Knowledge of key words through closed questions.
- Knowledge of geographical content through closed questions
- Application of knowledge and skills: short answer and long answer questions.
- Application of knowledge and skills: short answer and long answer questions, including formative mid-unit assessment and mid-unit assessment.

Prior learning of globalisation (Y8)

- Benefits and problems of globalisation

Future learning of the Changing economic world (Y11)

- Advantages and problems of globalisation

	<ul style="list-style-type: none">• how urban growth has created opportunities:<ul style="list-style-type: none">➤ social: access to services – health and education; access to resources – water supply, energy➤ economic: how urban industrial areas can be a stimulus for economic development ➤ how urban growth has created challenges:<ul style="list-style-type: none">• managing urban growth – slums, squatter settlements• providing clean water, sanitation systems and energy• providing access to services – health and education• reducing unemployment and crime• managing environmental issues – waste disposal, air and water pollution, traffic congestion.			
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	<ul style="list-style-type: none"> ➤ An example of how urban planning is improving the quality of life for the urban poor. 			
	<p>Urban change in cities in the UK leads to a variety of social, economic and environmental opportunities and challenges.</p> <ul style="list-style-type: none"> ➤ Overview of the distribution of population and the major cities in the UK. ➤ A case study of a major city, Birmingham, in the UK to illustrate: <ul style="list-style-type: none"> • the location and importance of the city in the UK and the wider world • impacts of national and international migration on the growth and character of the city ➤ how urban change has created opportunities: <ul style="list-style-type: none"> • social and economic: cultural mix, recreation and entertainment, 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions. 	<p>Prior learning of population change and geographical skills (Y7)</p> <p>Prior learning of changing Britain (Y8)</p> <ul style="list-style-type: none"> ➤ Demographics of Britain ➤ Push and pull to Britain ➤ Where do people live ➤ Urban and rural areas <p>Prior learning of population (Y7)</p> <ul style="list-style-type: none"> ➤ Where people live in the UK ➤ The growth of population ➤ Demographic Transition Model ➤ Population Pyramid ➤ EU migration (case study) ➤ Mexico to USA migration (case study) <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ SMSC: 1B, 1D, 2A, 2C 	

	<p>employment, integrated transport systems</p> <ul style="list-style-type: none">• environmental: urban greening <p>➤ how urban change has created challenges:</p> <ul style="list-style-type: none">• social and economic: urban deprivation, inequalities in housing, education, health and employment• environmental: dereliction, building on brownfield and greenfield sites, waste disposal• the impact of urban sprawl on the rural– urban fringe, and the growth of commuter settlements. <p>➤ An example of an urban regeneration project, BEDZED, to show:</p> <ul style="list-style-type: none">• reasons why the area needed regeneration• the main features of the project.			
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	<p>Urban sustainability requires management of resources and transport.</p> <ul style="list-style-type: none"> ➤ Features of sustainable urban living: <ul style="list-style-type: none"> • water and energy conservation • waste recycling • creating green space. ➤ How urban transport strategies are used to reduce traffic congestion. 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions, including end of unit assessment. 	<p>Prior learning of managing resources (Y10)</p> <ul style="list-style-type: none"> ➤ Increasing food supply through urban farm initiatives 	
	<p>Urban fieldwork ‘How has the regeneration of Birmingham City Centre impacted the local people?’</p> <ul style="list-style-type: none"> ➤ Regenerated areas of Birmingham include: New Street Station, Brindley Place, Bullring and Centenary Square. ➤ Sampling methods: point/line/area sampling within systematic/ stratified/ random ➤ Data collection techniques: pedestrian count, traffic count, land use survey, 	<ul style="list-style-type: none"> ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer questions based on unknown fieldwork ➤ Application of knowledge and skills: short and long answer questions ➤ Application of knowledge and skills: short and long answer questions in end of unit assessment 		

	<p>environmental quality survey and questionnaire</p> <ul style="list-style-type: none"> ➤ Presentation techniques: located proportional symbols, radar graphs, isoline map, bar chart. ➤ Structure of investigation: Aim, hypothesis, location, risks, methods, presentation, analysis, conclusion, evaluation 			
Summer	<p>The challenges of natural hazards</p> <p>The physical environment is constantly changing naturally and as a result of human interaction in a variety of places. This unit enables students to develop an understanding of the tectonic and meteorological processes and features in different environments. They will know there is a need for sustainable management strategies and find out the direct and indirect effects of human interaction with the physical environment. Throughout their studies, they will be able to revisit their learning of hazards through events covered by the media – in particular, September/October tends to see a spike in hurricanes, whilst the winter months often have increased storm risk and flooding.</p>			
	<p>Natural hazards present a challenge to humans</p> <ul style="list-style-type: none"> ➤ Natural hazards pose a risk to people and property. ➤ The categories of natural hazards: tectonic, geomorphological, 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. 	<p>Prior learning of natural hazards (Y9)</p> <p>Connections to the Curriculum SMSC: 1B, 1C, 1D, 2C</p>	<p>Careers</p> <ul style="list-style-type: none"> ➤ Volcanologist ➤ Seismologist ➤ Engineering geologist ➤ Groundwater modeller ➤ Teacher ➤ Hydrogeologist ➤ Researcher ➤ Aid worker ➤ Meteorologist

	<p>biological and meteorological.</p> <ul style="list-style-type: none"> ➤ Factors affecting hazard risk. 			<ul style="list-style-type: none"> ➤ Catastrophe Risk Analyst ➤ Catastrophe Risk Modeller
	<p>Physical processes cause the tectonic hazards of earthquakes and volcanic eruptions</p> <ul style="list-style-type: none"> ➤ Plate tectonic theory ➤ Global distribution of earthquakes and volcanic eruptions and their relationship to plate margins. ➤ Physical processes at constructive, destructive and conservative plate margins lead to earthquakes and volcanic activity. <p>The effects of, and responses to, a tectonic hazard vary between areas of contrasting levels of wealth.</p> <ul style="list-style-type: none"> ➤ Primary and secondary effects of a tectonic hazard. ➤ Immediate and long-term responses to a tectonic hazard. 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions, including mid unit assessment. 	<p>Prior Learning</p> <p>Cold environments (Y7) and climate change (Y9)</p> <ul style="list-style-type: none"> ➤ Volcanic activity can cause climate change ➤ Population (Y7) ➤ Understanding how the development of a country can impact on the impact of a natural disaster on a country ➤ Hazards (Y9) ➤ Earth Structure ➤ Plate boundaries ➤ Causes of weather hazards and tectonic hazards ➤ Primary and secondary impacts of earthquakes, volcanoes and tropical storms ➤ Responses to natural hazards – three P’s policy ➤ Case studies of earthquakes (Nepal), volcanoes (Iceland) and tropical storms (Typhoon Haiyan) <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ SMSC: 1B, 1C, 1D, 2C 	<p>Future pathways</p> <ul style="list-style-type: none"> ➤ Geography and hazard management ➤ Hazards and disaster management ➤ Natural hazard management ➤ Geo-environmental hazards ➤ Natural hazard management ➤ Environmental science ➤ Geophysical hazards ➤ International disaster management

	<ul style="list-style-type: none"> ➤ The effects and responses to the Christchurch earthquake in New Zealand, a HIC, 2011. ➤ The effects and responses to the Gorkha earthquake in Nepal, a LIC, 2015. <p>Management can reduce the effects of a tectonic hazard.</p> <ul style="list-style-type: none"> ➤ Reasons why people live in areas at risk from tectonic hazards. ➤ How monitoring, prediction, protection and planning can reduce the risks from a tectonic hazard. 			
	<p>Global atmospheric circulation helps to determine patterns of weather and climate</p> <ul style="list-style-type: none"> ➤ General atmospheric circulation model: pressure belts and surface winds. ➤ Tropical storms develop as a result 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer 	<p>Prior learning of atmospheric hazards (Y9) Population (Y7)</p> <ul style="list-style-type: none"> ➤ Understanding how the development of a country can impact on the impact of a natural disaster on a country ➤ Case studies of tropical storms (Typhoon Haiyan) <p>Connections to the Curriculum</p>	

	<p>of particular physical conditions.</p> <ul style="list-style-type: none"> ➤ Global distribution of tropical storms. <p>An understanding of the relationship between tropical storms and general atmospheric circulation.</p> <ul style="list-style-type: none"> ➤ Causes of tropical storms and the sequence of their formation and development. ➤ The structure and features of a tropical storm. ➤ How climate change might affect the distribution, frequency and intensity of tropical storms. <p>Tropical storms have significant effects on people and the environment.</p> <ul style="list-style-type: none"> ➤ Primary and secondary effects of tropical storms. ➤ Immediate and long-term responses to tropical storms. 	<p>and long answer questions, including mid unit assessment.</p>	<p>SMSC: 1B, 1C, 1D, 2C</p>	
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	<ul style="list-style-type: none"> ➤ The effects and responses of Typhoon Haiyan, Philippines, a LIC, 2013. ➤ Monitoring, prediction, protection and planning can reduce the effects of tropical storms. 			
	<p>The UK is affected by a number of weather hazards.</p> <ul style="list-style-type: none"> ➤ An overview of types of weather hazard experienced in the UK. <p>Extreme weather events in the UK have impacts on human activity.</p> <ul style="list-style-type: none"> ➤ The causes of the Somerset floods, UK, 2013-2014. ➤ The social, economic and environmental impacts of the Somerset floods ➤ Management strategies developed to reduce the flood risk of Somerset. 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions. 	<p>Prior learning of extreme weather hazards in the UK (Y9)</p> <ul style="list-style-type: none"> ➤ Extreme weather in the UK (Beast from the east) in both HIC and LIC <p>Connections to the Curriculum SMSC: 1B, 1C, 1D, 2C</p>	

	Evidence that weather is becoming more extreme in the UK.			
	<p>Climate change is the result of natural and human factors, and has a range of effects.</p> <ul style="list-style-type: none"> ➤ Evidence for climate change from the beginning of the Quaternary period to the present day. ➤ Possible causes of climate change: natural factors (orbital changes, volcanic activity and solar output) and human factors (use of fossil fuels, agriculture and deforestation). ➤ Overview of the effects of climate change on people and the environment <p>Managing climate change involves both mitigation (reducing causes) and adaptation (responding to change).</p> <ul style="list-style-type: none"> ➤ Managing climate change through 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions, including end of unit assessment. 	<p>Prior Learning Climate change (Y9)</p> <ul style="list-style-type: none"> ➤ Understanding how the changing climate can impact on climatic hazards <p>Prior Learning Ecosystems (Y10)</p> <ul style="list-style-type: none"> ➤ Threats to cold environments ➤ Management of cold environments <p>Connections to the Curriculum SMSC: 1B, 1C, 1D, 2C</p>	

	mitigation (alternative energy production, carbon capture, planting trees, international agreements) and adaptation (change in agricultural systems, managing water supply, reducing risk from rising sea levels).			
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Year 11 Overview

Term	Knowledge	Assessment	Connections to learning	Connections to future pathways
Autumn	The living world			
	<p>Changing populations are having an impact on ecosystems that is felt at a variety of scales. We interact with our environment in a myriad of ways often without thought to the consequences. Through studying ecosystems students will develop an understanding of how climate impacts upon vegetation and the physical landscape in various parts of the world, including cold environments of tundra and glacial regions, and how these can be developed in a variety of ways for economic advancement; however, they will also learn how ecosystems can sustainably managed for future generations.</p>			
	Ecosystems exist at a range of scales and involve the interaction between biotic and abiotic components.	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions Application of knowledge and skills: short answer	Connections to the Curriculum <ul style="list-style-type: none"> ➤ SMSC: 1B, 1C, 1D, 2A, 2C, 4E 	Careers <ul style="list-style-type: none"> ➤ Environmental research ➤ Forestry ➤ Estate management ➤ National Trust ➤ Landscape architect ➤ Groundsman ➤ Nature Conservation

	<ul style="list-style-type: none"> ➤ An example of a small scale UK ecosystem to illustrate the concept of interrelationships within a natural system, an understanding of producers, consumers, decomposers, food chain, food web and nutrient cycling. ➤ The balance between components. The impact on the ecosystem of changing one component. ➤ An overview of the distribution and characteristics of large scale natural global ecosystems. 	<p>and long answer questions.</p> <ul style="list-style-type: none"> ➤ Application of knowledge and skills: short answer and long answer questions. 		<ul style="list-style-type: none"> ➤ Natural resource manager <p>Future learning</p> <ul style="list-style-type: none"> ➤ Ecology ➤ Environmental Science ➤ Geography ➤ Biology ➤ Biodiversity, Ecology and Ecosystems ➤ Ecology & Conservation ➤ Biological Science ➤ Ecological and environmental sciences with management
	<p>Tropical rainforest ecosystems have a range of distinctive characteristics.</p> <ul style="list-style-type: none"> ➤ The physical characteristics of a tropical rainforest. ➤ The interdependence of 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions <p>Application of knowledge and skills: short answer and long answer questions.</p> <ul style="list-style-type: none"> ➤ Application of knowledge and skills: short answer 	<p>Prior learning of tropical rainforest ecosystems (Y8)</p> <ul style="list-style-type: none"> ➤ Structure ➤ Food chains and food webs ➤ Importance ➤ Deforestation ➤ Importance of woodlands ➤ Cold environments ➤ Arctic (case study) 	

	<p>climate, water, soils, plants, animals and people.</p> <ul style="list-style-type: none">➤ How plants and animals adapt to the physical conditions.➤ Issues related to biodiversity. <p>Deforestation has economic and environmental impacts.</p> <ul style="list-style-type: none">➤ Changing rates of deforestation.➤ A case study of a tropical rainforest, the Amazon rainforest in Brazil, South America, to illustrate:<ul style="list-style-type: none">➤ causes of deforestation – subsistence and commercial farming, logging, road building, mineral extraction, energy development, settlement, population growth• impacts of deforestation – economic development, soil	<p>and long answer questions, including formative mid-unit assessment.</p>	<ul style="list-style-type: none">➤ Threats facing a cold environment➤ Managing a cold environment	
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erosion, contribution to climate change.

Tropical rainforests need to be managed to be sustainable.

- Value of tropical rainforests to people and the environment.
- Strategies used to manage the rainforest sustainably – selective logging and replanting, conservation and education, ecotourism and international agreements about the use of tropical hardwoods, debt reduction.

Deforestation has economic and environmental impacts.

Changing rates of deforestation.

- A case study of a tropical rainforest, the Amazon Rainforest in Brazil,

	<p>South America, to illustrate:</p> <ul style="list-style-type: none"> • causes of deforestation – subsistence and commercial farming, logging, road building, mineral extraction, energy development, settlement, population growth • impacts of deforestation – economic development, soil erosion, contribution to climate change. 			
	<p>Cold environments (polar and tundra) have a range of distinctive characteristics.</p> <ul style="list-style-type: none"> ➤ The physical characteristics of a cold environment. ➤ The interdependence of climate, permafrost, soils, plants, animals and people. ➤ How plants and animals adapt to the physical conditions. 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions <p>Application of knowledge and skills: short answer and long answer questions.</p> <ul style="list-style-type: none"> ➤ Application of knowledge and skills: short answer and long answer questions. 	<p>Prior learning of population distribution and location of cold environments (Y7)</p> <p>Prior learning of climate change in (Y9)</p> <p>Prior learning of cold environment ecosystems (Y8)</p> <ul style="list-style-type: none"> ➤ Food chains and food webs ➤ Importance of cold environments <p>Cold environments ecosystems</p>	

	<ul style="list-style-type: none"> ➤ Issues related to biodiversity. 			
	<p>Development of cold environments creates opportunities and challenges.</p> <ul style="list-style-type: none"> ➤ A case study of a cold environment, Alaska in the USA, North America, to illustrate: <ul style="list-style-type: none"> • development opportunities in cold environments: mineral extraction, energy, fishing and tourism • challenges of developing cold environments: extreme temperature, inaccessibility, provision of buildings and infrastructure. <p>Cold environments are at risk from economic development.</p> <ul style="list-style-type: none"> ➤ The value of cold environments as wilderness areas and why these 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions <p>Application of knowledge and skills: short answer and long answer questions.</p> <p>Application of knowledge and skills: short answer and long answer questions, including formative end of unit assessment.</p>	<p>Prior learning of cold environment ecosystems (Y8)</p> <ul style="list-style-type: none"> ➤ Threats facing a cold environment <p>Managing a cold environment</p>	

	<p>fragile environments should be protected.</p> <ul style="list-style-type: none"> ➤ Strategies used to balance the needs of economic development and conservation in cold environments – use of technology, role of governments, international agreements and conservation groups. 			
<p>Spring</p>	<p>The changing economic world</p> <p>As students reach a milestone in their education, they will be making decisions that may impact upon their future employment pathways. The economic world is constantly changing. Students will learn the main employment sectors and how human processes can impact upon their quality of life, bringing prosperity to areas through the multiplier effect, and also how areas have declined through the domino effect. It is important for young people to become flexible and resilient to changes in the economy and appreciate the advantages of being life-long learners to ensure their continual employment. They will learn about the changing economy in the UK develop a knowledge and understanding of how countries can reduce their development gap through addressing the disparities of wealth locally, nationally and globally. Students develop their awareness with regards to the reasons for population change on globally and build upon their empathy and understanding for various cultures and needs of others within a society.</p>			
	<p>There are global variations in economic development and quality of life.</p> <ul style="list-style-type: none"> ➤ Different ways of classifying parts of the world according to their level of economic 	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. 	<p>Prior Learning Population (Y7)</p> <ul style="list-style-type: none"> ➤ Spatial distribution of population in relation to the physical landscape of the UK ➤ The nature of a changing population in the UK <p>The changing economic world (Y9) To understand:</p>	<p>Careers</p> <ul style="list-style-type: none"> ➤ Town planning ➤ Lecturer in demography ➤ Statistician – world health organisation ➤ Childs rights monitoring and evaluation specialist ➤ Aid agencies ➤ Mining and quarrying ➤ Research & Development ➤ Banking

	<p>development and quality of life.</p> <ul style="list-style-type: none"> ➤ Different economic and social measures of development: gross national income (GNI) per head, birth and death rates, infant mortality, life expectancy, people per doctor, literacy rates, access to safe water, Human Development Index (HDI). ➤ Limitations of economic and social measures. ➤ Link between stages of the Demographic Transition Model and the level of development. ➤ Causes of uneven development: physical, economic and historical. <p>Various strategies exist for reducing the global development gap.</p> <ul style="list-style-type: none"> ➤ An overview of the strategies used to reduce the development gap: 		<ul style="list-style-type: none"> ➤ Measures of development ➤ Population and the Demographic Transition Model ➤ Population pyramids ➤ Uneven development ➤ Consequences of development ➤ Industrial development and investment ➤ Aid and Fair Trade ➤ Debt relief and development <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ SMSC: 1B, 1C, 1D, 2C 	<ul style="list-style-type: none"> ➤ Local Government ➤ Transport management ➤ Exporting <p>Future Pathways</p> <ul style="list-style-type: none"> ➤ Population studies ➤ Business and marketing ➤ Geography ➤ Human development ➤ International development studies ➤ Geography ➤ Geography with economics ➤ Human Geography
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	<p>investment, industrial development and tourism, aid, using intermediate technology, fairtrade, debt relief, microfinance loans.</p> <ul style="list-style-type: none"> ➤ An example of how the growth of tourism in an LIC or NEE, Tunisia, helps to reduce the development gap. 			
	<p>Some LICs and NEEs are experiencing rapid economic development which leads to significant social, environmental and cultural change.</p> <ul style="list-style-type: none"> ➤ A case study of one LIC or NEE, Nigeria in Africa, to illustrate: <ul style="list-style-type: none"> • the location and importance of the country, regionally and globally • the wider political, social, cultural and environmental context within which the country is placed • the changing industrial structure. <p>The balance</p>	<ul style="list-style-type: none"> ➤ Knowledge of key words through closed questions. ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions, including mid unit assessment. 	<p>Prior learning of Globalisation (Y8)</p> <ul style="list-style-type: none"> ➤ The influence of TNC's and trade on the development and position of a country politically and economically 	

	<p>between different sectors of the economy.</p> <p>How manufacturing industry can stimulate economic development</p> <ul style="list-style-type: none"> • the role of transnational corporations (TNCs) in relation to industrial development. Advantages and disadvantages of TNC(s) to the host country • the changing political and trading relationships with the wider world • international aid: types of aid, impacts of aid on the receiving country • the environmental impacts of economic development • the effects of economic development on quality of life for the population. 			
	<p>Major changes in the economy of the UK have affected, and will</p>	<p>➤ Knowledge of key words through closed questions.</p>	<p>Prior Learning Population (Y7)</p>	

	<p>continue to affect, employment patterns and regional growth.</p> <ul style="list-style-type: none"> ➤ Economic futures in the UK: <ul style="list-style-type: none"> • causes of economic change: de-industrialisation and decline of traditional industrial base, globalisation and government policies • moving towards a post-industrial economy: development of information technology, service industries, finance, research, science and business parks • impacts of industry on the physical environment. • An example of how modern industrial development can be more environmentally sustainable – Cambridge Science Park, Torr Quarry • social and economic changes in the rural 	<ul style="list-style-type: none"> ➤ Knowledge of geographical content through closed questions ➤ Application of knowledge and skills: short answer and long answer questions. ➤ Application of knowledge and skills: short answer and long answer questions, including end of unit assessment. 	<ul style="list-style-type: none"> ➤ Spatial distribution of population in relation to the physical landscape of the UK ➤ The nature of a changing population in the UK Changing economic world (Y9) ➤ The changing UK economy <p>Connections to the Curriculum</p> <ul style="list-style-type: none"> ➤ SMSC: 1B, 1C, 1D, 2C 	
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	<p>landscape in one area of population growth, Bishop Stortford, and one area of population decline, Stornoway</p> <ul style="list-style-type: none">• improvements and new developments in road and rail infrastructure, port and airport capacity - London's Crossrail, Heathrow airport, Liverpool2 (case studies)• the north-south divide. Strategies used in an attempt to resolve regional differences - Mersey Waters Enterprise Zone, Liverpool Local Enterprise Partnership• the place of the UK in the wider world. Links through trade, culture, transport, and electronic communication. Economic and political links: the European Union (EU) and Commonwealth			
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Summer	Revision			