## St Cuthbert Mayne School Curriculum Map 2023-2024



**Department: Geography** 

## Year 12

## **Department Intent and Overview**

Our Geography curriculum will inspire curiosity and fascination about the world and its people. .

## **Key Stage 5 Curriculum Summary**

Geography is the study of the Earth's people, places, landscapes and environments. It mixes the arts and the sciences, and bridges the learning gap between many other subjects.

The aim of our KS5 curriculum is to challenge students' perceptions, investigative and analytical skills. It has a developmental structure which helps to facilitate progression through the course and beyond to link with the demands of higher level study. The Non-Examined Assessment is an important part of the course and students are guided through the process involved. This element prepares the student for research-based learning at university level, as well as providing opportunities to develop key investigative skills for the workplace.

The following units are covered:

- Water and Carbon Cycle In this unit we will be focussing on the major stores of water and carbon at or near the Earth's surface and the dynamic cyclical relationships associated with them. These are major elements in the natural environment and our understanding of them is fundamental to many aspects of physical geography. We will also be considering the magnitude and significance of the cycles at a variety of scales, their relevance to wider geography and their central importance for human populations.
- Ecosystems under Stress In this unit we will focus on the biosphere and in particular the nature and functioning of ecosystems and their relationships to the nature and intensity of human activities. The impact of population growth and economic development on ecosystems at various scales will also be considered allowing students to engage with fundamental contemporary people—environment issues including those relating to biodiversity and sustainability.
- Glacial Systems and Landscapes In this unit we will be examining glaciated landscapes. We will understand that these are dynamic environments in which landscapes continue to develop through contemporary processes but which mainly reflect former climatic conditions associated with the Pleistocene era.
- Global Systems and Global Governance In this unit we will be exploring how the global economy and society have altered significantly in recent years as a result of globalisation. We will be looking at the links between economic, social and political change and engaging with contemporary issues of the global community.
- Population and the Environment- In this unit we will be exploring the relationships between key aspects of physical geography and population numbers, population health and well-being, levels of economic development and the role and impact of the natural environment.
- Changing Places In this unit we will be learning about the representations of place and how humans perceive and engage with places. We will also be looking at how places change over time and how external agencies improve perceptions of places

Autumn Term — Population and the Environment (Human Geography)								
Topic/Unit	Population & the Environment Introduction Global and regional patterns	Farming Systems and Impacts of Climate Change	Zonal Soils, Problems, Management and Implications for Food Security	Environment, Health and Well-Being	Environmental Variables linked to Disease	Management Strategies and the role of NGOs		

	specific and technical terminology. Cartographic skills – choropleth maps. Graphical skills – line maps including compound line graphs	specific and technical terminology. Collect, analyse and interpret information from a range of secondary sources – including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills	specific and technical terminology. Collect, analyse and interpret information from a range of secondary sources – including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills.	specific and technical terminology. Collect, analyse and interpret information from a range of secondary sources – including factual, numerical and spatial data. Online research . Evaluating and presenting findings from research. Core and ICT skills. Use of geospatial technologies such as digital cartography and G.I.S.	specific and technical terminology. Collect, analyse and interpret information from a range of secondary sources – including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills. Use of geospatial technologies such as digital cartography and G.I.S.	specific and technical terminology. Collect, analyse and interpret information from a range of secondary sources – including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills. Use of geospatial technologies such as digital cartography and G.I.S.
Assessment	Timed question - teacher and peer assessment.	Questioning In class assessment - teacher/peers	Timed question - teacher and peer assessment	Questioning Mid point assessment - teacher assessed	Timed question - teacher and peer assessment	Questioning In class assessment - teacher/peers
Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Conservation ManagerSoil Mechanical Scientist International Aid Worker Sustainability Consultant Human					

Rights Officer Epidemiologist Hydrologist Agricultural Scientist Climate Change Analyst Environmental Lawyer	
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Autumn Term - Water and Carbon Cycles (Physical Geography)								
Topic/Unit	The role of carbon transfers in the carbon cycle	Human and physical changes to the carbon cycle	The carbon budget and the impact of the carbon cycle	The roles and relationships of the water and carbon cycle	Human interventions in the carbon cycle	Case studies		
Knowledge (Content covered)	Factors driving change in the magnitude of these stores over time and space, including flows and transfers at plant, sere and continental scales. Photosynthesis, respiration, decomposition, combustion, carbon sequestration in oceans and sediments,	Changes in the carbon cycle over time, to include natural variation (including wild fires, volcanic activity) and human impact (including hydrocarbon fuel extraction and burning, farming practices, deforestation, land use changes).	The carbon budget and the impact of the carbon cycle upon land, ocean and atmosphere, including global climate.	The key role of the carbon and water stores and cycles in supporting life on Earth with particular reference to climate. The relationship between the water cycle and carbon cycle in the atmosphere. The role of feedbacks within and between cycles and their link to	Human interventions in the carbon cycle designed to influence carbon transfers and mitigate the impacts of climate change.	Case study of a tropical rainforest focusing on water and carbon cycles and their relationship to environmental change and human activity. Case study of a river catchment to consider the impact of precipitation upon drainage basin stores and transfers and		

	weathering.			climate change and implications for life on Earth.		implications for sustainable water supply and/or flooding.
Skills	Draw well-evidenced conclusions informed by wider theory. Communicate and evaluate findings	Construct extended written argument about geographical matters. Understand the nature and use of different types of geographical information - numerical and spatial data	Measures of central tendency – mean, mode, median. Line graphs – simple, comparative.	Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret such information	Construct extended written argument about geographical matters. Use of remotely sensed data	Use of ICT to generate evidence of many of the skills provided above such as producing maps, graphs. Apply suitable analytical approaches for the different information types
Assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	End of topic summative assessment 'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment
Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Environment Agency Sustainability Consultant					

Water Quality Analyst Climate Analyst Industrial engineer Agriculture Weather forecast Civil Engineer GIS Specialist Cartographer Environmental Lawyer			
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Spring Term 1 – Ecosystems Under Stress (Physical Geography)								
Topic/Unit	Development, biodiversity and sustainability.	Structures of ecosystems	Vegetation succession	The dynamic components of terrestrial ecosystems	Impacts of climate change and exploitation on ecosystems	Biomes and the characteristics of Tropical Rainforests		
Knowledge (Content covered)	The concept of biodiversity. Local and global trends in biodiversity. Causes, rates and potential impacts of declining biodiversity. Ecosystems and their importance for human populations in the light of continuing population growth	Nature of ecosystems – their structure, energy flows, trophic levels, food chains and food webs. Application of systems concepts to ecosystems – inputs, outputs, stores and transfers of energy and materials. Concepts of	Concepts of succession: seral stages, climatic climax, sub-climax and plagioclimax. Mineral nutrient cycling	Nature of terrestrial ecosystems and the inter-connections between climate, vegetation, soil and topography which produce them. Ecosystem responses to changes in one or more of their components or	Factors influencing the changing of ecosystems, including climate change and human exploitation of the global environment	The concept of the biome. The global distribution of major terrestrial biomes. The nature of the tropical rainforest biome; the main characteristics of the biome and ecological responses to the climate, soil and soil moisture		

	and economic development. Human populations in ecosystem development and sustainability	biomass and net primary production.		environmental controls.		budget – adaptations by flora and fauna
Skills	Construct extended written arguments about geographical matters. Understand the nature and use of different types of geographical information - numerical and spatial data Communicate and evaluate findings	Apply suitable analytical approaches for the different information types	Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret such information	Construct extended written arguments about geographical matters. Draw well-evidenced conclusions informed by wider theory.	Construct extended written arguments about geographical matters. Use of remotely sensed data Use of ICT to generate evidence of many of the skills provided above such as producing maps, graph	Apply suitable analytical approaches for the different information types
Assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Mid-point formal assessment. 'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment

Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Biologist Zoologist Conservationist GIS specialist Researcher for university National Park ranger Civil Engineer Military Environmental Agency Sustainability consultant					
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	Spring Term 2 – Ecosystems Under Stress (Physical Geography)								
Topic/Unit	Human activity in Tropical Rainforests	Development issues in Tropical Rainforests	The characteristics of Savanna Grasslands	Human activity in Savanna Grasslands	Development issues in Savanna Grasslands	Vegetation succession in the British Isles			
Knowledge (Content covered)	Human activity and its impact in the tropical rainforest	Typical development issues in the tropical rainforest biome, including changes in population, economic development agricultural extension	The nature of the savanna grassland biome; the main characteristics of the biome and ecological responses to the climate, soil and soil	Human activity and its impact in the savanna grassland	Typical development issues in the savanna grassland biome, including changes in population, economic development, agricultural extension	Succession and climatic climax as illustrated by lithoseres and hydroseres. The characteristics of the climatic climax:			

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		and intensification, implications for biodiversity and sustainability.	moisture budget – adaptations by flora and fauna		and intensification, implications for biodiversity and sustainability.	temperate deciduous woodland biome.
Skills	Use of ICT to generate evidence Construct extended written arguments about geographical matters. Draw well-evidenced conclusions informed by wider theory.	Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret such information	Apply suitable analytical approaches for the different information types	Use of ICT to generate evidence Construct extended written arguments about geographical matters. Draw well-evidenced conclusions informed by wider theory	Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret such information	Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret such information
Assessment	Continued Mid-point formal assessment. 'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment
Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Biologist Zoologist Conservationist GIS specialist Researcher for university National Park ranger Civil Engineer Military Environmental					

Agency Sustainability consultant					
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	Spring Term - Population and the Environment (Human Geography)									
Topic/Unit	Models of Natural Population Change	International Migration	Principles of Population Ecology	Population, Resources and Pollution Model	Global Environmental Change	Global Population Futures	Case Studies			
Knowledge (Content covered)	Key factors in natural population change Models of natural population change and their application in contrasting settings Concept of the Demographic Dividend	International migration: types, causes and implications	Population growth dynamics: over-population, under-population and optimum population limplications of population size and structure for the balance between population and resource; the concepts of 'carrying capacity' and 'ecological footprint' and their implications	Population, resources and pollution model: positive and negative feedback Contrasting perspectives on population growth and its implications; Malthusian, neo-Malthusian and alternatives such as associated with Boserup and Simon	Health impacts of global environmental change: ozone depletion – skin cancer, cataracts; climate change – thermal stress, emergent and changing distribution of vector borne diseases	Prospects for the global population, projected distributions and critical appraisal of future population-environ ment relationships	Case study of a country/society experiencing specific patterns of overall population change			

Skills	Collect, analyse and interpret information from a range of secondary sources — including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills	Use of key subject specific and technical terminology Collect, analyse and interpret information from a range of secondary sources — including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills. Use of geospatial technologies such as digital cartography and G.I.S.	Use of key subject specific and technical terminology. Collect, analyse and interpret information from a range of secondary sources — including factual, numerical and spatial data. Core and ICT skill	Presentation, interpretation, analysis and communication of data. Use of geospatial technologies such as digital cartography and G.I.S. Core and ICT skills.	Use of key subject specific and technical terminology Collect, analyse and interpret information from a range of secondary sources — including factual, numerical and spatial data. The use of different types of data allows the development of critical perspectives on the data categories and approaches. Online research. Evaluating and presenting findings from research. Core and ICT skills	Use of key subject specific and technical terminology Collect, analyse and interpret information from a range of secondary sources — including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research.	Use of key subject specific and technical terminology Collect, analyse and interpret information from a range of secondary sources – including factual, numerical and spatial data. Online research. Evaluating and presenting findings from research
Assessment	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning,	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning,	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning,	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning,	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning,	'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning,	End of topic summative assessment 'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through

	marking and observation. Peer assessment	marking and observation. Peer assessment	marking and observation. Peer assessment	marking and observation. Peer assessment	marking and observation. Peer assessment	marking and observation. Peer assessment	questioning, marking and observation. Peer assessment
Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Conservation Manager Soil Mechanical Scientist International Aid Worker Sustainability Consultant Human Rights Officer Epidemiologist Hydrologist Agricultural Scientist Climate Change Analyst Environmental Lawyer						

Summer Term – Changing Places (Human Geography)

Topic/Unit	Introduction to Changing Places	Character of Places	Perceptions of Place	Relationships and Connections of Place	Characteristics and Impacts of External Forces	Place Studies - distant and local
Knowledge (Content covered)	The concept of place and the importance of place in human life and experience Insider and outsider perspectives on place; categories of place: near and far, experienced and media places	Factors contributing to the character of places Endogenous factors Exogenous factors	How humans perceive, engage with and form attachments to place and how they present and represent the world to others. How places are represented in a variety of different forms	The impact of relationships and connections on people and place with a focus on: Changing demographic and cultural characteristics and economic Change and social inequalities. How the demographic, socio-economic and cultural characteristics of places are shaped by shifting flows of people, resources, money and investment.	The characteristics and impacts of external forces operating at different scales including either government policies or the decisions of multi-nationals or the impacts of international or global institutions. How past and present connections within and beyond localities shape places and how past and present development influences the social and economic characteristics	Two place studies are required: one exploring the developing character of a place local to the home or study centre and the other exploring the developing character of a contrasting and distant place.
Skills	Use of key subject specific and technical terminology. Core and ICT skills	Use of key subject specific and technical terminology. Online research.	Collect, analyse and interpret information from a range of secondary sources – including factual, numerical	Collect, analyse and interpret information from a range of secondary sources – including factual, numerical	Collect, analyse and interpret information from a range of secondary sources – including factual, numerical	Presentation, interpretation, analysis and communication of data. Retrieval and manipulation of

		Evaluating and presenting findings from research. Core and ICT skills	and spatial data. Critical questioning of information, and sources of information. Online research. Evaluating and presenting findings from research.	and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills	and spatial data. Online research. Evaluating and presenting findings from research. Core and ICT skills	secondary datasets. Use of geospatial technologies such as digital cartography and G.I.S. The use of different types of data allows the development of critical perspectives on the data categories and approaches.
Assessment	Timed question - teacher and peer assessment.	Questioning In class assessment - teacher/peers	Timed question - teacher and peer assessment.	Questioning Mid point assessment - teacher assessed	Timed question - teacher and peer assessment.	Questioning In class assessment - teacher/peers
Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Town planner GIS Specialist Cartographer Transport Planner Sustainability Consultant Environmental Lawyer Climate Analyst					

Summer Term 1 – Ecosystems Under Stress (Physical Geography)

Topic/Unit	Plagioclimax - Heather Moorland	Characteristics of Coral Reefs	Development and Coral Reefs case study	Local Ecosystem case study	Ecological development. The impacts and management	Case study
Knowledge (Content covered)	The effects of human activity on succession — illustrated by one plagioclimax such as a heather moorland.	The distribution and main characteristics of coral reef ecosystems. Environmental conditions associated with reef development.	Factors in the health and survival of reefs: Natural: Water temperature, acidity, salinity, algal blooms. Human activity and its impact: Major drainage basin schemes, onshore development, desalination, pollution, tourism, fishing. Future prospects for coral reefs.	The main characteristics of a distinctive local ecosystem (such as an area of heathland, managed parkland, pond, dune system). Ecological responses to the climate, soil and soil moisture budget — adaptations by flora and fauna.	Local factors in ecological development and change (such as agriculture, urban change, the planned and unplanned introduction of new species). The impacts of change and measures to manage these impacts.  Conservation strategies and their implementation in specific settings.	Case study of a specified region experiencing ecological change to illustrate and analyse the nature of the change and the reasons for it, how the economic, social and political character of its community reflects its ecological setting and how the community is responding to change
Skills	Draw well-evidenced conclusions informed by wider theory. Analyse and interpret such information	Understand the nature and use of different types of geographical information - images, factual text. Draw well-evidenced conclusions informed by wider theory.	Construct extended written arguments about geographical matters. Use of remotely sensed data Communicate and evaluate findings	Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret such information	Construct extended written arguments about geographical matters. Use of remotely sensed data Communicate and evaluate findings Draw well-evidenced conclusions informed by wider theory.	Understand the nature and use of different types of geographical information - images, factual text. Draw well-evidenced conclusions informed by wider theory. Construct extended written arguments about

						geographical matters.
Assessment	Mid-point formal assessment. 'Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment	Geog Your Knowledge' low stakes test. Timed past A-Level questions. Teacher assessment for learning through questioning, marking and observation. Peer assessment
Gatsby 4 (Linking curriculum learning to careers) GATSBY BENCHMARK 4	Biologist Zoologist Conservationist GIS specialist Researcher for university National Park ranger Civil Engineer Military Environmental Agency Sustainability consultant					

Summer Term 2 - NEA Preparation							
Topic/Unit	Non-examined	Non-examined	Non-examined	Non-examined	Non-examined		

	Assessment introduction and Proposal form	Assessment planning methodology	Assessment primary data collection	Assessment presenting data and statistical analysis	Assessment critically examining data
Knowledge (Content covered)	Design a research question or issue defined and developed by the student individually to address aims, questions and/or hypotheses relating to any part of the specification content Involve research of relevant literature sources and an understanding of the theoretical or comparative context for a research question/hypothesis	Incorporate the observation and recording of field data and/or evidence from field investigations that is of good quality and relevant to the topic under investigation Involve justification of the practical approaches adopted in the field including frequency/timing of observation, sampling and data collection approaches.	Draw on the student's own research, including their own field data and/or secondary data, and their experience of field methodologies of the investigation of core human and physical processes	Demonstrate knowledge and understanding of the techniques appropriate for analysing field data and information and for representing results, and show ability to select suitable quantitative or qualitative approaches and to apply them.	Demonstrate the ability to interrogate and critically examine field data in order to comment on its accuracy and/or the extent to which it is representative, and use the experience to extend geographical understanding
Skills	Construct extended written arguments about geographical matters. Construct extended written arguments about geographical matter	Construct extended written arguments about geographical matters. Understand the nature and use of different types of geographical information	Use and annotation of illustrative and visual material: base maps, sketch maps, OS maps (at a variety of scales), diagrams, graphs, field sketches, photographs, geospatial, geo-located and digital imagery. Understand the nature and use of different types of geographical information - images, factual text. Analyse and interpret	Critical examination of field data. Using data to draw conclusions. Using theory and literature to support findings.	Critical examination of field data. Using data to draw conclusions. Using theory and literature to support findings.

