



Year 9 Geography: Coasts

Learning Outcomes

By the end of this Year 9 unit on coasts, students will have a secure knowledge and understanding of the processes that shape coastal landscapes, including weathering, mass movement, erosion, transportation, and deposition. They will be able to describe and explain the formation of a range of erosional and depositional landforms, such as headlands, bays, caves, arches, spits, and sand dunes, and understand the influence of geology, wave type, and fetch on these features. Students will apply this knowledge to real-world case studies, for example the Dorset Jurassic Coast, to explore both the challenges of coastal erosion and the strategies used to manage it.

Alongside this, they will develop key geographical skills, including interpreting maps and aerial photographs, annotating diagrams, analysing data, and producing extended written responses that explain and evaluate coastal issues. Through case studies and management debates, students will also consider the social, economic, and environmental impacts of coastal processes, reflecting on the conflicts between different stakeholders and the need for sustainable management in light of climate change. This unit therefore prepares students not only for the demands of GCSE Geography but also for thinking critically about the relationship between people and the physical environment.

Students will apply geographical enquiry and fieldwork skills during an outdoor learning journey to East Head Spit in West Sussex. This experience is designed to introduce and develop key investigative techniques in line with GCSE fieldwork requirements. As part of the visit, students will engage in practical data collection, including measuring sediment size, recording beach profile gradients, and evaluating the effectiveness of coastal management strategies in a real-world context. Through this hands-on learning, students will deepen their understanding of coastal processes and management while building the analytical and observational skills needed for future geographical study.

Key Questions

1. What is the coast and why is it important?
2. How do waves form and what affects their energy?
3. What role do geology and wave type play in shaping coasts?
4. What processes shape our coasts?
5. How does erosion create coastal landforms?
6. How does deposition create coastal landforms?
7. Why are headlands and bays formed differently?
8. How do caves, arches, stacks and stumps form?
9. How are beaches, spits and bars created?
10. Why do coasts need to be managed?
11. What are the advantages and disadvantages of hard engineering?
12. How effective are soft engineering strategies?
13. What is managed retreat and when is it used?
14. How is the Medmerry in West Sussex being managed?



Knowledge

Key Concepts:

- Coastal Processes
Weathering – mechanical, chemical, and biological weathering.
Mass movement – sliding, slumping, and rockfalls.
Erosion – hydraulic action, abrasion, attrition, solution.
Transportation – longshore drift, traction, saltation, suspension, solution.
Deposition – when sediment load is dropped due to energy loss.
- Coastal Landforms
Erosional landforms – headlands and bays, cliffs and wave-cut platforms, caves, arches, stacks, and stumps.
Depositional landforms – beaches, spits, bars, tombolos, sand dunes.
- Coastal Management
Hard engineering – sea walls, groynes, rock armour, gabions.
Soft engineering – beach nourishment, dune regeneration, managed retreat.
Sustainable management – balancing economic, social, and environmental needs.
Case Studies / Examples
UK coastal landscapes (e.g., Dorset Coast).
Management schemes (e.g., Medmerry coastal defence).
- Key Geographical Concepts (Cross-Cutting)
- Interdependence – how physical processes interact (erosion, deposition, geology).
- Cause and effect – how processes create landforms.
- Change over time – short-term (storms, erosion) vs long-term (geological timescales).
- Sustainability – evaluating management strategies.
- Scale – local impacts (coastal erosion) vs national/global issues (sea-level rise).

Key Skills:

- **Map skills** – interpreting OS maps, identifying coastal features, and using scale.
- **Diagram and sketching skills** – drawing and annotating coastal landforms such as headlands, bays, spits, and wave-cut platforms.
- **Data interpretation** – analysing graphs, photos, cross-sections, and satellite images to explain processes and landforms.
- **Case study application** – linking real-world examples (e.g., Jurassic Coast) to geographical theory.
- **Extended writing** – producing exam-style 6- and 9-mark answers with well-structured argument and evaluation.
- **Geographical vocabulary** – accurate use of key terminology such as hydraulic action, deposition, groyne, and managed retreat.
- **Numeracy** – interpreting and analysing coastal data, wave frequency graphs, and cost-benefit analyses of management options.

NHSG Key Stage 3 Geography Year 9: Summer Unit Overview



	Key Terms:			
	Erosion	Abrasion	Longshore drift	Wave-cut platform
	Weathering	Attrition	Deposition	Spit
	Mass movement	Solution	Headland	Bar
	Hydraulic action	Transportation	Bay	Managed retreat
Ongoing Assessment	Assessment is an integral part of every lesson and includes a re-cap of prior knowledge, discussion of new concepts and terminology and modelling of successful writing. Students also prepare and complete a range of short and long exam-style questions throughout the course with the focus carefully chosen to reflect new learning in each lesson. There a sample exam-style questions throughout the course planned into lessons frequently.			
Key Assessment	Key Assessment 1: This is a mid-topic assessment of coasts. It is worth 35 minutes in a 25-minute allotted time frame that covers coastal processes and landforms. Key Assessment 2- End of Year Exam- This will be a formal exam, out of class. It assesses the content covered throughout year 9, natural hazards, weather hazards and coastal landscapes. The examinations will be 45 minutes and worth 45 marks. This reflects the style at GCSE, 1 mark per minute.			
Sequencing	The coasts unit is sequenced to move from foundational knowledge of coastal environments through to applied case studies and evaluative thinking, ensuring that students build their understanding step by step. It begins with an introduction to what coasts are and why they are important, before moving on to the physical processes that shape them, including waves, erosion, transportation, and deposition. Once students understand these core processes, they apply this knowledge to the formation of key landforms such as headlands, bays, cliffs, wave-cut platforms, caves, arches, stacks, beaches, spits, and bars. The unit then shifts towards exploring why coasts need to be managed, introducing the concepts of hard engineering, soft engineering, and managed retreat, and evaluating their advantages and disadvantages. This knowledge is consolidated and extended through detailed case studies, such as the Jurassic Coastline, which allow students to investigate real-world examples of both the challenges posed by coastal processes and the effectiveness of management strategies. The unit concludes with opportunities for reflection and assessment, enabling students to demonstrate their ability to describe, explain, apply, and evaluate, in line with GCSE expectations. Within this unit exam technique is practice routinely to help students prepare for the end of year exam.			
Links to Careers	The study of coasts provides students with a wide range of transferable skills and insights that directly link to future career pathways. Understanding coastal processes, landforms, and management equips learners with knowledge relevant to careers in environmental science ,			



	coastal engineering, and flood risk management, where professionals work to protect communities from erosion and flooding. Skills in data analysis, mapping, and geographical information systems (GIS) are highly valued in fields such as urban planning, surveying, and environmental consultancy, while the study of coastal tourism and management connects to careers in hospitality, sustainable tourism, and heritage management. Moreover, by evaluating stakeholder perspectives and debating sustainable solutions, students develop critical thinking, communication, and decision-making skills that are essential across a variety of professions, including law, journalism, politics, and education. In this way, the coasts unit not only deepens geographical knowledge but also highlights the relevance of geography to real-world issues and career opportunities.
Diversity and Inclusion	The study of coasts can be closely linked to diversity and inclusion by emphasising the varied ways in which different communities experience and interact with coastal environments. Coastal management decisions often affect a wide range of stakeholders, from local residents and business owners to fishing communities, tourists, and conservation groups. Exploring these perspectives allows students to appreciate that impacts are not felt equally: vulnerable groups, such as those living in low-income coastal settlements or communities in low-lying developing countries, may be disproportionately affected by erosion, flooding, and sea-level rise. Using global case studies—from the Jurassic Coast in the UK to small island nations threatened by climate change, such as the Cayman Islands—ensures that students encounter a diversity of voices and contexts, helping them to recognise inequalities in vulnerability and resilience. Discussions about sustainable management also provide opportunities to consider issues of intergenerational equity and the need to protect coastlines for future communities. By embedding these perspectives, the coasts unit not only develops geographical understanding but also encourages empathy, cultural awareness, and respect for diversity.
Support	In geography, students are supported through a wide range of strategies that ensure learning is accessible and meaningful for all. Resources such as lesson-by-lesson PowerPoints, structured work booklets, and glossaries of key terms provide scaffolding and help students develop confidence in subject-specific vocabulary. All resources are accessible on SharePoint. Differentiated activities, including tiered tasks and sentence starters, support less confident learners, while “challenge” and “super challenge” activities extend higher attainers. Retrieval practice, knowledge organisers, and regular low-stakes quizzes are embedded to help students consolidate knowledge and improve long-term retention. Teachers also provide modelling of extended writing, clear success criteria, and opportunities for peer and self-assessment to build exam technique. Digital platforms, online resources, and interactive activities further enhance engagement, while targeted interventions and one-to-one support are used where necessary. Collectively, these strategies ensure that all students are able to make progress, achieve highly, and develop the skills required for GCSE and beyond.
Challenge	Blue and purple challenge activities are built into all of our geography lessons to stretch the more able and a wide range of extension activities are provided for students throughout the course. These include wider reading, watching news reports and articles, films and documentaries and targeted research assignments. Activities are shared with students through the lesson resource packs. The following links provide further challenge.



- Internet Geography – GCSE Coasts Revision [Internet Geography](#) A comprehensive interactive site with flashcards, multiple-choice quizzes, and short-answer questions covering all coastal topics—from wave types to management strategies and case studies.
- Save My Exams – Coastal Processes Revision Notes Clear and detailed revision notes covering wave types, weathering, mass movement, erosion, transportation, and deposition, with examiner tips. Concise notes on different strategies, including hard engineering, soft engineering, managed retreat, and integrated coastal zone management (ICZM), with case study examples. [PUMPKIN INTERACTIVE](#)
- Tutor2u Geography – Coastal Landscapes Revision Video A lively “revision blast” video with quizzes and activities summarising coastal landscapes, erosion, landform formation, and management strategies. [Tutor2uYouTube](#)
- [Geography Revision](#) Coolgeography – GCSE Physical Landscapes Revision Zone
- An online hub with resources for revising physical landscapes, including coasts—ideal for a quick knowledge refresh. [Cool Geography](#) SimpleStudy – Coastal Landscapes in the UK (AQA) Topic-by-topic revision with notes, flashcards, quizzes, and exam-style questions tailored to the AQA Coastal Landscapes curriculum.
- Wider reading can be found the Geography SharePoint Page.
- Wide World Magazine- Copies of these can be found in the library or on our Geography SharePoint Page [Geography - Wide World Magazine - All Documents](#)

We also encourage all students to watch, read or listen to the news to bring real stories into class to add to their learning.

Year 9 are invited to ‘The Geographical Society’ which is led by the Year 12 geography students where they have the opportunity to write articles for our magazine, the ‘Nonsuch Geographic’ and to take part in geography games and competitions.