



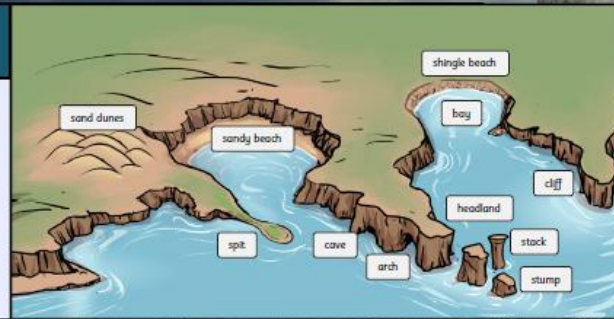
# Jurassic Coast Knowledge organiser



## What are coasts?

A **coast** is the place where the **land meets the sea or an ocean.**

It's like the **edge** of the land where you can see the water.



## Why does the coast have so many different physical features?

### Rocks and soils

The land along the coast has different rocks like limestone, sandstone, and granite. Different types of rock cause different features to form.

### Sea level changes

The sea level goes up and down a lot over a long time, and this makes the land near the sea change.

### Waves and tides

Different parts of the sea, create different-sized waves along the UK coast. The shape of the land and how windy it is also make the tides and waves change in each place.

### Weather

Rain and wind can wear down the land, making it change shape over many years.

### Glaciers and tectonic movement

Long, long ago, big ice sheets called glaciers moved over the UK land, making valleys and hills near the coast.

### Humans

People building structures like houses and roads, or other activity like mining or quarrying can change how the coast looks.

## Physical features of coasts

Coasts can have many different physical features.



This is a **cave**.

A cave is a hollowed-out space in a cliff or rock formation along the shoreline.



This is a **sand dune**.

A coastal sand dune is a hill of sand near the beach, formed by the wind, where plants often grow and animals can find shelter.



This is a **rock pool**.

A rock pool is a small, shallow pool of seawater found on rocky shores, created when the tide goes out and often filled with fascinating sea creatures and plants.



This is a **bay**.

A coastal bay is a wide, curved area along the shore where the land curves inward. It may have sand, pebbles or shingle on it. A cove is a small bay.



This is a **headland**.

A headland is a rugged, rocky peninsula that extends out into the ocean, forming a distinct feature along the shoreline.



These are **stacks and stumps**.

Stacks are tall, pillar-like rocks in the sea near the coast, created by waves eroding cliffs, while stumps are shorter, flat rocks that are the remains of eroded stacks.



This is a **spit**.

A spit is like a sandy peninsula extending from the mainland into the ocean. It is usually a narrow sandy strip of land.



These are **cliffs**.

Cliffs are tall, steep rock faces usually found by the sea.



This is an **arch**.

An arch is like a giant doorway made by the sea.



Physical features are things that you can see around you.

## UK seas and oceans

The UK is made up of islands, which means it is surrounded by the sea.

### Did you know?

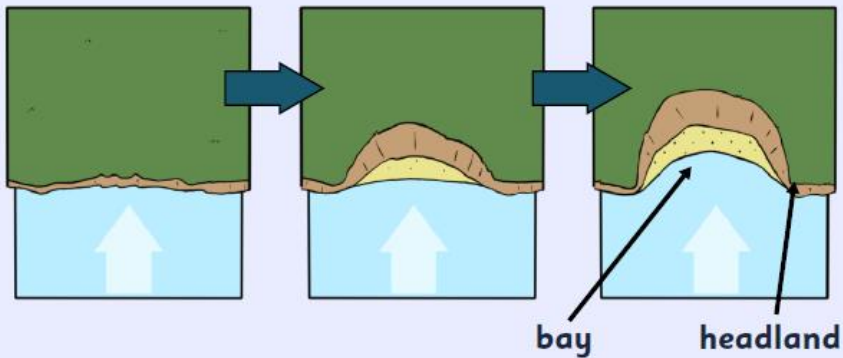
The UK has around 19,600 miles of coastline.



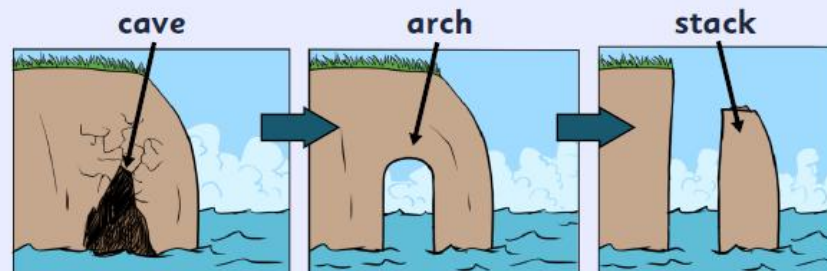
## Erosion

The sea is always moving, so the coast is always changing. Parts of the coastline get **worn down** and **moved** by natural forces such as water and wind. This is a physical process called **erosion**.

## Features formed by erosion



An area of the cliff face which is made from weaker rock is retreating because of erosion. The sea travels further inland to form a **bay**. This leaves the areas of stronger rock jutting out into the sea forming **headlands**.

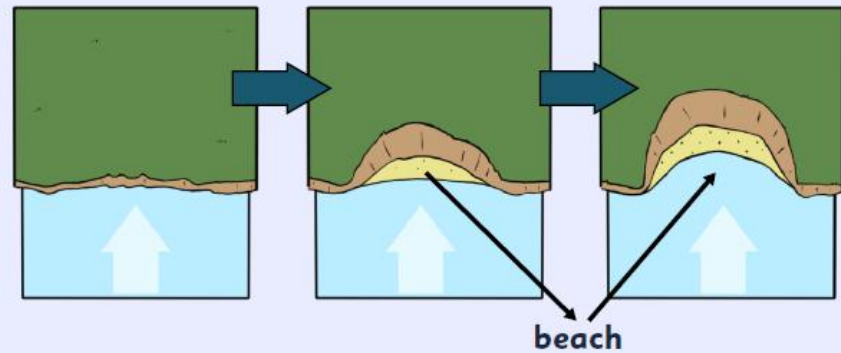


Erosion causes the cracks on the cliff face of the headland to become bigger. Eventually, the cave will carve all the way through the headland and form an arch. The top of the arch collapses and leaves a stack.

## Deposition

Landforms can be created by **sediment** left behind by the **waves**. This is a physical process called **deposition**.

## Features formed by deposition



The sea carries **sediment**. Weaker waves deposit this sediment on the shore and over time the beach gets bigger. This is an example of a landform created by deposition.



**Sand dunes** are created when the wind blows sand into piles, often helped by plants like marram grass, whose roots hold the sand together.



A **spit** is formed when waves move sediment along the shore and it piles up creating a long, thin strip of land that sticks out into the water.