

Along the coast, waves don't just erode and take material away, they also put it back.

When waves lose energy, they drop the sand, shingle and pebble they've been carrying. This is called deposition.

Beaches are formed along the coast when waves deposit sand, pebbles and shingles.

Beaches are often found in sheltered bays or where obstacles trap sediment. Like these groynes at Hornsea.

Longshore drift moves material along beaches. Waves approach the coastline at the same angle as the prevailing wind.

The wave swash moves sediment up and along the beach and the backwash, pulls it straight back down. This zigzag motion transports beach material.

Here in Holderness, boulder clay from cliffs like Great Cowden is eroded and carried south, by longshore drift.

Where the coastline changes direction, longshore drift can push material out into the sea, forming a spit.

A spit is a ridge of sand or shingles stretching out into the sea.

Spurn Point is a spit in the Humber Estuary. The spit is made of material eroded further along the coast from places like Great Cowden and deposited here.

Sheltered water behind spits has low energy. So, mudflats and salt marshes can form.

So, along the Holderness coast, erosion in the north feeds deposition in the south. Beaches and spits show the sea doesn't only destroy, it also builds.