

iSee...



# North Wales Coast

Reconciling Conservation and Recreation





Charter signatories seek to:

Avoid damage to sites and minimise disturbance to wildlife and the environment

Ensure all group leaders understand more about the habitats, species, geology and environments of North Wales and how to avoid disturbance and damage

Encourage others to respect the wildlife, landscapes and community life in and around North Wales

Work with land managers, statutory bodies and other interested parties to best manage groups on existing sites and consider the implications before developing new sites

- Respect conservation based management plans that have been agreed and publicised
- Show consideration to landowners, residents and other users when parking and operating
- Encourage groups, colleagues and students to respect, protect and enjoy the special character of the region – habitats, species, wildlife, geology, archaeology and manmade structures
- To discuss any essential permanent fixtures with the statutory bodies and relevant parties
- Leave a site cleaner than we find it and take litter home



twitter  
@nweocg



chartergroup@snowdonia-active.com



[www.facebook.com/nweocg](http://www.facebook.com/nweocg)

on the coast means that we all need to be aware of our potential impact and take steps to minimise it.

Although relevant to the entire North Wales coast, this guide particularly focuses on the wildlife and landforms which can be seen whilst exploring the Anglesey coast.

The Anglesey coastline is one of the most distinctive, attractive and varied landscapes in the British Isles, earning its designation as an Area of Outstanding Natural Beauty.

iSee North Wales Coast has been created by **Snowdonia-Active** in partnership with the following organisations:

### **Isle of Anglesey County Council's Destination Management Service**

**The North Wales Wildlife Trust** is one of 47 Wildlife Trusts across the UK. With your help, we can do much to protect and improve habitats for the wildlife and people of North Wales.

**Nature's Work** brings to life the natural world through a range of wildlife walks, educational courses and training events.

**Geomôn** is a registered charity working to promote Anglesey (Môn) as an internationally recognised Geopark.

This booklet is available in Welsh and

beach

on the rocks

on the cliffs

out to sea

.....

landform

.....

invasive species

.....

other resource

inged plover



# On The Beach

The beach is the best place to find evidence of creatures living further out in deeper water. A strandline is formed when the tide ebbs and is often best after big storms and onshore winds. Strandlines can form a kind of temporary habitat of their own, with scavengers like sandhoppers finding food and shelter under the seaweed, and in turn attracting birds like turnstones or even sometimes land-based predators such as shrews or hedgehogs.





crab shell



tube worms

# On The Beach



lugworm  
casts



jellyfish





empty egg-cases of sharks, skates & rays. Catshark (dogfish) egg-cases have curved tendrils, whilst those with horns are from skates/rays.

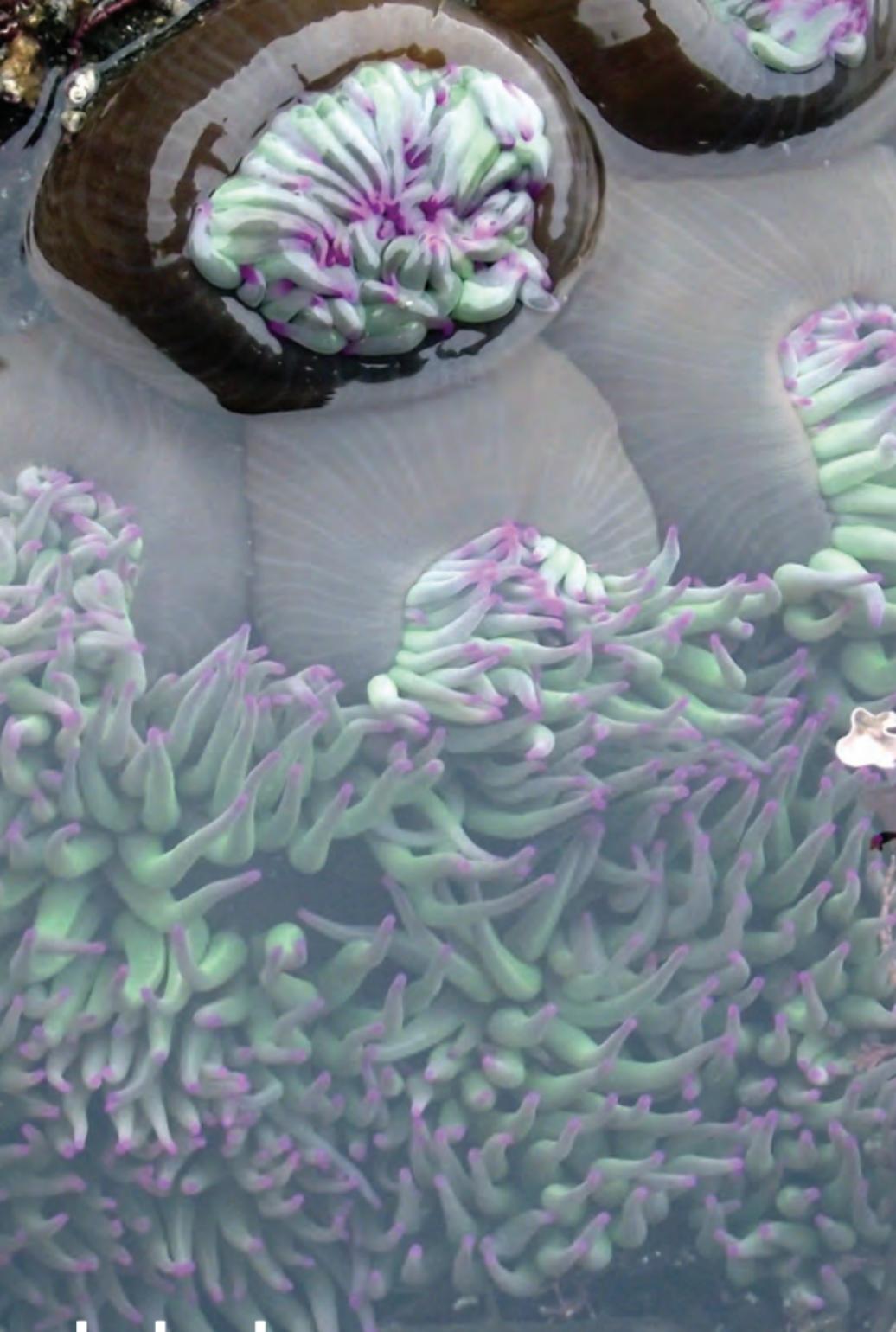
- ▶ **Sea Wash Ball** - empty egg cases laid by the common whelk. The first egg to hatch will eat all its neighbours.



- ◀ **Hornwrack** looks like seaweed but is a colony of animals. Each tiny hole has an animal in it - each with a separate job within the colony.

- ▶ Some **Oystercatchers** probe for worms in sand and mud. Others hammer or prise open







# On The rocks

Battered by waves and wind and uncovered by the receding tide, the rocky shore is an extremely difficult place to survive. Rockpools can freeze in winter and get very warm in summer; temperature and salinity can change instantly when the tide returns. Species that inhabit this zone have to be able to cope with dramatic changes.





**ladder  
wrack**

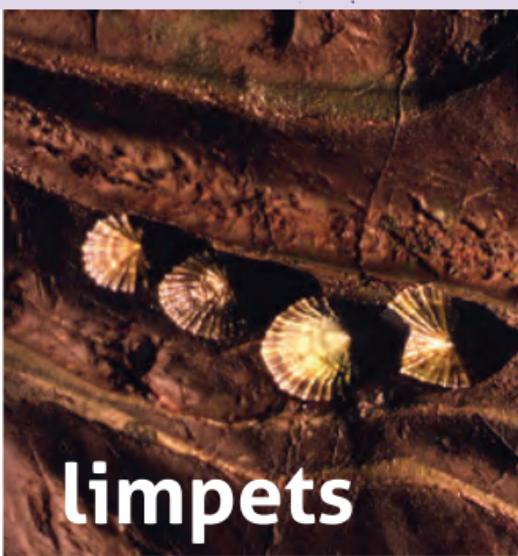


**sea slater**

# **on The rocks**



**hanny**



**limpets**





related to jellyfish. They look static but are actually very territorial and use stinging tentacles to fight for space.

► To help reduce buoyancy for diving **Shags & Cormorants** don't waterproof themselves. They have to spend time drying out on rocks.



◀ **Barnacles** are crustaceans and are related to crabs.

► **Shore Crab** grows by shedding and stepping out of old shell. During transition they are known as soft-shelled crabs and can be eaten as a







## on The CLIFFS

During the summer, coastal cliff-tops and crevices come to life with flowers and plants that can withstand the salty spray of the sea. There's also often a narrow buffer zone of grassland close to the edge which hasn't been intensively farmed, and can be rich in meadow wildflowers. Remote cliff ledges and cracks also provide nest sites for various seabirds, peregrines or ravens.





# ON THE CLIFFS





two organisms living together  
– an alga and a fungus.

► **Guillemot** eggs are pointed so they roll in a circle, rather than off the ledges where they nest.



◀ **Thrift** forms clumps on cliffs and rocks. The Welsh name is Clustog Fair (Mary's Pillow)

► **Great Black-Backed Gulls** predate other seabird eggs.



atlantic grey seal





# OUT TO SEA

Looking out to sea can offer glimpses of the often hidden richness of our coastal waters. Because of its unique mix of underwater habitats and the enlivening effect of oceanic currents, the UK has potentially some of the most varied and productive marine environments in the world – as rich as those of tropical seas for example. But they're also seriously threatened, and preventing their depletion or destruction requires cooperation from everyone that uses the sea.





**harbour  
porpoise**



**moon  
jellyfish**

**OUT TO SEA**



**seaweed**



**fulmar**



**mackerel**



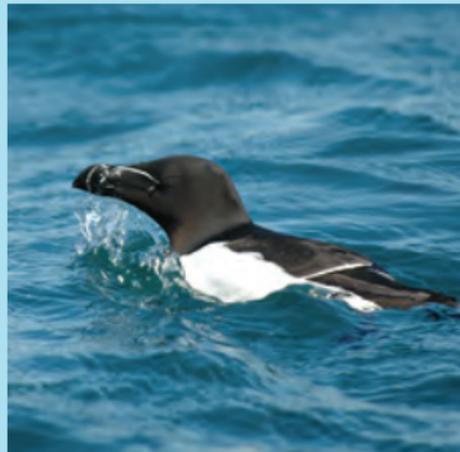
Dolphins and porpoises sleep by resting half their brain at a time. The other half reminds them to breathe!

► **Gannets** dive up to 62mph



◀ Cemlyn (Anglesey) – only colony of **Sandwich Terns** in Wales, and one of biggest in UK (<2,000 pairs).

► **Razorbills** (and other auks) use their wings to 'fly' underwater. shags and





# GeoMôn

## Anglesey Geopark

Duvidic black shales and paler sandstone on Rhosneigr beach, folded during the Caledonian mountain-building period (480-425 million years ago) when southern Britain collided with Scotland as the Lapetus Ocean closed.



and Llanbadrig area contain stromatolite fossils, the oldest fossils in Wales (860 million years old). They made the oxygen in the atmosphere that allowed other life to develop and evolution to begin.



Cambrian (510-20 million years old) South Stack schists and quartzite folded at a sideways moving (conservative) plate margin.



The image shows a close-up view of a geological outcrop. The left side is dominated by dark, rounded, sun-cracked sandstones, which are characteristic of the Devonian Period. These rocks are arranged in a pattern of irregular, rounded shapes, with visible cracks between them. To the right, there is a distinct layer of yellow 'cornstones', which are smaller, more angular rocks. The overall appearance is that of a hot desert environment, with the rocks showing signs of weathering and cracking. The text overlay provides context for the geological features and their location in Lligwy Bay North.

the Devonian Period  
of sandstones and  
sandstones with suncracks  
and yellow 'cornstones'  
Lligwy Bay North.  
deposited in a hot desert area  
around 30° South as Anglesey  
continued to move North.



**These Precambrian pillow lavas on Llanddwyn were spewed onto the seabed in pulses of lava, at a constructive plate margins where plates move apart.**



**These Precambrian rocks are called Mélange found at Porth Tŵr Bach on Llanddwyn, formed at a destructive**

A person wearing a black wetsuit, a white helmet, and a red life vest is climbing a dark, wet, and mossy rocky shore. The person is positioned on the right side of the frame, facing left, with their right hand on a rock for balance. The background consists of layered, dark grey rocks with patches of green moss and algae. Two speech bubbles are overlaid on the image: an orange one at the top left and a yellow one in the middle left.

Starting a discussion with your group about their surroundings can help engage them with the natural world

What difficulties would you experience as a marine snail living at the top of the shore?

### Follow the **Anglesey Marine Code**

([tinyurl.com/marinecode](https://tinyurl.com/marinecode)) to ensure you minimise stress and disturbance to wildlife. Observe wildlife quietly from a distance and keep clear of marine mammals, nesting birds and seals resting on the shore.



How will this view look in 100 years?

What clues can you see in the landscape that may tell you what rock type you are on?

If you are concerned that a seal may be injured go to **British Divers Marine Life Rescue (BDMLR)** for more information ([tinyurl.com/bdmlr-stranded](https://tinyurl.com/bdmlr-stranded)).

Please operate all boats with care and attention for the safety of occupants and respect for other sea users.



Species introduced from elsewhere are known as non-native species. Most don't cause problems; others thrive and can have serious consequences for native wildlife. These are known as invasive non-native species.

If you see any of these species while you are out and about, please take a note of what it is and where you've seen it. You can let us know about your sighting at [www.mba.ac.uk/recording](http://www.mba.ac.uk/recording). If you have a camera you can also take a picture and send it to us.



## National Coasteering Charter

Promotes guidelines for coasteering providers.  
[www.nationalcoasteeringcharter.org.uk](http://www.nationalcoasteeringcharter.org.uk)

## BMC Regional Access Database

[www.thebmc.co.uk/rad](http://www.thebmc.co.uk/rad)

## Reconciling Conservation & Recreation

Coasteering: [vimeo.com/39638050](https://vimeo.com/39638050)

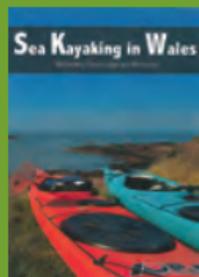
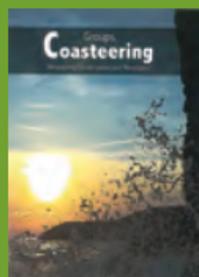
Sea Kayaking in Wales: [vimeo.com/62624726](https://vimeo.com/62624726)

## The Countryside Code - Respect, Protect and Enjoy

[www.countrysidecodewales.org.uk](http://www.countrysidecodewales.org.uk)

**Photo credits:** *Activity images:* North Wales Active, Phillip Ingham (cc<sup>1</sup>) [flic.kr/p/ndMZ1A](https://flic.kr/p/ndMZ1A), Rockpool Kayaks ([rockpoolkayaks.com](http://rockpoolkayaks.com)). *On the Beach:* Natural England (Ringed Plover), Jonny Easter (Crab Shell), Misha Lynden (Razor Clam Shell), Nia Haf Jones (Tube Worms, Mermaid's Purse), Lowri Roberts (Lugworm Casts, Jellyfish, Sea Wash Ball), Sam Bryan (Hornwrack), [northeastwildlife.co.uk](http://northeastwildlife.co.uk) (Oystercatcher). *On the rocks:* Stoutcob (cc<sup>2</sup>) [flic.kr/p/bxgffr](https://flic.kr/p/bxgffr) (Snakelocks Anemone), Kirsten Smith (Bladder Wrack), Lowri Roberts (Sea Slater), Paul Naylor (Shanny, Prawn, Shore Crab), Ben Stammers (Limpet), [northeastwildlife.org.uk](http://northeastwildlife.org.uk) (Lichen, Shag), Joan Edwards (Beadlet Anemone), Rohan Holt (Barnacles). *On the cliffs:* Natural England (Razorbill), Philip Precey (Scurvy Grass), Margaret Holland (Chough, Spring Squill), [northeastwildlife.co.uk](http://northeastwildlife.co.uk) (Rock Pipit, Guillemot, Great Black Back Gull), Jamie Larke (Sea Champion), Jonny Easter (Lichen), Ben Stammers (Thrift). *Out to sea:* Mateusz Włodarczyk (cc<sup>3</sup>) [goo.gl/BQkSTq3](http://goo.gl/BQkSTq3) (Atalantic Grey Seal) Richard Shucksmith (Harbour Porpoise, Gannet), Paul Naylor (Moon Jellyfish), Kelp (NRW Blaise Bullimore), Nia Haf Jones (Fulmar, Bottlenose Dolphin, Razorbill), Hans Hillewaert (cc<sup>4</sup>) [goo.gl/uRo85L](http://goo.gl/uRo85L) (Mackerel), Ben Stammers (Sandwich Tern). *Geomôn:* Stewart Campbell. *Non-native Species:* Kathryn Birch NRW (Wakame), NNSS (Wireweed, Slipper Limpet), Nia Haf Jones (Devil's Tongue Weed). (cc licenses [goo.gl/vBgtNb1](http://goo.gl/vBgtNb1), [goo.gl/cOVloC2](http://goo.gl/cOVloC2), [goo.gl/BQkSTq3](http://goo.gl/BQkSTq3) <http://goo.gl/uRo85L4>)

This guide has been produced by the North Wales Environmental Outdoor Charter Group with the financial help of the Sustainable Development





**Field guide for coastal outdoor activity**  
**Waterproof • Fits instructor buoyancy aid**

