



Canarygeog Worksheet

Coasts - Answers

1. What are the correct definitions for swash and backwash ?

- Swash is the movement of water up a beach.
- Backwash is the movement of water back down a beach.

2. Why does water drain back along the beach instead of flowing across it ?

The material that makes up the beach is permeable so a lot of the water sink into it instead of running across it.

3. Height and strength of the waves are determined by which factors ?

This is determined by the fetch, in other words, the strength of the wind and the time over which it has been blowing.

4. Explain the working of destructive and constructive waves.

- Destructive waves have a greater backwash than swash so they pull material down the beach.
- Constructive waves have a greater swash than backwash so they push material up the beach.

5. Describe the different types of coastal erosion caused by waves.

- Abrasion : material pulled along by the sea.
- Hydraulic action : air pushed into the cracks by the force of the waves.
- Solution : material (specially minerals) being dissolved by the sea.
- Attrition : transported material hitting each other.

6. What problems does longshore drift cause ?

- The main problem is the removal of beach material in certain areas.
- Coastal erosion is also present.
- The deposition of the material further along the shore.

7. What solution do groyne give to longshore drift ? Is it total or partial ?

It is a partial solution because they solve the problem in one location but can cause increased erosion further along the coast. They won't stop all the material from moving along the coast and with time will become damaged and will stop being efficient.

8. Why does beach construction depend of constructive waves ?

Because the constructive waves push the material up the beach helping to build the beach.

9. Is the gradient of the beach affected by the material ?

Yes because the pebbles due to their size and weight can rest on each other forming a steeper gradient, smaller material such as sand won't.

10. Are bars temporary or permanent coastal features ?

They are considered temporary coastal features as they can be broken with the effect of the incoming waves or even by the river mouth which it was blocking.

11. Why are fjords larger and deeper than rias ?

Because glaciated valleys are larger due to severe glaciations processes, there is also greater depth due to the amount of ice.