Subject	Year	Term
Geography	10	Autumn term 1

Topic

UK physical landscapes- Rivers

Content + skills (Intent)

Prior Learning (Topic)

KS1/KS2-

Use basic geographical vocabulary to refer to key physical features, including hill, mountain, sea, ocean, river, valley
Use aerial photographs and plan perspectives to recognise landmarks and basic human and physical features; devise a simple map; and use and construct basic symbols in a key
Name and locate counties and cities of the United Kingdom, geographical regions and their identifying human and physical characteristics, key topographical features (including hills, mountains, coasts and rivers), and land-use patterns; and understand how some of these aspects have changed over time
Describe and understand key aspects of physical geography including climate zones, biomes and vegetation belts, rivers, mountains, volcanoes and earthquakes, and the water cycle
Use the eight points of a compass, four and six-figure grid references, symbols and key (including the use of Ordnance Survey maps) to build their knowledge of the United Kingdom and the wider world

KS3 at Balcarras

Year 7- Help we are going under
Year 9- Clean water for everyone?

In this section, students are required to study UK physical landscapes and **two** from Coastal landscapes in the UK, **River landscapes in the UK and Glacial landscapes in the UK.**
The aims of this unit are to develop an understanding of the geomorphological, biological and meteorological processes and features in different environments, and the need for management strategies governed by sustainability and consideration of the direct and indirect effects of human interaction with the Earth and the atmosphere.

Future Learning (Topic)
KS4 at Balcarras- Glaciation (Year 10), Natural hazards- extreme weather (Year 10), Resource management (Year 11), Ecosystems (Year 11), geographical skills across all GCSE topics,
KS5 at Balcarras- Water and carbon cycle (Year 13), Coastal systems (Year 12), geographical skills across all A-level topics

How will knowledge and skills be taught? (Implementation)	How will your understanding be assessed & recorded (Impact)
A series of lessons split into key themes covering fluvial erosion, deposition and transportation and resulting landforms from both erosion and deposition. Causes and management of flooding will also be explored. Fieldwork on a local river is integral to give a first-hand experience, which will enhance understanding of the world beyond the classroom and gives a chance to put theory in to practice. Teacher led lesson content Group and independent research task GCSE exam style questioning Group discussion/debates and questioning Reading key articles and textbooks	Provide SHORT and FREQUENT retrieval practice tests in a low stake environment Pupils will receive a past paper question booklet which covers all previous exam questions available to us. These will be regularly set and marked Continual low-stakes formative testing in lessons through verbal questioning This topic will be covered within the Year 10 mock exam – summative feedback

Misconceptions ***Rivers are faster in the upper course than the lower course*** This is a common misconception! In the upper course of the river the gradient is often really steep but the velocity is slow because of the vast amount of friction (more water is in contact with the bed and banks of the river). In the lower course the gradient levels off, but the speed of the river is very fast because there is less friction acting on the river water. ***Rivers run from north to south*** Rivers run downhill, following the path of least resistance. This path could take any direction. ***Tributaries only join a river in the upper and middle stages*** Tributaries can join a river at any point along its long profile. ***Rivers are not tidal*** Some rivers, that flow into seas and oceans, are tidal. A tidal river is a river (or a stretch of a river) whose level and flow are influenced by tides. This is usually at the end of a river near the ocean, where water from the sea flows up the river when the tide comes in, raising the water levels. Likewise, at low tide, water flows back out of the river, lowering the water level. ***Other misconceptions…..*** https://www.newground.co.uk/blog/misconceptions-of-flooding/	GCSE record sheet, ALPS analysis, data shared in interim reports and formal reports and parents evening.

How can parents help at home?

Support with homework and revision techniques for graded assessments. Discuss current affair issues by watching/reading the news. Download the BBC or Guardian news app and set to environmental notifications to receive the most update articles. Watching relevant documentaries e.g. David Attenborough, wildlife/environments.

Watch this

Our Planet: Freshwater (Netflix)
Earth's Great Rivers (BBC iPlayer)
Managing Rivers and Preventing Flooding: https://youtu.be/AX1i5uJ50qM
What rivers can tell us about the Earth's history- Liz Hajek- https://www.youtube.com/watch?v=1o9NEtA2IEQ
Can you solve the river crossing riddle? Lisa Winer- https://www.youtube.com/watch?v=ADR7dUoVh_c
Why rivers and lakes should have the same rights as humans- https://www.youtube.com/watch?v=opdCfb8cCFw
The global risk of flooding and how to turn the tide- Virginia Smith- https://www.youtube.com/watch?v=2LlcUwVcc3o

Listen to this

Rivers
https://www.bbc.co.uk/sounds/play/p025qhmy

Mayfield Geography Podcast – covers a range of topics
https://anchor.fm/mayfieldgeography/episodes/Rivers---The-River-Tees-erapmm

We are rivers podcast- American rivers

https://www.americanrivers.org/podcast/

Check this out

Before the Flood (Netflix)

Britannica: Rivers
https://www.britannica.com/science/river

Conversation Starters

No new houses are to be built on floodplains
Would you live in a flood prone area?
What level of risk from flooding is acceptable to you?
Are we planning to flood?
Increasing risk of floods- is climate change to blame?

Helpful further reading/discussion

Reading	**Vocabulary Lists** *Speaking like a geographer (Splag)*	**Careers Links**
Non-fiction Ian Stewart & John Lynch [2007]: Earth – The Power of the Planet - BBC Books Fred Pearce [2007]: When the Rivers Run Dry: What happens When Our Water Runs Out? – Eden Project Books Robert Does [2006]: Extreme Floods A History in a Changing Climate - Sutton Publishing Academic reading https://www.daera-ni.gov.uk/articles/hydrology https://www.bbc.co.uk/news/topics/cgg43v9jz7lt Have a look at the Hodder magazines online through the VLE via dynamic learning Fiction Song of the current by Sarah Tolcser Riverkeep by Martin Stewart The wind in the willows by Kenneth Grahame	Erosion Fluvial processes Cross profile Long profile Lateral erosion Vertical erosion Discharge Flood Flood risk Hard engineering Soft engineering Hydrograph Precipitation	https://www.prospects.ac.uk/job-profiles/hydrologist https://nationalcareers.service.gov.uk/job-profiles/hydrologist Career Advice on becoming a Hydrologist by Owain S https://www.youtube.com/watch?v=X6OtNrCZ7D8 Working for the Environment Agency https://environmentagencycareers.co.uk/