

## River Homework 4 Answers

1) Suggest a feature likely to be found at the part of the river labelled A and explain its formation? (3)

3.1 A river cliff is likely to be found at A [1 mark]. The current is faster on the outside bend of the meander because the channel is deeper [1 mark]. This means there's more erosion on the outside bend, so a river cliff is formed [1 mark].

2) Suggest a feature likely to be found at the part of the river labelled B and explain its formation? (3)

3.2 A slip-off slope is likely to be found at B [1 mark]. The current is slower on the inside bend of the meander because the river channel is shallower [1 mark]. This means material is deposited on the inside of the bend, so a slip-off slope is formed [1 mark].

3) Name the feature labelled C (1)

### Neck of a meander

4) Explain how an oxbow lake could form on the river shown in figure 3? (6)

3.4 This question is level marked. How to grade your answer:  
Level 0: There is no relevant information. [0 marks]  
Level 1: There is a basic explanation of the formation of an ox-bow lake. [1-2 marks]  
Level 2: There is a clear explanation of the formation of an ox-bow lake. [3-4 marks]  
Level 3: There is a detailed explanation of the formation of an ox-bow lake, which uses geographical terms accurately. [5-6 marks]

Here are some points your answer may include:

- The current is fastest at the outside bend of a meander because the channel is deeper.
- The fast current at the outside bend means that more erosion takes place here, by the processes of abrasion and hydraulic action.
- Erosion causes the outside bends of a meander to get closer.
- The outside bends continue getting closer until there's only a small bit of land left between the bends (called the neck).
- The river breaks through the neck, usually during a flood, and flows along the shortest course.
- Material is deposited across the inlets to the old meander. This eventually cuts off the meander, forming an ox-bow lake.