



# UNIVERSITY OF CAMBRIDGE INTERNATIONAL EXAMINATIONS General Certificate of Education Advanced Subsidiary Level and Advanced Level

GEOGRAPHY 9696/23

Paper 2 Advanced Physical Options

October/November 2011

1 hour 30 minutes

Additional Materials: Answer Booklet/Paper

## **READ THESE INSTRUCTIONS FIRST**

If you have been given an Answer Booklet, follow the instructions on the front cover of the Booklet.

Write your Centre number, candidate number and name on all the work you hand in.

Write in dark blue or black pen.

You may use a soft pencil for any diagrams, graphs or rough working.

Do not use staples, paper clips, highlighters, glue or correction fluid.

Answer **two** questions only. Each question answered **must** be from a different topic.

Sketch maps and diagrams should be drawn whenever they serve to illustrate an answer.

You should make reference to appropriate examples studied in the field or the classroom, even where such examples are not specifically requested by the question.

All the Figures and the Table referred to in the questions are contained in the Insert.

At the end of the examination, fasten all your work securely together.

The number of marks is given in brackets [ ] at the end of each question or part question.



## **Tropical environments**

Only **one** question may be answered from this topic.

- 1 Fig. 1 shows the distribution of the main areas of tropical rainforest.
  - (a) Describe and explain the distribution of tropical rainforest shown on Fig. 1. [10]
  - **(b)** Using examples, explain the extent to which the continued existence of tropical rainforest is threatened by human activities. [15]
- **2** (a) Describe and explain the formation of features associated with tropical karst. [10]
  - **(b)** Describe and account for variations in the climates of the humid and seasonally humid tropics. [15]

#### **Coastal environments**

Only **one** question may be answered from this topic.

- **3** Fig. 2 shows some coastal landforms.
  - (a) Describe the formation of two of the named coastal landforms shown in Fig. 2. [10]
  - **(b)** Using examples, explain the extent to which coastal landforms are influenced by human intervention. [15]
- 4 (a) Describe the characteristics and distribution of coral reefs. [10]
  - **(b)** To what extent do attempts to manage coastlines often cause more problems than they solve? [15]

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#### **Hazardous environments**

Only **one** question may be answered from this topic.

- **5** Fig. 3 shows some causes of the Galtur Avalanche in 1999.
  - (a) Using Fig. 3, describe and explain the causes of avalanches, and suggest other factors which also might affect the occurrence of an avalanche. [10]
  - **(b)** Using examples, discuss why the prediction and monitoring of hazards is not always successful. [15]
- **6** (a) Describe the factors that determine the nature of volcanic eruptions. [10]
  - (b) Using examples, discuss the extent to which the hazardous impact of an earthquake is related to its strength. [15]

### Arid and semi-arid environments

Only **one** question may be answered from this topic.

- 7 (a) Table 1 shows the general locations of deserts and gives some examples.
  - Why is rainfall in the desert areas shown in Table 1 scarce and unpredictable? [10]
  - (b) Explain the processes of erosion and transportation in hot deserts. To what extent do these processes influence the development of landforms in the present day? [15]
- (a) Describe and explain the ways in which vegetation and animals have adapted to survive in arid conditions.
  - **(b)** Evaluate the role of human activities in the process of desertification. [15]

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