

Surname						Other Names					
Centre Number						Candidate Number					
Candidate Signature											

For Examiner's Use
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General Certificate of Education  
 June 2007  
 Advanced Subsidiary Examination



**GEOGRAPHY (SPECIFICATION A)**  
**Unit 1 Core Concepts in Physical Geography**

**GGA1**

Friday 25 May 2007 1.30 pm to 2.30 pm

**You will need no other materials.**  
 You may use a calculator.

Time allowed: 1 hour

**Instructions**

- Use blue or black ink or ball-point pen. You may use pencil for maps, diagrams and graphs.
- Fill in the boxes at the top of this page.
- Answer **all** questions.
- Answer the questions in the spaces provided.
- Do all rough work in this book. Cross through any work you do not want to be marked.

**Information**

- The maximum mark for this paper is 60.
- The marks for questions are shown in brackets.
- You will be marked on your ability to use an appropriate form and style of writing, to organise relevant information clearly and coherently, and to use specialist vocabulary where appropriate. The legibility of your handwriting and the accuracy of your spelling, punctuation and grammar will also be considered.

For Examiner's Use			
Question	Mark	Question	Mark
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2			
Total (Column 1) →			
Total (Column 2) →			
TOTAL			
Examiner's Initials			

Answer **all** questions.

1 (a) Outline **two** physical causes of flooding.

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(2 marks)

(b) Study **Figure 1** which is an extract from an Oxfam appeal for aid following the floods in Bangladesh, a Less Economically Developed Country, during the summer of 2004.

**Figure 1**

Bangladesh has called for international assistance as river floods continue to overwhelm two-thirds of the country. Thirty million people are now affected, with over 400 dead.  
Forty percent of the capital city, Dhaka, is now under water with the poorest, low-lying areas worst affected. Hospitals are seeing an increasing number of people with waterborne diseases such as diarrhoea.  
There is concern that rising tides in the Bay of Bengal could stop river floodwaters flowing into the sea while water from northern areas continues downstream, worsening the flood in Dhaka.

(i) Suggest reasons why the impacts of flooding in Dhaka, outlined in **Figure 1**, were so severe.

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(3 marks)

(ii) Contrast the impacts of a flood event in the UK with those experienced in Bangladesh in 2004.

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*(5 marks)*

(c) Explain how flooding can contribute to the formation of depositional landforms.

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*(10 marks)*

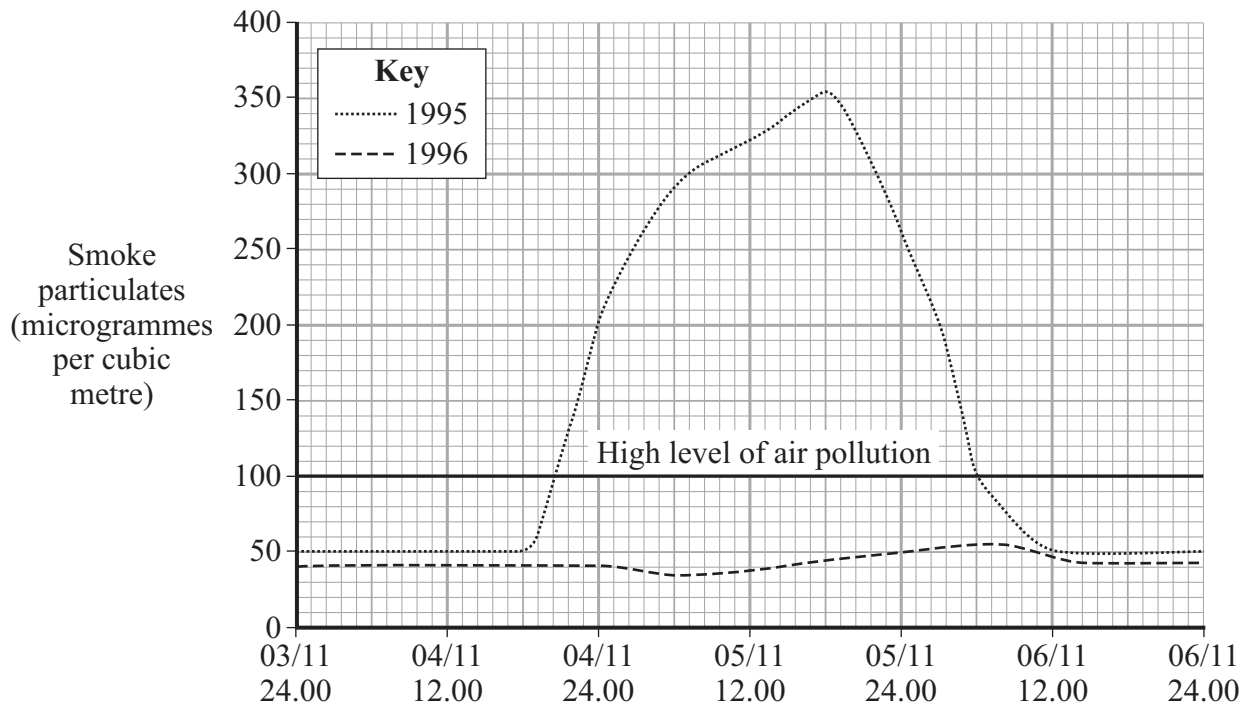
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**Turn over for the next question**

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- 2 (a) Study **Figure 2** which shows the concentration of smoke particulates measured in the air in Leeds around Bonfire Night (5 November) in 1995 and 1996.

**Figure 2**



- (i) How did the concentration of smoke particulates shown in **Figure 2** differ between 1995 and 1996?

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(2 marks)

(ii) Suggest how prevailing atmospheric conditions might have been responsible for the differences observed in 1995 and 1996.

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*(3 marks)*

(b) Describe the climatic conditions typical of Cool Temperate Western Maritime regions.

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*(5 marks)*

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**Turn over for the next question**

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3 (a) State the meaning of the following terms.

Soil structure .....

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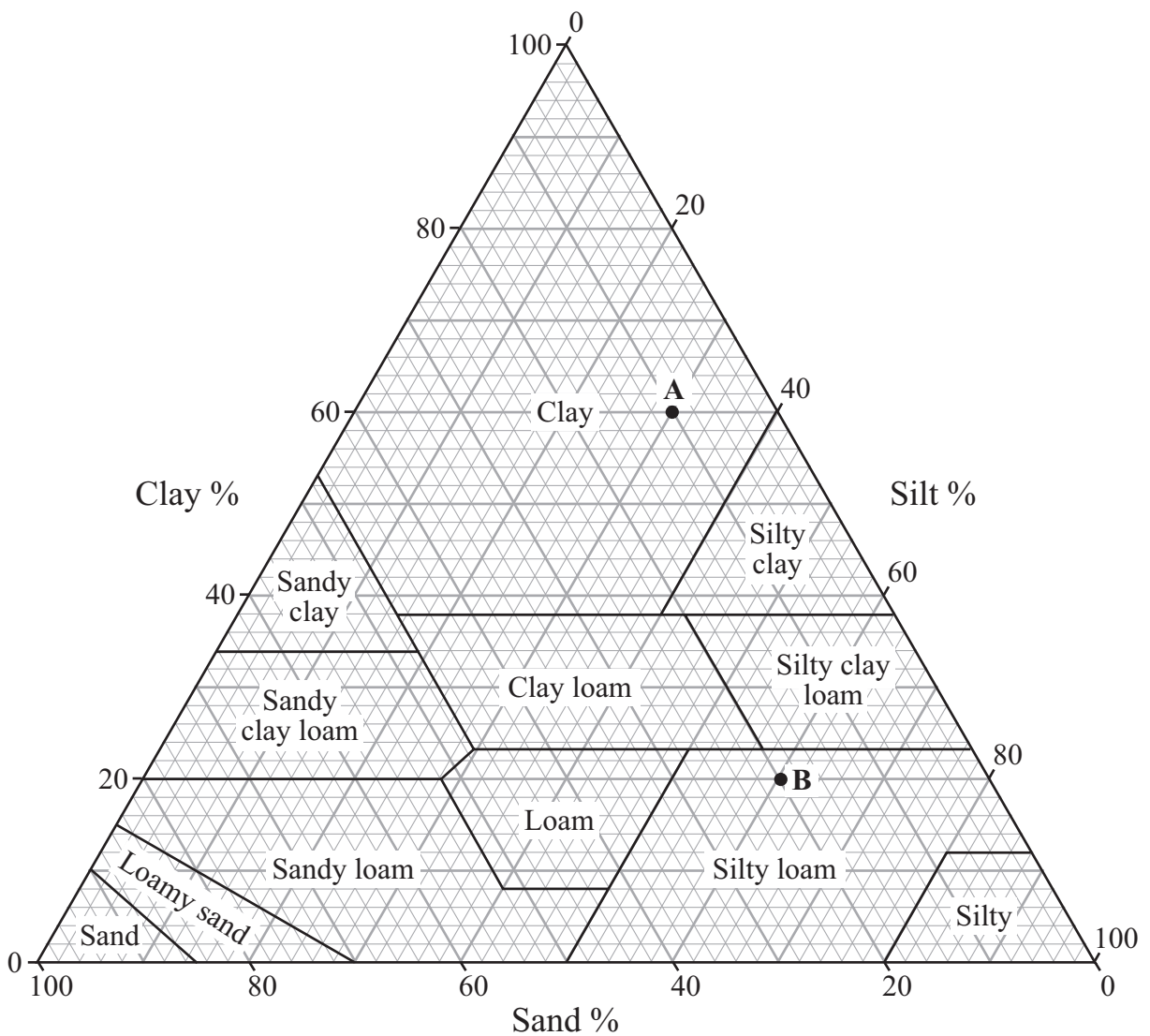
Soil texture .....

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(2 marks)

(b) Study **Figure 3** which is a triangular graph illustrating soil textural classes.

**Figure 3**



State the percentage of clay in the soil at **A** and the percentages of sand and silt in the soil at **B**.

**A** percentage of clay .....

**B** percentage of sand .....

**B** percentage of silt .....

*(3 marks)*

(c) In what ways does a podsol soil differ from a brown earth soil?

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*(5 marks)*

(d) For any plant succession you have studied, describe how and explain why the vegetation changes over time.

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