



**JURONG JUNIOR COLLEGE**  
**JC2 GEOGRAPHY**  
**Preliminary Examination 2017**

**GEOGRAPHY**

**9751**

**Higher 2**

Paper 2

Thursday 14 September 2017

3 Hours

Name: \_\_\_\_\_

Class: \_\_\_\_\_

**INSTRUCTIONS TO CANDIDATES**

Write in dark blue or black pen.

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

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

Answer **four** questions in total.

Candidates answer **all** questions.

The Insert contains all the Resources referred to in the questions.

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.

Diagrams and sketch maps should be drawn whenever they serve to illustrate an answer.

You are reminded of the need for good English and clear presentation in your answers.

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.

At the end of the examination, please attach your answers to the cover page provided.

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

## Section A

### Theme 4: Geographical Investigation

1. You and a group of classmates were tasked with undertaking a fieldwork exercise on 3 different terrains to ascertain the relationship between infiltration rates and the nature of the land use associated with the terrain.

The group was divided up into teams of four to measure the infiltration rates associated with each site. One site (Site A) was a site in an area undergoing construction. The other site (Site B) was located within a park. The last site (Site C) was located in a farmland area. The infiltration rate is calculated by finding out the time it takes for water level in the cylinder to fall by 2cm. The rate is calculated as mm/s.

Your team took measurements on all 3 sites on a Monday morning (Site A), noon (Site B) and late afternoon at 4pm (Site C). Heavy rain was experienced at (Site C) the night before.

Teams were each given the following equipment to gather primary data on infiltration rates:

- Milo Tin
- Ruler
- Stop watch
- Water

The time taken for the water level to drop by 2cm was defined using a ruler and personal observation. At site A, the group found difficulty placing milo tin in the ground as the site they have chosen was compacted and had many rock and concrete debris. Nevertheless they found a suitable spot to put in the milo tin near to newly ploughed earth where the site digger had just finished digging. The data collected was recorded using a data collection sheet. (Resource 2).

Resource 1 shows the land use associated with each site (Sites A, B & C). Resource 2 shows the data collected by your team to calculate the infiltration rates associated with each site.

- (a) With reference to Resource 1, suggest a suitable hypothesis and explain the rationale for your investigation. [2]
- (b) Explain the safety considerations your group will take at each respective site. [4]
- (c) Suggest **three** other pieces of information that may be useful in understanding infiltration rates at all sites. [6]
- (d) Explain how the way data collected might render the investigation unfair. [8]
- (e) Assess the usefulness of the infiltration data in Resource 2 in helping to determine the flood risk at the different sites. [5]

## **Section B**

### **Theme 1: Tropical Environments**

#### **Tropical Deforestation**

- 2.** Resource 3 shows the main drivers of deforestation in Brazil, Malaysia, Indonesia, Bolivia, Paraguay and Papua New Guinea. Resource 4 shows the area of oil palm harvested across Indonesia, Malaysia, Africa and South America.
- (a)** With reference to Resource 3, compare the total land deforested and the drivers of deforestation due to commercial agriculture across the different tropical countries. [4]
- (b)** Using Resource 3, compare the percentage of illegal agro conversion and illegal agro conversion exported. [4]
- (c)** Using Resource 4, describe the changes in the area of oil palm harvested amongst the different regions from 1991 to 2014. [3]
- (d)** Using Resources 3, 4 and your own knowledge, discuss why tropical deforestation continues unchecked in developing countries. [9]
- (e)** Explain the possible consequences of tropical deforestation. [5]

## Theme 2: Development, Economy and Environment

### Economic Structure in Vietnam

3. Resource 5 shows the distribution of employment in the economic sectors of Vietnam from 1990 to 2008. Resource 6 shows selected socioeconomic data of Vietnam in 1990 and 2015. Resource 7 shows labour productivity growth and nominal wage growth in selected countries during the period 2013-2018.
- (a) With reference to Resource 5, describe the changes in Vietnam's distribution of employment from 1990 to 2008. [4]
  - (b) With the help of Resource 6, suggest how employment in services in Vietnam may have changed by 2015 and explain why. [7]
  - (c) With reference to Resource 7, describe the relationship between labour productivity growth and nominal wage growth for the period 2013-18. [4]
  - (d) With the help of Resources 6, 7 and your own knowledge, discuss whether Vietnam can have strong economic development for the period 2013-2018. [6]
  - (e) Suggest **two** other pieces of information not seen in Resources 5, 6 and 7 that can help understand economic development in Vietnam better and explain why. [4]

## Theme 3: Sustainable Development

### Urban Growth in Asia and Oceania

4. Resource 8 shows the percentage urban population and city sizes in South Asia and Oceania, 2011 and 2025 (projected).
- (a) With reference to Resource 8, describe the percentage urban population and city sizes in South Asia and Oceania. [5]
  - (b) Identify the **two** types of data representation method shown in Resource 8 and suggest the benefits and limitations of these methods. [5]
  - (c) Suggest how the varied growth within South Asia may be explained. [6]
  - (d) Describe some of the problems South Asia will face in relation to its urban population and city sizes. [4]
  - (e) Suggest solutions to help South Asia in relation to the problems identified in (d). [5]

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