



NANYANG JUNIOR COLLEGE

Year 2 Preliminary Examination

H1 GEOGRAPHY

8834/01

17 Sept 2025

3 hours

Additional Materials:

Insert

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, index number and name on the work you hand in.

Write in dark blue or black pen on both sides of the paper.

You may use an HB pencil for any diagrams or graphs.

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

DO NOT WRITE ON ANY BARCODES.

Answer Question 1 in **Section A**.

Answer **both** questions in **Section B**.

Answer **two** questions in **Section C**.

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.

Section A

Cluster 2 Fieldwork

Responding to Climate Change in Punggol, Singapore

- 1 A group of four 18-year-old students in Singapore conducted a fieldwork investigation to examine how local communities in Punggol respond to climate change through climate-adaptive initiatives organised for residents.

The students proposed the following hypothesis:

“The presence of community climate initiatives in Punggol has enhanced residents’ awareness of and participation in sustainable practices as part of their response to climate change.”

To support their investigation, the students gathered secondary data from online sources and the Punggol Town Council on community initiatives that promote sustainable living and environmentally friendly practices. Based on preliminary research and observed community activity, they selected four sites for detailed study:

- a. **Punggol Waterway Park** – Tree planting (50 trees) and organic mulching by NurtureStars Punggol.
- b. **One Punggol** – *Make/IT* space at Punggol Regional Library offering upcycling workshops (e.g., sewing, crafting).
- c. **Oasis Terraces** – Community participation in rooftop gardening.
- d. **City Sprouts @ Punggol** – Residents exploring a pop-up urban farming stall that promotes sustainable living.

The students conducted surveys with 25 respondents using random sampling at Punggol MRT during a weekday in June. The responses were then tabulated and presented in a results table.

Resource 1 shows a map of Punggol highlighting the four sites investigated. Resources 2A to 2D provide photographs of the four sites and their associated sustainable practices. Resource 3 is the questionnaire survey used to collect fieldwork data. Resource 4 presents the tabulated results of the survey questions.

- (a) With reference to Resource 1, explain why the investigation is appropriate. [3]
- (b) Explain **three** benefits of using surveys as a tool for data collection. [6]
- (c) With reference to Resource 3, explain the strengths and weaknesses of the survey design. [6]
- (d) Using a suitable data representation method, present the results to Question 5 from the survey shown in Resource 4, and justify your choice. [5]
- (e) With reference to all the resources, evaluate the validity of the students’ conclusion that residents in Punggol are not participating actively in climate actions because they are not aware of climate-adaptive initiatives in the area. [10]

Section B**Cluster 1 Sustainable Future and Climate Change**

Answer **both** questions

- 2** Resource 5 shows the number of people living in slums between 2000 to 2018. Resource 6 shows a photograph of a slum in Nairobi, Kenya. Resource 7 shows an infographic of SDG 11 on Making cities and human settlements inclusive, safe and resilient and sustainable. Resource 8 shows a photograph of a slum settlement in Africa before and after an in-situ upgrading project
- (a) Describe the spatial distribution of people living in slums between 2000 to 2018 as shown in Resource 5. [3]
 - (b) Explain the spatial pattern of slum distribution shown in Resource 5. [5]
 - (c) Describe **two** visible features in Resource 6 that show the area has the characteristics of a slum. [4]
 - (d) With reference to Resources 6 and 7, explain how slums hinder progress towards SDG 11 through their social and environmental impacts. [6]
 - (e) Using Resource 8, explain how in-situ upgrading contributes to achieving sustainable urban development in slum areas. [4]
- 3** Resource 9 shows contributors to Global Sea Level Rise between 2003 and 2014. Resource 10 is a map showing the degree of vulnerability of cities to climate change in 2018. Resource 11 shows imports and exports of energy products in Singapore between 2018 to 2023.
- (a) With reference to Resource 9, describe the trends in global mean sea level and its contributing factors between 2003 and 2014. [3]
 - (b) Explain the trends of the **two** main contributors to sea level rise between 2003 and 2014. [5]
 - (c) With reference to Resource 10, describe the relationship between average annual % change in population growth (2018–2035) and climate change vulnerability across different regions. [4]
 - (d) With reference to Resource 10, explain how future population growth influences climate change vulnerability across different regions. [6]
 - (e) With reference to Resource 11, suggest measures that could help Singapore reduce its dependence on imported fossil fuels and shift towards low-carbon energy sources. [4]

Section C

Answer **two** questions

- 4** 'A circular economy approach can address the challenges of managing non-hazardous solid waste.' Evaluate this statement. [13]
- 5** 'Strategies to improve the lives of women in cities have been successful.' Evaluate on this statement. [13]
- 6** Evaluate the extent to which the socio-economic costs of climate change outweigh its environmental impacts. [13]

End of Paper