

The total of all marks is 40.

Topic 1: Battle for the Biosphere

Figure shows the location of areas of tropical rainforest.



Which of the following is the best description of the distribution of tropical rainforests? There is only one correct answer. (max 2 marks)

- A) Evenly distributed in the tropics.
- B) All in the northern hemisphere.
- C) Mostly in the equatorial regions.
- D) Mostly in arid areas.

Which of the following statements is correct? There is only one correct answer. (max 2 marks)

- A) The largest continuous area of tropical rainforest is in South America.
- B) The largest continuous area of tropical rainforest is in Southeast Asia.
- C) There is some tropical rainforest in Europe.
- D) The tropical rainforest in Africa is mostly on the east coast.

Describe the distribution of tropical rainforests. (max 2 marks)

Answer

One mark for each point.

Along/close to the equator (1 mark).

Identification of an anomaly such as Mexico or Madagascar, not all 'equatorial' areas, e.g. East Africa (1 mark).

Outline TWO ways in which humans could protect eco-systems. (max 4 marks)

Answer

One mark for basic point (any of those three) and one for extension, for example.

- By cutting back on consumption, example or detail of same.
- By recycling more effectively, example or detail of same.
- By finding substitutes for natural products example or detail of same.

Explain how climate controls the distribution of biomes, such as tropical rainforests. (max 4 marks)

Answer

Allow one mark for point but limit to two if no extension offered.

Basic point = appropriate change (1 mark). Extension = detail of change (1 mark).

Role of temperature explained in terms of higher temperatures = more/different plant growth (1 mark). Details of same delivered through examples/locations (1 mark).

Role of rainfall explained in terms of higher rainfall = more/different plant growth (1 mark). Details of same delivered through examples/locations (1 mark).

Might also address the relationship between rainfall and temperature as in rainforests being 'hot' and 'wet'.

Explain the role of human activity in the destruction of tropical rainforest. (max 6 marks)

Answer

Expect responses to cover the following:

- over exploitation of, e.g., logging
- disruption of eco-system through mining/drilling activity
- conversion of land to farming for agribusiness.

Will also describe details of the destruction through examples.

Explanation likely to cover:

- economic pressure to gather resources
- related need to earn foreign exchange

- improving technologies, making once remote resources more accessible
- exploitation managed by transnational corporations (TNCs) who have powerful influence
- exploitation managed from the urban core.

Good answers will combine elements of description and explanation, for example:

‘In the Oriente region of Ecuador the TNC Chevron (now Texaco) drilled thousands of wells and disposed of waste by filling hundreds of pits with oil, leading to pollution of the water supply in local rivers, and groundwater. The economy of Ecuador was heavily dependent on the foreign exchange from oil and local tribes had no political power to stop this exploitation.’

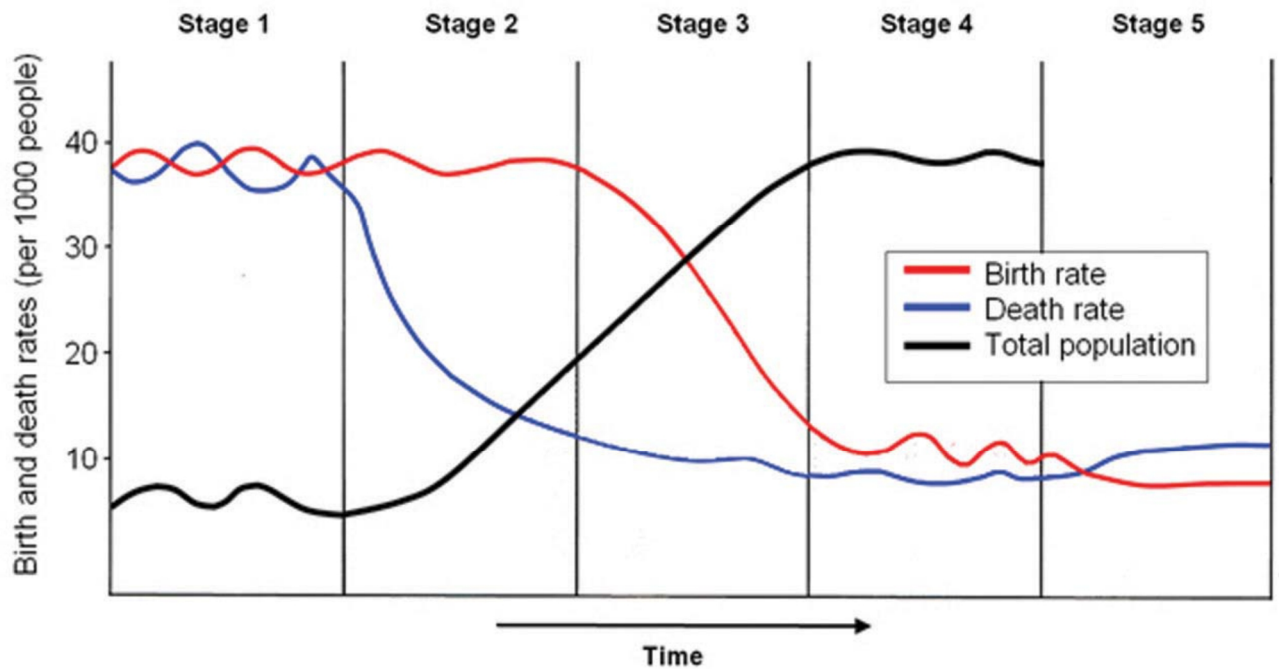
1-2 marks – The response covers one impact of human activity but with little accuracy or detail. No location beyond a country name. Other than naming an activity, reasons for the destruction are not addressed. There is no real link with global factors. Limited structure to the answer and basic use of geographical terminology.

3-4 marks – Several activities are identified, with at least two having some detail. Location is clear but not detailed. At least one factor that facilitated the destruction is identified. Some structure, clearly communicated, but with limited use of geographical terminology.

5-6 marks – Several activities are well described. Location is clear and specific. The factors facilitating destruction are addressed in some depth. Clear structure, well communicated and with good use of geographical terminology.

Topic 2: Population Dynamics

Figure shows the demographic transition model.



In which stage of the demographic transition model does total population begin to grow rapidly? There is only one correct answer. (max 2 marks)

- A) Stage 1.
- B) Stage 2.
- C) Stage 3.
- D) Stage 4.

What happens to total population in Stage 5 of the demographic transition model? There is only one correct answer. (max 2 marks)

- A) It stays the same.
- B) It rises.
- C) It falls.
- D) It rises and falls.

Describe the relationship between total population and death rate. (max 2 marks)

Answer

- High death rates correspond to low total population. Accurate use of data, e.g. low population when death rates are 35/40 per 1000.

- As death rates fall, total population rises/begins to rise.
- As death rates stabilise at a low level, population also stabilises.

Award one mark for any of those basic points, plus a second mark if point is developed.

Many developing countries have youthful populations. Describe what is meant by a ‘youthful population’. (*max 2 marks*)

Answer

A population with a high percentage/proportion of young people/children (1 mark)
aged 0 –16 (or similar age range) (1 mark).

Describe THREE problems faced by countries with youthful populations. (*max 6 marks*)

Answer

Any three developed points from the following.

- High costs of healthcare for the young/newborn (1 mark), e.g. maternity units, premature units (1 mark).
- Other service provision costs, such as schools/nursery places (1 mark) or benefits that are child specific (1 mark).
- High youthful dependency ratio (1 mark) and therefore few working age people paying tax to pay for the young (1 mark).
- Rapid population growth is ‘built in’ as the young move up the pyramid (1 mark), so there are follow-on issues such as housing demand (1 mark).

Award one mark for a basic point, plus a second mark for a developed point or relevant example.

Explain why some countries choose to increase immigration but others choose to reduce it. (*max 6 marks*)

Answer

Answers should cover **both** reducing and increasing immigration.

Reduce: this is often because of real or perceived pressure on resources, e.g. housing, healthcare system or education services being over-stretched by the volume of immigration. Lack of available jobs or a view that jobs that could be taken by the host population are being filled by migrants. Overcrowding and pressure on space. Social/cultural reasons in terms of societies being worried about the scale of immigration.

Increase: often related to skill shortages, e.g. lack of low–skill workers in construction, farming etc (Dubai, UK in terms of EU immigration) but could also be because of

specific skills shortages, e.g. doctors, nurses. May also be due to underutilised resources and the need to populate areas, e.g. USA/Canada in the past.

Could also counteract an ageing population and increase birth rates (as it has done in the UK recently).

1-2 marks – Attempts an explanation of some reasons but with a narrow focus; likely to cover either reducing or increasing but not both. Some generalized examples used.

3-4 marks – Some explanation of several reasons for immigration policy, but in general terms. Some details are provided but may be unbalanced in terms of reducing/increasing. Some structure.

5-6 marks – A range of explanations with details, using examples linked to reasons for both increasing and reducing immigration. Well located and with linked detail. Structured explanation.