

2.5 The Demographic Transition Model

Name: _____ Class: _____ Date: _____

Total: 10 marks

KEY WORDS demographic transition model 人口转变模型 • migration 迁移

Objective

Build the skills to answer exam questions on the **Demographic Transition Model** 人口转变模型 (DTM).

You must be able to:

- describe the birth and death rates in each of the DTM's five stages
- explain why the death rate falls before the birth rate
- place a country in a DTM stage from its rates
- state one limitation of the DTM

1 Worked examples

Study these first. Each one shows the method for a task used later.

■ The five stages

Stage 1: high CBR and CDR (stable). Stage 2: CDR falls, CBR high (fast growth). Stage 3: CBR falls (slowing growth). Stage 4: both low (stable). Stage 5: CBR below CDR (decline).

■ Why death falls first

Better food, water, sanitation, and medicine cut the **death rate** early. The **birth rate** stays high longer because family size is cultural and slow to change — so Stage 2 grows fast.

■ Limitations

The DTM is based on Europe's history, assumes all countries follow the same path, and ignores migration and government policy.

2 Practice

2.1 Describe the birth and death rates in Stage 2 of the DTM.

[2]

2.2 Explain why the death rate falls before the birth rate. [2]

2.3 Country Z has a low death rate and a birth rate that has recently begun to fall.

(a) Which DTM stage is it in? [1]

(b) State what is happening to its growth rate. [1]

3 Exam-style questions

3.1 In Stage 4 of the DTM, birth and death rates are both [1]

- **A** high
- **B** low
- **C** rising
- **D** unequal by 20 per 1000

3.2 One valid criticism of the DTM is that it [1]

- **A** shows death rates
- **B** is based on European history and ignores migration
- **C** has five stages
- **D** uses birth and death rates

3.3 A country has very high birth and death rates that roughly balance.

(a) Which DTM stage is this? [1]

(b) Explain why almost no countries are in this stage today. [1]

Solutions

2.1 death rate falling; birth rate still high → rapid natural increase.

2.2 improved food, sanitation, and medicine quickly cut deaths; high fertility persists as cultural attitudes to family size change slowly.

2.3 (a) Stage 3. (b) growth is slowing (still positive but decelerating).

3.1 B. Stage 4 has low birth and low death rates, near-stable population.

3.2 B. the model generalises from Europe and omits migration/policy.

3.3 (a) Stage 1. (b) modern medicine/sanitation have cut death rates almost everywhere, moving countries to Stage 2+.