

Full Higher Separate content. ★ = Higher Tier. ◆ = Separate Science only.

Q1. Explain the difference between communicable and non-communicable diseases. Give ONE example of each.

[3 marks]

Q2. Describe THREE risk factors for cancer.

[3 marks]

★ HIGHER TIER

Q3. ★ Explain what is meant by correlation and causation. Use an example from cancer risk factors.

[3 marks]

Total: 9 marks

Q1 (3 marks)

Explain the difference between communicable and non-communicable diseases. Give ONE exampl...

- Communicable: caused by pathogen, can spread between hosts [1] — example: tuberculosis, malaria, measles [1]
- Non-communicable: cannot be transmitted; caused by lifestyle/genetics/environment [1] — example: coronary heart disease, cancer, Type 2 diabetes [1] — 3 marks for definitions + one example

Q2 (3 marks)

Describe THREE risk factors for cancer.

- UV radiation from sunlight — skin cancer [1]
- Smoking — lung cancer [1]
- Some viruses (e.g. HPV — cervical cancer) / obesity / asbestos exposure [1] — any 3 with correct cancer type or explanation

Q3 (3 marks) [★ HT]

★ Explain what is meant by correlation and causation. Use an example from cancer risk fact...

- Correlation: two variables change together — does not prove one causes the other [1]
- Causation: one factor directly causes the other [1]
- Example: correlation between smoking and lung cancer — further evidence (biological mechanism) shows causation: carcinogens in smoke cause mutations in lung cells [1]