Science Year 10 — Practice Exam 1 — Answers & Explanations

Answers to the 12 questions in the free preview.

Science

1. C. mass × acceleration
Newton's second law states F = m × a (force equals mass times acceleration).

2. C. Homeostasis
Homeostasis is the regulation of internal conditions, such as temperature, to keep the body stable.

3. A. Charles Darwin
Charles Darwin proposed the theory of evolution by natural selection in his book "On the Origin of Species".

4. D. Biotechnology
Biotechnology applies biological processes and organisms to develop products and technologies.

5. B. Genome
The genome is the complete set of genetic material, or DNA, found in an organism.

6. B. Choosing organisms with desired traits to breed together
Selective breeding involves choosing parent organisms with desirable traits, over generations, to produce offspring with those traits.

7. A. Ohm
Electrical resistance is measured in ohms, symbol Ω.

8. D. Frequency
Frequency measures how many complete waves pass a point per second, measured in hertz (Hz).

9. B. Voltage = current × resistance
Ohm's law states V = I × R, where V is voltage, I is current, and R is resistance.

10. B. Ampere
Electric current is measured in amperes (amps), symbol A.

11. D. High frequency
Wavelength and frequency are inversely related for waves travelling at the same speed, so a short wavelength means a high frequency.

12. B. 4.5 billion years
Scientific evidence, including radiometric dating, estimates Earth's age at approximately 4.5 billion years.

PrepNest

PREVIEW

That’s the end of the preview answers

These are the answers to the 12 preview questions. The full answer key covers all 24 questions in Science Year 10 — Practice Exam 1, with the working behind every mark.

STILL TO COME	QUESTIONS	MARKS
Science	12	12

The full paper comes with

- Every question, printed exactly like the ones in this preview
- The complete answer key, with the working behind every mark
- A topic report after marking, showing what to practice next

Get the full paper at

prepnest.com.au/practice/exams/science-year_10-1

PrepNest