ENGLAND GCSE MATHS AQA HIGHER · UNIT 3 · 10 QUESTIONS

Algebra, Notation, Vocabulary and Manipulation — Practice Test

This practice test was made by AI and there may be mistakes. If a question or answer looks wrong, use the Flag a mistake button to let Brett know so he can fix it.

1 **A tennis ball costs a pounds. The total cost, in pounds, of 6 tennis balls is**

- **A** a^6
- **B** $6a$
- **C** $a + 6$
- **D** $6a^2$

Understand It with Pulse | Flag a mistake

2 **The height of a rocket, in metres, after t seconds is $h = 25t - 5t^2$. When t = 3, the height is**

- A 35
- B 25
- C 75
- D 30

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3 **Simplify 2a + 5b + 4a - 2b, where a is the number of red apples and b is the number of lemons.**

- A 6a + 7b
- B 6a + 3b
- C 6a
- D 3b

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4 Expand (x + 3)(x + 6)

- A $x^2 - 9x + 18$
- B $x^2 + 9x - 18$
- C $x^2 - 3x + 18$
- D $x^2 + 9x + 18$

Understand It with Pulse | Flag a mistake

5 Factorise 3x + 9

- A x(3 + 3)
- B 3(x - 3)
- C 3(x + 9)
- D 3(x + 3)

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6

Expand 5(x + 5)

A 5x + 25

B 5x + 10

C 5x + 5

D 10x + 25

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7

Expand $(x - 5)^2$

A $x^2 - 10x + 25$

B $x^2 - 10x - 25$

C $x^2 + 25$

D $x^2 - 5x + 25$

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8 **Simplify 3p + 5b + 2p - b, where p is the number of paintbrushes and b is the number of hardcover books.**

- A 5p + 6b
- B 4b
- C 5p + 4b
- D 5p

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9 **A sandwich costs s pounds. The cost, in pounds, of 4 sandwiches and a £2 drink is**

- A 5s + 2
- B 4s - 2
- C 4(s + 2)
- D 4s + 2

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10 **Factorise $x^2 - 25$**

A (x - 5)(x + 5)

B (x + 5)(x + 5)

C (x + 5)(x - 5)

D (x - 5)(x - 5)

Understand It with Pulse | Flag a mistake

ANSWER KEY

1. B
2. D
3. B
4. D
5. D
6. A
7. A
8. C
9. D
10. C

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