

## Intro to Solving Quadratics by Factorisation

1. What can we conclude about this statement?

$$\_ \times \_ = 0$$

2. So what about this statement?

$$(x - 2) \times (x - 3) = 0$$

3. Solve this:

$$x^2 + 5x + 6 = 0$$

4. Solve this, where negatives are involved:

$$x^2 + x - 20 = 0$$

5. Sometimes there appears to be no  $x$  term:

$$x^2 - 9 = 0$$

6. Sometimes the answer is repeated:

$$x^2 - 14x + 49 = 0$$

7. Sometimes there appears to be no constant term:

$$x^2 + 4x = 0$$

8. Sometimes we try to think too much:

$$x^2 = 100$$

9. Sometimes the answer is a fraction:

$$2x^2 + 5x + 3 = 0$$

10. Sometimes we have to create the question for ourselves:

$$x^2 + 30 = 11x$$

11. Sometimes we have to work hard to create the question for ourselves:

$$x^2 = \frac{-5x}{2} - 6$$