



Factorise

$$m^2 - 2m - 63$$

$$(m-9)(m+7)$$

Factorise

$$m^2 - 81$$

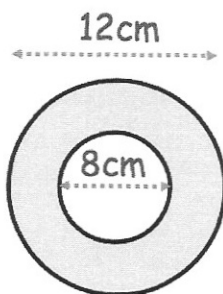
$$(m-9)(m+9)$$

Write 3958234 correct to one significant figure.

4,000,000

Write 0.05491 correct to two significant figures.

0.055



Find the area of the shaded shape.

$$\begin{aligned} & (\pi \times 6^2) - (\pi \times 4^2) \\ & = 62.83 \dots \text{cm}^2 \end{aligned}$$

$$\mathbf{a} = \begin{pmatrix} 5 \\ -2 \end{pmatrix} \quad \mathbf{b} = \begin{pmatrix} -8 \\ 2 \end{pmatrix}$$

Work out  $\mathbf{b} + 3\mathbf{a}$ 

$$3\mathbf{a} = \begin{pmatrix} 15 \\ -6 \end{pmatrix}$$

$$\underline{\mathbf{b}} + 3\mathbf{a} = \begin{pmatrix} 7 \\ -4 \end{pmatrix}$$

Work out the length of the side labelled y.

$$\begin{aligned} & 2x - 10 = 90 \\ & 2x = 100 \\ & x = 50 \end{aligned}$$

$$\frac{8}{\cos 50} = 12.446 \text{ cm}$$

