## Volume of Cylinders - Matching Cards Answers

(Diagrams are not drawn to scale).

| Calculate the volume of the shape, giving your answer correct to the nearest whole number. |  | $\pi \times 2^{2} \times 8$ | $101 \mathrm{~cm}^{3}$ |
| :---: | :---: | :---: | :---: |
| Calculate the volume of the shape, giving your answer correct to the nearest whole number. |  | $\pi \times 3.5^{2} \times 9$ | $346 \mathrm{~cm}^{3}$ |
| The volume of the cylinder is $42 \mathrm{~cm}^{3}$. Calculate its height $(x)$ giving your answer correct to 1 decimal place. |  | $x=\frac{42}{\pi \times 2.25}$ | 5.9 cm |
| Calculate the volume of the shape, giving your answer correct to the nearest whole $\mathrm{cm}^{3}$. |  | $\pi \times 36 \times 20$ | $2262 \mathrm{~cm}^{3}$ |
| Calculate the volume of the shape, giving your answer correct to 1 significant figure. |  | $\pi \times 2.5^{2} \times 10$ | $200 \mathrm{~cm}^{3}$ |
| The volume of the cylinder is $166 \mathrm{~cm}^{3}$. Calculate its radius ( $x$ ), giving your answer correct to 1 decimal place. |  | $x=\sqrt{\frac{166}{10 \pi}}$ | 2.3 cm |
| Calculate the volume of the shape, giving your answer correct to the nearest whole $\mathrm{cm}^{3}$. |  | $\pi \times 144 \times 30$ | $13572 \mathrm{~cm}^{3}$ |

Calculate the volume of the shape, giving your answer correct to 2 significant figures.

The volume of the cylinder is $1963 \mathrm{~cm}^{3}$. Calculate its height ( $x$ ), giving your answer correct to the nearest whole number.

The volume of the cylinder is $100 \mathrm{~cm}^{3}$. Calculate its radius ( $x$ ), giving your answer correct to 1 decimal place.

| $(8 \mathrm{~cm})$ | $\pi \times 16 \times 12$ | $600 \mathrm{~cm}^{3}$ |
| :---: | :---: | :---: |
| $x=\frac{12 \mathrm{~cm}}{x+25}$ | 25 cm |  |
| 11 cm | $x=\sqrt{\frac{100}{11 \pi}}$ | 1.7 cm |

## Volume of Cylinders - Matching Cards

## Instructions

Cut out every card then match each diagram to the correct working and answer.
(Diagrams are not drawn to scale).

| $\pi \times 3.5^{2} \times 9$ | $x=\frac{1963}{\pi \times 25}$ | $600 \mathrm{~cm}^{3}$ | $200 \mathrm{~cm}^{3}$ |
| :---: | :---: | :---: | :---: |
| $x=\sqrt{\frac{166}{10 \pi}}$ | $\pi \times 36 \times 20$ | $346 \mathrm{~cm}^{3}$ | $13572 \mathrm{~cm}^{3}$ |
| $x=\frac{42}{\pi \times 2.25}$ | $\pi \times 16 \times 12$ | $25 \mathrm{~cm}^{2}$ | $2262 \mathrm{~cm}^{3}$ |
| $\pi \times 2.5^{2} \times 10$ | $\pi \times 2 \times 8$ | $101 \mathrm{~cm}^{3}$ |  |
| $\pi \times 144 \times 30$ | $x=\sqrt{\frac{100}{11 \pi}}$ |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |

Calculate the volume of the shape, giving your answer correct to the nearest whole number.


## Volume of Cylinders

Calculate the volume of the shape, giving your answer correct to the nearest whole number.


## Volume of Cylinders

The volume of the cylinder is $42 \mathrm{~cm}^{3}$. Calculate its height (x) giving your answer correct to 1 decimal place.


## Volume of Cylinders

Calculate the volume of the shape, giving your answer correct to the nearest whole $\mathrm{cm}^{3}$.


Volume of Cylinders


Calculate the volume of the shape, giving your answer correct to the nearest whole $\mathrm{cm}^{3}$.

Calculate the volume of the shape, giving your answer correct to 2 significant figures.
 Volume of Cylinders

The volume of the cylinder is $1963 \mathrm{~cm}^{3}$. Calculate its height (x), giving your answer correct to the nearest
 whole number.

## Volume of Cylinders

The volume of the cylinder is $100 \mathrm{~cm}^{3}$. Calculate its radius (x), giving your answer correct to 1 decimal place.

