1. 



Diagram NOT accurately drawn
$A B C$ is a right-angled triangle.
Angle $B=90^{\circ}$.
Angle $A=36^{\circ}$.
$A B=8.7 \mathrm{~cm}$.

Work out the length of $B C$.
Give your answer correct to 3 significant figures.
cm
2.


Calculate the value of $x$.
Give your answer correct to 3 significant figures.
3.


Diagram NOT accurately drawn
$P Q R$ is a triangle.
Angle $Q=90^{\circ}$.
Angle $R=43^{\circ}$.
$P R=5.8 \mathrm{~m}$.
Calculate the length of $Q R$.
Give your answer correct to 3 significant figures.
4.

$P Q R$ is a triangle.
Angle $P Q R=90^{\circ}$.
$P Q=12.5 \mathrm{~cm}$.
$Q R=5 \mathrm{~cm}$.
Calculate the value of $x$.
Give your answer correct to 1 decimal place.
5.


Diagram NOT
accurately drawn
$L M N$ is a right-angled triangle.
$M N=9.6 \mathrm{~cm}$.
$L M=6.4 \mathrm{~cm}$.

Calculate the size of the angle marked $x^{\circ}$.
Give your answer correct to 1 decimal place.
$\qquad$
.${ }^{\circ}$
6.


Diagram NOT
accurately drawn

Work out the value of $x$.
Give your answer correct to 1 decimal place.
7.

Diagram NOT
accurately drawn

$P Q R$ is a right-angled triangle.
$P R=12 \mathrm{~cm}$.
$Q R=4.5 \mathrm{~cm}$.
Angle $P R Q=90^{\circ}$.
Work out the value of $x$.
Give your answer correct to one decimal place.
$x=$
(3 marks)
8. Calculate the size of angle $a$ in this right-angled triangle.

Give your answer correct to 3 significant figures.


Diagram NOT accurately drawn
9. $\quad P Q R$ is a right-angled triangle.


Diagram NOT
accurately drawn
$P R=8 \mathrm{~cm}$.
$Q R=12 \mathrm{~cm}$.
(a) Find the size of the angle marked $x$.

Give your answer correct to 1 decimal place.
$X Y Z$ is a different right-angled triangle.

$X Y=5 \mathrm{~cm}$.
Angle $Z=32^{\circ}$.
(b) Calculate the length $Y Z$.

Give your answer correct to 3 significant figures.
10. The diagram shows a quadrilateral $A B C D$.

$A B=16 \mathrm{~cm}$.
$A D=12 \mathrm{~cm}$.
Angle $B C D=40^{\circ}$.
Angle $A D B=$ angle $C B D=90^{\circ}$.
Calculate the length of $C D$.
Give your answer correct to 3 significant figures.
11.


Diagram NOT
accurately drawn
$A B C$ is a triangle.
$A D C$ is a straight line with $B D$ perpendicular to $A C$.
$A B=7 \mathrm{~cm}$.
$B C=12 \mathrm{~cm}$.
Angle $B A D=65^{\circ}$.
Calculate the length of $A C$.
Give your answer correct to 3 significant figures.

