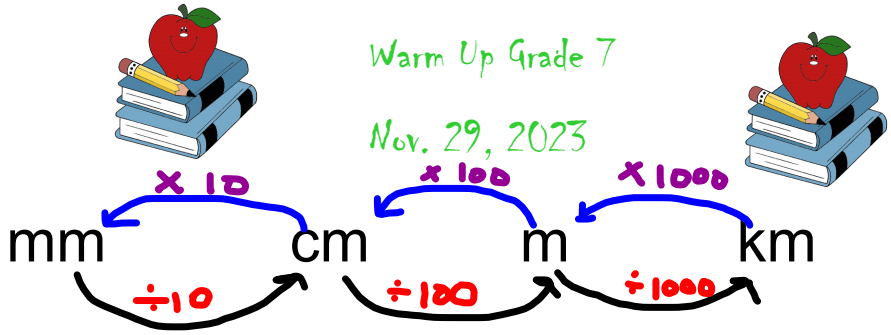


Complete the following:

a) 0.92 km = 920 m

b) 834 m = 834000 mm

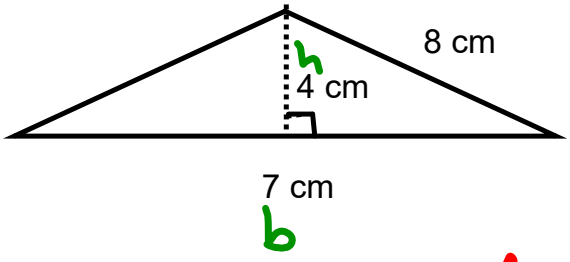
c) 2.4 km = 2400 m

d) 31.7 cm = 0.317 m

e) 51 mm = 5.1 cm

f) 7400 mm = 7.4 m

2) Find the area of the following



$b = 7cm$

$h = 4cm$

$A_\Delta = ?$

$$A_\Delta = \frac{b \times h}{2}$$

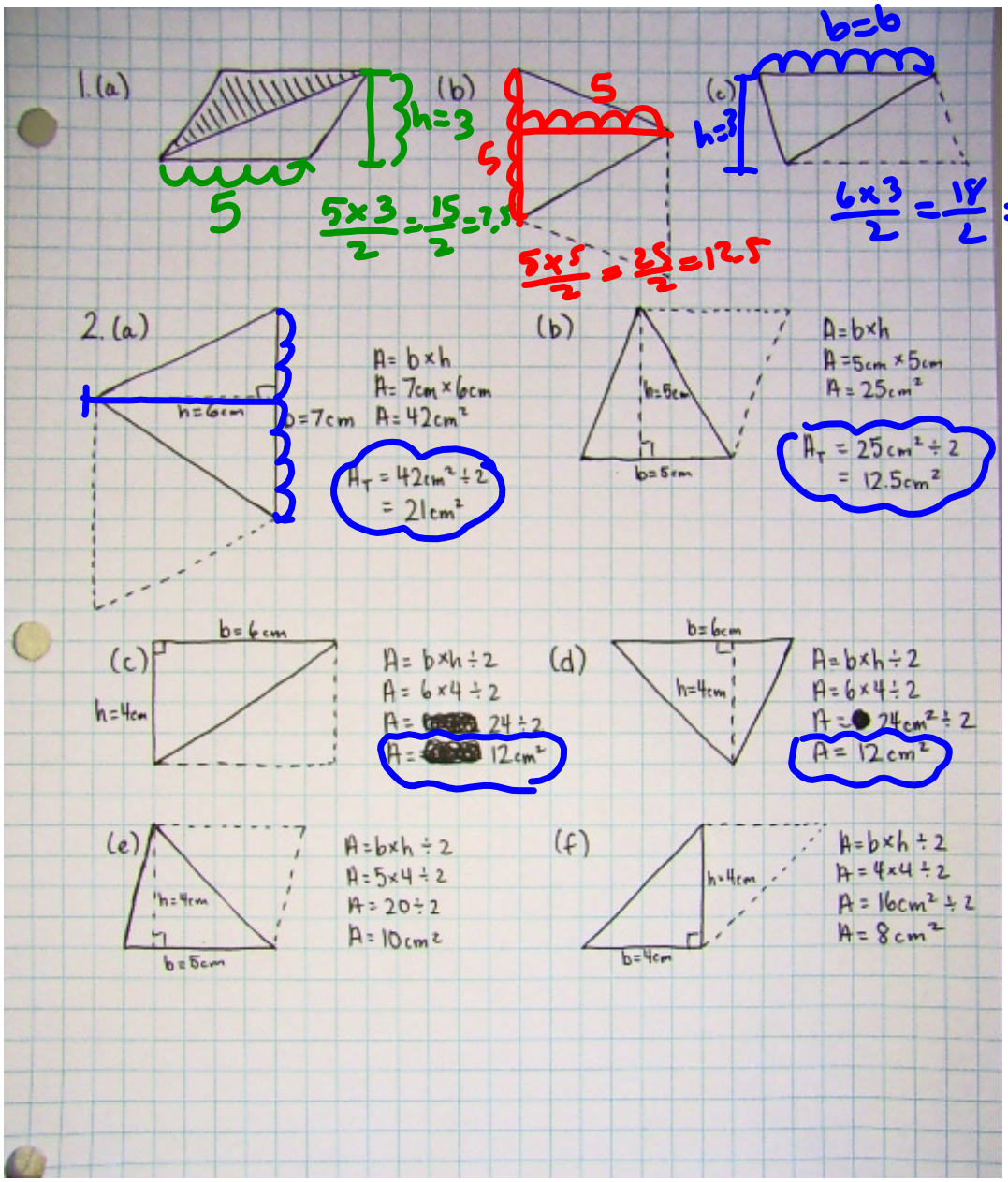
$$= \frac{7cm \times 4cm}{2}$$

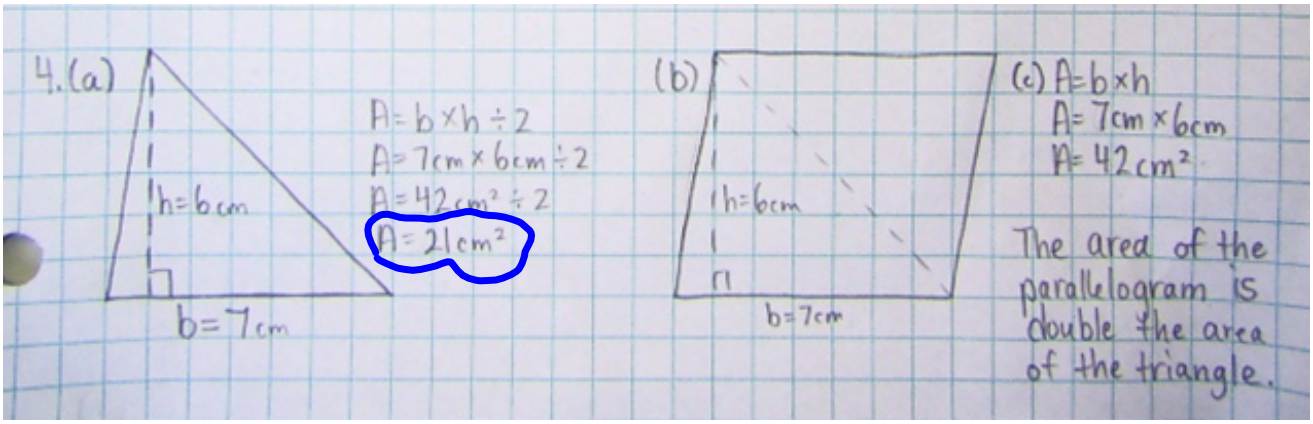
$$= \frac{28cm^2}{2}$$

$$A_\Delta = 14cm^2$$

Homework Solutions

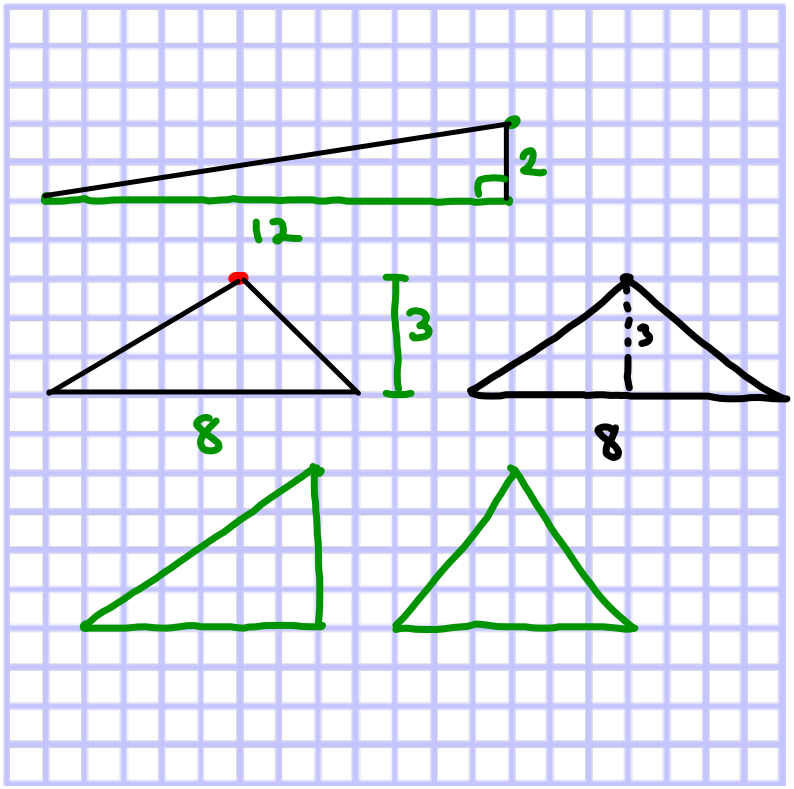
pg. 145 # 1-4




4.(a)
h=6cm
b=7cm
A=b×h÷2
A=7cm×6cm÷2
A=42cm²÷2
A=21cm²
(b)
h=6cm
b=7cm
(c) A=b×h
A=7cm×6cm
A=42cm²
The area of the parallelogram is double the area of the triangle.

Draw 3 different triangles each with area 12 square units.

on test



$A_\Delta = \frac{b \times h}{2}$

$12 = \frac{b \times h}{2}$

$12 = \frac{b \times h}{2} \quad \frac{(24)}{2}$

$b \times h = 24$

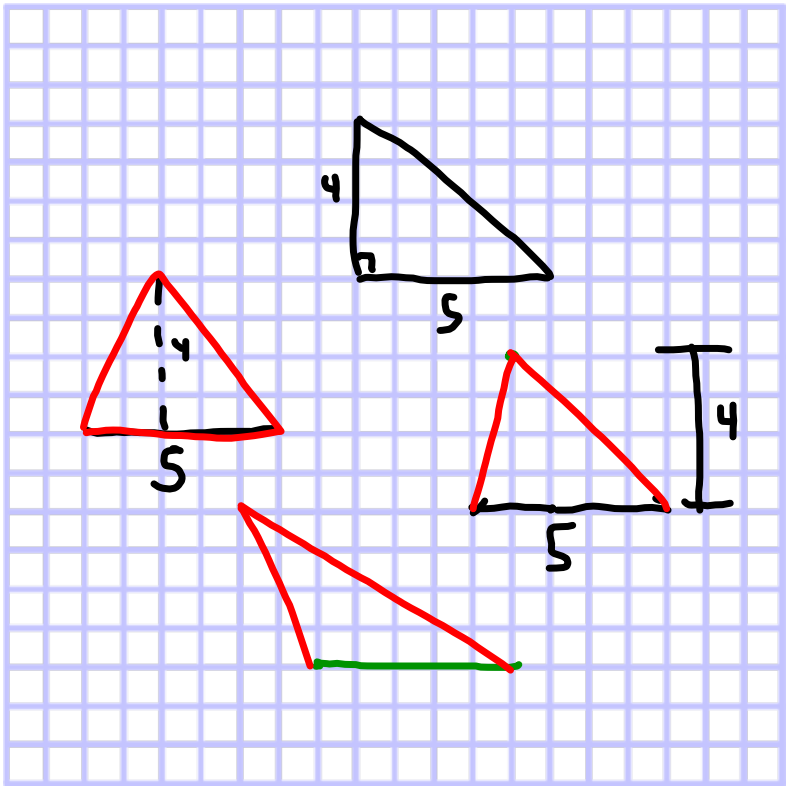
1×24

2×12

3×8

4×6

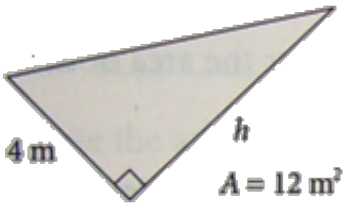
Draw 3 different triangles with base 5 units and height 4 units.



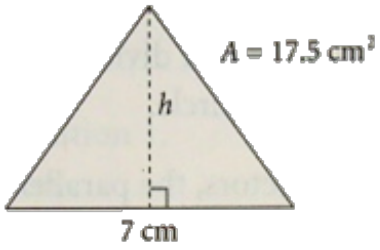
Calculating Base or Height for a triangle.

$$b = \frac{2A}{h} \qquad h = \frac{2A}{b}$$

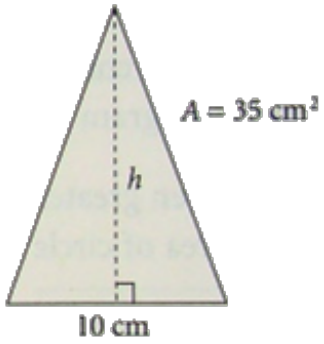
Find the height of each triangle.



b)



c)



$h = \frac{2A}{b}$

$= \frac{2(12m^2)}{(4m)}$

$= \frac{24m^2}{4m}$

$b = 6m$

$h = \frac{2A}{b}$

$= \frac{2(17.5cm^2)}{(7cm)}$

$= \frac{35cm^2}{7cm}$

$= 5cm$

Class/Homework

Practice Questions

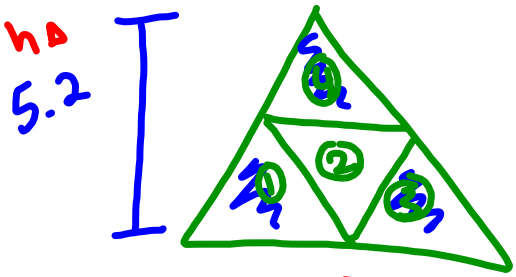
Page 146 5, 7, 8

Page 147 #9, #11

5ab

7a

9



Whole Area

$A_\triangle = \frac{b \times h}{2}$

$= \frac{6.0m \times 5.2m}{2}$

$= \frac{31.2\ m^2}{2}$

$= 15.6\ m^2$

$\div 4$

A little △

3.9m²

x 3 blue

11.7 m²

little△

b) 1 can = 5.5 m²

11.7m² ÷ 5.5m²

2.1 cans

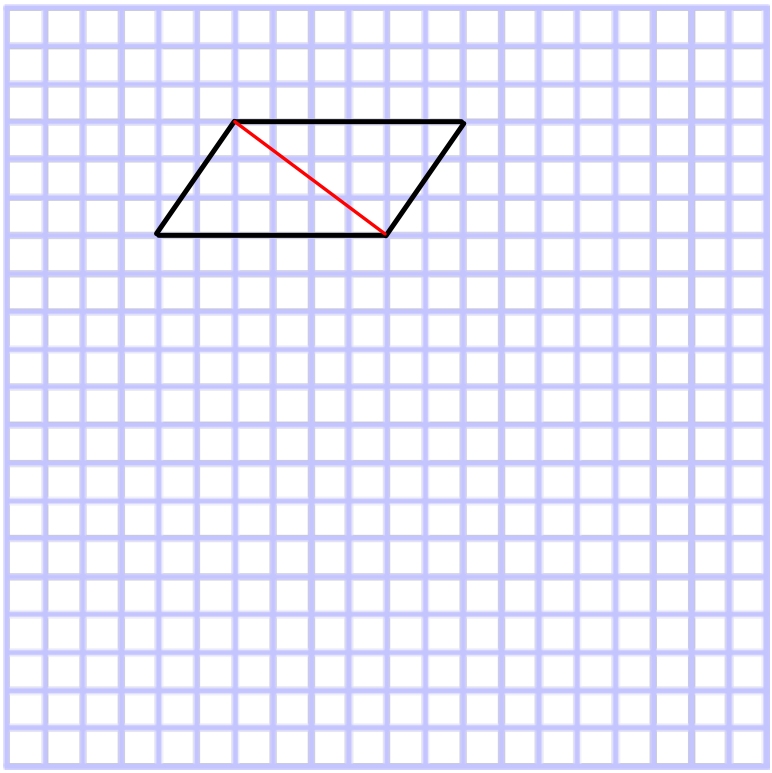
Buy 3 cans

When we draw a diagonal in a parallelogram,
we make 2 congruent triangles.

Congruent triangles have the same area.

The area of the two congruent triangles is
equal to the area of the parallelogram.

So, the area of one triangle is $\frac{1}{2}$ the area of the parallelogram.



Alls rectangle or parallelograms can be split into two equal triangles. The formula to find the Area of a rectangle or parallelogram can be Base x Height, so to find the area of a triangle half its size would have to be

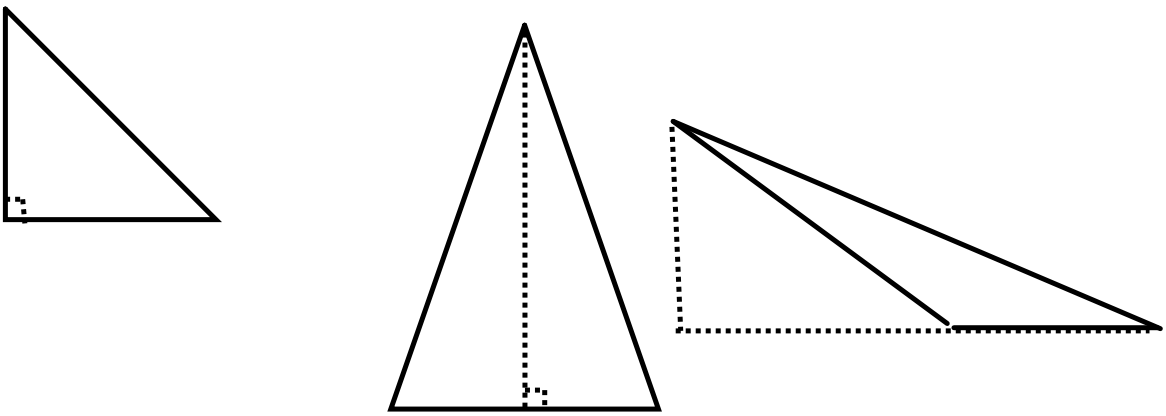
$$\text{Area of Triangle} = \frac{\text{Base} \times \text{Height}}{2}$$

~~TRIANGLES~~

All triangles have three sides and three angles.

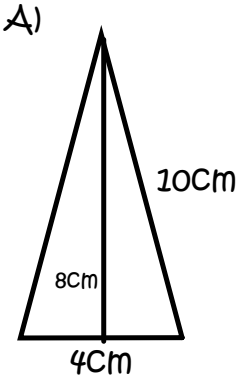
Any side of a triangle can be its base.

The height of the triangles must b e perpendicular to its base and mus intersect the vertex opposite the base.

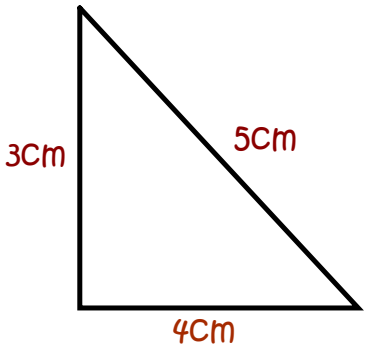


Find the Area for each of the following triangles:

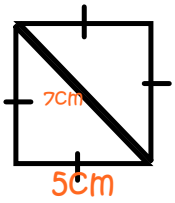
A)



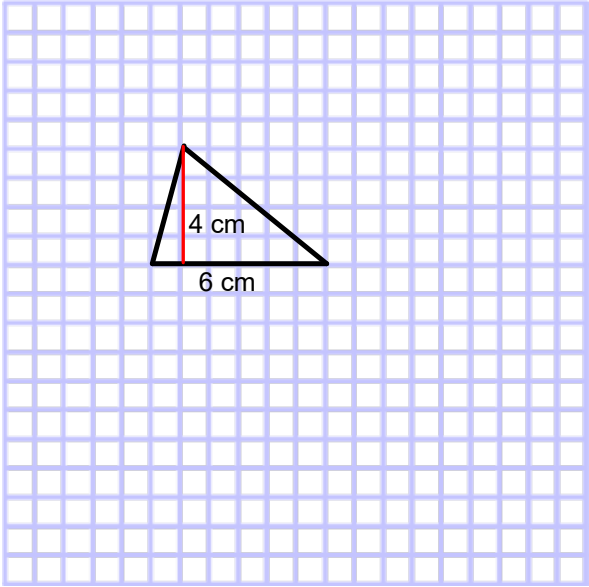
B)

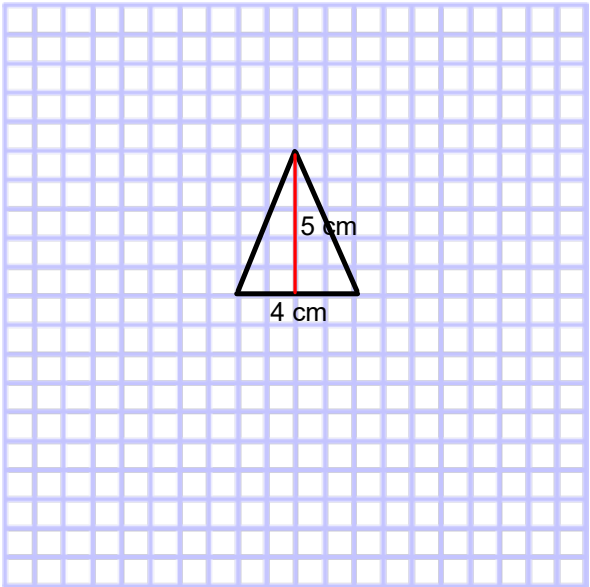


C)



Copy each triangle on graph paper.
Draw a related parallelogram.





Class / Homework

Page 145 #1, #2 #3, #4 Use grid paper

Use Mental Math:

1. 15 x 7 x 2 x 3 =
2. 90 - 31 =
3. 45% of 60 =

2a. $A = \frac{b \times h}{2}$

$A = \frac{7 \times 6}{2}$

$A = \frac{42}{2}$

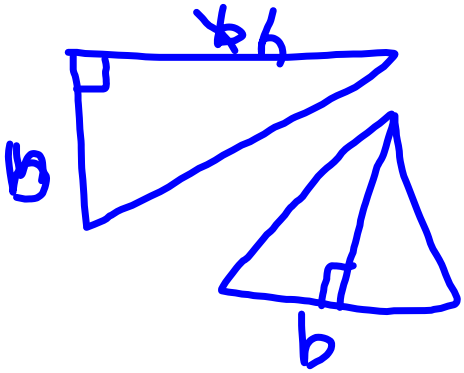
$A = 21 cm^2$

b. $A = \frac{5 \times 5}{2}$

$A = \frac{25}{2}$

$A = 12.5 cm^2$

c. $A =$



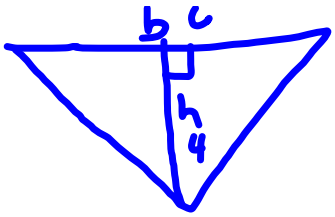
c. $A = \frac{b \times h}{2}$

$A = \frac{6 \times 4}{2}$

$A = \frac{24}{2}$

$A = 12 cm^2$

d.



$A = \frac{6 \times 4}{2}$

$A = 12 cm^2$

e. $A = \frac{5 \times 4}{2}$

$A = \frac{20}{2}$

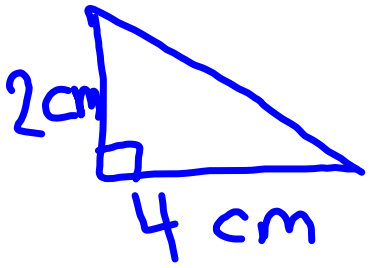
$A = 10 cm^2$

$A = \frac{b \times h}{2}$

$A = \frac{1}{2} b \times h$

F. $A = \frac{4 \times 4}{2}$

$A = 8 cm^2$

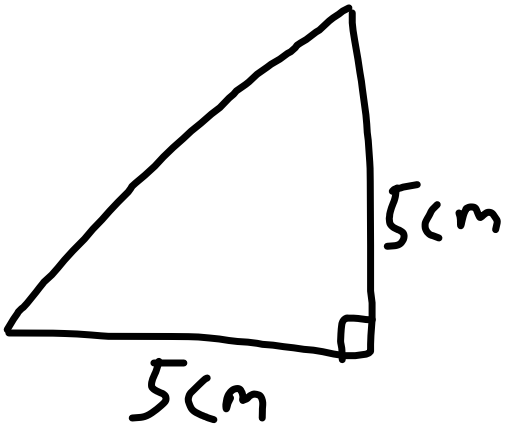


$A = \frac{b \times h}{2}$

$= \frac{4 \times 2}{2}$

$= \frac{8}{2}$

$= 4 cm^2$

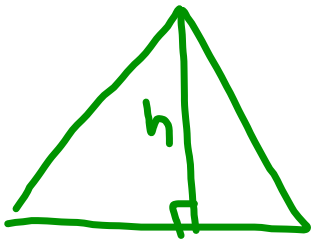


$A = \frac{B \times H}{2}$

$= \frac{5 \times 5}{2}$

$\frac{25}{2}$

$A = 12.5 cm^2$



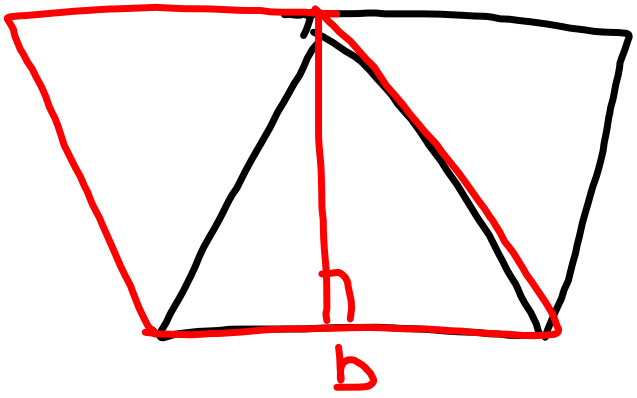
4a $A = \frac{b \times h}{2}$

$A = \frac{7 \times 6}{2}$

$A = \frac{42}{2}$

$A = 21 cm^2$

b.



c. $A = b \times h$

$A = 6 \times 7$

$A = 42 cm^2$

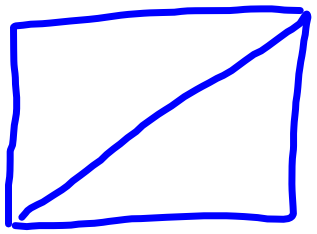
5a - A: 18 cm²
b: 9 cm

$A = \frac{b \times h}{2}$

$(2\times)\ 18 = \frac{9 \times h}{2}\ (2\times)$

$36 = 9 \times h$

$4\ \text{cm} = h$



36cm²

18cm²

b. $A = 32$
$h = 4$

$A = \frac{b \times h}{2}$

$32 = \frac{b \times 4}{2}$

$64 = b \times 4$

$16 = b$

c. $A = 480 m^2$ (32m)
$b = 30m$

$480 m^2 = \frac{b \times h}{2}$

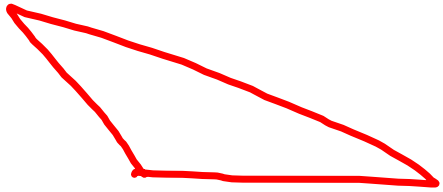
$960 m^2 = 30 \times h$

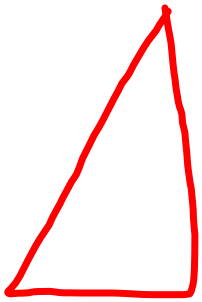
$32m = h$

6a. i) $6 cm^2$

ii) $6 cm^2$

iii) $6 cm^2$





7. a) 2b x 14h

b) 2b x 10h

c) 2b x 8h