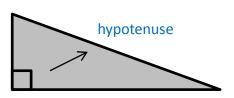
### **Pythagoras Theorem**

#### **Hypotenuse**

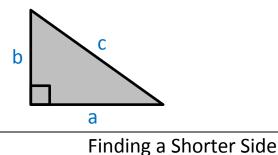
The hypotenuse is the side that is opposite from the right angle in a right angled triangle.



The hypotenuse is the longest side in the right angled triangle.

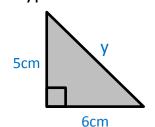
## Pythagoras Theorem

$$c^2 = a^2 + b^2$$

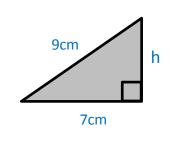


### Finding the Hypotenuse

$$c^{2} = a^{2} + b^{2}$$
  
 $y^{2} = 5^{2} + 6^{2}$   
 $y^{2} = 25 + 36$   
 $y^{2} = 61$   
 $y = \sqrt{61}$   
 $y = 7.8$ cm



# $c^{2} = a^{2} + b^{2}$ $9^{2} = h^{2} + 7^{2}$ $81 = h^{2} + 49$ $h^{2} = 81 - 49$ $h^{2} = 32$ $h = \sqrt{32}$ h = 5.7cm



## Pythagoras Theorem Practice

http://www.cimt.plymouth.ac.uk/projects/mepres/book8/bk8i3/bk8\_3i1.htm

http://www.cimt.plymouth.ac.uk/projects/mepres/book8/bk8i3/bk8\_3i2.htm

http://www.cimt.plymouth.ac.uk/projects/mepres/book8/bk8i3/bk8\_3i4.htm

Learn about Pythagoras Theorem. Answer the questions.

www.supermathsworld.com Ask your teacher for login details.

Select Shape from the options.

Select Pythagoras Theorem from the menu. Try on Easy, Medium and Hard level.

http://www.mathsisfun.com/pythagoras.html

Read about Pythagoras Theorem. Answer the questions at the bottom of the page.

http://www.bbc.co.uk/schools/ks3bitesize/maths/shape\_space/pythagoras\_theorem/revise1.shtml

Learn about Pythagoras. Try the activity and the test.