**3D Pythagoras’ Theorem GREEN**



The diagram represents a cuboid *ABCDEFGH*.

*AB* = 28cm. *BC* = 12cm. *CH* = 16cm.

Calculate the length of AH.

…………………cm

**(4 marks)**



The diagram represents a pyramid *ABCDE* with height *EF.*

*AB* = 6.3cm. *BC* = 3.2cm. *EF* = 7 cm. *CE* = xcm.

Calculate x.

…………………cm

**(4 marks)**

**3D Pythagoras’ Theorem AMBER**



The diagram represents a cuboid *ABCDEFGH*.

*AB* = 28cm. *BC* = 12cm. *CH* = 16cm.

Calculate the length of AH.

…………………cm

**(4 marks)**



The diagram represents a pyramid *ABCDE* with height *EF.*

*AB* = 6.3cm. *BC* = 3.2cm. *EF* = 7 cm. *CE* = xcm.

Calculate x.

…………………cm

**(4 marks)**

**3D Pythagoras’ Theorem RED**



Start by using Pythagoras’ Theorem with triangle ABC to calculate length AC.

Then use Pythagoras’ Theorem with triangle ACH to calculate length AH.

The diagram represents a cuboid *ABCDEFGH*.

*AB* = 28cm. *BC* = 12cm. *CH* = 16cm.

Calculate the length of AH.

…………………cm

**(4 marks)**



The diagram represents a pyramid *ABCDE* with height *EF.*

Start by using Pythagoras’ Theorem with triangle ABC to calculate length AC.

Divide AC by 2 to calculate length FC.

Then use Pythagoras’ Theorem with triangle CEF to calculate x.

*AB* = 6.3cm. *BC* = 3.2cm. *EF* = 7 cm. *CE* = xcm.

Calculate x.

…………………cm

**(4 marks)**