**Student Assessment Sheet – Pythagoras’ Theorem and Trigonometry**

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Objective** | **Before teaching** | | | | **Date of lesson/s** | **After teaching** | | | |
| **Limited** | **Developing** | **Secure** | **Extending** | **Limited** | **Developing** | **Secure** | **Extending** |
| Use Pythagoras’ Theorem to calculate the length of the hypotenuse of a right-angled triangle |  |  |  |  |  |  |  |  |  |
| Use Pythagoras’ Theorem to calculate the length of any side of a right-angled triangle |  |  |  |  |  |  |  |  |  |
| Use Pythagoras’ Theorem to calculate the height of an isosceles triangle |  |  |  |  |  |  |  |  |  |
| Find the distance between two coordinates |  |  |  |  |  |  |  |  |  |
| Use SOHCAHTOA to calculate missing sides and angles in right-angled triangles |  |  |  |  |  |  |  |  |  |
| Know the exact values of sine, cosine and tangent at key angles (0, 30, 45, 60, 90 degrees) |  |  |  |  |  |  |  |  |  |
| Use Pythagoras’ Theorem in 3D |  |  |  |  |  |  |  |  |  |
| Find the angle between a line and a plane |  |  |  |  |  |  |  |  |  |
| Use the formula for area of a non-right-angled triangle |  |  |  |  |  |  |  |  |  |
| Use the sine rule to find missing sides and angles in non-right-angled triangles |  |  |  |  |  |  |  |  |  |
| Use the cosine rule to find missing sides and angles in non-right-angled triangles. |  |  |  |  |  |  |  |  |  |
| Understand when to use sine or cosine rule |  |  |  |  |  |  |  |  |  |
| Sketch the graphs of:  - y = sin x  - y = cos x  - y = tan x |  |  |  |  |  |  |  |  |  |