Maths Workout - Geometry & Measures

Topic 24 - Trigonometry 2				
Target 1	**Target 2**	**Target 3**	**Target 4**	**Target 5**
Calculate any side and any angle using trigonometry *Solve problems using trigonometry and Pythagoras*	*Use the formula: area of a triangle = ½ absinC*	*Calculate sides and angles with the sine rule*	*Calculate sides and angles with the cosine rule*	*Solve mixed trigonometry problems*
1. Calculate a side using sin, cos or tan: horizontal/vertical orientation	1. Demo: know the labelling convention used in triangles	1. Demo: Know both expressions of the sine rule	1. Demo: Know both expressions of the cosine rule	1. Solve trigonometry problems: geometry
2. Calculate a side using sin, cos or tan	2. Demo: Derive the formula: *area of a triangle = ½ absinC*	2. Demo: Calculate a side using the sine rule	2. Demo: Calculate a side using the cosine rule	2. Solve trigonometry problems: geometry & bearings
3. Calculate a side using sin, cos or tan; complex diagram	3. Demo: Calculate the area of a triangle using *½ absinC*	3. Calculate a side using the sine rule	3. Calculate a side using the cosine rule	3. Solve trigonometry problems: geometry
4. Calculate an angle using sin, cos or tan: horizontal/vertical orientation	4. Calculate the area of a triangle using *½ absinC*: simple data	4. Calculate a side using the sine rule: no diagrams: some obscure data	4. Calculate a side using the cosine rule: no diagrams: some obscure data	4. Solve trigonometry problems: bearings
5. Calculate an angle using sin, cos or tan	5. Calculate the area of a triangle using *½ absinC*: obscure data	5. Demo: Calculate an angle using the sine rule	5. Demo: Calculate an angle using the cosine rule	5. Solve trigonometry problems: bearings
6. Calculate an angle using sin, cos or tan; complex diagram	6. Calculate the area of a triangle using *½ absinC*: no diagrams: simple data	6. Calculate an angle using the sine rule	6. Calculate an angle using the cosine rule	6. Solve trigonometry problems: angles of depression
7. Solve problems using trigonometry: calculate the area of a regular polygon	7. Solve problems using area of a triangle using *½ absinC*: complex diagrams	7. Calculate an angle using the sine rule: no diagrams	7. Calculate an angle using the cosine rule: no diagrams	7. Solve trigonometry problems: angles of elevation
8. Solve problems using trigonometry; no diagrams	8. Solve problems using area of a triangle using *½ absinC*: no diagrams: obscure data	8. Solve a bearing problem requiring the use of the sine rule: diagrams	8. Solve a bearing problem requiring the use of the cosine rule: diagrams	8. Solve trigonometry problems: geometry
9. Solve problems using trigonometry in 3D; angles in cuboids		9. Solve a bearing problem requiring the use of the sine rule: no diagrams	9. Solve a bearing problem requiring the use of the cosine rule: no diagrams	9. Solve trigonometry problems: geometry
10. Solve problems using trigonometry in 3D; angles in cuboids				10. Solve trigonometry problems: geometry