

Problem of the Week: Week 3 (Summer 1): Year 8: Geometry: Constructions and scale drawings

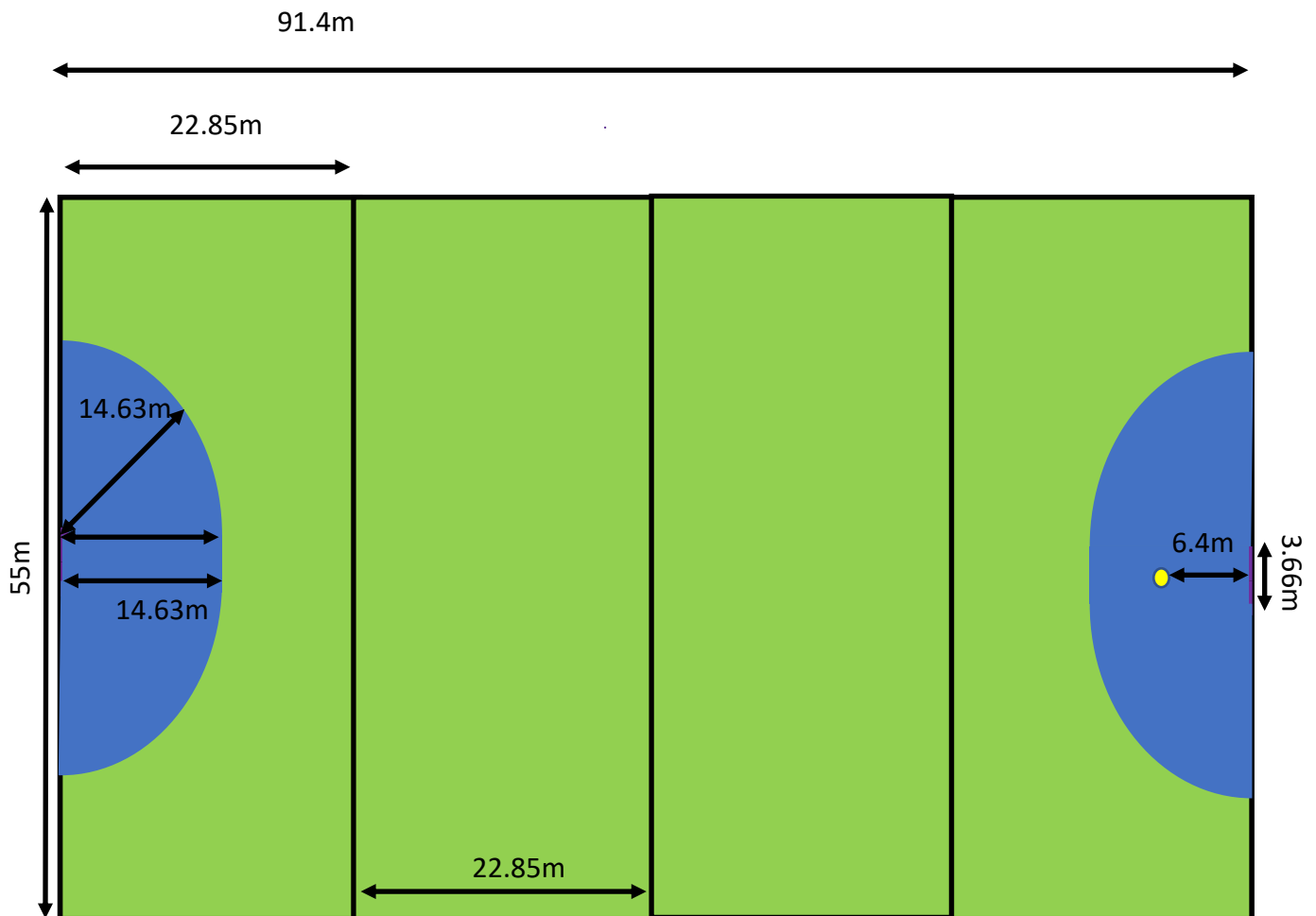
- Construct similar shapes by enlargement, with or without coordinate grids
- Draw and measure line segments and angles in geometric figures, including interpreting scale drawings

Problem 1:

Hockey Pitch

The diagram below represents a hockey pitch.

- Round each measurement to the nearest metre
- Choose a scale to allow you to draw the hockey pitch to scale on an A4 piece of paper.



Problem 2:**Enlargement**

The diagram below shows a right-angled triangle with vertices at (2,3), (2, 1) and (5,1)

1. Choose a centre of enlargement and enlarge the triangle by the following scale factors:

- a. 2 b. 3 c. 0.5

What happens if the centre of enlargement is inside the shape?

2. On a different set of axes draw a shape in a different quadrant, choose a centre of enlargement and enlarge your shape by the following scale factors:

- a. 2 b. 3 c. 0.5

3. On a plain piece of paper draw a car / house / hexagon. Choose a centre of enlargement and using a scale factor of one half, draw your shape when this enlargement has been applied.

