

13th March

Corbettmaths

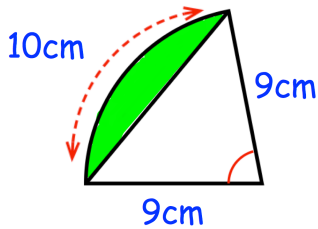
The first 4 terms of a sequence are:
400, 390, 375, 355 ...

Which term is the first to be negative?

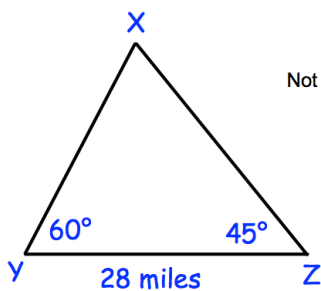
Express $(5 - \sqrt{2})^2$ in the form $a + b\sqrt{2}$, where a and b are integers to be found

Find the minimum point of the graph

$$y = x^2 - 6x - 20$$



Calculate the area of the segment



Not drawn to scale.

How much closer is the boat, at point X, to the port at Y than the port at Z?