

Problem of the Week

Problem D

Stay On Course

To describe the locations of towns in the State of Mathigan, Ima Hiker uses coordinates and coordinate geometry. North is the direction of the positive y axis, east is the direction of the positive x axis, south is the direction of the negative y axis and west is the direction of the negative x axis. Distances are measured in kilometres.

Ima starts her walk at Angletown which is located at $A(0, 0)$. She walks in a straight line to the northwest until she reaches Bisector Valley. Once she reaches Bisector Valley, she walks in a straight line to the northeast until she reaches Conic Centre which is located at $C(0, 4)$. She then walks in a straight line returning to Angletown. How far does Ima walk?

