Coordinate Geometry

Ruhaanth Karthikeya(koppuruhaanthkarthikeya@sriprakashschools.com)

August 10, 2023

10^{th} Maths - Chapter 7

This is Problem 2 from Exercise 7.1

1. Find the distance between the following pairs of points. ii)(0,0),(36, 15).

Solution: :

Given,

$$\mathbf{A} = \begin{pmatrix} 2\\3 \end{pmatrix} \tag{1}$$

$$\mathbf{B} = \begin{pmatrix} 4 \\ 1 \end{pmatrix} \tag{2}$$

$$\mathbf{AB} = \begin{pmatrix} 2 \\ -2 \end{pmatrix} \tag{3}$$

$$||AB|| = \sqrt{(2)^2 + (-2)^2}$$
 (4)

$$||AB|| = \sqrt{4+4} \tag{5}$$

$$||AB|| = \sqrt{8} \tag{6}$$

$$||AB|| = 2.82 \tag{7}$$

(8)

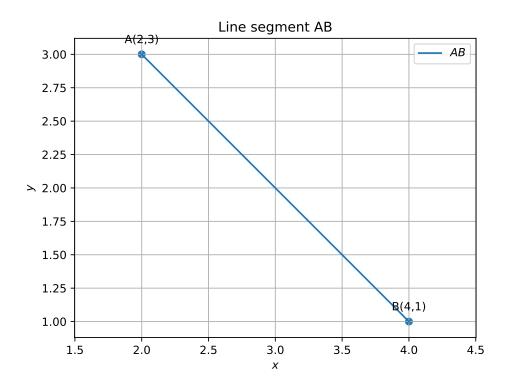


Figure 1: Line segment AB