package a.a.c;

import java.io.\*;

import java.lang.\*;

import java.util.Scanner;

class UberPool {

public void process() //process function for finding which passenger can be catched

{

Scanner sc=new Scanner(System.in);

System.out.println("enter the starting point coordinates A "); //starting point

int ax = sc.nextInt(); //x-coordinate of A

int ay = sc.nextInt(); // y-coordinate of A

System.out.println("enter the destination point coordinates B ");

int bx = sc.nextInt(); // x-coordinate of B

int by = sc.nextInt(); // y-coordinate of B

float atb= Distance(ax,ay,bx,by); //distance btw A to B

System.out.println("enter the coordinates of C "); //some point btw path A to B

int cx = sc.nextInt(); // x-coordinate of C

int cy = sc.nextInt(); // y-coordinate of c

float atc= Distance(ax,ay,cx,cy); //distance btw A to C

System.out.println("enter the coordinates of X "); //New Passenger at X-Coordinate

int xx = sc.nextInt(); // x-coordinate of X

int xy = sc.nextInt(); // y-coordinate of X

float ctx = Distance(cx,cy,xx,xy); //distance btw C to X

System.out.println("enter the coordinates of Y "); //Another New Passenger at Y-Coordinate

int yx = sc.nextInt(); // x-coordinate of Y

int yy = sc.nextInt(); // y-coordinate of Y

float cty= Distance(cx,cy,yx,yy); //distance btw C to Y

float xtb= Distance(xx,xy,bx,by); //distance btw X to B

float ytb= Distance(yx,yy,bx,by); //distance btw Y to B

float trip1=atc+ctx+xtb; //distance btw (A to C )+(C to X)+(X to B)

float trip2=atc+cty+ytb; //distance btw (A to C )+(C to Y)+(Y to B)

if ((2\*atb)<=trip1 && (2\*atb)<=trip2) /\* c ondition to chk trip1 and trip2 is less then twice of A to B \*/

{

System.out.println("-1");

}

else if(trip1<=trip2)

{

System.out.println("1");

}

else

{

System.out.println("2");

}

}

public float Distance(int x1, int y1, int x2, int y2) //method to calculate distance btw 2 points

{

float result;

int a=((x2-x1)\*(x2-x1))+((y2-y1)\*(y2-y1));

result = (float) Math.sqrt(a);

return result;

}

public static void main(String args[]) throws Exception

{

UberPool obj1=new UberPool(); //object creation

obj1.process(); //calling process method

}

}