



# Linear Functions and Lines Exam

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- (1 marks)**  
Find the gradient in between the two points  $(-1,2)$  and  $(-3,-6)$
- (2 marks)**  
Find the equation of the line going through  $(4/5,-3)$  and  $(-2/9,4)$
- (2 marks)**  
Is the line  $4x+3y+3=0$  parallel to the line passing through the points  $(3,-5)$  and  $(2,5)$ ?
- (2 marks)**  
Show that the line  $2y=x-4$  is perpendicular to the line  $2x+y+3=0$
- (3 marks)**  
Find the point of intersection, P, of  $2x+y+3=0$  and  $2y=x-4$ .
- (2 marks)**  
Find the distance from  $(3,-5)$  to  $(2,5)$ .
- (2 marks)**  
Find the perpendicular distance from the point  $(-3,-6)$  to the line  $2x+y+3=0$ .
- (2 marks)**  
Find the midpoint of the two points  $(3,-2)$  and  $(4,-6)$
- (2 marks)**  
The midpoint of  $A(5,2)$  and  $B(x,y)$  is  $(4,3)$ , Find the point B.
- (3 marks)**  
Shade the region given by  $x+y+1>0$  and  $x>-2$