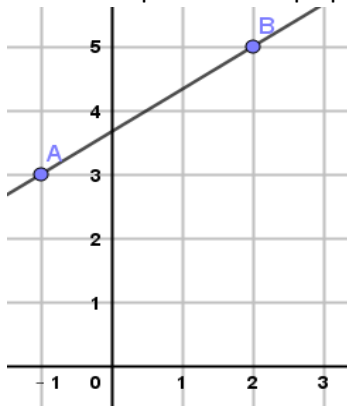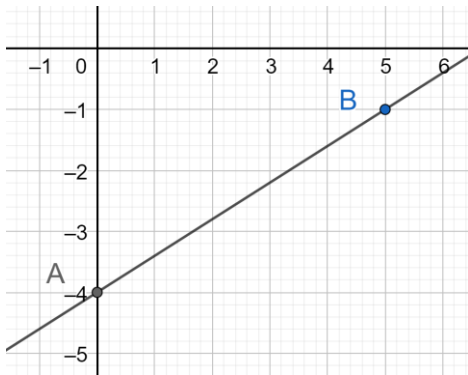1. Graph $y = \frac{3}{5}x - 4$
2. Write an equation in slope point form for the following graph



3. Write an equation of a line that is perpendicular to $y = 3x + 2$ and passes through the point (-2, 5) in slope point form.
4. Write an equation of the line that passes through points (-5, 7) and (2, 8) in slope intercept form.
5. Write an equation of the line that has x-int of 3 and y-int of -2 in slope point form.

1.



2. $y - 3 = \frac{2}{3}(x + 1)$  or  $y - 5 = \frac{2}{3}(x - 2)$

3. Perpendicular, therefore the slope would be $-\frac{1}{3}$ so the answer is $y - 5 = -\frac{1}{3}(x + 2)$

4. Use the slope formula you get $m = \frac{1}{7}$, so equation in slope point form is $y - 8 = \frac{1}{7}(x - 2)$.
Change it to slope intercept from by isolating for y, you get $y = \frac{1}{7}x + \frac{54}{7}$

5. coordinates would be (3, 0) and (0, -2), so the slope is $\frac{2}{3}$, plug into slope point form you get
$y - 0 = \frac{2}{3}(x - 3)$