

"solve graphically"

1.  $-3x + 2y \geq -6$

Sol<sup>n</sup> STEP 1  $\Rightarrow -3x + 2y = -6$

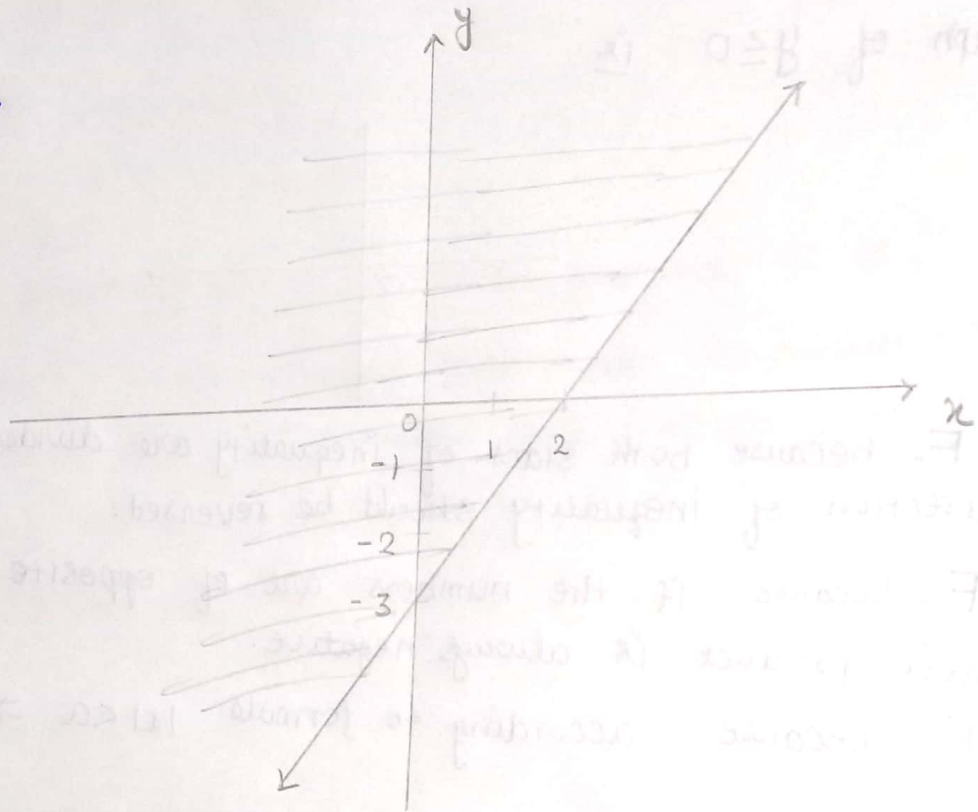
STEP 2  $\Rightarrow y = 0 \Rightarrow x = \frac{-6}{-3} = 2$   $(2, 0)$

$x = 0, y = \frac{-6}{2} = -3$   $(0, -3)$

STEP 3  $\Rightarrow$  line will be solid because of inequality of type ( $\geq$ )

STEP 4  $\Rightarrow$

STEP 5  $\Rightarrow$



arbitrary point  $\Rightarrow (-1, -1)$

$$-3(-1) + 2(-1) = 1 \geq -6$$

So, solution region of given inequality is above ~~of~~  $(-1, -1)$  (should include the region of  $(-1, -1)$ )