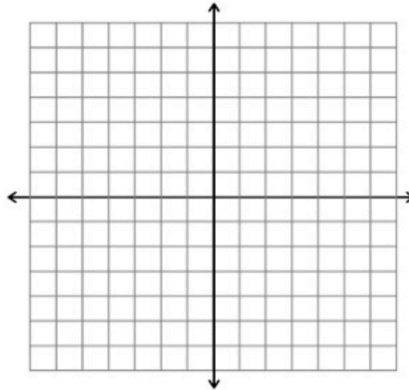


1. Graph and answer questions about the function $f(x) = -3x + 7$ (5pts)

- what is the slope _____ what is the y intercept _____
- is f increasing, decreasing, or constant _____
- Graph the function (please be neat)



2. Determine whether the given function is linear or nonlinear. If it is linear, determine the equation of the line ($y = mx + b$). (5pts)

x	y
0	55
10	52.5
20	50
30	47.5
40	45

- is the function Linear non linear _____
- how do you know _____
- write the equation of the line _____

3. X | -2 -1 0 1 2 (15 points)

Y | 7 6 3 2 0

A.) use your graphing calculator to determine the line of best fit and correlation coefficient. Line of best fit _____ $r =$ _____

B.) By hand do the line of best fit and provide the answers to:

Sum of x's	Sum of y's	Sum of x^2	Sum of y^2	Sum of $x * y$
_____	_____	_____	_____	_____

$n =$ _____ $S_{xx} =$ _____ $S_{yy} =$ _____ $S_{xy} =$ _____

mean of x's _____ mean of y's _____ slope $m =$ _____ $b =$ _____

C.) What does the r value tell you about how good your line is?