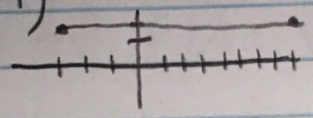
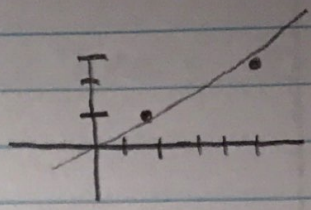
Pg 82

#1)  slope = 0

#5)  $m = 3/7$

#9) $y+1 = \frac{1}{4}(x-2)$

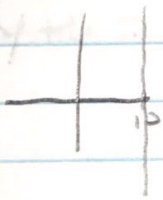
$y = 1/4x - 1\frac{1}{2}$

x	y
0	$-1\frac{1}{2}$
4	$-\frac{1}{2}$
-4	$-2\frac{1}{2}$

#11) $y+5 = -3/2(x-0)$

$y = -3/2x - 5$

x	y
0	-5
2	-8
-2	-2

#15)  $x = 10$

#17) $m = \frac{-1+1}{4-2} = 0$

$y+1 = 0(x-2)$

$\boxed{y = -1}$

#29) (2, 170,000) (3, 195,000)

$m = \frac{25}{1} = 25{,}000$

4th: \$220,000

#31) $5x - 4y = 8$

$-4y = -5x + 8$

$y = 5/4x - 2$

a) $y+2 = 5/4(x-3)$

$\boxed{y = 5/4x - 23/4}$

b) $y+2 = \frac{-4}{5}(x-3)$

$\boxed{y = -4/5x + 2/5}$

#35) $16x^2 - y^2 = 0$

$y = \pm\sqrt{16x^2}$

↑ NOT a function

#43) $f(x) = x^2+1$

a) $f(1) = 1^2+1 = \boxed{2}$

b) $f(-3) = (-3)^2+1 = \boxed{10}$

c) $f(b^3) = (b^3)^2+1 = \boxed{b^6+1}$

d) $f(x-1) = (x-1)^2+1$

$= \boxed{x^2-2x+2}$

#47) $f(x) = \frac{x-1}{x+2}$ Domain = all Reals $x \neq -2$

#49) $f(x) = \sqrt{25-x^2}$

$25 - x^2 \geq 0$

$-x^2 \geq -25$

$x^2 \leq 25$

$x \leq 5, -5$

Domain:

$-5 \leq x \leq 5$

#51) $C = 5.25x + 17,5000$

$P = (8.43 - 5.25)x - 17,500$

$3.18x - 17,500$