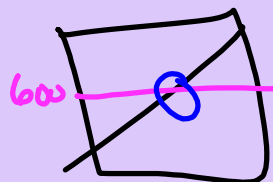


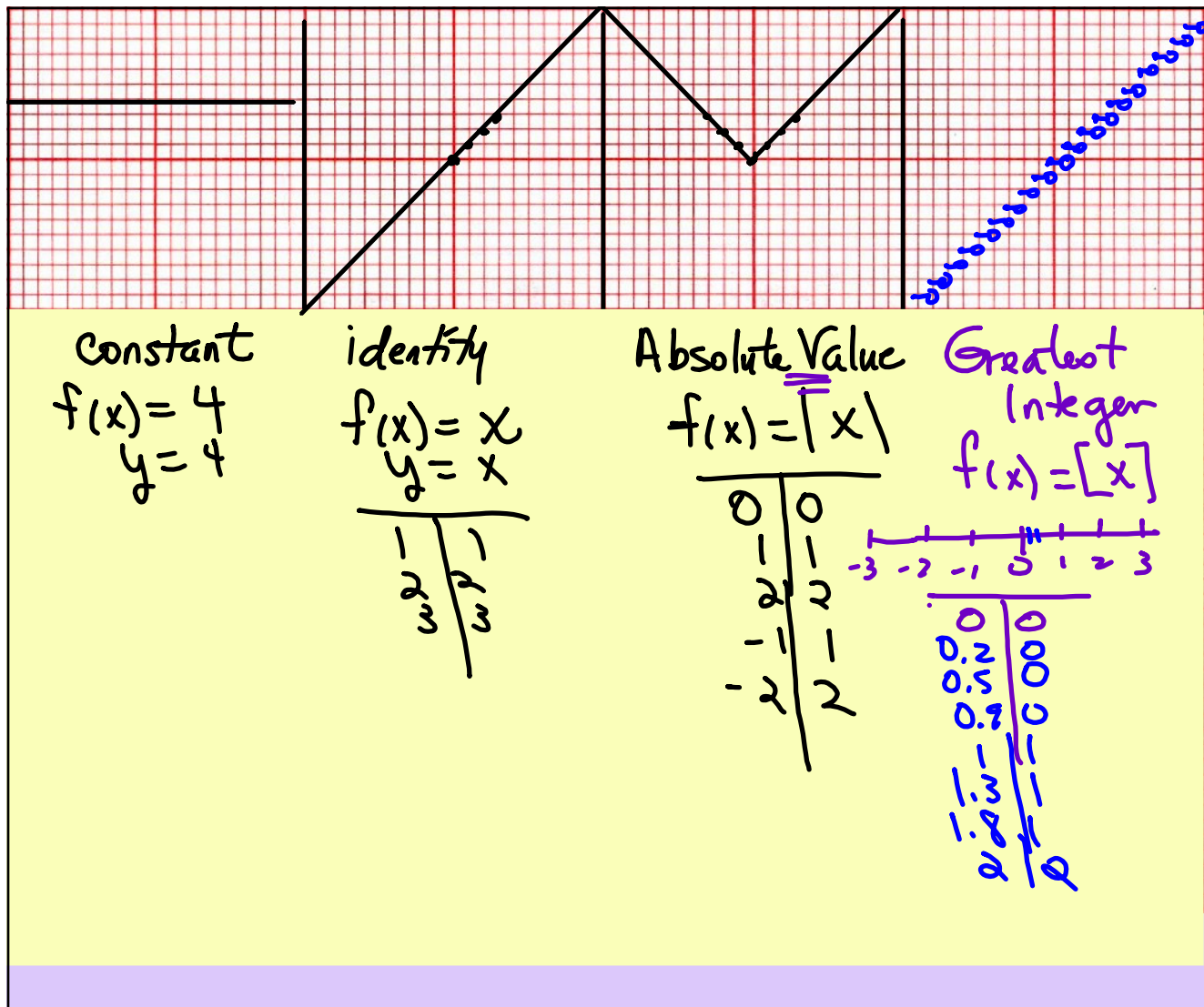
MORE REGRESSION

x	y
25,000	600

Know x-coord
Table

Know y-coord
Graph & Intersect

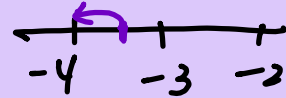




Greatest Integer

$$f(x) = [3x - 2]$$

$$\begin{aligned} f(2.6) &= [3(2.6) - 2] \\ &= [7.8 - 2] \\ &= [5.8] \\ &= 5 \end{aligned}$$



$$f(x) = 3[x] - 2$$

$$\begin{aligned} f(-3.4) &= 3[-3.4] - 2 \\ &= 3(-4) - 2 \\ &= -12 - 2 \\ &= -14 \end{aligned}$$

Transformation Rules

$f(x) + c$ up c units

$f(x) - c$ down c units

$f(x+c)$ left c units

$f(x-c)$ right c units

$a f(x)$ changes slope

$-f(x)$ reflect over x -axis

$f(-x)$ reflect over y -axis

Example

$$f(x) = |x| + 5$$

$$f(x) = |x| - 32,587$$

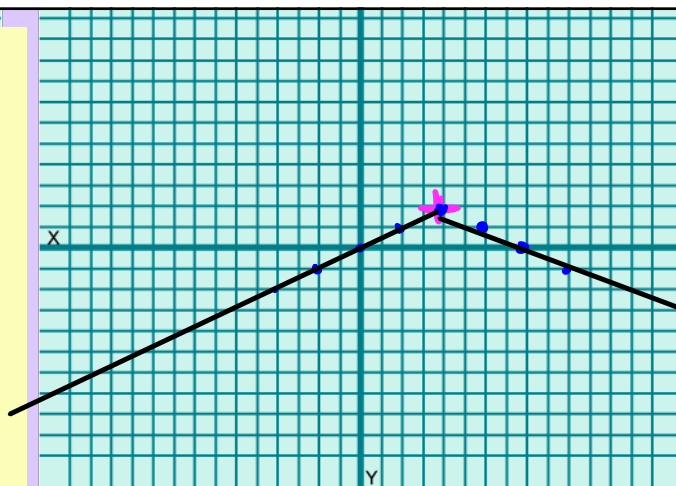
$$f(x) = |x + \quad|$$

$$f(x) = |x - \#|$$

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

Annotations for $y = -\frac{1}{2}|x-4| + 2$:

- Arrow pointing to $-\frac{1}{2}$: Slope
- Arrow pointing to 4 : Right
- Arrow pointing to $+2$: Up



$$f(x) = 2[x+4] - 1$$

Annotations for $f(x) = 2[x+4] - 1$:

- Arrow pointing to 2 : Slope
- Arrow pointing to 4 : Left
- Arrow pointing to -1 : Down

