

Key

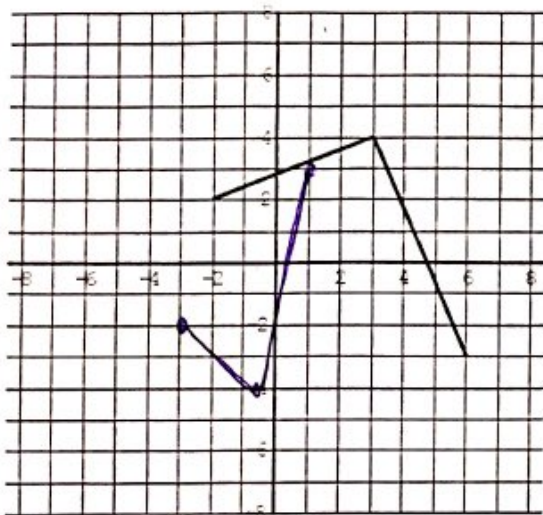
TRANSFORMATIONS LESSON 2

Part II: Combining All Transformations

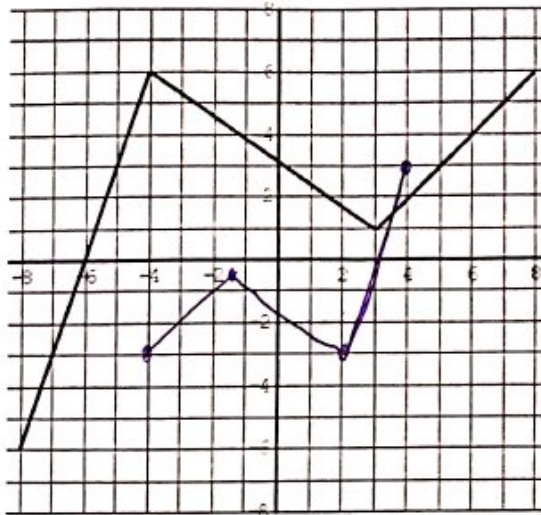
Questions: For each of the graphs, apply the transformation:

$$y = -f[2(x+2)]$$

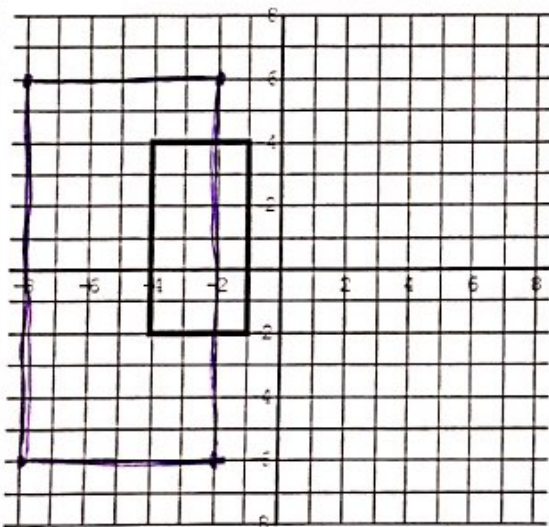
1) $y = -f(2x+4)$



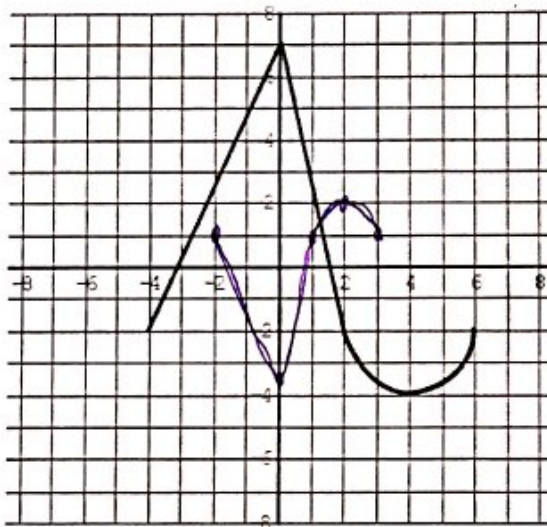
2) $y = -\frac{1}{2}f(-2x)$



3) $y = 2f(\frac{1}{2}x) - 2$



4) $y = -\frac{1}{2}f(2x)$



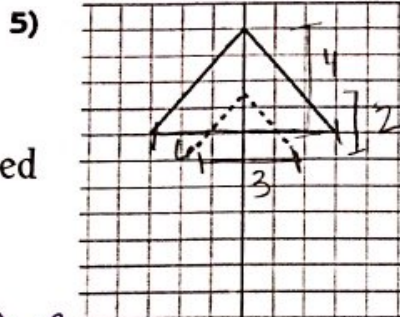
TRANSFORMATIONS LESSON 2

Part II: Combining All Transformations

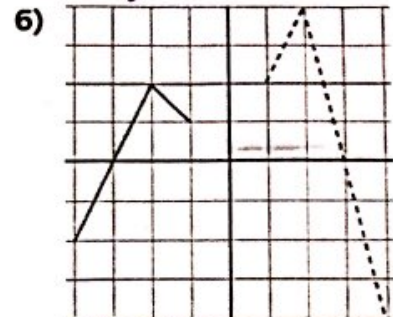
Questions: For each of the following graphs, write the equation of the transformation:

Solid = Original
Dashed = Transformed

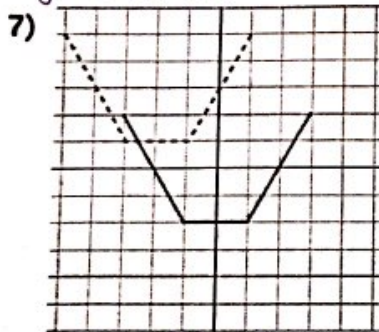
$$y = \frac{1}{2} f(2x)$$



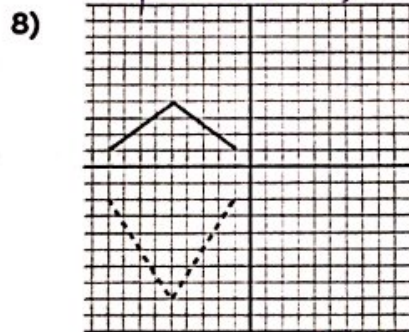
$$y = 2f(-x)$$



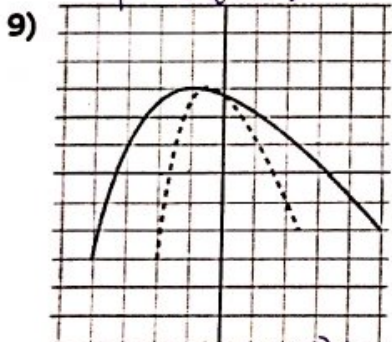
$$y = f(x+2) + 3$$



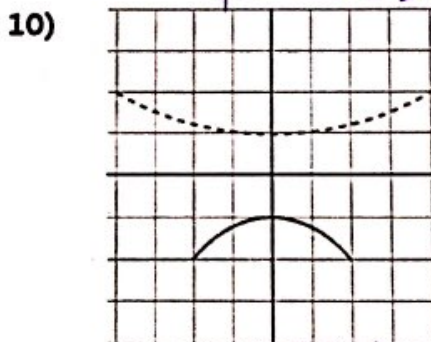
$$y = -2f(x)$$



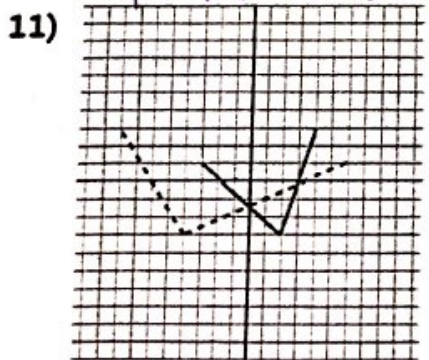
$$y = f(2x)$$



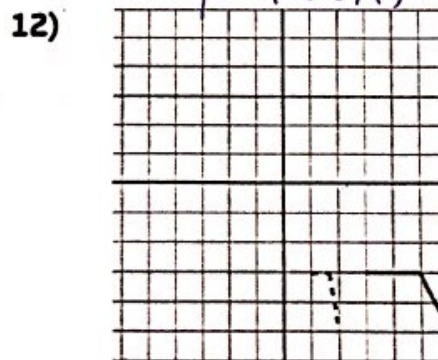
$$y = -f\left(\frac{1}{2}x\right)$$



$$y = f\left(-\frac{1}{12}x\right)$$



$$y = f(3x)$$



Translations Practice P = parent function

① $f(x) = \frac{1}{x}$

Key

1) $f(x) = \sqrt[3]{x}$

4) $f(x) = -\sqrt{x} + 2$

2) $f(x) = \sqrt[3]{2x}$

5) $f(x) = \sqrt[3]{x+3} - 4$

2) $f(x) = \frac{1}{x+2} + 3$

3) $f(x) = \sqrt[3]{-x}$

3) $f(x) = \frac{4}{x} + 2$

