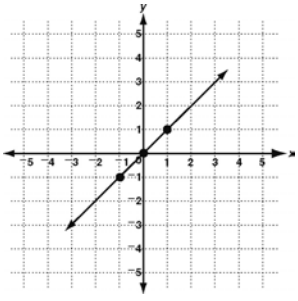
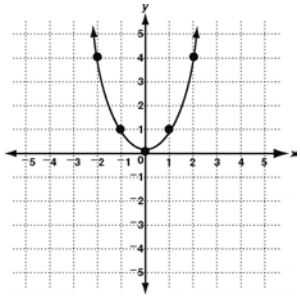
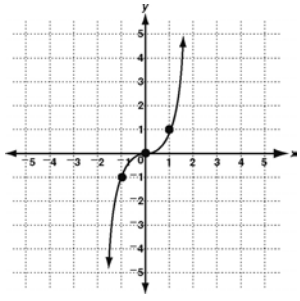
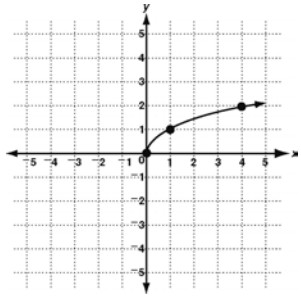
Name _____ Date _____ Class_____

LESSON 1-2

Reading Strategies

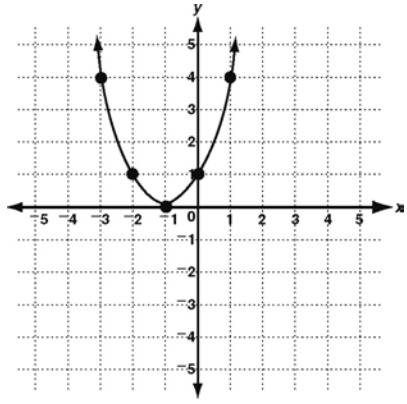
Use a Model

Every function belongs to a family of other functions whose graphs have similar shapes. Each family has a parent function. There may be lots of functions in the family, but there is only 1 parent function. Look at the models of the different parent functions in the table below. All linear functions are straight lines just like the function $f(x) = x$. The line may not be in exactly the same position on the coordinate plane, but it is still a straight line.

Parent Functions			
Linear $f(x) = x$	**Quadratic** $f(x) = x^2$	**Cubic** $f(x) = x^3$	**Square Root** $f(x) = \sqrt{x}$
			

Use the graphs below and the table above for Exercises 1–6.

1. How is this function like the parent quadratic function? How is it different?



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2. What is the transformation of this function?

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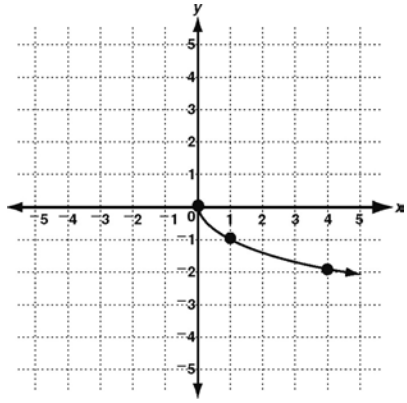
3. How is this function like the parent square root function? How is it different?



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4. What is the transformation of this function?

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