

Quiz 11.3

Find the inverse of the functions.  
\*(Use the steps in your notes!)\*

1.  $f(x) = x^2$

$$y = x^2$$

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

$$\sqrt{y} = x$$

$$f^{-1}(x) = \sqrt{x}$$

2.  $f(x) = x^3$

$$y = x^3$$

$$\sqrt[3]{y} = \sqrt[3]{x^3}$$

$$y = \sqrt[3]{x}$$

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

May 11-7:14 AM

11-3

I can graph the inverse functions of

$f(x) = x^2$  and  $f(x) = x^3$

Feb 21-10:23 AM

Find the inverse algebraically then graph it.

$f(x) = x^2$

x	f(x)
-2	4
-1	1
0	0
1	1
2	4

f(x)	x
4	2
1	1
0	0
1	1
4	2

Feb 21-10:30 AM

Solve for the inverse algebraically then graph it.

$f(x) = x^3$

x	f(x)
-2	-8
-1	-1
0	0
1	1
2	8

f(x)	x
-8	-2
-1	-1
0	0
1	1
8	2

Feb 21-10:28 AM

**Task** Graphing Inverse Functions

$f(x) = a\sqrt{x-h} + k$ 
 $f(x) = a\sqrt[3]{x-h} + k$

Vertical stretch (mult y coords) →

Shift right/left →

Shift up/down →

LIARS!

Feb 9-10:55 PM

Check for understanding

#1 Graph the function

$f(x) = 2\sqrt[3]{x-2} + 5$

#2 Write an equation for the graph

$f(x) = \sqrt{x} - 1$

Feb 21-10:33 AM

**Honors**

How do these graphs differ?

$$f(x) = -\sqrt{x}$$

$$f(x) = \sqrt{-x}$$

$$f(x) = -\sqrt{-x}$$

Feb 24-3:42 PM

Mar 11-9:15 AM