

# Basic Graphs v. 4

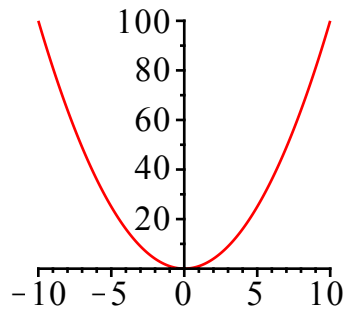
Math 1500 Fall 2010

## 1. Lines:

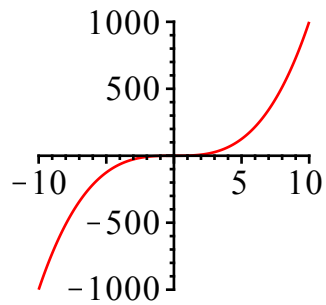
$y=mx + b$  where  $m$  is slope and  $b$  is y-intercept.

## 2. Polynomials:

$$y=x^2$$

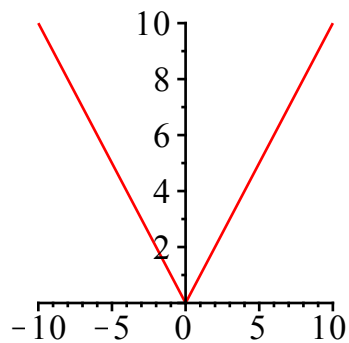


$$y=x^3$$



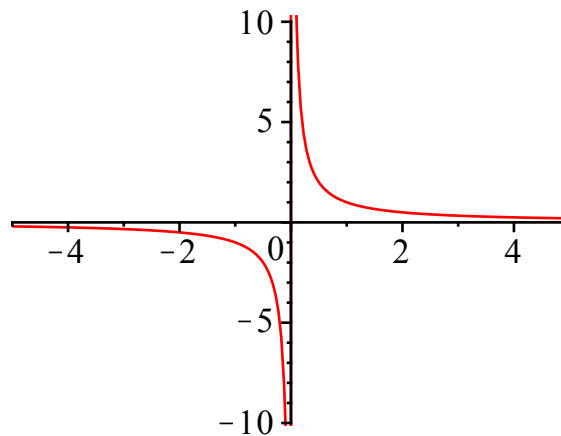
## 3. Absolute Value:

$$y=|x|$$



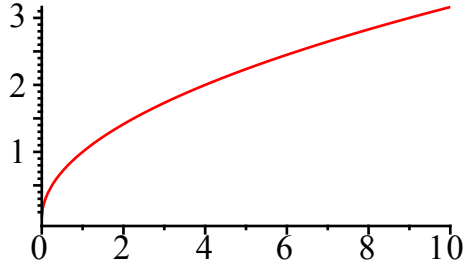
## 4. Reciprocal:

$$y=\frac{1}{x}$$

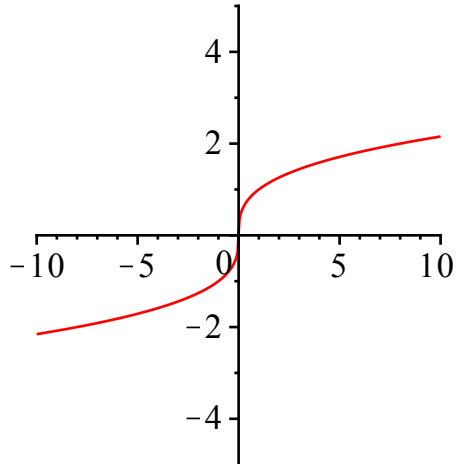


**5. Roots:**

$$y = \sqrt{x}$$

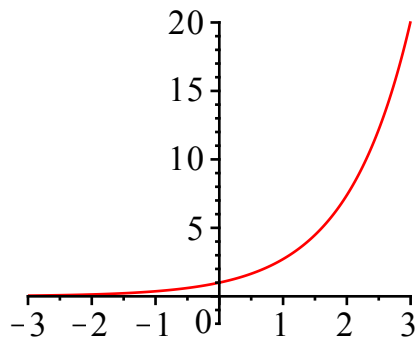


$$y = \sqrt[3]{x}$$

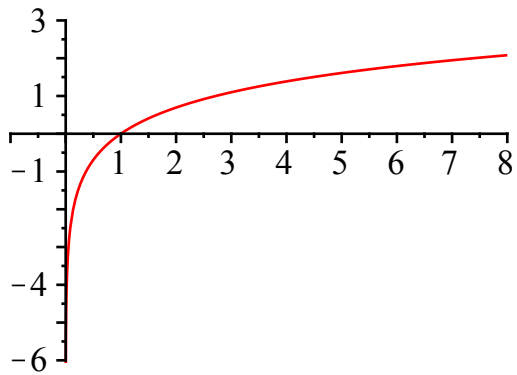


**6. Exponential and Logarithmic:**

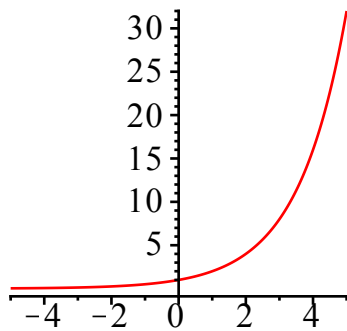
$$y = e^x$$



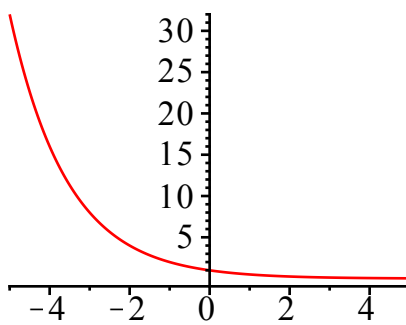
$$y = \ln(x)$$



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

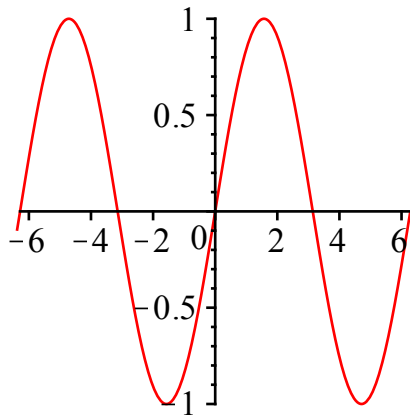


$$f(x) = \left(\frac{1}{2}\right)^x$$

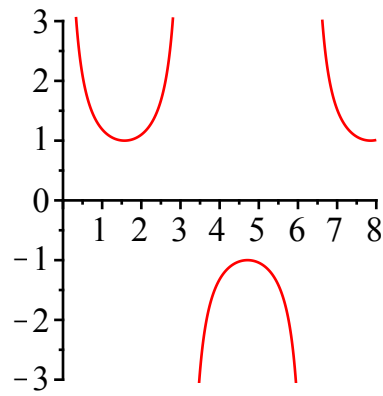


## 7. Trigonometric:

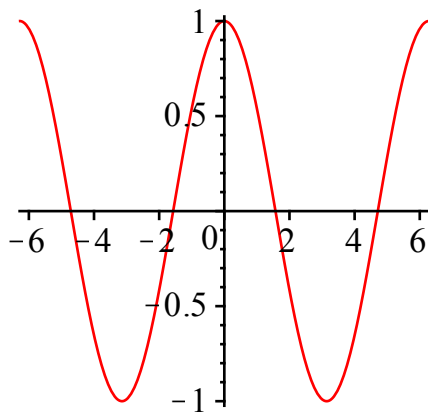
$$f(x)=\sin(x)$$



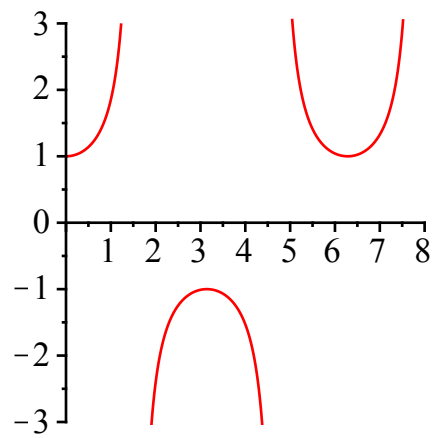
$$f(x)=\csc(x)$$



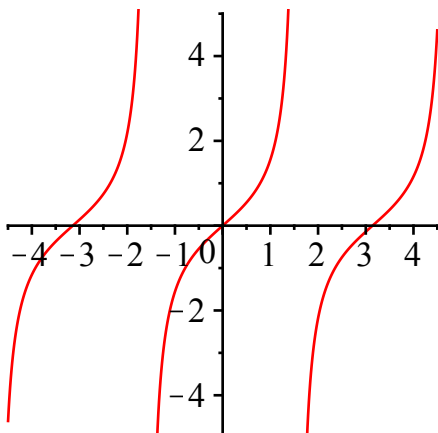
$$f(x)=\cos(x)$$



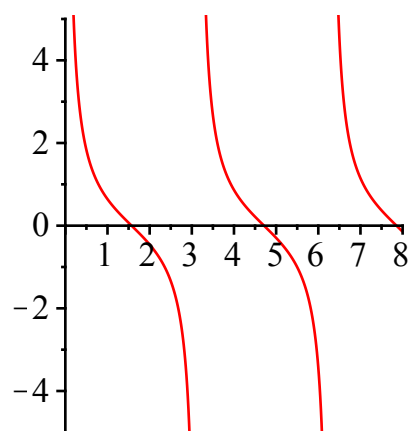
$$f(x)=\sec(x)$$



$$f(x)=\tan(x)$$

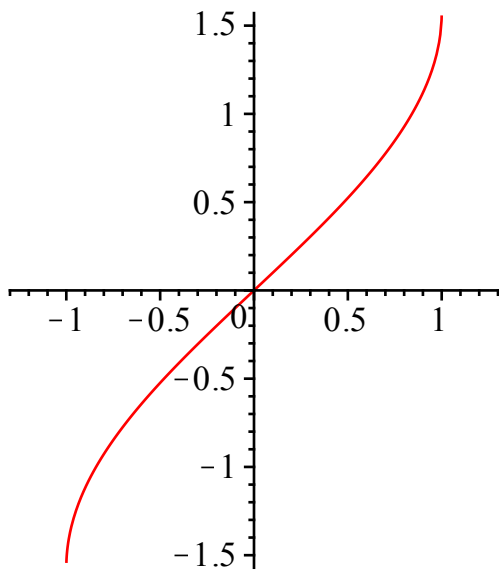


$$f(x)=\cot(x)$$

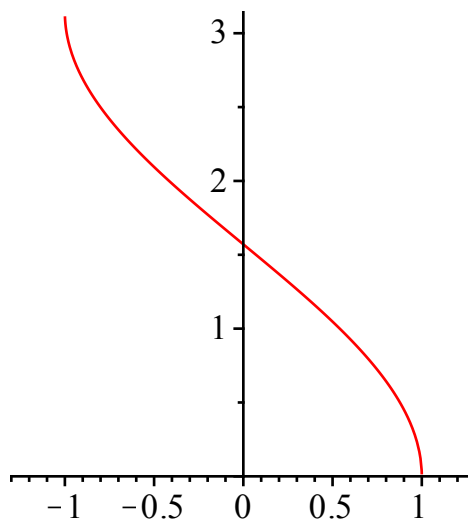


## 8. Inverse Trigonometric:

$$f(x)=\arcsin(x)$$



$$f(x)=\arccos(x)$$



$$f(x)=\arctan(x)$$

