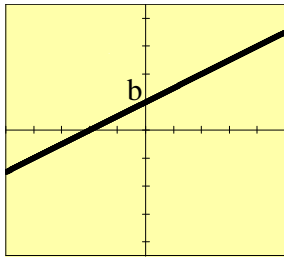
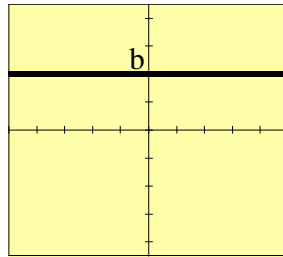


A Brief Catalogue of Graphs

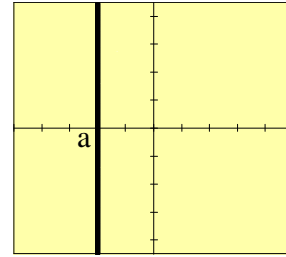
LINEAR FUNCTIONS



$$y = mx + b$$

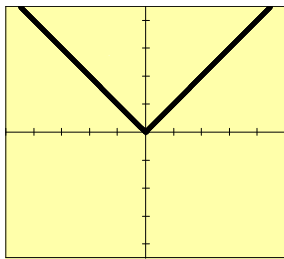


$$y = b$$

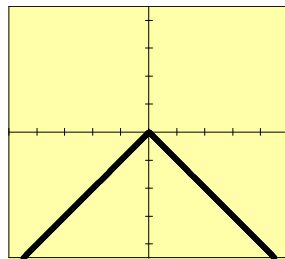


$$x = a$$

ABSOLUTE VALUE FUNCTIONS

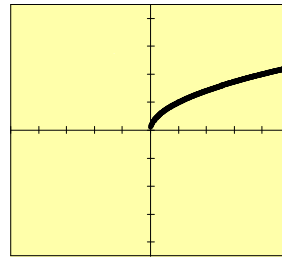


$$y = |x|$$

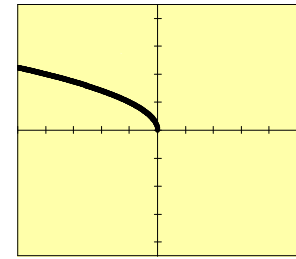


$$y = -|x|$$

SQUARE ROOT FUNCTIONS

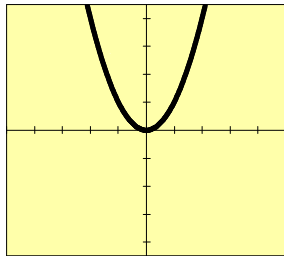


$$y = \sqrt{x}$$

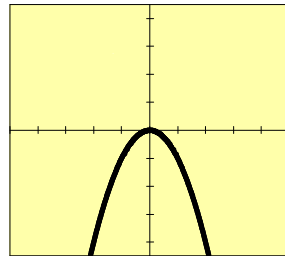


$$y = \sqrt{-x}$$

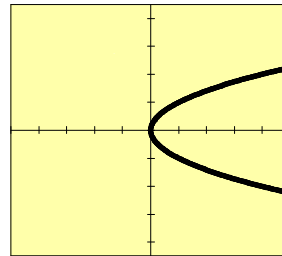
QUADRATIC FUNCTIONS



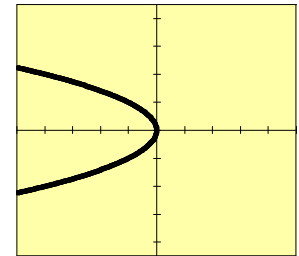
$$y = x^2$$



$$y = -x^2$$

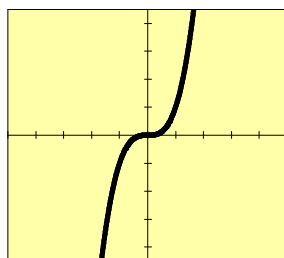


$$x = y^2$$

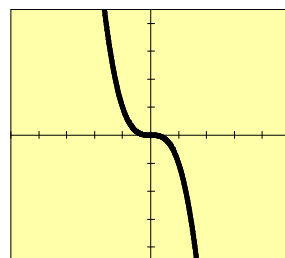


$$x = -y^2$$

CUBIC FUNCTIONS

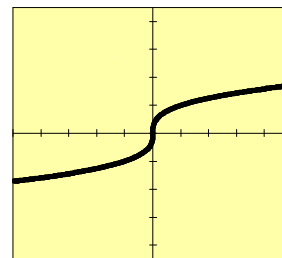


$$y = x^3$$

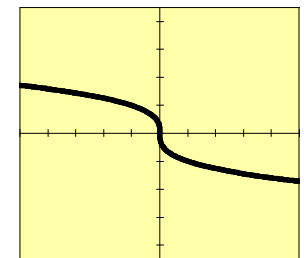


$$y = -x^3$$

CUBE ROOT FUNCTIONS

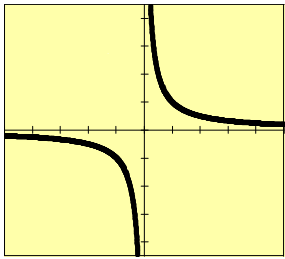


$$y = \sqrt[3]{x}$$

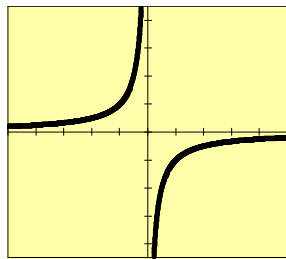


$$y = -\sqrt[3]{x}$$

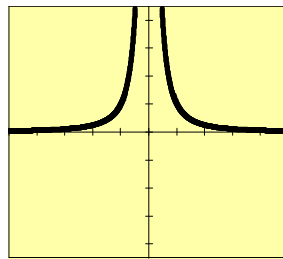
RATIONAL FUNCTIONS



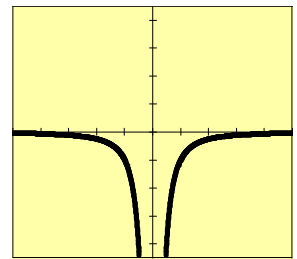
$$y = \frac{1}{x}$$



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

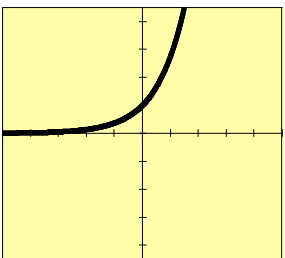


$$y = \frac{1}{x^2}$$

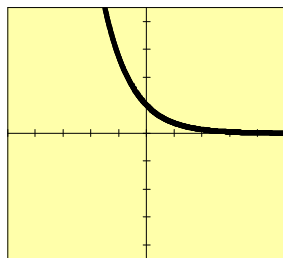


$$y = -\frac{1}{x^2}$$

EXPONENTIAL FUNCTIONS

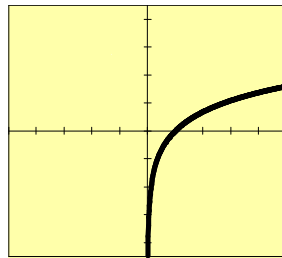


$$y = b^x$$

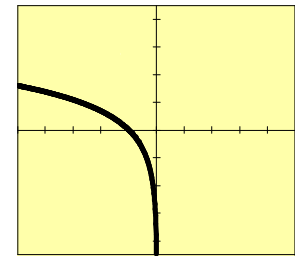


$$y = b^{-x}$$

LOGARITHMIC FUNCTIONS

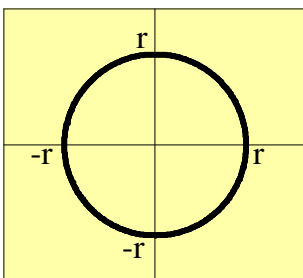


$$y = \log_b x$$

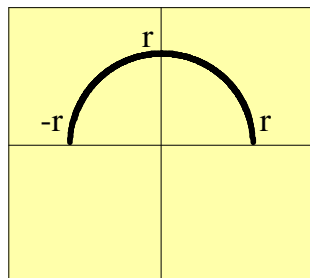


$$y = \log_b(-x)$$

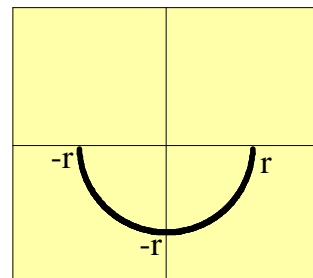
CIRCLES AND HALF-CIRCLES



$$x^2 + y^2 = r^2$$



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



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