superscript:

 $2x^{34}$ 

subscript:

 $x_2$ 

greek letters:

 $\pi$ 

 $\alpha$ 

trig functions:

 $y = \sin(x)$ 

 $\log$  functions :

 $\log(x)$ 

ln(x)

 $\log_2(x)$ 

square roots

 $\sqrt[3]{2}$ 

fractions : this is  $\frac{5}{77}$  lala