## Some of the short ones we did on the board

(at least with one class, and I thought it would be helpful to all)
Parentheses before exponents: $\quad(-3)^{2}=9$
Exponents before multiplication: $\quad-3^{2}=-9$

Negative exponents:

$$
3^{-2}=\frac{1}{3^{2}}=\frac{1}{9}
$$

Negative exponents continues: $\quad \frac{1}{3^{-2}}=3^{2}=9$
Negative exponents again: $\quad(2 x)^{-1}=\frac{1}{2 x}$
We will not forget this one!

$$
3^{0}=1
$$

Multiplying (same base!): $\quad x^{3} * x^{2}=x^{5}$
Dividing (same base!): $\quad \frac{x^{7}}{x^{4}}=x^{7-4}=x^{3}$
Dividing and negative exponents: $\quad \frac{x^{7}}{x^{-4}}=x^{7+4}=x^{11}$
More power!
$\left(x^{3}\right)^{4}=x^{3 * 4}=x^{12}$
== Make up your own===

