Adding & Subtracting

<u>Opposite Numbers</u> – Two numbers with the same numeral but have opposite signs.

Examples:

$$\frac{2}{3}$$
 and $-\frac{2}{3}$ are opposites **n** and -**n** are opposites

<u>Absolute Value</u> – the distance from that number to zero on a number line, bars around a number (or numerical expression) indicate absolute value.

Examples:

$$|14| = 14$$
 $|-45| = 45$

$$|x| = x$$
 $|-x| = x$

Addition

When adding numbers with the **same sign** (both positive or both negative), **add the numbers** and keep the sign.

Examples:

$$-12 + -34 = -36$$
 4 + 10 = 14

When adding numbers with **different signs** (one positive and one negative) find the **subtract the numbers** and keep the sign of the higher number.

Examples:

$$-20 + 4 = -16$$
 $18 + -3 = 15$

S.A.D.S.

Subtraction