

Question: Why do chemical equations need to be balanced?

BALANCING CHEMICAL EQUATIONS

Balanced chemical equations - have the same number of atoms of each element on both sides of equation

* When balancing chemical equations NEVER change the subscripts, instead change the coefficient in front of the compounds needing balanced.

Steps to Balancing a Chemical Equation

Step 1: Write a chemical equation for the reaction using formulas and symbols — make sure reactants are on left side and products on right.

Step 2: Count the atoms in reactants and products.

Step 3: Choose coefficients that balance the equation.

→ HINT: Generally, if there is an even # of an element on one side and an odd on the other side, place a 2 in front of compound containing odd number of atoms.

Step 4: Recheck the numbers of each atom on both sides of equation and adjust coefficients if necessary — remember NEVER change subscripts.

