



Unit 4: Chemical Reactions

Lesson 9: Practice Makes Perfect

Guiding Question: What is the process for writing structural formulas without using Lewis Dot Diagrams (use your own words)?

Do Now:

- How do you know which atom you should put in the middle when drawing a Lewis dot structure?

Notes

Drawing structural formulas:

1. Add up the total number of valence electrons
 - If the compound has an overall charge, it has either lost (+) or gained (-) electrons (subtract or add this to your total electrons)
2. The atom with 4 (or the closest to 4) valence electrons will be the central atom
3. Attach all other atoms to the central atom with a bond (represents 2 electrons)
4. Subtract the number of electrons used in bonds from the total determined in step 1.
5. Arrange the remaining electrons to satisfy the octet of every atom.
 - H will never get extra electrons!

Remember!

We want our molecules to be as symmetrical as possible.

Every atom needs their octet (eight electrons around it – and a max of 8!)

Closure

- Answer Guiding Question on page 8
- Homework #4 due Friday, 3/2
- Achieve 3000: The Car that Runs on Chocolate due Friday, 3/9 at 11:59pm