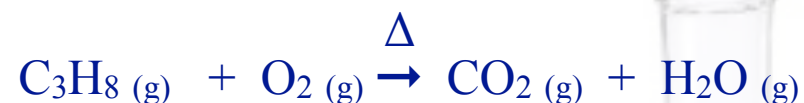
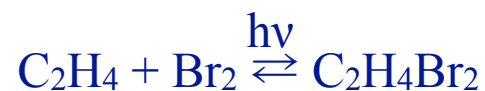


Parts of a Chemical Equation

- ▶ **Reactants** are what you start with.
 - ▶ They are always on the **left**.
- ▶ Then an arrow pointing to the right.
 - ▶ \rightarrow by default, read it “yields”
 - ▶ \rightleftharpoons means reversible (equilibrium)
 - ▶ Do not use \leftrightarrow or \Rightarrow or \leftarrow (they mean other things)
- ▶ **Products** are what you end up with.
 - ▶ They are always on the **right**.
- ▶ Put a “+” between substances
- ▶ Order doesn’t matter.
- ▶ Over the arrow is optional:
 - ▶ Δ means add heat
 - ▶ $h\nu$ means add light
 - ▶ chemical formula is solvent
 - ▶ temperature means temperature
 - ▶ \updownarrow means reflux (boil)



- ▶ After the substance (can be written subscript):
 - ▶ (aq) means in water
 - ▶ (s), (l), (g) means solid, liquid, gas state
 - ▶ \uparrow means gas evolved (escaped)
 - ▶ \downarrow means precipitate (solid fell out)

