

TYPES OF REACTIONS

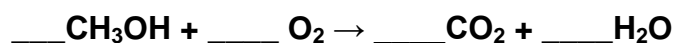
OBTAIN YOUR TEACHERS PERMISSION BEFORE PERFORMING THIS EXPERIMENT

In this experiment you will be examining TYPES OF REACTIONS (RXNs) It is very important that you MEASURE EXACT AMOUNTS OF SUBSTANCES and FOLLOW ALL DIRECTIONS EXACTLY!!!!!!

DECOMPOSITION OF WOOD

WOOD + Heat \rightarrow CO₂ + Water + Methanol (CH₃OH)

We can burn the Methanol vapor in this equation



BALANCE THIS EQUATION

1. WATCH THE VIDEO OF THIS REACTION
2. Set up the apparatus as shown
3. Place the sawdust into the IGNITION TUBE INSERT THE STOPPER
4. GLOVES and GOGGLES
5. Light the burner and adjust if necessary.
6. HEAT the MIXTURE UNTIL SMOKE FILLS THE TUBE
7. USING A WOOD SPLINT, LIGHT THE GAS COMING OUT OF THE TUBE. (YOU MAY HAVE TO VARY THE AMOUNT OF HEAT ON THE TUBE TO KEEP IT LIT)

Describe this experiment in your own words. How could wood be used as an alternative fuel source? NOT AS FIRE FOR HEAT AND COOKING.

CLEAN UP!clean the test tube (waste container) with a test tube brush, return materials.

Factors

SYNTHESIS

DECOMPOSITION 1

REPLACEMENT

DOUBLE REPLACEMENT

MATERIALS:

- GOGGLE (over eyes) GLOVES (over hands)
- Correct IGNITION test tube
- Stopper with glass fitting
- Sawdust (7 LEVEL SCOOPS)
- ring stand and test tube clamp
- Bunsen Burner and Spark Lighter
- WOOD SPLINTS

THIS WILL GET HOT!!

**GLOVES AND
GOGGLES**