Things to Know about Lab 1.3.1

Acid Neutralization:

$$H^{+}$$
 + OH^{-} \rightarrow $H_{2}O$
 $low\ pH\ high\ pH$ neutral $(pH=7)$

Phenolphthalein Endpoint:

Below pH 8 = clear

Above pH 8 = pink

The titration curve for phenolphthalein is very steep around pH 8, therefore it is an acceptable indicator for pH 7.

Titration:

A titration is a chemical analysis involving the progressive addition of a solution of known solute concentration, called the titrant, into a solution of unknown concentration, called the sample. The purpose is to determine the quantity of a specified chemical in the sample, from which the molar mass and the concentration of the chemical may be determined.

Burette:

A long thin piece of glassware with a stopcock used in the drop-wise addition of a titrant. As your skill improves, it is capable of dispensing ½ drops.

Note: never attempt to fill a burette to the top mark, not only is it impossible, but it is quite time consuming. Record initial and final volumes and take the difference.

Acetylene:

Also known as ethyne gas (C_2H_2) . It is very flammable.