Acid and Base Notes Name \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Chem 332 – O’Dette Date \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Period \_\_\_\_

Water

* When a water molecule \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_, it forms two ions.
* Draw the water molecule splitting

Acid Base Theory

1. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
   * Svante Arrhenius in 1884 established the first theory of acids and bases
   * Acids produce \_\_\_\_\_\_ when dissolved in water
   * Bases produce \_\_\_\_\_\_ when dissolved in water
   * EX:
2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
   * Arrhenius theory doesn’t always work, for example NH3 would be considered an acid by Arrhenius theory but when NH3 reacts it will actually act as a base
   * In 1923 Johannes Bronsted and Thomas Lowry proposed a new acid base theory
   * Acid – \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
   * Base – \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
   * EX:

Strength of Acids and Bases

* Depends on \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
* Dissociation =
  + Acid Ex:
  + Base Ex
* Strong Acids :
* Weak Acids :
* Strong Bases :
* Weak Bases :

Properties of Acids and Bases

* Acids :
* Bases: