Biology 103: acids/ PH scale

- Acids are substances that dissociate in water which releases hydrogen ions
- Hydrochloric acid is produced by the stomach acids in digestion
- Bases are substances that take up hydrogen ions or release hydroxide ions
- Sodium hydroxide is a strong base
- The PH scale is a measure of acidity or basicity of a solution
- Ranges from 0-14
- 7 is neutral
- A PH below 7 is acidic and above 7 is basic
- A buffer is a solution that resists changes in a PH when acids or bases are added to it
- The 4 major organic molecules in the body are carbohydrates, lipids, proteins and nucleic acids
- Organic molecules contain carbon and hydrogen and are associated with cells
- A dehydration reaction is a type of synthesis chemical reaction that removes water which links subunits together
- Carbohydrates are used as an energy source
- Monosaccharides are made of a single sugar molecule and has a backbone of 3-7 carbons
- Disaccharides are made of two monosaccharides joined by a dehydration reaction
- Triglycerides are made of one glycerol and 3 fatty acids and function in energy storage insulation and cushioning