



Big Chem Final Review



Although you may use your notes on the Final Exam, there is insufficient time to look up very much. You MUST know your stuff for this exam!!!

Practice your notes **in writing!** Here are some things to be sure you know:

All **Symbols** and **Valences** and **Formula Writing!** Practice on the computer disk and **in writing** on the practice sheet. Practice **Balancing Equations!**

Practice **in writing** each type of chemical problem. For Example:

The Gas Laws
Boyle's Law
Charles' Law
Combined Gas Laws
Ideal Gas Law Equation
Vapor Pressure
Boiling Point

Dalton's Law Partial Pressure
Correct to STP
Graham's Law of Diffusion
Density of Gases
Molar Volume
Equations with Gas Volumes
Molarity of Solutions, M

The Big K of Equilibrium
The Principle of Le Chatelier
Solubility Product
Will a ppt form?
Get Moles
From mass
From Concentration, M

Terms: Be able to Define, Explain, and Provide Examples for these terms:

Liquids
Vapor Pressure
Boiling Point
Two ways to boil
Charles's Law
Absolute Temp
Melting Point
Warming curve
for H₂O
Triple Point
Heat of Fusion
Heat of
Vaporization
Surface Tension
Capillarity
Ducky
Humidity
Psychrometer
Gases
Boyle's Law
Charles' Law
Dalton's Law of
Pressure
STP
Principle of
Le Chatelier
Regulation
Shift
Equilibrium
Pressure
Temperature
Concentration
Sublimation
Gases
Boyle's Law
Charles' Law
Combined Gas
Laws
Ideal Gas
Equation
Dalton's Law of
Partial Pressure

Molar Volume
STP
Correct to STP
Density of Gases
MM for Gases
Enthalpy
Entropy
Min Energy
Max
Randomness
Solutions
Solute
Solvent
Concentration
M= mol/liter
At Equilibrium
Ions &
Molecules
Colligative Props
Suspensions
Colloids
Fractional
Distillation
Catalyst
Reaction Rate
Pressure
Temperature
Concentration
Surface Area
Nature of
Reactants
Catalyst
Rate Law
Reaction
Mechanism
Equilibrium
Constant
Theory of

Ionization
Acid
Three Types
Arrhenius
Bronsted
Lewis
Base
Salt
Props of Acids
Props of Bases
Ionic Equations
Big K for Ions
Common Ion
Effect
Electrolytes
Big K for
solubility
Big K for Water
The pH Scale
The Hydronium
Ion
Hydrolysis
Buffers
Titration
Oxidation
Reduction
REDOX
Balancing by
Oxidation Table
Oxidation
Numbers
Electrochemical
Cells
Battery of Cells
Electrolysis
Nuclear
Chemistry
SubAtomic

Particles
Accelerators
Linear
Circular
Half-Life
Transmutation
Nuclear Reactors
Parts of Reactors
Nuclear Fission
Nuclear Fusion
Nuclear Bombs
Radioactive
Dating
Organic
Chemistry
Alkanes
Alkenes
Alkynes
Alcohols
Phenols
Ethers
Aromatic
Compounds
Benzenes
Phenols
Aldehydes
Ketones
Acids
Esters
Amines
Organic
Reactions
Halogen
Substitution
Halogen
Addition
Pyrolysis
Wurtz doubles

the Chain
Reasons for so
many Organic
Compds
Types of
Formulas
Qualitative
Analysis
Theory
Separation
Identification
Silver Group
Separation
Cu-As Group
Separation
Al-Ni Group
Separation
Ba-Mg Group
Separation
Flame Tests
Sodium
Potassium
Barium
Sep Cu Group
from As Group
Sep Al Group
from Ni Group
Amphoterism
Paranitrobenzene
azoresorcinol
Flocculent Blue
Lake ppt.
Dense White
Fumes
Centrifuge
Decant
Precipitate