

Name _____ Date _____ Period _____

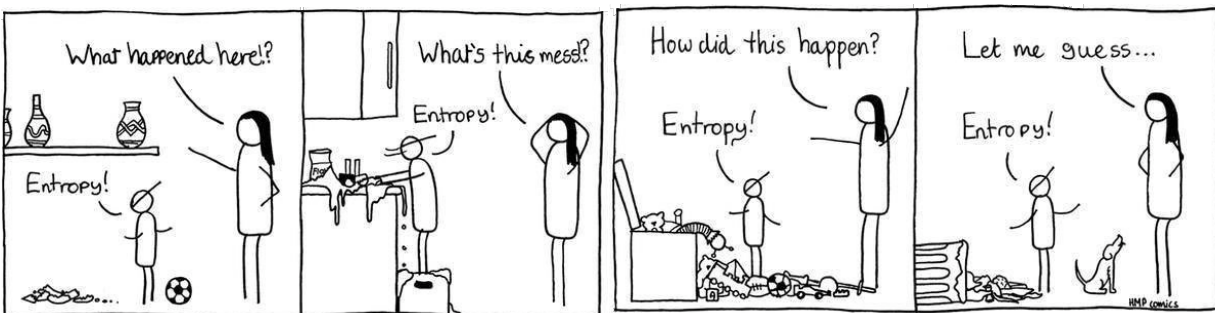
STUDY GUIDE – CHAPTERS 8-10

Multiple Choice Topics (77 points)

- entropy
- ΔG
- ATP
- ATP cycle
- energy coupling
- enzyme structure and function
- activation energy
- non-competitive (allosteric) and competitive inhibitors
- optimum pH and temperature
- free energy vs. time graph
- cellular respiration
- locations of steps in cellular respiration
- substrate-level phosphorylation
- oxidative phosphorylation
- reactants/products of each step in cellular respiration
- kinase/isomerase/dehydrogenase
- glycolysis
- Krebs cycle
- ETC/chemiosmosis in cellular respiration
- phosphofructokinase
- oxidation and reduction reactions
- fermentation
- locations of steps in photosynthesis
- reactants/products of each step in photosynthesis
- light reactions
- ETC/chemiosmosis in photosynthesis
- dark reactions (Calvin cycle)
- C₃/C₄/CAM plants
- relationship between pH and [H⁺]
- absorption spectrum
- action spectrum

Free Response Topics (28 points)

- electromagnetic spectrum
- graphing
- photosynthesis
- endergonic vs. exergonic
- cellular respiration
- enzymes
- experimental design
- surface area to volume ratio lab



This is why we don't teach our children about entropy until much later...