

Exam 1 breakdown:

Ch 1 (homeostasis) – 18 questions

For pathways, know stimulus, sensors, integrating center, effectors, and effect

14 questions on negative feedback regulation of

- blood glucose (including knowing what hormones alpha and beta cells of pancreas secrete). Also know Type 1 diabetes versus Type 2 diabetes)

- body temperature, and

- blood pressure.

2 questions on positive feedback (examples of breastfeeding vs childbirth)

1 questions on importance of pH (blood pH, and pH contrasts, acidosis, alkalosis)

1 questions on Clinical Application readings on anabolic steroid abuse and corticosteroids (see Ch 1 study outline on syllabus)

Ch 2 part 1 (cell metabolism) – 20 questions

5 questions on “G” vocab words (glycolysis, glycogen, glucagon, glycogenesis, glycogenolysis, gluconeogenesis).

2 questions on glycogen metabolism and enzymes (glycogen synthase, glycogen phosphorylase, and glucose 6 phosphatase)

1 on lactic acid metabolism

3 on lipogenesis and lipolysis

3 on amino acid metabolism by the liver (and problems with amino acid metabolism)

3 on aerobic respiration pathway (know what enters a pathway, and what is the main product). Know all the products of the electron transport chain.

2 on anaerobic respirations (and the products of it, and what happens to brain or heart tissue if forced to respire this way)

1 on acidosis and alkalosis, and the things that can cause them when they’re metabolized.

Ch 2 part 2 (cell transport) – 12 questions

5 on the types of passive transport (diffusion, 2 types of facilitated diffusion, osmosis, filtration)

5 on active transport including primary active transport (pumps) and bulk transport

2 on secondary active transport (co-transport vs counter-transport, and clinical application)