**Review for Exam Five, BSC 182**

Please note that this review does not cover ALL of the material discussed in the lecture notes. *It is meant as a guide only*. Exam questions will come from the lecture material, not this review. Please be familiar with all of the topics we discussed in lecture.

1. Which part of the digestive system are
   1. Part of the alimentary canal?
   2. Accessory organs
2. What are the six essential activities of the GI tract
3. Compare mechanical (physical) digestion to chemical digestion
   1. Name locations in which each occurs
4. Review the Local Enteric Plexuses
   1. What is their function
   2. Where (in general) are they located
   3. What’s the common name for them
   4. What are the two major intrinsic plexuses and their functions
5. Name the layers, location, and function of the peritoneum
6. What is mesentery?
7. What are the four layers of the alimentary canal?
   1. What are the layers within the mucosa?
   2. How many muscle layers are present?
8. What is the terminology for the mouth?
   1. The epithelial lining of the mouth?
   2. Borders?
   3. Muscles associated with the mouth?
   4. Vestibule?
   5. What is a frenulum?
      1. How many do we have, and where?
   6. Features of the soft palate?
   7. Features of the hard palate?
   8. Muscles and function of the tongue
   9. Types and locations of papillae on the tongue
   10. Locations, names, and types of secretions for the salivary glands
       1. Function of salivary amylase
       2. Function of mucus
       3. Intrinsic glands versus extrinsic glands
   11. Types of teeth
       1. Anatomy of the tooth
       2. Dental caries
       3. Calculus
9. Pharynx: location and function
10. Esophagus
    1. Glands
    2. Epithelium
    3. Muscle types
    4. Sphincters
    5. Movement
11. What does “deglutition” mean?
12. Stomach
    1. External anatomy
    2. Internal regions
    3. Sphincters
    4. Gastric glands
       1. Cell types: what do they produce
    5. What are the stages of gastric secretion?
       1. What stimulates/inhibits each stage?
    6. Where is HCl produces and how is it controlled?
    7. What is chyme?
    8. Pepsin
       1. What does it do?
       2. Where is it formed?
       3. How is it activated?
13. Small intestine
    1. What are the three regions?
    2. What are plicae circulares?
    3. Villi?
    4. Microvilli?
    5. Peyers Patches
    6. Brunners Glands
    7. Intestinal Crypts
14. Liver
    1. Lobes
    2. Function related to digestion?
    3. Ducts
15. Gall Bladder
    1. What is the function of Bile?
    2. Which part of bile is active in digestion?
    3. Function of the gall bladder?
    4. What is the relationship between CCK and the gall bladder?
16. Pancreas
    1. Function of bicarbonate ion?
    2. Function of pancreatic amylase?
    3. What other enzymes are produced?
    4. What is the relationship between CCK and the pancreas?
17. Where are each of the following digested? Where are they absorbed?
    1. Carbohydrates
    2. Lipids
    3. Proteins
    4. Nucleic Acids
18. What is the
    1. Gastroileal reflex
    2. Gastrocolic reflex
19. Large Intestine
    1. Teniae coli:
    2. Haustra:
    3. Epiploic appendages:
    4. Vermiform appendix
    5. Regions
    6. Internal Versus External anal sphincter
    7. Type of epithelium
    8. Functions of the large intestion
20. Bacterial Flora
    1. What do they do?
    2. Where are they located?
21. Defecation
    1. What stimulates removal?
22. Malabsorption
    1. Gluten Enteropathy
       1. What is gluten
       2. How can it harm people sensitive to it?
23. Kidney structures: Know locations and functions for
    1. Cortex
    2. Medulla
    3. Renal pyramid
    4. Renal column
    5. Renal papillae
    6. Minor calyx
    7. Major calyx
    8. Renal pelvis
    9. Nephron
    10. Glomerulus
    11. Renal capsule
    12. Renal corpuscle
    13. Proximal convoluted tubule
    14. Nephron loop
    15. Distal Convoluted tubule
    16. Collecting Duct
    17. Vasa recta
    18. Peritubular capillaries
    19. Afferent arteriole
    20. Efferent arteriole
    21. Juxtaglomerular apparatus
    22. Macula Densa
    23. JG Cells
    24. Mesangial cells
24. Three steps to urine formation
25. Relationship between filtration rate and filtration pressure
26. How is GFR controlled?
27. What happens to urine formation during stress? (Sympathetic system?)
28. What is the renin-Angiotensin system
    1. What sequence does it follow?
29. What is ANP and what does it do?
30. What happens to urine in the presence of ADH? In the absence?
31. What is diuresis?
32. Where are the ureters
    1. What layers do they have?
33. Differences between the male and female anatomy near the bladder?
34. What is the trigone?
35. Epithelium of the bladder?
36. Differences between male and female urethra
37. Differences between Internal and External urethral sphincters
38. What is micturituion? How is it stimulated?

































