<u>CHAPTER 7 Vocab</u> -Cell Structure & Function

CELL:
CELL THEORY:
ENDOSYMBIOTIC THEORY:
NUCLEUS: (Use cell definition not the atom one!)
NUCLEOLUS
CYTOPLASM:
ORGANELLE:
EUKARYOTE:
PROKARYOTE:
<u>CHROMATIN</u> : DNA with attached proteins which is found SPREAD OUT in the nucleus of NON-DIVIDING cells
<u>CHROMOSOME</u> : DNA with attached proteins which is TIGHTLY PACKED into rod shaped bodies found in DIVIDING cells
PERIPHERAL PROTEIN: (B in diagram) Protein attached to the interior or exterior surface of a cell membrane INTEGRAL PROTEIN: (A in diagram)
Protein that is embedded in the membrane bilayer; it can go across to touch both sides or only extend into one of the layers

<u>FLAGELLUM</u> (plural = FLAGELLA) FEW, LONG hair-like structures containing microtubules that extend from the surface of a cell and play a role in cell movement (locomotion) Ex: "sperm tail"
<u>CILIUM</u> (plural = CILIA): MANY, SHORT hair-like structures that extend from the surface of a cell which move the cell itself or move substances across the cell surface
CRISTA (plural = CRISTAE):
THYLAKOID:
LIPID BILAYER:
SELECTIVELY PERMEABLE (SEMI-PERMEABLE):
APOPTOSIS: Programmed cell death; cell suicide for the "good of the organism"
CELL SPECIALIZATION (DIFFERENTIATION):
TISSUE:
ORGAN:
ORGAN SYSTEM:
GLYCOPROTEINS:
NUCLEAR PORES:
<u>CYTOSKELETON:</u>
<u>CENTRIOLES:</u>
RIBOSOMES:

MITOCHONDRION:
ROUGH ENDOPLASMIC RETICULUM (ROUGH ER):
SMOOTH ENDOPLASMIC RETICLUM (SMOOTH ER):
CHLOROPLASTS:
GOLGI APPARATUS (GOLGI BODY or GOLGI COMPLEX):
LYSOSOMES:
CELL WALL:
VACUOLE:

 $\textbf{Atoms} \rightarrow \textbf{Molecules} \rightarrow \textbf{Organelles} \rightarrow \textbf{Cells} \rightarrow \textbf{Tissues} \rightarrow \textbf{Organs} \rightarrow \textbf{Organ systems} \rightarrow \textbf{Organism}$