Biology Test Review – Unit 1

SB1 b and c, includes characteristics of living things.

1. What standards does this test cover, explain what are you expected to understand based on the GPS?
2. Fill in the table below

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| Characteristics of Living Things | Examples/Details |
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1. Define monomer and polymer. Give a non-science example of each.
2. Fill in the table below

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| Macromolecule (polymer) | Monomer | Elements Found in Molecule | Functions | Examples |
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1. What comparisons/connections can be made between carbohydrates and lipids?
2. What comparisons/connections can be made between nucleic acids and proteins?
3. What comparisons/connections can be made between carbohydrates and nucleic acids?
4. Why are macromolecules based on carbon?
5. Label the REACTANTS and PRODUCTS in the following reaction:
   1. H2O + SO4 🡪 H2SO4
6. Compare and contrast the amount of activation energy and energy being released or absorbed in exothermic and endothermic reactions.
7. Explain enzymes. What do enzymes do, how do they work, what are they responsible for?
8. What are factors that influence how well an enzyme works? What is an analogy for enzymes/catalysts?
9. What was the difference between the anabolic and catabolic enzyme reactions in the lab?
10. Review the labs we have done in class: Macromolecule Indicator Lab, Lipid (milk), and Toothpick-ase.

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| Lab Activity | Purpose, results, independent and dependent variables |
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