

Biochemistry Reactions Worksheet

QUESTIONS:

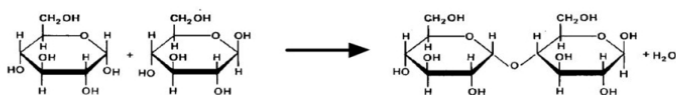
1. Match the definition with the correct term

- A. Condensation Synthesis
- B. Hydrolysis
- C. Monomer
- D. Polymer
- E. Polymerization

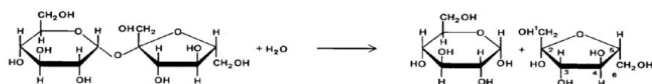
- _____ Large molecules that consists of many subunits called monomers
- _____ Identical or similar subunits of a polymer
- _____ Process of linking monomers to form a polymer
- _____ Loss of a water molecule between two monomers to form a covalent bond between the monomers
- _____ breaking the covalent bond between monomers by adding a water molecule
- _____ AKA dehydration synthesis

2. Indicate if each of the following is an example of condensation synthesis or hydrolysis.

Reaction #1: _____



Reaction #2: _____



Reaction #3: _____

Protein, carbohydrate, or lipid synthesis

Reaction #4: _____

Digestion of proteins, carbohydrate, or lipid

3. How can you tell if a chemical equation represents :

- a. Condensation synthesis? _____
- b. Hydrolysis? _____

4. How are carbohydrates classified? _____

5. Match the description with the correct term.

- | | |
|------------------|--------------------|
| A. Disaccharides | D. Monosaccharides |
| B. Lactose | E. Polysaccharides |
| C. Maltose | F. Sucrose |

- _____ Simple sugar
- _____ General term used to describe a molecule that consists of 2 simple sugars covalently bonded
- _____ General term used to describe a molecule that consists of 100s or 1000s of simple sugars covalently bonded
- _____ Molecule that consists of 2 glucose molecules covalently bonded
- _____ Molecule that consists of a glucose and a galactose covalently bonded
- _____ Molecule that consists of a glucose and a fructose covalently bonded