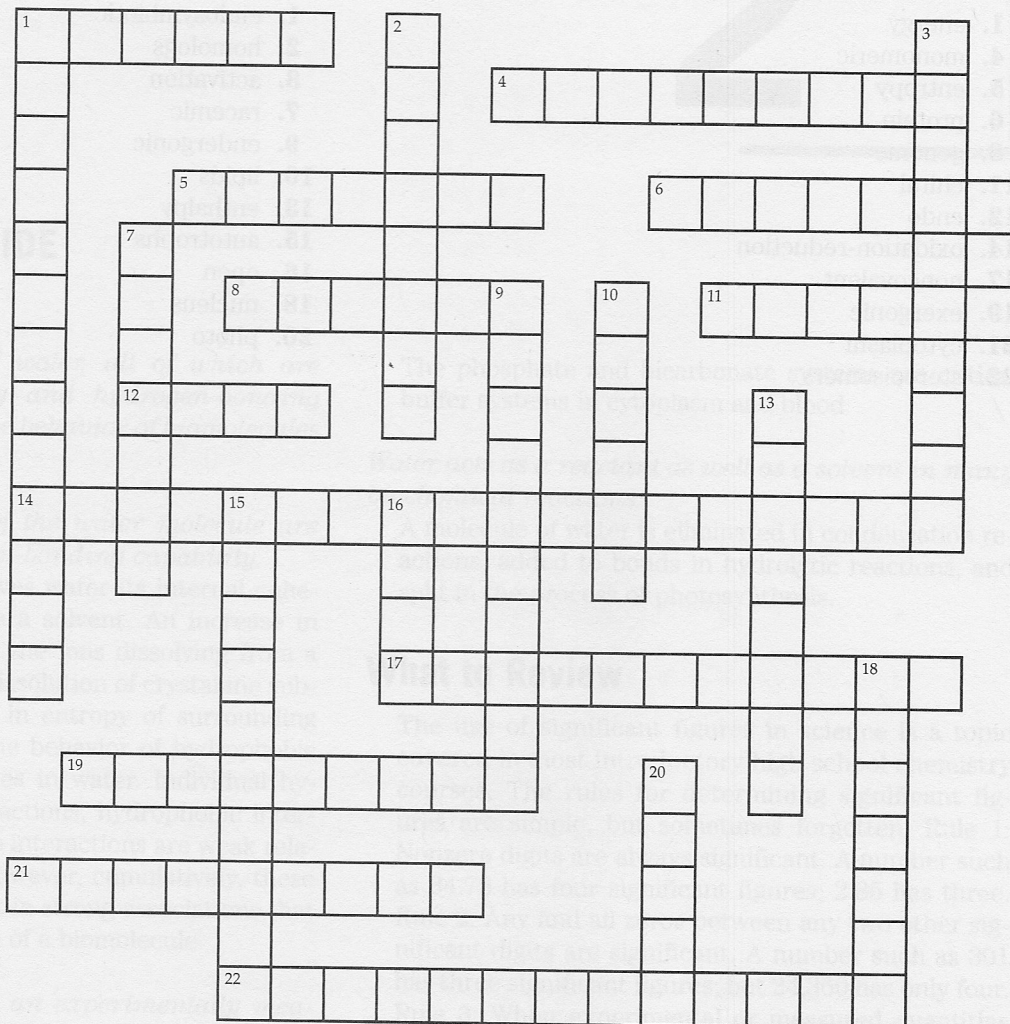


SELF-TEST

Do You Know the Terms?

ACROSS

- G*; free _____.
- Amino acids are the _____ subunits of proteins.
- The randomness of the components of a chemical system; *S*.
- Amino acid is to _____ as monomer is to polymer.
- The complete set of genetic material needed for the growth and development of an organism.
- Glycine is the only amino acid lacking an _____ asymmetric or carbon.
- Reactions requiring an input of energy from the surroundings _____ are thermic reactions.
- In _____ - _____ reactions, electrons are transferred from a more reduced to a more oxidized molecule.
- A type of weak interaction that stabilizes the native conformation of a biomolecule or supramolecular complex.
- Describes a reaction for which the free-energy change (ΔG) is negative.
- The internal components of cells and the aqueous solution in which they are suspended.
- Molecules having the same composition and order of atomic connections, but different spatial arrangements among the atoms.



DOWN

- Mitochondria are thought to have evolved from bacteria that formed _____ associations with the ancestors of modern eukaryotes.
- Proteins encoded by two genes that share similar nucleotide sequences.
- Enzymes enhance the rate of chemical reactions by lowering the _____ energy that constitutes an energy barrier between reactants and products.
- An equimolar mixture of the D and L isomers of an optically active compound is a _____ mixture.
- Describes a reaction for which the free-energy change (ΔG) is positive.
- Structural components of membranes; energy storage molecules.
- The energy or heat content of a system; *H*.
- Organisms that can synthesize most of the molecules necessary for their growth from simple compounds, such as CO_2 and NH_3 .
- A system that exchanges energy and material with its surroundings is said to be _____.
- Membrane-bounded compartment, present only in eukaryotes, that contains chromosomes.
- _____ -synthetic organisms convert solar energy into ATP.