**Living Things & Transfer of Energy Vocabulary**

1. **Ecology:** the study of how organisms interact with one another and with their environment
2. **Biotic factor:** an interaction between organisms in an area; a living organism
3. **Abiotic factor:** a nonliving part of an environment, such as water, nutrients, soil, sunlight, rainfall, or temperature
4. **Organism:** a living thing, anything that can carry out life processes independently
5. **Population:** a group of individuals of the same species that live in the same place at the same time
6. **Community:** all the populations of different species that live and interact in an area
7. **Ecosystem:** a community of organisms and their nonliving environment
8. **Biomes:** large region characterized by climate and communities of species that are grouped together
9. **Niche:** the abiotic conditions under which individuals can survive and the role they play in the ecosystem
10. **Habitat:** the place where an organism usually lives and is part of an organism’s niche
11. **Matter:** anything that has mass and takes up space
12. **Energy:** the ability to do work and enables organisms to use matter in life processes
13. **Law of Conservation of Energy**: energy cannot be created or destroyed, but instead energy changes form
14. **Law of Conservation of Mass:** mass cannot be created or destroyed, but it moves through the environment in different forms
15. **Energy Pyramid:** tool that can be used to trace the flow of energy through an ecosystem
16. **Water Cycle:** the movement of water between the oceans, atmosphere, land, and living things
17. **Carbon Cycle:** the movement of carbon through organisms and between organisms and the physical environment
18. **Nitrogen Cycle:**the movement of nitrogen between the environment and living things
19. **Nitrogen Fixation:** bacteria in the soil are able to change nitrogen gas into forms that plants can use; lightning can also fix nitrogen
20. **Decomposition:** the breakdown of dead organisms and wastes that returns nutrients to the environment