Essential Science Vocabulary

Biome Unit	
Ecosystem	All the living and non living things in an environment, including their interactions with each other
Abiotic Factor	A nonliving part of an ecosystem
Biotic Factor	A living part of an ecosystem
Population	All the individuals of one species in one given area
Community	All the living things in an ecosystem
Ecology	The study of how living and nonliving things interact
Habitat	The place where a plant or animal naturally lives or grows
Niche	The role of an organism in a community
Food Chain	The path of energy form one organism to another
Food Web	The overlapping food chains in an ecosystem
Herbivore	An animal that eats plants, algae, and other producers
Carnivore	An animals that hunts other animals for food
Predator	An animal that hunts other animals for food
Prey	An animal that is hunted for food
Scavenger	A meat-eating animal that feeds on the remain of dead animals
Omnivore	An animal that eats both plants and animals
Symbiosis	A relationship between two animals that last over time
Mutualism	A relationship between two kinds of organisms that benefits both organisms
Parasitism	A relationship between two organisms, where one animal lives in or in another organism and harms that organism
Commensalism	A relationship between two kinds of organisms that benefits one, without harming the other
Limiting Factor	Anything that controls the growth or survival of a population

Carrying Capacity	The maximum population size that an area can support
Endangered Species	A species that is in danger of becoming extinct
Extinct	A species that has died out completely
Threatened Species	A species that is in danger of becoming a endangered species
Carbon Cycle	The continuous exchange of carbon dioxide and oxygen among living things
Nitrogen Cycle	The continuous trapping of nitrogen gas into compounds in the soil and its return top the air
Biome	One of Earth's largest ecosystems, with its own kind of climate, soil, plants, and animals
Grasslands	A biome where grasses, not trees, are the main plant life
Taiga	A cool forest biome of conifers in the upper northern hemisphere
Tundra	Large, treeless plain in the artic region, where he ground is frozen all year long
Desert	A sandy or rocky biome, with little precipitation and little plant life
Deciduous Forest	A forest biome with many kinds of tree that loose there leaves each year
Tropical Rain Forest	A hot biome near the equator, with much rainfall and a wide variety of life
Ecological Suppression	The gradual replacement of one community by another
Pioneer Species	The first species living in an otherwise lifeless area
Pioneer Community	The first community living in an once lifeless area
Climax Community	The final stage of succession where in an area, unless a major change happens

Landform Unit	
Old Mountain	A mountain with a top that has been weathered away
New Mountain	A mountain that has not undergone much weathering and has a pointy top
River	A long flowing stream of fresh water that feeds into an ocean or lake
Meander	A wind or turn in a river that makes an S-shape

Tributary	A stream that flows into a larger river
Plateau	An area of high flat land
Peninsula	A landmass that is surrounded by water on three sides
Island	A landmass that is surrounded by water on three sides
Canyon	A very deep valley created by a river that has steep sides
Glacier	A mountain of ice
U-Shaped Valley	A valley created by glaciers weathering away at mountains
V-Shaped Valley	A valley created by rivers weathering away at mountains
Delta	A place where a river dumps sediment into a larger body of water
Bay	Ocean water that is partly enclosed by land
Hill	A raised area of land that is smaller than a mountain
Dune	A sand hill made by wind and ocean tides
Fault	A crack in the earth's surface
Geologist	A scientist who studies rocks to tell how they formed and to predict when an earthquake may occur
Magma	Hot, molten rock deep below the Earth's surface
Lava	Magma that reaches the Earth's surface
Weathering	Breaking down rocks into smaller pieces
Erosion	The picking of and carrying away of weathered rock
Deposition	The dropping off of bits of eroded rock
Meteorite	A chunk of rock form space that strikes the Earth's surface
Runoff	Precipitation that flows across the land's surface or fall into rivers and streams
Watershed	Area from which water is drained
Sediment	Pieces of material carried and deposited by water or wind

Flood Plain	Land that is likely to be underwater during a flood
Lithosphere	The hard outer layer of the earth
Hydrosphere	Earth's water, found in continents and oceans
Rock	A naturally formed solids in the crust made up of many types of minerals
Igneous Rock	A rock formed when melted rock cools and hardens
Sedimentary Rock	A rock made of bits of sediment pressed together
Metamorphic Rock	A rock formed under heat and pressure
Fossil	Any remains or imprints of living things of the past
Humus	Decayed plants or animal material in the soil
Pollution	Any things that has a negative affect on the earth and it's organisms
Rock Cycle	Rocks changing from one into another in an endless cycle
Renewable Resources	A resource that can be replaced within a short amount of time
Ozone layer	A layer of ozone gas in eth atmosphere that screens out much of the Sun's UV rays
Fossil Fuel	A fuel formed from decay of ancient forms of life
Nonrenewable Resources	A resource that cannot be replaced within a short period of time
Smog	A mixture of smoke and fog
Acid Rain	Moisture that fall to the Earth after being mixed with pollution in the air
Desalination	A process in which fresh water is extracted form sea water
Water Cycle	The continuous movement of water between the Earth's surface and the air by changing from a liquid to a gas and back
Aquifer	An underground layer of rock or soil filled with water
Spring	A place where underground water seeps out of the ground
Well	A hole dug below the water table that allows water to seep in
Reservoir	A storage area for fresh water

Basin	The floor of the ocean, containing mountains, valleys, and plateau
Current	An ocean movement
Continental Shelf	The steep slope leading down from the continental shelf toward the floor
Continental Slope	The steep slope leading down form the continental shelf to the sea floor
Continental Rise	A buildup of sediment on the sea floor at the bottom of the continental slope
Abyssal Plain	The vast flat lands beyond the continental shelf that cover almost half of the deep ocean's floor
Seamount	A huge underwater volcanic mountain that may emerge from the ocean surface as an island
Trench	A deep valley in the sea floor
Mid-Ocean Ridge	Chain of mountains that wind along all the world's major oceans
Alternative Energy	A source of energy other than the burning of fossil fuels
Geothermal Energy	Earth's internal energy
Biomass	Energy from plant matter or animal waste
Wind Energy	Energy from the wind's power
Solar Energy	Energy from the sun

Weather Unit	
Atmosphere	The blanket of gasses that surround the Earth
Insolation	The amount of the sun's energy that reaches the Earth at any given time
Troposphere	The layer of the atmosphere closest to the Earth's surface
Air Pressure	The force put on a given area by the weight of the air above it
Weather	What the lower part of the atmosphere at any given time
Barometer	A weather instrument that measures air pressure
Anemometer	A weather instrument that measures wind speed

Wind Vane	A weather instrument that measures where the wind is blowing form
Water Vapor	Water that is in the air in the form of a gas
Humidity	The amount of water vapor in the air
Evaporation	The slow change of water form a liquid to a gas in the water cycle
Condensation	The changing of water form a gas to a liquid in the water cycle
Relative Humidity	A comparison between how much water vapor in the air and how much the air can hold
Stratus Cloud	A cloud that forms in blanket like layers
Cumulus Cloud	A cloud that appear puffy and rises up form what looks like a flat bottom
Cirrus Cloud	A cloud high in the sky that has a feather like shape and created form ice crystals
Cumulonimbus Cloud	A cloud that produces sever weather
Fog	A cloud at ground level
Precipitation	Any form of water particles that fall from the atmosphere and reaches the ground
Wind	Air that moves horizontally
Convection Cell	A circular pattern of air rising, air sinking, and wind
Sea Breeze	Wind that blows from the sea to the land
Land Breeze	Wind that blows from the sea to the land
Coriolis Effect	The curving of the path of a moving object caused by the Earth's rotation
Isobar	A line on a weather map connecting places with equal air pressure
Air Mass	A large region of the atmosphere where the air has similar properties throughout
Front	A boundary between air masses with different temperatures
Cold Front	A front where cold air moves in under a warm air mass
Warm Front	A front where warm air moves in over a cold air mass
Thunderstorm	The most common severe storm, formed in cumunlonimbus cloud

Tornado	A violent, whirling wind that moves across the ground in a narrow path
Hurricane	A very large, swirling storm with a very low pressure at the center
Storm Surge	A great rise of the sea along a shore caused by low air pressure
Climate	The average weather pattern of a region

Force and Motion Unit	
Force	A push or a pull exerted by one object on another, causing a change in motion
Inertia	The tendency of a moving object to keep moving in a straight line or of any object to resist a change in motion
Friction	A force that opposes the motion of one object moving past another
Speed	How fast that opposes the motion of one object moving past another
Velocity	The speed and direction of a moving object
Acceleration	Change in a velocity with respect to time
Balanced Forces	Forces that cancel each other out when acting together on a single object
Unbalanced Forces	Forces that do NOT cancel each other out when acting together on a single object
Action	The force one object applies to a second, as in Newton's third law of motion, which states "For every action there is an equal and opposite reaction"
Reaction	The force with which an object responds to an action, as in Newton's third law of motion
Work	The use of force to move an object a certain distance
Simple Machine	A machine with few moving parts, making it easier to do work
Lever	A simple machine made of a ridge bar and a fixed pivot point, called a fulcrum
Fulcrum	The pivot point of a lever
Effort Arm	The part of a lever that applies force to the resistance arm
Resistance Arm	The part of a lever that applies force to the load that the machine acts against
Gravity	The force of attraction between any two objects due to their mass

Weight	The force of attraction between any two objects due to their mass