Characteristics of Populations
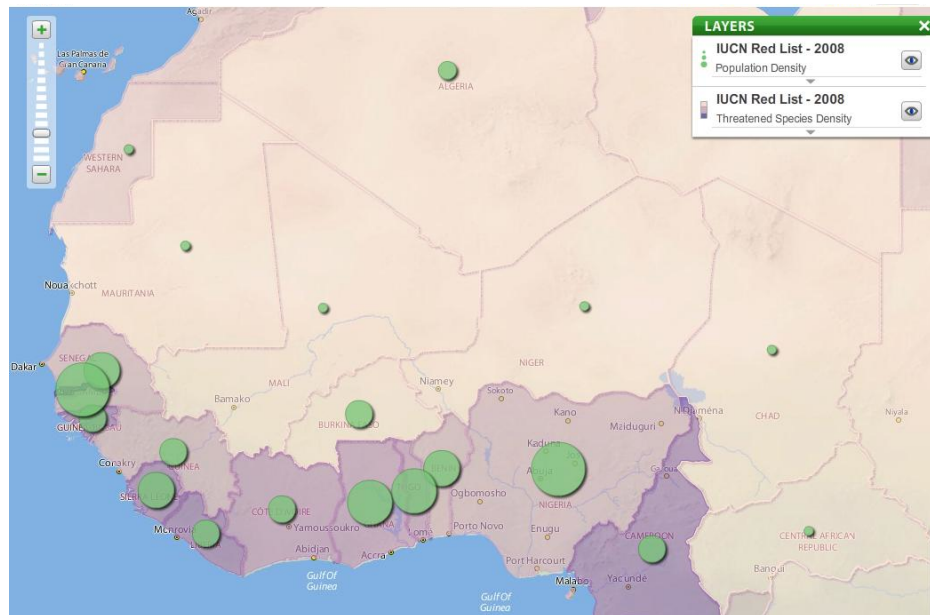
Population Size

- The total number of individuals in a population
- Population size constantly changes and is determined by many factors.

Population Density

- The number of individuals in a population that occupy a specific area.
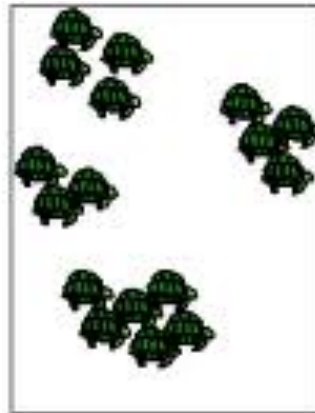
Population Spacing

- How a population is arranged in an area.
- Populations could be evenly spaced, clumped together, or randomly spaced.
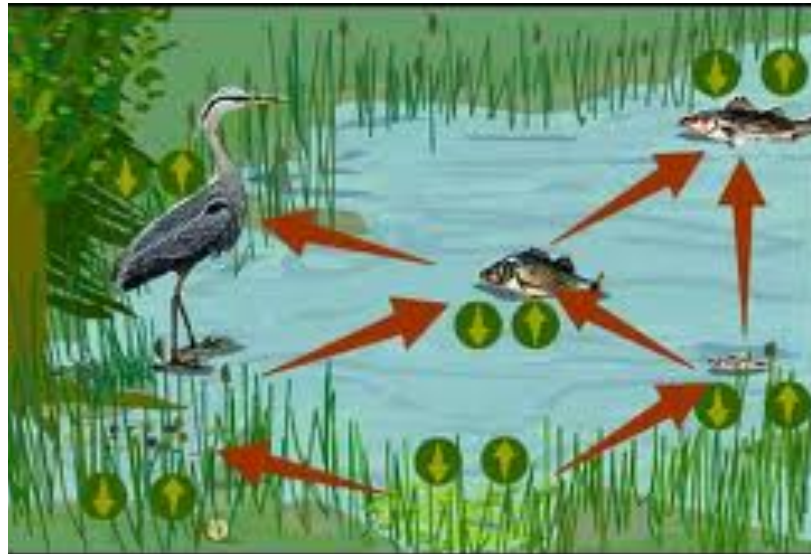

Regular Dispersion   Aggregated Dispersion   Random Dispersion

Limiting Factors

- Any abiotic or biotic factor that limits the size of a population.

- Examples: availability of food, amount of light, availability of water

Carrying Capacity

- The largest number of individuals in a species that an environment can support and maintain for a long period of time.

- If a population grows too large for an environment, some of the organisms will die.

Biotic Potential

- The maximum rate at which a population increases given ideal conditions – plenty of food, plenty of water, great weather, and no diseases or predators.
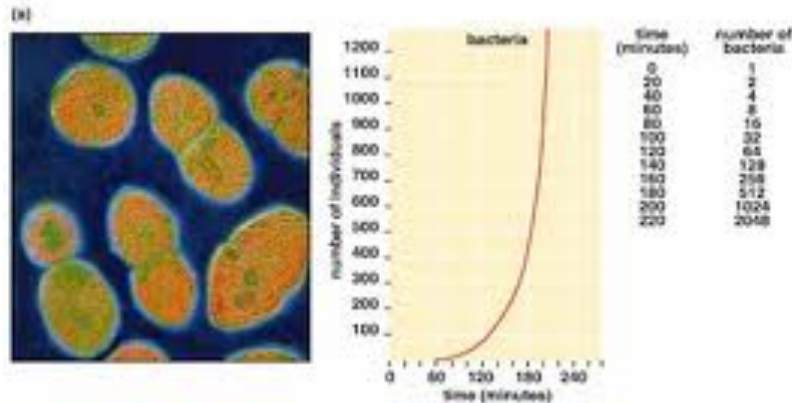
Symbiosis

- Any close interaction between two or more species.

- Commensalism benefits both species. Cattle egret pick insects off of cattle.

- Parasitism benefits one species and harms the other. Mosquitoes feed on blood from other organisms.

Predation

- One organism hunting, killing, and feeding off another organism.

- Examples: lions and antelopes, fox and hare, ladybugs and other insects

Niches

- The role or job of an organism
- examples: some birds eat seeds others eat insects, earthworms loosen and aerate the soil, lions control the antelope population

Habitats

- The place where an organism lives.
- Examples: worms live in soil, frogs live in ponds, deer live in forests