**March Notes: Day 3 Natural Selection**

Name: Period: Date:

**Aim: How did different species appear?**

**DO NOW: What is this cartoon telling us?**

**What is the definition of Evolution?**

 is the  in the  of a of  over .

Evolution is  the change of a .

Example: If a horse is born blue and it is the  horse in the herd that is blue;  evolution has occurred.

If a blue horse has an  to survive and  where the gene is passed on to its offspring; and over time  blue horses are born- that is .

**Factors that Force Evolution**

For evolution to occur certain factors are needed:

* Mutations – are created when the for a trait has at the level ( ).
* Could be in , design, body parts.
* The Environment –
* An increase in , types or can lead to an increase in .
* Change in can change which have an in a .
* – organisms that are isolated tend to mate which genetically individuals, causing changes in the population.
* Open spaces – organisms that have ranges of mates will tend to have s that are more .

**What is survival of the fittest? What is natural selection?**

Natural selection is the idea that ( , , ) will “ ” which organisms will live (the ) and which organisms will become (the ).

Natural selection has nothing to do with an organism or It has to do with how well an organism can to its .

Natural selection only deals with the traits, but also an organism’s . Those organisms whose behavior helps them will live to and that behavior.

**What are some ways selection can occur?**

**Predators**- Predators will usually those that are too , or . Thinning or removing traits ( ) from the while traits in the population.

**Climate change-** Individuals that do well in one may not do well in . If there is a in climate, only those that have traits, will survive.

**Competition**- When two or more population are for a , only those that are will prevail; while the others will either find other resources or out.

There is  **variation** in a population giving some individuals an advantage over the others.→ Those individual that survive to reproduce will produce more offspring are produced than will

→ The environment will cause organisms to  (for food/**resources**, to avoid predators, or for a mate) → Individuals that are **better**  to the environment (most **fit**) will survive and reproduce → Those better adapted organisms **pass on their**  to their offspring! Traits of those individuals that die before they reproduce will lose. ()