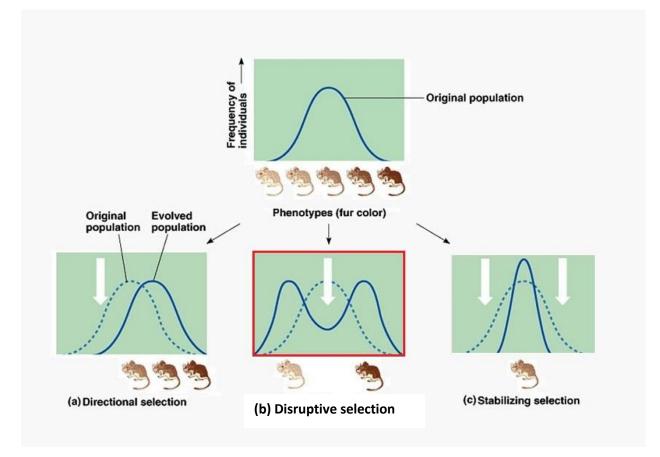
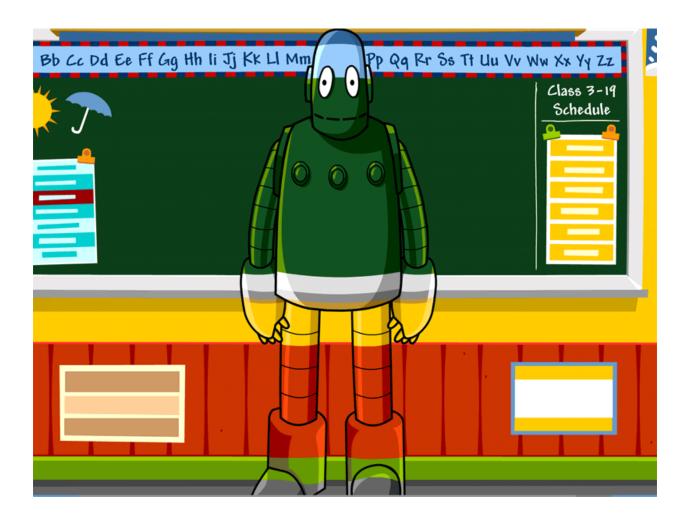
Station 1: Beaks

- 1. For this station, two of you are going to have scooping beaks (aka: spoons) and two of you will have point beaks (aka: tweezers).
- 2. First, dump out the beans. You have 20 seconds to collect as many beans as you can.
- 3. After the 20 seconds is up, count the amount of beans and record the number on your chart.
- 4. Put the beans away and pour out the pasta noodles. You have 20 seconds to collect as many pasta noodles as you can.
- 5. After the 20 seconds is up, count the amount of pasta you collected and record the number on your chart.
- 6. Answer the questions using the data you collected.



Station 2: Camouflage

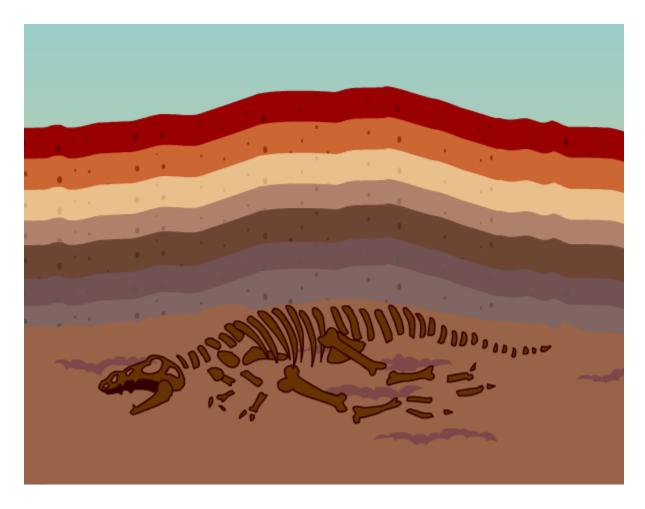
- 1. You have 30 seconds to look at the pictures and write down as many animals as you can find.
- 2. <u>Hide your answers from the other people at your table!</u>
- 3. After the 30 seconds is up, turn your page over and share your answers with your group and see who found the most animals.
- 4. Answer the corresponding questions.



Camouflage – Blending into surroundings using similar patterns, or colors

Station 3: Claws

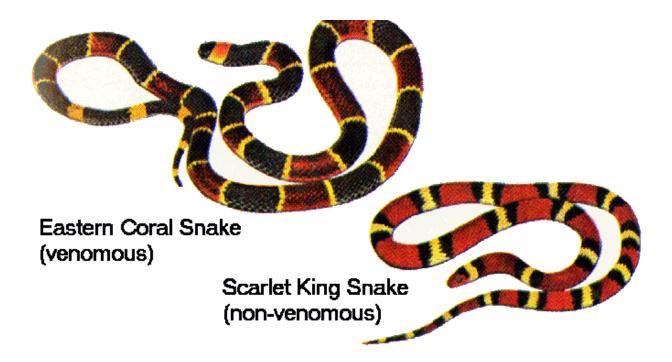
- 1. You have a bucket of dirt and there are beans in the dirt.
- 2. First, use your bare hands to find as many beans as you can in 20 seconds.
- 3. Then attach the "claws" (spoons) to your fingers using the tape at your lab table and dig for 20 seconds to see how many beans you can find.
- 4. Answer the following questions.



Fossils – Preserved remains of once-living organisms Evolution – Change over time in biological populations

Station 4: Mimicry

- 1. There are 5 cups of liquid in front of you--- each with a clear, sparkling liquid.
- 2. Your group only gets to pick <u>THREE</u> of the five cups. 4 of them are sparkling water and 1 of them is soda (Sprite).
- 3. After each cup you pick, one person needs to try and see if it is soda (Sprite).
- 4. Answer the corresponding questions.



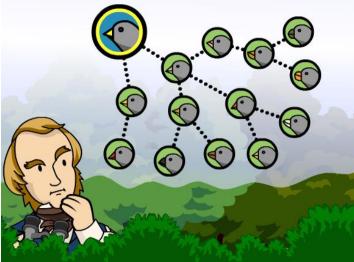
Mimicry – Close external resemblance (imitation) of organisms to one another

Station 5: Fur

1. Each person at the lab table is going to place their bare hand (one at a time) into the ice water and time how long you can keep your hand in there.

****REMOVE YOUR HAND AS SOON AS IT STARTS TO FEEL TOO COLD!***

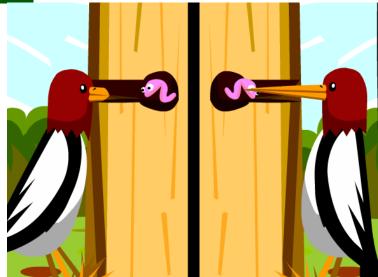
- 2. Next, put a glove on your hand and put it back in the ice water.
- 3. Time how long you can keep your hand in the bucket with the glove on.
- 4. Answer the corresponding questions.



Charles Darwin – Proposed that organisms have descended from a common ancestor, with changes, over long periods of time

Adaptation – Inherited characteristic that increases an organism's chance of survival

Natural Selection – The process where organisms are better adapted to their environment and tend to produce more offspring with favorable adaptations



Station 6: Genetic Drift: RANDOM Evolution

- 1. There are 20 (beads) fish in your pond. 13 of the same color that will represent Species #1 and 7 of a different color that will represent Species #2.
- 2. Species #1 blends into the environment better, and its main predator cannot see them as well.
- 3. However, a tornado comes through and kills 10 of the 20 fish. Close your eyes and randomly pick out 10 of the fish from your pond.
- 4. Answer the questions and fill out the chart for the new population.
- 5. Add the <u>same colored</u> fish for each fish that remains to bring the population back to 20 without changing the frequency.
- 6. A few months later another tornado comes through. Close your eyes again and pick out 10 random fish.
- 7. Answer the questions and fill out the chart for the new population.
- 8. Add the same colored fish for each fish that remains to bring the population back to 20 without changing the frequency.
- A few months later, a drought occurs drying up part of the pond killing the fish in that location. Close your eyes again and pick out 10 fish.
- 10. Fill out the final chart and answer the corresponding questions.

