

## Extension: Evolutionary Evidence

**Introduction:** The Theory of Evolution is a well-supported scientific theory that provides a basis for modern biology. As with all scientific theories, it is subject to change as new evidence is found. One of the main ideas of evolution is that natural selection changes a species over time. A single organism doesn't change in its lifetime but its offspring may be slightly different and over time the differences add up and the species evolve into new forms. Scientists have debated how long it takes a species to evolve and agree that some species have changed very little over time but others seem to have changed quite rapidly. In this activity you will read scientific articles that scientists have written to share their studies with other scientists and the public. You analyze their methods to see if they seem reliable and if the data is valid and repeatable.

### Procedures:

1. Sit with the group your teacher assigns. Read the article and underline where you see evidence of the scientific methods used in the study and the conclusions made from the data.
2. Discuss your findings with your group and summarize them in your data table.
3. Find someone who has read a different article and share your findings with each other, continue until you have talked to someone for each article.
4. Answer the questions below.

### Data:

Article #	Organism	Scientific methods	Conclusions
1			
2			
3			

<b>4</b>			
<b>5</b>			

### **Analysis**

1. What scientific methods were the same in each study?

Different?

2. How were the conclusions similar?

Different?

3. Choose a position to take concerning evolution and write a paragraph with this topic sentence:  
Recent studies in evolution (provide/do not provide) compelling evidence for evolutionary theory.  
Provide 3 pieces of data and explain why they support or do not support the evolutionary theory.