



LIVING DINOSAURS: FACT OR FICTION?

INTRODUCTION

If you have seen the movie *Jurassic Park*, you may remember that a scientist claimed that modern birds are actually living dinosaurs. The film is science fiction, but what about the scientist’s claim? This handout will test your knowledge about the evolutionary relationship between birds and dinosaurs and other facts about these animals.

PROCEDURE

1. Read the statements in Table 1 before watching the short film *Great Transitions: The Origin of Birds* (<http://www.hhmi.org/biointeractive/great-transitions-origin-birds>). Discuss each statement with a partner and decide whether the statement is true or false. In the column labeled “before,” circle either the T or F to indicate your choice. (You are not expected to know all the answers at this point; just make your best guess.)
2. After watching the film, discuss each statement again with your partner. In the column labeled “after,” circle either the T or F to indicate your choice.

Table 1. Statements about dinosaur and bird evolution.

| Before | After | Statement |
|--------|-------|--|
| T / F | T / F | 1. The discovery of the fossil <i>Archaeopteryx</i> provided evidence that birds evolved from mammals. |
| T / F | T / F | 2. Flight evolved once in the history of life—in birds. |
| T / F | T / F | 3. All dinosaurs were large and slow moving. |
| T / F | T / F | 4. Like birds, some dinosaurs laid eggs and cared for their young. |
| T / F | T / F | 5. The skeleton of a <i>T. rex</i> has many similarities to the skeleton of a chicken. |
| T / F | T / F | 6. The fossil record shows that some dinosaur species had feathers nearly identical to those found on birds today. |
| T / F | T / F | 7. Birds evolved feathers on wings so that they could fly. |
| T / F | T / F | 8. <i>Archaeopteryx</i> is the direct ancestor to all living birds. |
| T / F | T / F | 9. The first birds appear in the fossil record about 66 million years ago after the extinction of the dinosaurs. |
| T / F | T / F | 10. Dinosaurs are alive today. |

EXPLANATIONS

After completing the table, write one or two sentences to explain your answer to each statement. Include any evidence from the film that supports your answer. If your answer changed after watching the film, explain what caused you to change your mind.

1. The discovery of the fossil *Archaeopteryx* provided evidence that birds evolved from mammals.

2. Flight evolved once in the history of life—in birds.

3. All dinosaurs were large and slow moving.

4. Like birds, some dinosaurs laid eggs and cared for their young.

5. The skeleton of a *T. rex* has many similarities to the skeleton of a chicken.

6. The fossil record shows that some dinosaur species had feathers nearly identical to those found on birds today.

7. Birds evolved feathers on wings so that they could fly.

8. *Archaeopteryx* is the direct ancestor to all living birds.

9. The first birds appear in the fossil record about 66 million years ago after the extinction of the dinosaurs.

10. Dinosaurs are alive today.
