

**Biology Unit 4: Evolution
Evidence For Evolution Worksheet**

Name _____
Date _____ Per _____

The following questions cover ideas and concepts that we have learned throughout our study of evidence for evolution. Use your note sheet to answer each question thoughtfully.

1. Fruit fly embryos and frog embryos differ from each other more than frog embryos and human embryos do. What does this tell us about how the three species are related?

Frogs are more closely related to humans than fruit flies are to frogs. Amphibians and humans are animals, fruit flies are insects.

2. The mouthparts of an adult horsefly are modified for biting. The mouthparts of a mosquito are modified for piercing skin and sucking blood. Are the mouthparts of the two species homologous or analogous? Explain your answer.

The mouthparts are homologous...same structure, different function. Suggests that they shared a common ancestor.

3. Changes have occurred through time that have in some cases reduced or removed the function of some body structures or organs. These are called vestigial structures and the penguin's wings and leg bones or snakes are examples of this phenomenon. Listed below are several human vestigial structures. Suggest a possible function for each and explain why the structure may have become vestigial.

- a. Ex: Appendix
 - i. Probable Function: Used to digest plant material
 - ii. Why Don't We Use It Anymore: Omnivorous diet of humans make us rely less heavily on plants for nutrition.

- b. Wisdom Teeth
 - i. Function:
 - ii. Why Vestigial:

- c. Coccyx (Tail Bone)
 - i. Function:
 - ii. Why Vestigial:

Answers will vary...

- d. Muscles That Move Ears
 - i. Function:
 - ii. Why Vestigial: