

Choose the answer which best completes the following statements or answers the following questions. (3 pts. @) Place the answers to these questions on your own lined paper.

1. Darwin believed that evolution took place:
1. Gradually, in small steps 2. Through the appearance of radically new types
3. Only in the distant past 4. In short bursts
2. Which statement is not consistent with Darwin's theory of natural selection?
1. Limited resources put limits on population growth.
2. Some members are more adapted to the rigors of competition.
3. There is no variation in individuals. 4. All populations tend to overproduce.
3. The structural similarities between the flippers of whales and the arms of humans are used to show that the:
1. Whales evolved from the human species.
2. Whales are older than the human species.
3. Human species and whales have a common ancestry.
4. Human species began life in the oceans.
4. What do we call structures that perform a similar function but arise from different ancestral traits? 1. Analogous structures 2. Neutral substitution
3. Homologous structures 4. Species richness
5. "Differential success in reproduction" is just another way of saying
1. genetic drift 2. mutation 3. natural selection 4. recombination
6. The idea that organisms are able to pass along characteristics acquired during their lifetime is most closely associated with: 1. Lamarck 2. Mendel 3. Lyell 4. Darwin 5. Wallace
7. Lamarck's contribution to the theory of evolution was the concept of
1. natural selection. 2. geographic distribution of organisms
3. mutation 4. catastrophism. 5. inheritance of acquired characteristics.
8. According to Lamarck, traits, such as large muscles, that are acquired over an individual's lifetime: 1. are acted on by natural selection
2. are the result of a change of alleles 3. cannot be passed on to offspring
4. can be passed on to offspring
9. According to Darwin, what caused species to change over time?
1. Natural selection 2. Inheritance of acquired traits 3. Use and disuse
4. Lamarckian inheritance
10. The oldest fossils usually 1. contain more radioactive isotopes than younger fossils
2. are found in sediments from the Cenozoic era
3. are found in the deepest strata 4. are found above younger fossils
5. have the longest half-lives