Biology 0861 **Evolution Assignment** Name\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Due: Tuesday, January 27 2015

Winter 2015

1. **Using your own words** ( do not copy word for word from the textbook!)**summarize** the main ideas of Darwin’s Theory. ( 5 marks)

2. How does Darwin’s principle of descent with modification explain the

 characteristics of today’s species? ( 2 marks)

3. What are homologous structures? ( 1 mark) Give 2 different examples of such

 structures ( 2 marks)

4. Fitness is a result of ( 1 mark)

1. adaptations
2. homologies
3. common descent
4. variation.

5. Using the Galapagos finches as an example, explain how isolation of groups can

 be involved in speciation. ( 3 marks)

6. Explain how the Galapagos finches may have evolved? ( 5 marks)

7. copy question 9-10 p 415 text.

9. What is microevolution? (1 mark) What is macroevolution? (1 mark)

10. Sedimentary rocks form when layers of small particles are compressed ( 1

 mark)

1. in the atmosphere.
2. in a snow field.
3. in mountains.
4. under water.

11. Briefly describe each of the 6 important topics in macroevolution discussed on

 pages 435-440 of textbook. ( 3 marks)

12. In the space below using specific examples (of your choice) explain the following statement: (8 marks)

 " The relationship between adaptation and natural selection does not go both ways. Whereas greater relative adaptation leads to natural selection, natural selection does not necessarily lead to greater adaptation."