Biology 102 Assignment Five

1. Why is it more accurate to define the biosphere as the global ecosystem rather than the global community?

2. Why does the set of evolutionary adaptations characterizing a species tend to limit the geographic distribution of that species?

3. Why does sewage cause algal blooms in lakes?

4. What is the relationship between a population and a species?

5. Why is a fire in a pine forest likely to destroy mature trees if it occurs in an area that has been "protected" from fire for decades?

6. Why is the transfer of energy in an ecosystem referred to as *energy flow* rather than *energy cycling*?

7. Why is a pound of beef so much more expensive than a pound of corn?

8. Why does the demand for meat tend to drive up the prices of produce also, particularly grains?

9. What is an exotic species?

10. Why is the biodiversity crisis relevant to human welfare?

11. What would happen to a population if it exceeds its carrying capacity?

12. What is *succession*, and why does it occur?

13. What does the *competitive exclusion principle* imply about coexisting species?

14. What is aggressive mimicry?

15. What makes the flow of energy through ecosystems fundamentally different from the flow of nutrients?

16. What is meant by a carbon dioxide *sink*?

17. What is causing acid rain?

18. Why can eutrophication of lakes by humans be a harmful activity?

19. Where are most of the nutrients in a tropical rainforest concentrated?

20. What are the implications of #19 on farming and lumber industries in tropical countries?