

Environmental Issues Final Exam Study Guide

Chapter 1, Science and the Environment, p. 4

1. What are some results of the Industrial Revolution?
2. List the fields of Environmental Science:
3. What is biodiversity? Why should loss of biodiversity be of concern to humans? Why is biodiversity so important to ecosystems?
4. Describe what a sustainable world would look like:
5. What is an ecological footprint?
6. Compare and contrast developed and developing nations.

Chapter 3, The Dynamic Earth, p. 62

7. List the layers of the atmosphere. Where is the ozone layer located?
8. What is the greenhouse effect? What role does it play in the atmosphere?
9. List places where freshwater is found on Earth. Where is a majority of it stored? What is a tributary? What is an estuary?
10. Define open and closed systems. Which one would describe the Earth? Which one would describe matter?
11. List examples of non-renewable resources and renewable resources:
12. List examples of natural resources:

Chapter 4, The Organization of Life, p. 98

13. List examples of biotic and abiotic factors:

14. What role does the sun play in ecosystems?

15. Define the following terms:

Artificial Selection:

Selective Breeding:

Coevolution:

Resistance:

Chapter 5, How Ecosystems Work, p. 124

16. Define the role that each of the following organisms play in ecosystems:

Decomposers:

Herbivores:

Omnivores:

Carnivores:

Consumers:

17. What is a pioneer species? Give an example of one found in primary succession:

18. What is nitrogen fixation?

19. What role does fire play in ecosystems?

20. How are the nitrogen and phosphorus cycles effected by the use of fertilizers?

21. What is a climax community?

Chapter 6, Biomes, p. 152

22. Describe where savannahs are found, what they look like and what animals are found in them:

23. Describe where deserts are found, what they look like and what animals are found in them:

24. How do temperature and precipitation affect the different biomes?

25. What is an adaptation? What are some adaptation of plants and animals?

26. What are some threats to tropical rainforests? Where are then located? What kind of species diversity do they have? What is the extinction rate like in this part of the world?

Chapter 7, Aquatic Ecosystems, p. 184

27. What are some environmental functions of wetlands?

28. Where does most ocean pollution come from? What causes most coastal pollution?

Chapter 8, Understanding Populations, p. 210

29. What is population density?

30. Describe and give examples of the following relationships between species:

Parasite and host:

Mutualism:

Predator and Prey:

Commensalism:

Competition:

Chapter 9, Understanding Human Population, p. 234

31. What is an age structure diagram?

32. What are some reasons birth rates have declined worldwide?

33. What is the Earth's population estimated to be at in the year 2050?

34. What are some diseases that are spread through unsafe drinking water?

Chapter 10, Biodiversity, p. 258

35. What is an endangered species? List some examples:

36. How many species are estimated to be living on earth today?

37. What is the Endangered Species Act of 1973?

38. List some major human causes of extinction:

39. What are some areas in the United States that have the highest levels of biodiversity?

Chapter 20, The Environment and Human Health, p. 548

40. What are some natural causes of pollution?

41. What are some sources of air pollution?

42. How are most infectious diseases transmitted?