

Name \_\_\_\_\_ Date \_\_\_\_\_

## Ecology- Chapter 14 Test (100 points)

***Good Luck!!***

Multiple Choice (2 points each)

\_\_\_\_\_1. Which of the following is *not* an environmental effect of deforestation?

- a) Reduction of wildlife habitat
- b) Soil erosion
- c) Loss of topsoil
- d) Re-establishment of trees

\_\_\_\_\_2. Which of the following is an example of land used as a protected area to preserve the scenery and ecosystems?

- a) Grand Canyon National Park
- b) Great Basin
- c) Great Plains
- d) Rocky Mountains

\_\_\_\_\_3. The National Farmland Protection Program was designed to

- a) Protect farmland from being overtaken by natural grasses and weeds
- b) Protect farmland from damage by wild grazing animals that are destroying crops
- c) Protect farmland from being developed
- d) Protect farmland from environmental damage from pollution

\_\_\_\_\_4. Which of the following has not resulted from urban sprawl?

- a) suburbs
- b) overgrazing
- c) Loss of farmland
- d) Traffic congestion

\_\_\_\_\_5. Which of the following most effectively allows forests to recover from tree harvesting?

- a) Cutting only medium-sized or mature trees
- b) Cutting all of the trees and then replanting the area with seedlings

- c) Allowing the forest to reseed itself
- d) Cutting only young trees and then replacing them with seedlings

\_\_\_\_\_6. Eliminating invasive plants and replacing them with native plants is one aspect of

- a) Urban management
- b) deforestation
- c) range improvement
- d) overgrazing

\_\_\_\_\_7. Where do most Americans live?

- a) In urban areas
- b) On producing farms
- c) In rural areas
- d) There is an equal distribution of people across the land

\_\_\_\_\_8. Which of the following is a side effect of heat islands?

- a) drought
- b) lower temperatures
- c) lower temperatures and drought
- d) overgrazing

\_\_\_\_\_9. Which of the following is an example of how people use land?

- a) To harvest wood
- b) To grow crops
- c) To preserve native species
- d) All of the above

\_\_\_\_\_10. Traffic jams, substandard housing, and polluted air and water can be caused by rapid growth in cities, a phenomenon known as

- a) urbanization
- b) urban sprawl
- c) urban crisis
- d) infrastructure

\_\_\_\_\_11. What can be done to sustain the productivity of rangeland?

- a) Limit herd size

- b) Eliminate invasive plants
- c) Leave the land unused for a time.
- d) All of the above

\_\_\_\_\_12. An important environmental benefit of all open spaces in cities includes

- a) Contamination of water sources by runoff of soil and animal wastes
- b) Hotter, humid summers due to evaporation of water from plant leaves
- c) The improvement in air quality resulting from filtering of pollutants by plants
- d) All of the above

\_\_\_\_\_13. Deforestation is an especially serious problem in tropical rain forests because

- a) Farmers must repeatedly clear additional forest area to obtain land that can support crops
- b) It takes so long for the replacement seedlings to reach maturity due to the hot climate
- c) They are located in developed nations with high per person resource consumption
- d) The downed trees are left to rot, damaging the soil

\_\_\_\_\_14. Heat islands affect local

- a) Weather patterns
- b) Water levels
- c) Traffic patterns
- d) Harvest patterns

\_\_\_\_\_15. In 1870, the first national park established to protect and preserve the land for future generations was

- a) Grand Canyon
- b) Yosemite
- c) Yellowstone
- d) Death Valley

\_\_\_\_\_16. Given that most people live in urban areas, why should rural areas be preserved?

- a) They provide crucial infrastructure
- b) They provide ecological services
- c) They contain greenbelts
- d) None of the above

\_\_\_\_\_17. The designation of wilderness areas

- a) Guarantees unrestricted public access.
- b) Historically forbade mining
- c) Allows only limited development
- d) Provides for protected habitats

\_\_\_\_\_18. Why is it important to preserve farmland?

- a) Farmland provides an important oxygen source for urban areas
- b) Farmland moderates the temperature of urban areas
- c) Farmland provides crops and fruits to support urban and rural populations
- d) All of the above

\_\_\_\_\_19. Which of the following is true of land-use plans?

- a) Developers must prepare detailed reports assessing the environmental impact of their projects
- b) The public often has input in land-use plans
- c) Projects in environmentally sensitive areas may be hotly debated
- d) All of the above

\_\_\_\_\_20. An area prone to landslides is an example of

- a) Rangeland
- b) Open space
- c) Rural land
- d) Marginal land

Matching (2 points each) \_\_\_\_\_

**Urban Crisis**

**Overgrazing**

**Ecosystem Services**

**Wilderness Area**

**Urban Sprawl**

**Selective Cutting**

**Deforestation**

**Urban area**

**Infrastructure**

**Geographic Information System**

\_\_\_\_\_21. Area with at least 2,500 people and has a governing body

\_\_\_\_\_22. Rapid expansion of a city into the surrounding countryside

\_\_\_\_\_23. The result of cities growing so rapidly that they cannot provide services for all of their citizens

\_\_\_\_\_ 24. Structures such as roads, schools, and power lines built by cities for public use

\_\_\_\_\_ 25. Land-use planning tool

\_\_\_\_\_ 26. Clearing trees without replacing them

\_\_\_\_\_ 27. Method of harvesting trees in which certain trees are removed

\_\_\_\_\_ 28. Excessive use of a grazing area

\_\_\_\_\_ 29. Resources provide by natural or artificial ecosystems

\_\_\_\_\_ 30. Area where the land and its ecosystems are protected from exploitation

Short Answer (5 points each)

31. Explain consequences of an inadequate urban infrastructure.

32. Identify an advantage of clear-cutting method for harvesting trees.

33. Identify a disadvantage of clear-cutting method for harvesting trees.

34. Compare and contrast well-managed rangeland with poorly managed rangeland.

35. Name the 6 different categories of land use.

36. Name three examples of Ecosystem Services.

Please use the following graph for questions 37-38.

37. Look for patterns in the data above. What general statement can be made about the change over time in the percentage of forest cleared in the four countries?

38. Refer to the graph. During the 1987-88 time periods, which country shows the greatest percent of forest loss? Explain your answer.