**Name:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Quiz: Sustainability, Ecological Footprint, and Water Quality**

**Multiple Choice: Read each question carefully and select the best response.**

1. Sustainability is the ability to meet a community’s present needs without compromising the ability of future generations to meet \_\_\_\_\_\_\_\_\_\_\_ needs.
   1. Other Communities
   2. Their own
   3. Both
   4. None of the above
2. The 3 Pillars of Sustainability include
   1. Social, Industrial, Environmental
   2. Social, Industrial, Economic
   3. Economic, Environmental, Social
   4. Industrial, Environmental, Social
3. Which of the following is an example of a renewable resource?
   1. Solar Power
   2. Wind Power
   3. Both A and B
   4. Neither A or B
4. One way to insure Environmental Sustainability is to…
   1. Harvest renewable resources more quickly than they can regenerate.
   2. Produce waste more quickly than is can decompose.
   3. Use non-renewable resources instead of renewable resources.
   4. Develop renewable resources as nonrenewable resources are being depleted.
5. Problems such as war, poverty, injustice, and low education rates are symptoms of which pillar of sustainability?
   1. Economic
   2. Environmental
   3. Social
   4. Industrial
6. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ sustainability is the ability of an economy to support a defined level of economic production indefinitely.
   1. Economic
   2. Environmental
   3. Social
   4. Industrial
7. To be economically sustainable, a business must be \_\_\_\_\_\_\_\_\_\_\_\_\_.
   1. Clean
   2. Fair to its employees
   3. Profitable
   4. In business for more than 5 years
8. All of the following are calculated when determining an ecological footprint **except** \_\_\_\_\_\_\_\_\_\_\_.
   1. Cropland
   2. Built-up land
   3. Cost of resources
   4. Carbon Demand
9. All of the following are ways to reduce the ecological footprint **except** \_\_\_\_\_\_\_\_\_\_\_.
   1. Eat more meat
   2. Reduce your waste
   3. Drive less
   4. Use renewable resources
10. The chemical, physical, biological, and radiological characteristics of water refers to \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_?
    1. Salinity
    2. pH
    3. Water Quality
    4. Turbidity
11. The most common standards used to assess water quality relate to \_\_\_\_\_\_\_\_\_\_, \_\_\_\_\_\_\_\_\_\_\_, and \_\_\_\_\_\_\_\_\_\_\_\_.
    1. Health of ecosystems, safety of human contact, and sewage.
    2. Health of ecosystems, safety of human contact, and drinking water.
    3. Precipitation, pollution, and drinking water.
    4. Health of ecosystems, pollution, and drinking water.
12. Nitrogen, Phosphorus, and \_\_\_\_\_\_ are the key standards in water quality testing.
    1. pH
    2. annual rainfall
    3. both a and b
    4. neither a or b
13. \_\_\_\_\_\_\_\_\_\_ is used in agriculture to grow crops and to maximize farming output.
    1. Salt
    2. Sediment
    3. Hydrogen
    4. Nitrogen
14. \_\_\_\_\_\_\_\_\_\_ and \_\_\_\_\_\_\_\_\_\_\_ can cause an overstimulation of growth in aquatic plants and algae. This may lead to decreased light reaching deeper water and the removal of oxygen from the water.
    1. Carbon and Nitrogen
    2. Carbon and Phosphorus
    3. Nitrogen and Oxygen
    4. Nitrogen and Phosphorus
15. \_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_ is a major contributor of phosphorus in streams.
    1. Soil erosion
    2. Carbon Dioxide
    3. Pollution from automobiles
    4. Dead organisms
16. pH is a measure of how acidic/basic water is. The range goes from 0-\_\_\_.
    1. 16
    2. 7
    3. 14
    4. 12
17. A pH reading of less than 7 is considered \_\_\_\_\_\_\_.
    1. Acid
    2. Neutral
    3. Base
    4. None of the above
18. Dissolved Oxygen is a measure of how much oxygen is dissolved in the water. \_\_\_\_\_\_\_\_ and \_\_\_\_\_\_\_\_\_\_ water is capable of holding more dissolved oxygen.
    1. Warm and Moving
    2. Cold and Moving
    3. Warm and Stagnant
    4. Warm and Salty
19. \_\_\_\_\_\_\_\_\_\_\_ is the measure of relative clarity of a liquid.
    1. Salinity
    2. Turbidity
    3. pH
    4. Temperature
20. \_\_\_\_\_\_\_\_\_\_\_ is the process by which a body of water becomes enriched in dissolved nutrients (such as phosphates) that stimulate the growth of aquatic plant life usually resulting in depletion of dissolved oxygen.
    1. Fertilizer
    2. Climate Change
    3. Pollution
    4. Eutrophication

Short Answer: Answer the following questions with 1-3 complete sentences.

1. Why is it important to monitor rivers and streams that are located near farms and livestock?
2. Identify the 3 pillars of Sustainability.
3. What are some of the problems that decrease social sustainability?
4. What determines if an organization, business, or country is sustainable?
5. Identify 1 issue that faces each of the 3 pillars of sustainability (Social, Environmental, and Economic).