

Name:

Date:

Class:

## Lesson 15.5: Conservation Practices in Agriculture

### Know and Understand

Answer the following questions using the information provided in this lesson.

1. *True or False?* Water is the most important nutrient for both livestock and crop production. (15.5.1)

Answer:

2. Which of the following is not a method used by farmers to diminish erosion caused by rain and other forms of precipitation? (15.5.1)
  - A. Leaving crop residue on fields
  - B. Planting crops so rows allow rainwater to flow downhill quickly
  - C. Planting cover crops
  - D. Planting grassed waterways

Answer:

3. Why is crop residue left on a field after harvest? (15.5.1)
  - A. Dry plants break the fall of raindrops on the soil.
  - B. Plants will sprout and grow next season.
  - C. Decomposition of these materials will add nutrients to the soil.
  - D. Both A and B.
  - E. E. Both A and C.

Answer:

4. How does slowing the pace of water across a field help prevent soil erosion? (15.5.1)
  - A. Slow water is warmer than fast water and is absorbed quickly by plants.
  - B. Slowly moving water enables bacteria to grow, which reduces erosion.
  - C. Slow water keeps rocks and small pebbles in place to reduce erosion.

D. Slow water has less energy to dislodge soil particles than fast-moving water does.

Answer:

5. Which of the following tillage methods are used to prevent soil erosion? (15.5.1)

A. Conventional tillage

B. No-till

C. Grassed waterways

D. Ripper tillage

Answer:

6. What conservation purpose do windbreaks serve? (15.5.1)

A. They create a natural barrier to slow the flow of wind.

B. Windbreak trees have roots that prevent wind erosion.

C. Windbreaks screen rivers from farmland.

D. They provide natural scenery for drivers passing by fields.

Answer:

7. Which pollutants are important to control in agriculture? (15.5.2)

A. Soil particles

B. Fertilizers

C. Manure

D. All are correct.

Answer:

8. What is the least expensive method of water pollution abatement? (15.5.2)

A. Grassed waterways

B. Following chemical and fertilizer label directions

C. Applying chemicals right before rainstorms

D. Buffer strips

Answer:

9. How can agriculturists minimize the pollution of waterways? (15.5.2)

- A. Wise application of pesticides and fertilizers
- B. Buffer strips
- C. Riparian zones
- D. All are correct.

Answer:

10. How does a riparian zone protect surface water from pollution? (15.5.2)

- A. Plants reduce erosion by increasing the flow of water
- B. Plant roots absorb water and nutrients
- C. Plants shade and cool water
- D. Riparian zones create a dam to stop runoff water

Answer:

11. Why is good waste management essential for CAFOs? (15.5.2)

- A. The large number of livestock in a small space produces large quantities of manure.
- B. CAFOs are often located near rivers and streams, which are easily polluted.
- C. CAFOs use a lot of water that can carry waste into the environment.
- D. Waste management in CAFOs is of no consequence.

Answer:

12. Which application of manure reduces the likelihood of it washing off fields and into waterways? (15.5.2)

- A. Subsurface injection
- B. Spreading manure on top of the soil
- C. Irrigating farm fields with a slurry of manure
- D. None of the above

Answer:

13. What must farmers monitor when irrigating a crop? (15.5.3)

- A. Weather
- B. Soil conditions
- C. Plants' water needs
- D. All are correct.

Answer:

14. Which type of irrigation floods fields? (15.5.3)

- A. Furrow
- B. Surface
- C. Sprinkler
- D. Drip

Answer:

15. Which type of irrigation system has the lowest environmental impact? (15.5.3)

- A. Surface
- B. Sprinkler
- C. Drip
- D. All are about the same impact.

Answer:

16. What are two types of sprinkler irrigation systems? (15.5.3)

- A. Drip and pipe
- B. Center-pivot and end line
- C. Center-pivot and wheel line
- D. Furrow and surface

Answer:

17. Which of the following statements is not true about tailwater? (15.5.3)

- A. It is most commonly associated with flood irrigation systems.
- B. Reclaimed water must be treated before it is released to nonagricultural land,
- C. It is gathered from one or more points at the top edge of a field.

D. Farmers manage irrigation systems to reduce tailwater.

Answer:

18. Which federal agency is at the front line of agricultural soil and water conservation? (15.5.4)

- A. EPA
- B. NRCS
- C. SWCD
- D. Farm Bureau

Answer:

19. Which soil and water management organization monitors water quality in lakes and streams? (15.5.4)

- A. EPA
- B. NRCS
- C. SWCD
- D. Farm Bureau

Answer:

20. Which organization helps with agricultural literacy efforts around soil and water conservation? (15.5.4)

- A. EPA
- B. NRCS
- C. SWCD
- D. Farm Bureau

Answer: