

Assessment

Quiz

Section: What Causes Air Pollution?

MATCHING

In the space provided, write the letter of the term or phrase that best matches the description.

- | | |
|--|---------------------------------|
| _____ 1. have no emissions from tailpipes or gasoline | a. primary pollutant |
| _____ 2. results from chemical reactions involving sunlight, air, exhaust, and ozone | b. ZEVs |
| _____ 3. scrubbers and electrostatic precipitators help industries meet the requirements of this | c. smog |
| _____ 4. put directly into the air by human activity | d. temperature inversion |
| _____ 5. a source of air pollution before modern times | e. Clean Air Act |
| _____ 6. atmospheric condition that traps pollution near the ground | f. sea-coal |

MULTIPLE CHOICE

In the space provided, write the letter of the term or phrase that best completes each statement or best answers each question.

- | | |
|--|--|
| _____ 7. Which is a secondary air pollutant? | _____ 9. Which device helps clean car exhaust? |
| a. ozone | a. electrostatic precipitator |
| b. carbon monoxide | b. scrubber |
| c. particulate matter | c. catalytic converter |
| d. nitrogen oxides | d. ZEV |
| _____ 8. Volatile organic compounds | _____ 10. Which pair below are the two main sources of air pollution in urban areas? |
| a. are tiny particles of liquid or solid matter. | a. vehicles, volcanoes |
| b. are produced by chemical interactions between sulfur and oxygen. | b. vehicles, industries |
| c. are an odorless, colorless poisonous gas. | c. industries, agriculture |
| d. are organic chemicals that form toxic fumes. | d. none of the above |

Quiz

SECTION: WHAT CAUSES AIR POLLUTION?

Matching

- | | |
|------|------|
| 1. b | 4. a |
| 2. c | 5. f |
| 3. e | 6. d |
| 4. a | |

Multiple Choice

- | | |
|------|-------|
| 1. b | 7. a |
| 2. c | 8. d |
| 3. e | 9. c |
| 4. a | 10. b |

SECTION: AIR, NOISE, AND LIGHT POLLUTION

Matching

1. d
2. c
3. e
4. b
5. a
6. f

Multiple Choice

7. d
8. b
9. a
10. a

SECTION: ACID PRECIPITATION

Matching

1. d
2. c
3. e
4. a
5. f
6. b

Multiple Choice

7. b
8. a
9. d
10. c

Chapter Test General

MATCHING

1. c
2. e
3. f
4. i
5. h
6. j
7. a
8. d
9. b
10. g

MULTIPLE CHOICE

11. b
12. a
13. d
14. c
15. a
16. a
17. b
18. d
19. c
20. a

Chapter Test Advanced

MATCHING

1. e
2. b
3. g
4. i
5. f
6. j
7. d
8. a
9. h
10. c

MULTIPLE CHOICE

11. a
12. d
13. c
14. c
15. a
16. b
17. d
18. b
19. c
20. d

SHORT ANSWER

21. The EPA has required the reduction of lead in gasoline, which has lowered lead pollution by 50 percent. Installing catalytic converters has reduced the amount of pollutants from tailpipe exhaust. By the year 2016, California Zero-Emission Vehicle Program requires 16 percent of vehicles sold in California to give off no emissions. Auto manufacturers are building prototype cars that produce fewer emissions (such as hybrids) or no emissions.
22. Students may describe three of the following: Chronic bronchitis—an inflammation of the bronchial tubes leading to persistent coughing and difficulty in breathing. Asthma—bronchial passages constrict and fill with mucus. Emphysema—air sacs lose their elasticity, causing difficulty in exhaling. Lung cancer—malignant disease that is linked to air pollution, although smoking cigarettes is the more common cause. Asbestosis—asbestos fibers cut and scar the lungs, causing difficulty in breathing.

PROBLEM SOLVING

23. 1,000 times more acidic