

## Environment Protection - 25 x 25 - Starting with Letters A to F

### Across

**1** Capable of decomposing under natural conditions. (13)

**5** A type of hydrocarbon, such as benzene or toluene, with a specific type of ring structure. Aromatics are sometimes added to gasoline in order to increase octane. Some aromatics are toxic. (9)

**8** The pressurized gas used to propel substances out of a container. (7)

**10** Hole made with drilling equipment. (4,4)

**12** Life or processes that require, or are not destroyed by, the presence of oxygen. (7)

**13** A control device that burns hazardous materials to prevent their release into the environment; may operate continuously or intermittently, usually on top of a stack. (5)

**15** A device that adds chlorine, in gas or liquid form, to water or

sewage to kill infectious bacteria. (11)

**17** A pipe with a valve at the lower end, used to remove slurry from the bottom or side of a well as it is being drilled, or to collect ground-water samples from wells or open boreholes. (6)

**19** A distinct and pure substance formed by the union of two or more elements in

definite proportion by weight. (8,8)

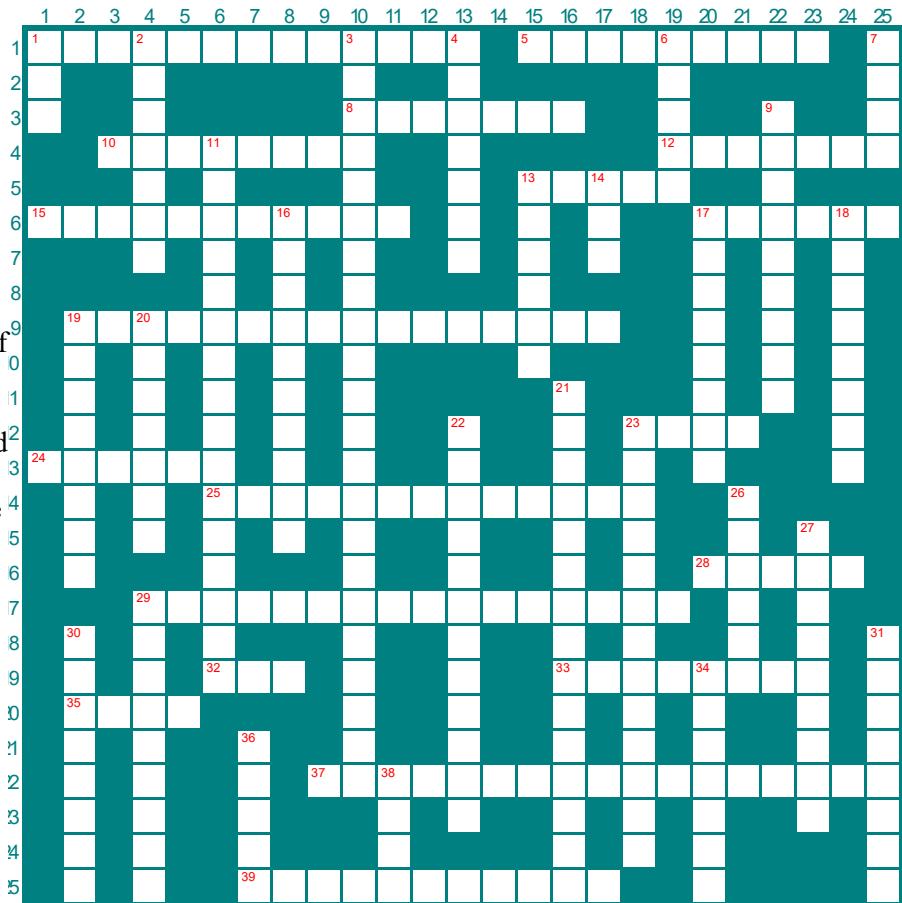
**23** A thick-walled container (usually lead) used to transport radioactive material. Also called a coffin. (4)

**24** To draw off the upper layer of liquid after the heaviest material (a solid or another liquid) has settled. (6)

**25** An agent that kills microbes. (13)

**28** A proliferation of algae and/or higher aquatic plants in a body of water; often related to pollution, especially when pollutants accelerate growth. (5)

**29** Conversion of coal to a gaseous product by one of several available technologies. (4,12)



- 32 The first chlorinated hydrocarbon insecticide chemical name Dichloro-Diphenyl-Trichloroethane) . It has a half-life of 15 years and can collect in fatty tissues of certain animals. EPA banned registration and interstate sale of XXX for virtually all but emergency uses in the United States in 1972 because of its persistence in the environment and accumulation in the food chain. (3)
- 33 Lakes and reservoirs that freeze over and normally go through two stratifications and two mixing cycles a year. (8)
- 35 The uranium-containing heart of a nuclear reactor, where energy is released. (4)
- 37 Animals, birds, fish, plants, or other living organisms threatened with extinction by anthropogenic (man-caused) or other natural changes in their environment. (10,7)
- 39 Injecting air or oxygen into an aquifer to strip or flush volatile contaminants as air bubbles up through the ground water and is captured by a vapor extraction system. (3,8)
- Down**
- 1 - A measure of the amount of oxygen consumed in the biological processes that break down organic matter in water. The greater the XXX, the greater the degree of pollution. (3)
- 2 A pesticide used on citrus fruits. (7)
- 3 Reduction of the net energy level and change in chemical composition of organic matter caused by microorganisms in an oxygen-free environment. (9,13)
- 4 The relationship of living things to one another and their environment, or the study of such relationships. (7)
- 6 Simple rootless plants that grow in sunlit waters in proportion to the amount of available nutrients. They can affect water quality adversely by lowering the dissolved oxygen in the water. They are food for fish and small aquatic animals. (5)
- 7 A clump of solids formed in sewage by biological or chemical action. Chemicals (coagulants) are added to the water to bring the nonsettling particles together into larger, heavier masses of solids called XXXX. (4)
- 9 An instrument to measure dosage; many so-called dosimeters actually measure exposure rather than dosage. (9)
- 11 The maximum amount of air polluting discharge legally allowed from a single source, mobile or stationary. (8,8)
- 13 Molds, mildews, yeasts, mushrooms, and puffballs, a group of organisms lacking in chlorophyll (i.e., are not photosynthetic) and which are usually non-mobile, filamentous, and multicellular. Some grow in soil, others attach themselves to decaying trees and other plants whence they obtain nutrients. Some are pathogens, others stabilize sewage and digest composted waste. (6)
- 14 The mineral content of a product remaining after complete combustion. (3)
- 16 The capacity of bases to neutralize acids. An example is lime added to lakes to decrease acidity. (10)
- 17 Mixed fresh and salt water. (8)
- 18 Wastewater--treated or untreated--that flows out of a treatment plant, sewer, or industrial outfall. Generally refers to wastes

- discharged into surface waters. (8)
- 19** An instrument used to measure radiation levels. (Use hyphen where necessary). (5-3)
- 20** Region of interaction between rivers and near-shore ocean waters, where tidal action and river flow mix fresh and salt water. Such areas include bays, mouths of rivers, salt marshes, and lagoons. These brackish water ecosystems shelter and feed marine life, birds, and wildlife. (7)
- 21** A highly adsorbent form of carbon used to remove odours and toxic substances from liquid or gaseous emissions. In waste treatment, it is used to remove dissolved organic matter from waste drinking water. It is also used in motor vehicle evaporative control systems. (9,6)
- 22** A chamber used to inject air into water. (8,4)
- 23** A rating of the purity of water based on a count of fecal bacteria. (8,5)
- 26** Crushed glass. (6)
- 27** A sequence of organisms, each of which uses the next, lower member of the sequence as a food source. (4,5)
- 29** The dissolution and wearing away of metal caused by a chemical reaction such as between water and the pipes, chemicals touching a metal surface, or contact between two metals. (9)
- 30** Microscopic living organisms that can aid in pollution control by metabolizing organic matter in sewage, oil spills or other pollutants. However, XXXXXXXX in soil, water or air can also cause human, animal and plant health problems. (8)
- 31** A test to determine the relative strength of a substance by comparing its effect on a test organism with that of a standard preparation. (8)
- 34** The relatively stable humus material that is produced from a composting process in which bacteria in soil mixed with garbage and degradable trash break down the mixture into organic fertilizer. (7)
- 36** The animal and plant life of a given region. (5)
- 38** A site used to dispose off solid waste without environmental controls. (4)