
Appendix A. Glossary

Abandoned Mine Drainage (AMD): this is a form of pollution that occurs when an abandoned mine fills with water. This water is able to pick up metals that were previously inaccessible to the water table before mining occurred. The metal-rich water can then leak out back into the environment and drastically impact any ecosystem it flows into.

Acidity: describes the amount of acid in a substance. The amount of hydrogen ions in said substance determines its acidity. For example, a substance with a high level of hydrogen ions is very acidic.

Alkalinity: the measurement of the acid-neutralizing capacity of a substance. Like acid, the amount of hydrogen ions in said substances determines its alkalinity. For example, a substance with a low level of hydrogen ions is very alkaline.

Anticline: upwards folds in the Earth's crust that extend from the surface. This geological feature is responsible for the formation of hills and mountains.

Aquifer: pockets below the water table that contain water within a permeable body of rock.

Biodiversity: a term that refers to the species and population sizes in an area. An area with good biodiversity would have sustainable populations of many different species.

Climate: the averages and patterns of weather over a long period of time.

Conventional Drilling: also known as traditional drilling, relies on a well's natural pressure to pump oil to the surface.

Deciduous forest: the predominant forest type in our area. This forest type is mainly composed of trees that lose their leaves in the fall.

Easement: a legal right to use another person's property.

Ecosystems: a community of organisms that live and influence each other in their environment.

Erosion: the process where rocks and soil are removed from one location and are deposited in another. This process can happen naturally but is often dangerously quickened by human influence.

Floodplains: natural areas of low-lying ground next to some stream segments that increase the stream's capacity to move water during periods of high flow.

Fragmentation: occurs when human made barriers split up a habitat and species are no longer able to cross into newly formed sections of a once continuous area. Roads, highways, agriculture and buildings can all result in fragmentation.

Greenhouse Gases: gases in the atmosphere that trap in solar radiation and reflects heat back to earth's surface.

Headwater Streams: streams that lack tributaries or "branches" and are the beginning source of water in a watershed.

Impaired: an area that is polluted and unable to support life at the same capacity it once could.

Invasive Species: a species that is non-native to an area and is likely to cause environmental or economic damage.

Macroinvertebrates: any animal or insect lacking a backbone that is large enough to see with the naked eye. They are common populations in streams and other bodies of water and are common prey for fish species.

Natural Heritage Area (NHA): designed areas of ecological importance that are protected by different environmental safeguards.

Nonpoint Source Discharge: these discharges are not regulated and enter a stream from multiple sources. This type of discharge can consist of abandoned mine drainage, agricultural runoff and stormwater runoff.

Permeability: the ability to be passed through by a liquid or gas. A material with high permeability can have a substance easily flow through it while a material with low permeability is less capable to have a substance flow through it.

pH: this is a scale ranging from 1-14 that helps determine the acidity of a substance. The lower a substance goes on this scale, the more acidic it is. Seven is considered a neutral point and is what clean water typically falls under. The higher end of the scale is considered basic and is where alkaline substances are found.

Point Source Discharge: discharges that enter a stream from a specific point. These types of discharges are typically managed through a provision of the Clean Water Act.

Precipitation: condensed atmospheric water vapor—i.e., rain, snow, fog, hail, etc.

Riparian Corridors: vegetative areas adjacent to streams. They have a huge impact on stream health and are important to aquatic and terrestrial life.

Runoff: water that is not absorbed into the ground. This water is a product of precipitation and runs along the surface until it empties into already existing waterways.

Sedimentation: the process where a sediment—typically composed of soil and rock—settles in a new area. This is often a product of erosion.

Septic System: underground wastewater treatment/containment structures. Septic systems are extremely common in rural areas and take the place of public centralized sewer systems.

Soil Series: a group of soils with similar profiles developed from similar parent materials and conditions.

Subsidence: the process by which land or buildings sink to a lower level. This can cause unreparable damage to a property.

Syncline: folds in the Earth's crust that dip away from the surface. This geological feature is responsible for the formation of valleys.

Topographic Features: a very broad classification that includes any and all geologic structures like hills, valleys, lakes, oceans, etc.

Tributaries: streams that flow into larger bodies of water.

Unconventional Drilling: is a newer and more technologically advanced form of drilling. This kind of drilling targets low permeability formations and uses pressure to create cracks for oil to pass through.

Weather: The short term, day to day, measurement of temperature, humidity, wind and precipitation.

Wetlands: areas of land that, for at least part of the year, are covered with water. These areas tend to have vegetation that is water tolerant and good at absorbing and filtering a stream's excess flow.

