

- **Aggregate** – Rocky material used as base course for roadway. Can be one of several types or classes, depending on where and how it will be used.
- **Aggregate size** – For aggregate testing, this is the smallest sieve that will pass at least 90 percent of the sample.
- **As-built drawings** – Notations that describe revisions to original project plans. Also called record drawings.
- **Backfill** – Granular material used in excavations for bridges, retaining walls, headwalls, culverts, and other structures.
- **Base course** – Roadway layer. Can be either the bottom or middle layer between the original ground and the surfacing. Consists of gravel and sand or mixed with asphalt.
- **Benchmark** – A stable, physical point that establishes vertical control during surveying. Examples of benchmarks are a length of reinforcing steel driven into the ground or a railroad spike driven into a utility pole, with the elevation of the point written on a witness stake. Usually required near major structures, special construction areas, or where terrain is rugged and preliminary benchmarks are difficult to reach.
- **Bituminous material** – Asphalt.
- **BLM** – United States Bureau of Land Management
- **BMP** – Best Management Practices relating to temporary pollution control and erosion control measures.
- **Borrow** – Material excavated from one area that will be used in another area.
- **Centerline** – The center of the road, which is shown on the plans and established in the field by the project survey crew.
- **Clearing and grubbing** – Cleaning a site to prepare it for construction. Involves removing debris, structures, shrubbery, trees, obstructions, and objectionable and unsuitable materials. May also involve handling and disposing non-hazardous and hazardous waste materials.
- **Cold milling** – Technique for removing asphalt or concrete pavement that may include base and sub-base material. Also called rotomilling.
- **Compacting** – Tightly compressing material for stability and strength.
- **Control points** – Semi-permanent survey markers set prior to construction that provide the basis of subsequent construction surveying or staking. Also known as reference points.
- **Control sheets** – Provide information about a construction location, such as control points.
- **Courses** – Layers of a roadway, such as, base or surfacing.
- **Crack and seat** – Roadway rehabilitation process that demolishes concrete pavement into pieces approximately 20 inches in size, then stabilizes the pieces by rolling or vibrating. Usually done with a guillotine-type hammer.

- **Culvert** – A type of drain used to pass runoff or other drainage under a roadway. Can be constructed of materials such as concrete, steel, or plastic. Common types of culverts include reinforced concrete pipe, corrugated metal pipe, metal arch pipe, and plastic pipe. Culvert ends may include end sections, headwalls, manholes, drop inlets, or riprap basins.
- **Deposit** – Source for aggregate, sometimes called an aggregate pit.
- **Downdrains** – Dindrains are drainage pipes that convey water down roadway slopes in a manner that prevents slope erosion. They allow drainage from fill embankments, benches in cut sections, and other steep or long slopes.
- **Eastings** – Survey identifiers in the east-west direction that measure an east-west direction from a defined location.
- **Edge lines** – Lines that mark the edges of a travelway.
- **Excavate** – Remove material.
- **FHWA** – United States Federal Highway Administration, a division of the Department of Transportation
- **Field books** – Books used to record survey and construction activities. Types of field books include compaction, sieve, concrete, and testing.
- **Foundation fill** – Replacement material for excavated material. Used to replace unsuitable material and establish a stable foundation for culverts, bridges, and other structures.
- **Global Positioning System (GPS)** – Surveying tool preferred because of its mobility and efficiency—only one or two people are required to perform the survey. The technology uses satellites, resulting in an extensive survey coverage area.
- **Grade** – Incline, slant, or slope of a roadway.
- **Grade stake** – See Redhead.
- **Grooving** – A method of finishing Portland Cement Concrete Pavement.
- **Guinea** – A small wooden stake used to show the contractor where survey information was taken and to identify where construction begins. They can also be used to reestablish catch points if slope stakes are accidentally removed or destroyed.
- **Lanyard** – Rope suitable for supporting one person. One harness end is fastened to a safety belt or harness and the other end is secured to a substantial object or a safety line.
- **Lifeline** – Rope, suitable for supporting one person, to which a lanyard or safety belt or harness is attached.
- **Location Project Number (LPN)** – The LPN identifies a specific geographical area – or control points – that the Location Division has surveyed.
- **Material site** – Source for aggregate.
- **Means and methods** – The means is the way the contractor physically controls the work and the method is the plan for how to control it.

- **Monuments/markers** – Used in surveying to identify property boundaries or to mark a specific survey area.
- **MSHA** – United States Mine Safety and Health Administration.
- **Network** – A chart of the critical path schedule.
- **NAQTC** – Nevada Alliance for Quality Transportation Construction
- **NGS** – United States National Geodetic Survey
- **Northings** – Survey identifiers in the north-south direction that measure a north-south direction from a defined location.
- **Nuclear density gauge** – Instrument for measuring the density of roadway material, such as base or asphalt pavement. Requires training and certification to operate, store, or transport.
- **Occupational dose** – Amount of radiation received by an individual during the performance of his duties. The dose is indicated by the Thermal Luminescent Dosimeter or Optically Stimulated Luminescent badges.
- **Optically Stimulated Luminescent (OSL) badges** – A badge that monitors occupational dose of radiation.
- **OSHA** – United States Occupational Safety and Health Administration.
- **PDDM** – NDOT Project Design Development Manual, sometimes referred to as Design Manual.
- **Phenolphthalein solution** – Chemical solution used to check uniformity of cement distribution in soil or aggregate.
- **Pipe jacking** – A technique for installing underground pipelines and culverts, usually concrete pipes, by jacking, or pushing, pipes through the ground.
- **Pit** – Source for aggregate.
- **Plantmix** – Mixing method that uses a mixing plant to combine aggregate, Portland cement, and water, or aggregate and asphalt. The material is then transported to the roadway for placement.
- **Portland cement concrete** – Mixture of aggregate, water, and Portland cement.
- **Portland cement concrete pavement (PCCP)** – Portland cement concrete that is used as a roadway paving surface.
- **Portland cement treated base** – Base material in which Portland cement is added for increased strength.
- **Protective blanket** – Type of erosion control that involves an asphaltic cover, which serves as a blanket to allow establishment of vegetation.
- **Pugmill** – Type of mixer, consisting of revolving blades, fins, or paddles on a shaft.
- **Record drawings** – Drawings that contain notations, which describe revisions to original project plans. Also called as-built drawings.

- **Redhead/grade stake** – Stakes placed so that the top of the stake indicates the elevation of the finished aggregate base.
- **Reference points** – – Semi-permanent survey markers that provide the basis of subsequent construction surveying or staking. Also known as control points.
- **Riprap** – A type of erosion control. Riprap is the careful placement of relatively large stone on the erodible slope. It is also used at culvert inlets and outlets to protect soil from erosion and to dissipate energy from flowing water.
- **Roadmix** – Mixing method that combines cement, aggregate, and water on the roadway instead of at a central mixing plant.
- **Rock slides** – Movement of rocks down a slope. Groundwater seldom primarily causes these movements.
- **Rolling pattern** – Pattern used by the roller during placement of roadway base or surfacing. Rolling establishes stability, permeability, and uniform thickness.
- **Rotomilling** – See Cold milling.
- **Rubblizing** – Demolition process that produces concrete pieces smaller than 12 inches, then stabilizes the pieces by rolling or vibrating. Usually done with either a resonant breaker or a multi-head breaker with drop hammers.
- **Safety Belt** – Device, usually worn around the waist and attached to a lanyard, lifeline, or structure, to prevent a worker from falling.
- **Sawcuts** – A narrow cut into pavement that reduces internal stresses. Sawcuts are typically protected with a seal that keeps out debris.
- **Scarify** – To break up and loosen the surface of a field or a road.
- **Screed** – Part of an asphalt paver that strikes off excess paving material and partially compacts it.
- **Seeding** – Type of erosion control that involves mulching or seeding and jute matting, which hastens and encourage abundant vegetative root growth, which binds the soil particles together.
- **Shoring** – Temporary bracing that provides strength and stability during trenching operations or construction of structures.
- **Shouldering material** – Graded material placed and compacted against the edge of a plantmix bituminous surface or Portland cement concrete pavement.
- **Shrink factor** – The difference in material volume before and after compaction.
- **Slides** – See rock slides, slipout, and slump slides.
- **Slipout** – Landslide that occurs at or below roadway grade in embankments.
- **Slope scaling** – Process of removing rock and soil to construct a slope. This task requires experienced personnel.
- **Slope stakes** – Stakes that mark the original ground locations where the toe of a fill slope and the top of a cut slope begins.

- **Slump slides** – Slides that occur when a large mass of soil moves with relatively little deformation along an internal slip surface. Slump slides usually contain seepage or saturated material.
- **Soil nailing** – Technique for reinforcing soil slopes, excavations, or retaining walls with relatively slender steel reinforcing bars inserted at a downward inclination into the slope, excavation, or wall, and then grouted within the hole.
- **Spalling** – Flaking or weathering of concrete or masonry block in which chips or larger pieces of material break away.
- **Special Provisions** – Project-specific specifications that add, delete, or otherwise revise standard specifications.
- **Split sample** – Material sample that is divided into smaller and equal sizes or amounts.
- **Stakes (staking/stakeout)** – Stakes are wooden sticks or slats that mark survey points on a construction project. Stakes are also made of alternative materials, such as metal or plastic. The staking process (or “stakeout”) usually occurs before clearing and grubbing.
- **Standard Specifications** – Written directions for the administration, materials, and construction of a project.
- **Stockpile** – Supply of material, such as gravel.
- **Striping** – Pavement marking that delineates certain areas of pavement, such as traffic lanes and crosswalks.
- **Subgrade** – Original ground on which construction takes place.
- **Surfacing course** – The top layer of a roadway.
- **Survey crew** – Group of engineering technicians that performs construction staking on a project.
- **Swell factor** – The difference in material volume before and after excavation from a compacted state
- **Thermal Luminescent Dosimeter (TLD) badge** – Monitors occupational dose of radiation.
- **Tining** – A method of finishing portland cement concrete pavement that creates small grooves and ridges in the finished surface.
- **Total Station** – A surveying instrument that measures angles, electronically measures distances, and provides the ability of robotic survey, in which the user remotely operates the instrument from the area to be staked.
- **Trenching** – Construction activity in which a trench, such as for a pipe, is dug.
- **Underdrains** – Pipes that intercept underground flow and seepage to drain the roadway below the surface. They are commonly used to intercept subsurface water moving toward the roadway.
- **USC & GS** – United States Coast and Geodetic Surveys
- **USGLO** – United States General Land Office
- **USGS** - United States Geological Survey

- **WAQTC** – Western Alliance for Quality Transportation Construction.
- **Windrow** – Soil, gravel, or similar material shaped into a row or berm.
- **Wire line** – Technique that involves placing a wire along the roadway, used for determining roadway grade when placing aggregate or paving material.
- **Witness stakes** – Stakes that provide information about adjacent surveyed points. Used during surveying.