



## SECTION 302

### STABILIZED PERMEABLE BASE

**302.1 Description.** This work shall consist of furnishing and placing a stabilized permeable base material. The mixture shall be placed, spread and compacted as shown on the plans or as directed by the engineer.

**302.2 Material.** All material shall be in accordance with Division 1000, Material Details, and specifically as follows:

Item	Section
Aggregate for Drainage	1009
Asphalt Binder (PG 64-22, PG 70-22, PG 76-22)	1015
Portland Cement	1019
Water	1070

**302.2.1 General.** Stabilized permeable base shall be either asphalt binder stabilized or Portland cement stabilized at the option of the contractor. All stabilized permeable base shall use Grade 4 drainage aggregate in accordance with [Sec 1009](#).

**302.2.2 Asphalt Stabilized Permeable Base.** Mixtures shall be composed of the base aggregate and 2.5 percent asphalt binder by weight (mass) of the total mixture. PG 64-22, PG 70-22 or PG 76-22 asphalt binder shall be used. All proportioning, mixing and transporting shall be in accordance with [Sec 401](#).

**302.2.3 Cement Stabilized Permeable Base.** Cement stabilized base mixtures shall be composed of the base aggregate with a cement factor of 2.5 sacks per cubic yard (140 kg/m<sup>3</sup>). All proportioning, mixing and transporting shall be in accordance with [Sec 501](#). Fly ash and ground granulated blast furnace slag shall not be used.

#### 302.3 Construction Requirements.

**302.3.1 Contamination.** Contamination of the finished base material that affects the drainage capability of the product will not be permitted. Any areas determined to be contaminated shall be completely removed without disturbing the adjacent or underlying material and replaced at contractor's expense.

**302.3.2 Displacement.** Rutting or other displacement of the permeable base or the underlying base will not be permitted. If displacement occurs, which could result in ponding or a non-uniform, non-draining thickness of permeable base, the material shall be completely removed without disturbing the adjacent or underlying material and shall be replaced at the contractor's expense.

**302.3.3 Asphalt Stabilized Permeable Base.** Applicable portions of [Sec 401](#) will apply, except as noted herein. The final mixture, when discharged from the pugmill or drum, shall be 250-300 F (120-150 C). A minimum of three passes of a 5 to 10 ton (4.5 to 9 Mg) steel wheel roller shall be made, compacting the material until no further displacement is noted. Compaction shall begin as soon after spreading the mixture as the mixture is able to bear the weight (mass) of the roller without undue displacement and shall be completed before the

temperature of the mixture drops below 100 F (38 C). The approximate compacted thickness of a single lift shall be a maximum of 4 inches (100 mm).

**302.3.4 Cement Stabilized Permeable Base.** Applicable portions of [Sec 502](#) will apply, except as noted herein. Segregation of the mixture shall be minimized. Normal concrete pavement consolidation equipment such as vibrators or vibrating pans will be considered adequate, provided the mixture can be satisfactorily compacted. The mixture shall be cured for a minimum of 48 hours in accordance with [Sec 502.6](#), except that white-pigmented membrane or straw shall not be used. A fine water mist may be applied several times each day for the 48-hour period as needed to maintain moisture. The water application shall not be heavy enough to wash away the cementitious material or mortar.

**302.4 Method of Measurement.** Final measurement of the completed permeable base will not be made except for authorized changes during construction or where appreciable errors are found in the contract quantity. Where required, measurement of permeable base, complete in place, will be made to the nearest square yard (m<sup>2</sup>). The revision or correction will be computed and added to or deducted from the contract quantity.

**302.5 Basis of Payment.** The accepted quantities of permeable base of the thickness specified will be paid for at the contract unit price for each of the pay items included in the contract. Payment will be considered full compensation for all labor, equipment and material, including the stabilizing agent, to complete the described work.