



CITY OF NORTHGLENN

Soils and Materials Testing Guidelines

Public Works Dept.



CITY OF NORTHGLENN

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**Inspection Request Line
303-829-5359**

Frequently Asked Questions

Construction Inspection Request Line
303-450-8787

How long will my soils tests results be valid?

Soils tests are valid for a period of 24 hours, unless the weather conditions change the site conditions. Conditions such as heat, wind, rain, snow, and frost can impact the moisture density. Valid soils tests approved by the City Engineer are required prior to placing roadbase, concrete or asphalt.

When do I need a proof roll, and how long are the test results valid?

Proof roll with a loaded tandem axle truck are required prior to placing roadbase, concrete or asphalt. Proof rolls are typically valid for 24 hours, unless weather conditions change the site conditions. Unless significant changes occur to the subgrade or subbase, a passing proof roll test may remain valid beyond the 24 hour period.

Can the soils technician approve my test results?

No. Technicians can perform tests and record results to be provided to the City Engineer and the Contractor. Approving the results of those tests shall be the responsibility of the City Engineer or his designee, who are responsible for assuring compliance with the City Standards and Specifications.

Is it necessary to have written field copies of test results?

Yes. Without these written results the City Engineer or his designee will be unable to approve the subgrade or subbase.



What type of tickets are required for materials delivered to a project?

Load ticket are required for roadbase and asphalt, while batch tickets are required for concrete deliveries. Loads arriving on a project without these tickets risk being rejected due to the inability of the Engineer or Inspector to determine if the material complies with the City Standards and Specifications.

Does this brochure provide me with all the information I will need on a project?

No. The information provided in this brochure should be used as a general guide only. Specific information regarding Standards and Specifications may be obtained by reviewing the City of Northglenn Standards and Specifications, Project Special Conditions, as well as the Approved Construction Plans.

When should I call for inspections?

Inspections require 24 hours advance notice. To schedule your inspections call 303-328-8468

Concrete Class A Class B Class P	Slump 2 - 4 inches 1 - 4 inches 1 - 3 inches	Air 4 - 7% 5 - 8% 4 - 7%	Temp 40 - 90 degrees F 40 - 90 degrees F 40 - 90 degrees F	Cylinders Every 50 yards or portion thereof per day. 1-7 day break 1-14 day break 2-28 day break	Unit Weight As directed by City Engineer.	Tickets Batch and Load for every truck.	Curing Compound 1 gallon per every 300 sq foot.	Placing Temp 35 degrees F and rising.	Cold Weather Cure 50 degrees F for 72 hours, then above 32 degrees F for the remaining 7 day curing period.
Asphalt	Max Theoretical 1 for each day paving occurs	Density Tests every 250 feet per lane mile. 92-96% Max Theoretical Density AASHTO T 209	Mix Temp 275 degrees F variance of 25 degrees - or +	Maximum Lift 3 inches.	Asphalt Cores As directed by City Engineer.	Tickets Every load.	Oil Content Plus or minus 0.3%	Placing Temp Lower layers 40 degrees and rising Top layers 50 degrees and rising	Surface Tolerance 3/16 inch in 10 feet
Roadbase	Proctor AASHTO T 180 Every 500 tons, or portion thereof.	Density Tests Every 250 feet per lane mile per lift. Min 95%	Moisture Minus 1% to plus 1% of optimum.	Maximum Lift 8 inches.	Surface Tolerance 1/2 inch in 10 feet.	Proof Roll Loaded tandem axle water truck.	<p><i>Soils and Proof Roll Tests are valid for a period of 24 hours, or unless weather conditions change.</i></p> <p><i>The City of Northglenn requires written field copies of all testing be provided to the City Inspector or City Engineer no later than the end of each workday.</i></p>		
Subgrade	Proctor AASHTO T-99 As required for consistency.	Density Test Every 250 feet per lane mile per lift. Min 95%	Moisture Minus 2% to plus 1% of optimum.	Maximum Lift 8 inches.	Surface Tolerance Smooth and free of ruts.	Proof Roll Loaded tandem axle water truck.			
Trench Backfill Native Clay Soils	Proctor AASHTO T-99 As required for consistency.	Density Test Every 250 feet per lift.	Moisture Minus 2% to plus 1% of optimum.	Maximum Lift 8 inches.	Max Open Trench 300 feet.	Proof Roll Loaded tandem axle water truck.	Hand Compaction Around manholes, valves, vaults, inlets, and other structures as directed.		
Class 6 Roadbase	Proctor AASHTO T 180 Every 500 tons, or portion thereof.	Density Test Every 250 feet per lift. Min 95%	Moisture Minus 1% to plus 1% of optimum.	Maximum Lift 8 inches.	Max Open Trench 300 feet.	Proof Roll Loaded tandem axle water truck.			

