SUPERPAVE GYRATORY COMPACTOR (SGC)

Standard: ASTM D6925, AASHTO T312

The NL PavePro Superpave Gyratory Compactor (SGC) is a high precision laboratory instrument designed to replicate the compaction process of asphalt mixtures under controlled conditions. By simulating the pressure, angle, and rotational movement of field rollers, this SGC produces specimens that closely match the density, aggregate orientation, and structural integrity of actual pavements. This ensures that laboratory results are directly relevant to real world performance.

Developed in line with Superpave mix design requirements, the NL PavePro SGC provides engineers, researchers, and quality control laboratories with a reliable tool for evaluating mixture properties such as volumetrics, density, and void content. Its electromechanical drive system offers consistent control of compaction parameters, while advanced digital interfaces allow for programmable test cycles, real time monitoring, and automatic data acquisition.

Main Features:-

- **Rigid steel frame construction**: Ensures stability, minimizes vibration, and guarantees consistent compaction results across specimens.
- **Electromechanical drive system**: Provides precise control of gyration angle and compaction pressure.
- **Programmable digital interface**: Allows operators to set specimen size, number of gyrations, target height and pressure.
- **Real time monitoring**: Continuous measurement of specimen height and density with automatic data logging.
- **Safety enclosure with emergency stop**: Protects operators during compaction cycles.
- **Data export options**: USB/Ethernet connectivity for easy reporting and compliance documentation.
- **Compatible molds**: Supports both 100 mm and 150 mm specimens for Superpave mix designs.
- **Selectable end conditions** : Compact to number of gyrations or specified height.

PavePro series

Technical Specifications :

Model Number	NL PV / P1
Applied Pressure	600kpa ± 60kpa (0 – 5 gyrations) & ± 18kpa (above 5 gyrations)
Internal Angle of Gyration	1.16° ± 0.02°
Speed of Gyration	30 ± 0.5 RPM
Number of Gyrations	0 – 600
Specimen Sizes	100 mm & 150 mm
Product Dimension	750 (W) x 915 (D) x 1400 (H) mm
Approx. Weight	386 kg
Power	220~240 VAC, 1 Ph, 50/60 Hz, 10 A

*1 Copy of Manual Instruction

Unit Consists Of :

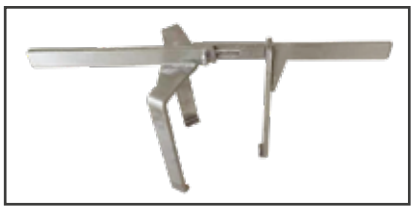
Model Number	Parts Description	Qty
NL PV / P1 – P1	150 mm Ram Head with Handle	1set
NL PV / P1 – P2	150 mm Ram Foot Assembly	1set
NL PV / P1 – P3	150 mm Mould Assembly with Base Plate	1set
NL PV / P1 – P4	150 mm Specimen Removal Clamp	1set

Optional Accessories :

Model Number	Accessories Description
NL PV / P1 – A1	100 mm Ram Head with Handle
NL PV / P1 – A2	100 mm Ram Foot Assembly
NL PV / P1 – A3	100 mm Mould Assembly with Base Plate
NL PV / P1 – A5	Printer
NL PV / P1 – A6	Data Transfer Software
NL PV / P1 – A7	Height Gauge 120 mm

Ram Head with Handle

Ram Foot Assembly



Specimen Removal Clamp

Mould Assembly with Base Plate