

XPLORER² Model 3500

Nuclear Density Gauge



- ★ The Most Advanced Gauge on the Market
- ★ 3-Year Warranty — Longest in the Industry
- ★ First Calibration at NO Additional Cost
- ★ Low-cost Replacement Parts & Components
- ★ #1 in Customer Service & Technical Support

XPLORER 2 Model 3500

SIMPLY ROCK SOLID

Meets ASTM 6938, D2950, D7013, D7759, C1040 and AASHTO T310



The 3500 Xplorer 2, is a nuclear moisture/density gauge for field measurements of soils, concrete and asphalt pavements. The Xplorer 2 is built with rugged and durable components. New highly advanced features save time and reduce maintenance issues in the field thereby lowering the costs of repairs.

Designed to ensure superior field performance, the Xplorer's machined aluminum base is made to

precisely fit its durable polycarbonate shell and electrical components. The new large backlit LCD and keypad makes reading test results easy at night or in direct

sunlight. The Xplorer 2 is Bluetooth® enabled for easy data transfer to any Android® smartphone or tablet. Reporting software built into the new X2 Mobile Application can send all test results via email with just a few clicks. It is also the first nuclear gauge with an integrated battery port for connection to supported external gauge tracking devices.

InstroTek stands behind each Xplorer 2 with the first 3-year warranty in the industry. InstroTek nuclear gauges have the lowest ownership costs of any nuclear gauge in the market, saving you thousands of dollars over the life of your gauge.

Superior electronics, advanced features, precise engineering and now the longest warranty in the market make the Xplorer 2 **Simply The Rock Solid Choice.**

FEATURES

- ▶ GPS
- ▶ Bluetooth
- ▶ USB Storage
- ▶ Project Storage
- ▶ Memory/Storage of Results
- ▶ Software Updates via USB Drive
- ▶ Alphanumeric Keypad
- ▶ Integrated Battery Port for Gauge Location Tracking Devices
- ▶ Large 4 line X 20 Character Backlit LCD Display with 3/8" (9mm) Tall Characters
- ▶ Backlit LCD and Keypad
- ▶ 9V Alkaline Battery Backup
- ▶ Gauge Case with Integrated Wheels
- ▶ Reporting App Available for any Android® Smartphone or Tablet

KEY BENEFITS



The Xplorer 2 software is straightforward and easy to use. The simple keyboard layout and menu options make it easy for field technicians to set up a test and find results quickly.



The Xplorer 2 has been thoroughly tested for ruggedness and precision. Every detail of the Xplorer 2 has been engineered to reduce maintenance costs, improve durability and increase accuracy.

The Xplorer 2 comes with a **3-Year Warranty** and is backed by over **20 YEARS** of outstanding and trusted customer service.



Best warranty in the industry
3-Year Warranty based on a proven quality record



Convenient locations
6 offices throughout the US to service, calibrate and provide parts for your nuclear gauges



Use your favorite gauge service center
Any service center can service and calibrate the Xplorer 2



No additional manufacturer kick back cost
NO surcharge to service centers for calibration, savings passed on to you



Lower price parts and components
Lowest component and parts costs in the industry directly to you or to your favorite service center

XPLORER²_{TM}

Model 3500



3500 XPLORER NUCLEAR DENSITY GAUGE INCLUDES:

Gauge, Standard Block, Scraper Plate, Drill Pin, Extraction Tool, Transportation Case, Operators Manual and Quick Start Guide, AC and DC Chargers, Long Shank Locks, Source and Case Certificates, Leak Test Certificate, USB Flash Drive. All InstruTek gauges come standard with a 3-year limited warranty, a free calibration at one-year, and are backed with unmatched customer service and technical support.

SPECIFICATIONS

RADIOLOGICAL

Gamma Source	Cesium 137, 10 mCi (0.37 GBq)
Neutron Source	Am241:Be, 40 mCi (1.48 GBq)
Source Housing	Double Encapsulated stainless steel
Highest Surface Dose Rates	at 5 cm, 15 mrem/hr, gamma and neutron
Transit (Shipping) Case	DOT 7A, Type A, Yellow II label, TI=0.5

MATERIALS

Shielding	Tungsten and Lead
Source Rod	Stainless Steel 17-4 H900, Hardened to 42-47 Rockwell C
Gauge Base	CNC Machined 6061-T6 Aluminum
Post and Frame	CNC Machined 6061-T6 Aluminum
Index Rod	Tight-Tolerance 17-4 PH Hardened Stainless Steel Rod
Top Shell	UV Stabilized Polycarbonate
Bearing	932 Bearing Bronze
Screws/Fittings	Stainless Steel

MECHANICAL SPECIFICATIONS

Gauge Size	H 58.4 cm X L 30.8cm X W 22.2 cm (23"x 14.5"x 8.75")
Weight	14 Kg (31 lb)
Shipping Case Size	31"x 15"x 17"
Shipping Weight	42 Kg (94 lb)
Shielding Materials	Lead, Tungsten and Cadmium
Base and Tower	Aluminum
OPERATING TEMPERATURE	
Ambient	-10 to 70 C (14 to 158 F)
Surface	170 C (338 F)
Storage Temperature	-70 to 185 °F (-55 to 85 °C)
Humidity	98% non condensing environment, advance sealing of boards for improved moisture residence

ELECTRICAL SPECIFICATIONS

Main Power Source	6-Cell D NiCad battery pack
Main Power Source	
Battery Life	500-1000 recharge/discharge cycles
Backup Power Source	9V Alkaline
Battery Recharge Time	10 to 14 hours
Charge Source	12V DC
Current Consumption Average	25mA
Time Before Auto Shutdown	1 hour
Backlit Display	Large 4 line x 20 character LCD display with 9mm tall characters
Keypad	24 key sealed membrane

MEASUREMENT SPECIFICATIONS

Direct Transmission, 6" (150mm)	15 Seconds	1 Minute (std.)	4 Minutes
Precision at 2000 kg/m3 (125 lb/ft3)	±6.7 kg/m3 (0.42 lb/ft3)	±3.4 kg/m3 (0.21lb/ft3)	±1.7 kg/m3 (0.11 lb/ft3)
Chemical Error	±22.4 kg/m3 (1.4 lb/ft3)	±22.4 kg/m3 (1.4 lb/ft3)	±22.4 kg/m3 (1.4 lb/ft3)
Surface Error	-16 kg/m3 (1 lb/ft3)	-16 kg/m3 (1 lb/ft3)	-16 kg/m3 (1 lb/ft3)
Backscatter			
Precision at 2000 kg/m3 (125 lb/ft3)	±15.6 kg/m3 (0.98 lb/ft3)	±7.8 kg/m3 (0.49 lb/ft3)	±3.9 kg/m3 (0.25 lb/ft3)
Chemical Error	±35.2 kg/m3 (2.2 lb/ft3)	±35.2 kg/m3 (2.2 lb/ft3)	±35.2 kg/m3 (2.2 lb/ft3)
Surface Error	-56 kg/m3 (-3.5 lb/ft3)	-56 kg/m3 (3.5 lb/ft3)	-56 kg/m3 (3.5 lb/ft3)
Moisture at 240 kg/m3 (15 lb/ft3)			
Precision	±9.9 kg/m3 (0.62 lb/ft3)	±4.9 kg/m3 (0.31 lb/ft3)	±2.5 kg/m3 (0.16 lb/ft3)
Surface Error	-16 kg/m3 (-1 lb/ft3)	-17 kg/m3 (1.06 lb/ft3)	-17 kg/m3 (1.06 lb/ft3)