

# EDG-4114

Electrical Density Gauge(EDG)



## Description of Electrical Density Gauge(EDG)

The Electrical Density Gauge (EDG) is capable of providing accurate readings of soil density, moisture content, and percent compaction on soils typically used for roads and foundations. The precision by which the EDG can determine these physical parameters depends highly upon you, the operator. Reading and understanding the contents of this manual is a very important step toward utilizing EDG to its maximum potential.

## Technology standard

ASTM D7698

## Technical parameters

Density range: Standard field compacted soil range

Dry density accuracy:  $\leq 3\%$  Standard test range

Moisture content range: Standard field compacted soil range

Moisture content accuracy:  $\leq 3\%$  Standard test range

## Theory of application

by applied high radio frequency between electrodes to test the dielectric and density of compacted soil materials. And make a comparison between the measured dielectric properties and soil modules. Soil module is a specific standard of soil It has a set of pre-measured specific permittivity. This group of electrical properties represents a series of density and humidity data. After the field measurement, the dry and wet density, moisture content and compaction percentage are calculated by mathematical algorithm. The accompanying temperature detector also increases the accuracy of measurements.

## Characteristic

- Can replace the nuclear density measurement method, sand filling method, first stage drying method, no nuclear source.
- There is no need difficult training or certified professionals are required.
- There is no need to consider the transportation or storage of hazardous materials.
- Use high quality, reliable point-to-point RF technology.
- 2-3sec. show measurement results.
- The temperature probe detects the test .temperature to make the test more accurate

# DM200C

## Concrete Moisture Meter



DM200 Concrete water testing instrument adopted the high frequency principle based on the introduction of the most advanced technology from foreign country. In other words, there is a fixed frequency inside the equipment. Once the moisture of the detected objects carried, the frequency through the sensor will be different. The difference between the frequencies will be displayed in figure after the conversion by current-frequency converter.

### Work principle

This instrument adopted the high frequency principle based on the introduction of the most advanced technology from foreign country. In other words, there is a fixed frequency inside the equipment. Once the moisture of the detected objects carried, the frequency through the sensor will be different. The difference between the frequencies will be displayed in figure after the conversion by current-frequency converter.

### Specification

Its integrative design convenient to carry outside for testing.

Digital display with back light gives exact and clearly reading although you stay at the somber conditions.

It is small in size, light in weight ,easy to carry out for fieldwork if needed.

Display: 4 digital LCD

Measuring range: 0%-50%

Operating conditions:

Temperature: 0-60

Humidity: 5%-90%

Resolution: 0.1

Accuracy:  $\pm 0.5\%$

Power supply: 9V battery (6F22)

Dimensions: 160mm×60mm×25mm

Weight: 203g (not including batteries)