



## Point Load Tester: Portable Rock Strength Testing for Field Applications

Standards: [ASTM D5731](#)



ULTIMATE USER-  
FRIENDLINESS



LEADING  
DEPENDABILITY  
AND RELIABILITY



STRICT COMPLIANCE  
WITH INDUSTRY  
STANDARDS



STOCKED  
CONSUMABLES  
AND SPARES



TRUSTED AFTER  
SALES TECHNICAL  
SUPPORT



LIFETIME PRODUCT  
SUPPORT ADVANTAGE



### Description

A [Point Load Test Apparatus](#) is a specialized Rock Strength Tester designed to assess the point load strength index of rock samples. By analyzing the Point Load Index, this instrument helps estimate the uniaxial compressive strength (UCS) of rock, measure anisotropy (the ratio of maximum to minimum load strength at different points), classify rock types, determine weathering zones, and predict drilling efficiency.

The Point Load Strength Tester is an ideal solution for on-site testing in construction, geology, mining, hydropower, railways, and transportation projects. Unlike traditional testing methods, the PLT Machine requires minimal sample preparation—accommodating both core samples from engineering exploration and irregular rock fragments with minor modifications. Since no specialized mechanical processing is needed, the Point Load Index Tester offers a fast, cost-effective, and simple testing process compared to conventional rock strength assessments.

With its portable design, the Portable Rock Testing Machine delivers rapid results in the field, making it an essential tool for geotechnical engineers and site investigators.

Read more in our [mega blog](#).

### Point Load Strength Tester Main Features

- **Stable Horizontal Structure** – Designed with a horizontal structure for enhanced stability, ensuring precise testing conditions for Point Load Test Apparatus.
- **Reinforced Cylindrical Frame** – The reaction force frame features a cylindrical design, eliminating eccentricity while providing a firm and compact structure capable of handling high-strength and large core samples.
- **Lightweight and Portable Design** – The jack is integrated into the outer shell, crafted from high-quality, high-strength materials for durability. Its compact structure and lightweight design make the Portable Rock Testing Machine easy to transport and operate in the field.



- **Durable Cemented Carbide Loading Head** – The loading cone head is made from cemented carbide, offering exceptional strength and durability, ensuring accurate and reliable point load testing over time.
- **Advanced Digital Measurement System** – Equipped with a strain sensor and LCD display, the electronic force measurement system provides high resolution, precise test accuracy, and easy-to-read results for Point Load Index Tester applications.
- **Battery-Powered for Field Testing** – Operates on a 9V square battery, making it ideal for outdoor and remote testing environments, ensuring uninterrupted operation for PLT Machines used in geotechnical investigations.

## Point Load Tester Technical Specifications

Model	NG-RockStrength
Jack Pressure	100 MPA
Force Transducer Range	100kN
Piston Diameter	36mm
Piston Maximum Stroke	60mm
Max Distance Between Loading Points	90mm
Accuracy	0.001kN
Force Measuring Error	<1% F.S
Piston Area	10.17 cm <sup>2</sup>
Power Supply	9V Square Battery
Reading Mode	LCD Display
Dimensions	13.8" x 13.8" x 28" / 350 x 350 x 710 mm
Weight	93 lbs. / 42 kg

\* Request a [formal quotation](#) or send an e-mail to [sales@nextgentest.com](mailto:sales@nextgentest.com) for the most up-to-date pricing and applicable discounts and incentives.