DFG Concrete Indicator



An accurate, easy-to-use, robust digital force indicator for concrete testing



Introduction - As an accredited testing lab, servicing the concrete industry, you rely on testing systems to meet your clients' requirements. Specifically the concrete testing machine digital indicator is a key element to delivering accurate, reliable test results. ADMET designed the new DFG Concrete Indicator specifically to meet these needs.

Based upon 20 years of experience in the concrete industry this new product delivers consistent results according to AASHTO and ASTM concrete and cement testing specifications using a simple, easy to use interface that minimizes operator error. Automatically transmitted results are sent to your computer running ADMET's GaugeSafe Data Exchange Program for inclusion in your test report and LIMS systems.

When AASHTO, CCRL, or your customer requests proof of test execution the DFG provides two answers; the calculated test rate and the plot of the test curve. Your customer's requirements can be met with two modes of operation; the Full Mode for maximum flexibility or the simple Quick Mode to maximize efficiency and minimize operator interaction. Full Mode allows modification of all testing parameters while Quick Mode streamlines setup to minimize keystrokes.

In summary the DFG Concrete Indicator provides unrivaled performance, irrefutable accuracy and operational simplicity to concrete testing at a low cost.

Applications - The DFG Concrete Indicator is expertly designed for performing the following tests:

ASTM C39 Compressive Strength of Concrete Cylinders ASTM C78 Flexural Strength of Beams - 3rd pt Loading ASTM C109 Compressive Strength of Cement Mortars ASTM C293 Flexural Strength of Beams - Center Loading ASTM C496 Splitting Tensile Strength - Concrete Cylinders

Highlighted Features - In Quick Mode the DFG automatically defines the test parameter settings for the operator in accordance with published specifications. Additionally, when "Hands-Free" operation is selected the DFG will automatically collect data from each test without the operator touching the keypad, this reduces testing time, minimizes errors and ensures that no data is lost.

Additional features include an Auto-Test-Reset mode for hands free operation, bar graph load rate display, permanent storage of test data and easy transfer of results into data base programs. It's accuracy, which exceeds ASTM E4, ease-of-use and ruggedness results in a system of unrivaled price/performance. ADMET offers a line of load cells, pressure transducers and DFG mounting packages so that you can upgrade your testing machine and quickly and accurately perform your concrete tests.

Test With Certainty.

DFG Concrete Indicator

Features

- Display Live Load, Maximum Load, Live Stress and Maximum Stress numerically.
- Indicate Load/Stress Rate numerically or with a bar graph.
- Report Average Test Rate to ensure each test is performed according to specification.
- Two user selectable modes of operation. Full Mode provides the greatest flexibility in test setup. Quick Mode minimizes keystrokes and ensures tests are performed according to ASTM specifications.
- Select between specimen types cylinder, cube, beam center point loading, beam-3rd point loading, split tensile and general area. ASTM C39 Stress Correction Factor is automatically applied to the cylinder geometry.
- Report cylinder break types according to ASTM C39.
- Store up to 1,000 test results to permanent memory. Results include Date, Time, Specimen ID#, Maximum Load, Maximum Stress, Average Load Rate plus a statistical summary of each. Auto store results after each test.

System Specifications

Load Input Compatibility		
Sensitivity	User selectable from 1mv/v to +/- 2.5Vdc	
Excitation	5 or 10 Vdc	
Accuracy	DFG plus Transducer-Better than 0.5% of read- ing from 1% of full scale to full scale (Exceeds ASTM E4).	
Resolution	1 part in 8 million (approx.)	
Sampling Rate	Up to 100 Hz	
Display		
Туре	2 line x 16 character x 0.4" h alphanumeric LCD	
Power Requirements		
Voltage	100-240 VAC 50-60 Hz	
Size		
Dimensions	7.89" W X 6.39" H x 3.56" Dp	

•	Select between force units of Lb, N, KN, Kg and stress units
	of psi, MPa, KPa.

- Auto-Test-Reset is standard and automatically enables the indicator for the start of the next test without requiring operator interaction.
- Define and detect the end of test with the Sample Break Detector.
- Digital output activates at sample break or machine overload.
- Transmit via the USB communications port results, XY data, test methods and calibration data to a remote computer running ADMET's GaugeSafe Data Exchange Program.
- DFG comes standard with one analog input for measuring force and stress. Store up to 4 force calibrations for multiple force systems.
- Each calibration table allows up to 5 calibration points each with piece wise linear fit between points. Accuracy exceeds ASTM E4 Standards and in general is better than 0.5% of reading from 1% of full scale to full scale.

Accessories	
Software	GaugeSafe Data Exchange Software. USB Connection between DFG and Computer.
Mtg Brackets	Fixed and Swivel Mounting Brackets
Pressure Transducers	1 kpsi, 3 kpsi, 5 kpsi, 10 kpsi





Copyright 2013. All rights reserved. ADMET, Inc. Norwood, MA 02062 USA

800-667-3220