

ADVANCED TESTING TECHNOLOGIES

Viskomat XL, Mortar, Cement and Fresh Concrete Rheometer

www.WorldofTest.com/viskomat-xl-mortar-cement-and-fresh-concrete-rheometer

Applications

Qualitest viskomat XL is a Rheometer for Mortar and Fresh Concrete up to 8 and more mm Grain Size. It fills the gap between the viskomat NT for mortar and paste with a specimen volume of 360 ml and the concrete rheometer BT2 with a sample volume of 20l.

The operation principle of the viskomat XL is near the same as for the viskomat NT. So a mixer formed probe is measuring the torque, and the specimen vessel is rotating. An additional scraper is cleaning the wall of the vessel.

Features

Very dynamic speed range

The speed may be 0.001 to 80 rpm in both directions, clockwise or counter clockwise. User may define the speed in several steps, in a linear increase or decrease of speed. As an option, an oscillating or shear stress controlled mode is possible.

High Torque Range

The viskomat XL has a torque range from 0 to 1000 Ncm with a resolution of 0.05 Ncm and accuracy better than 0.2 Ncm.

Temperature control

Temperature control is realized by a double wall specimen container, where a cooling liquid is circulating. The specimen temperature is measured with a RTD mounted inside the shaft of the probe.

High Time Resolution

The sampling rate might be set from 0.005s to 1min.

Shear Stress Control Mode

As option you may run the viskomat XL with a shear stress controlled mode. So you pre-set the torque over time, and the speed is automatically controlled to achieve the predefined torque.

Oscillation Mode

The oscillation mode gives information about the storage modulus G' and the loss modulus G'' , as well as the plastic and elastic properties of your material.

Software

The viskomat XL is controlled via a network interface. Simple connect your PC and start your Internet Explorer for full control and data transfer. No special software installation necessary.



ADVANCED

TESTING TECHNOLOGIES

Specifications

Model	viskomat XL
Application	Rheometer for mortar paste and fresh concrete 6 to 20 mm
Motor Speed Range	0.0001 - 80 rpm (steady speed and speed ramp mode)
Maximum Grain Size	6 - 16mm (depend on aggregate shape)
Specimen Volume	3.5L (3L usable)
	Inner diameter 165mm, height 175 mm
Motor Torque	12 Nm
Motor Angle Measurement Accuracy	± 0.05 ° or better
meas. Torque Range	0 - 3000 Nmm or 0 - 10000 Nmm (selectable)
meas. Torque resolution	0.01 Ncm
meas. Torque Accuracy	0.2 Ncm
Sampling Rate	0.005s – 1 min
Temperature Sensors	RTD PT100 1/10 DIN B
Cooling and Heating	double wall vessel connected to an external chiller
Controller	extra cabinet, 110..230V, 50..60Hz, 800W
Connection	Could be connected via a Network interface to any PC running a WEB browser based on 32 bit or 64 bit technology like Windows XP, Vista, Widows 7, OS X, and Linux. The viskomat XL may be integrated in your Intranet. To run the viskomat XL no special PC is necessary.
Controller Interfaces	4 x USB, 2 x GBit network, HDMI, ext. SATA
User Interface	Colored screen with online graphic, or external PC / tablet
Server	WEB, FTP, SSH
Safety	Special proximity sensor with automatic stop function.
Dimensions	920 × 315 × 410 mm
Standard Configuration	Control unit with screen, mouse, keyboard, USB-port, Network connection, one probe for concrete and one probe for mortar and paste, one scraper, user manual.



Toll-Free: 1.877.884.TEST (8378) | Fax: 954.697.8211



info@qualitest-inc.com | www.WorldofTest.com



USA Canada UAE Mexico India Hong Kong