NOVOTEST

HARDNESS TESTING

QUALITY TESTING DEVICES

ULTRASONIC TESTING

EDDY
CURRENT TESTING



COATING TESTING

CONSTRUCTION
MATERIALS TESTING

MAGNETIC TESTING

PRODUCT CATALOG



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CLOUD STORAGE

FULL DOCUMENTATION

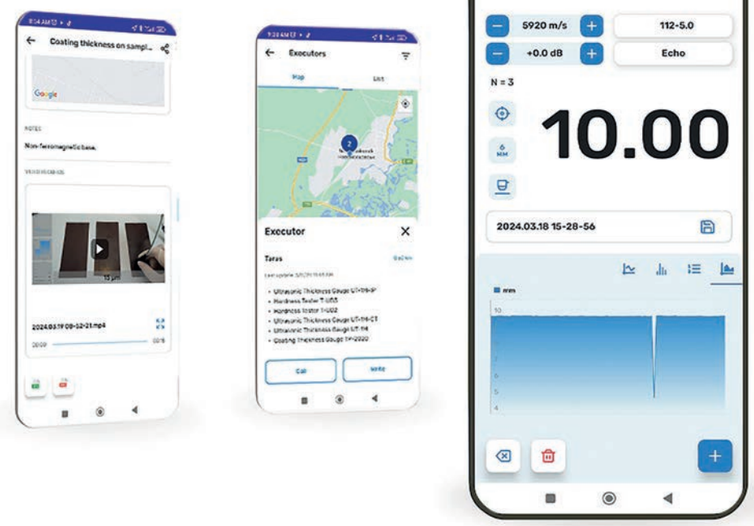
PHOTO AND VIDEO CAPTURE

ONE-CLICK REPORTING AND SHARING

NOVOTEST Lab
Application For Android
Get it on Google Play

LAB IN YOUR POCKET

The NOVOTEST Lab app for Android stands out by offering an all-in-one quality control solution. Effortlessly perform measurements, document results with multimedia, store archives accessible from anywhere via the cloud, send results instantly, and locate NDT service providers easily.



NOVOTEST Lab
Application for Android gadgets

When using the app alongside a coating thickness gauge, you get access to a comprehensive interface featuring graphs, histograms, and statistics not available on the device itself, thereby expanding the thickness gauge's functionality.



COATING THICKNESS GAUGE

ULTRASONIC THICKNESS GAUGE



When paired with the NOVOTEST Lab App, the ultrasonic thickness gauge enhances its capabilities, making it a unique smart device that outperforms any other thickness gauge in the world.

NOVOTEST Lab streamlines the use of hardness testers by simplifying device management and the calibration process, making it accessible even for beginners, and offering numerous additional benefits.



HARDNESS TESTERS

CLOUD STORAGE



Store your archives directly on your smartphone. Opt for synchronization with Google Drive to access your reports from any device connected to your cloud storage.

UCI HARDNESS TESTER SOLIDUR



NEW

TOUCHSCREEN

NOVOTEST Lab
Application For Android
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WEB interface
for data transfering

NEW GENERATION UCI PROBE

NOVOTEST LAB-BASED PLATFORM

LARGE TOUCHSCREEN INTERFACE

UNMATCHED ACCURACY AND REPEATABILITY

NEW GENERATION UCI PROBE

The new generation high accuracy UCI probe U2 is made in an ergonomic stainless steel housing with replaceable cable that connects via a Lemo type connector. The probe features an interchangeable tip that can be removed by the user to perform hardness measurements of gear teeth, grooves and other narrow places.



SPECIALIZED NOZZLES AND PROBE OPTIONS

The device kit can be supplemented with special nozzles - for sheet materials, products with small-radius surfaces, shallow grooves. Device can be equipped with UCI probes of different testing load and configuration – a shortened version for measuring in narrow places, such as a small diameter pipe, and also with an extended indenter, which allows users to measure hardness in the most difficult to reach places.



NOVOTEST

SPECIFICATIONS

UCI U2 probe loads	1kg (10N), 5kg (50N), 10kg (98N)
Measurement error	<4% (HV5, HV 10)
Scales	HV, HRA, HRB, HRC, HRD, HRE, HRF, HRG, HRH, HRK, HB, HBS, HBW, HK, HR 15-N, HR 30-N, HR 45-N, HR 15-T, HR 30-T, HR 45-T, HR-15W, HS, HLD, Rm, Knoop, Tensile strength Rm/MPa
Materials	Pre-calibrated for Non-Austenitic Steel, Nickel and High-Nickel Alloys, Cartridge Brass, Copper No. 102 to 142 Inclusive, Alloyed White Irons, Wrought Aluminum Products, Steel (unalloyed, low alloy and cast), Steel (quenched tempered condition), Steel (untreated, soft annealed or normalized conditions), Steel (quenched condition), Cold working steels, High speed steels, X110MoCo9.8, Hardmetals, Aluminium and its alloys *additional custom scales and materials for calibration
Measuring direction	Any direction 360°
Display	5.5" touch screen, 720x1280, IPS LTPS
Camera	13MP
Connectivity	WWAN (2G/3G/4G, VoLTE), WLAN/Wi-Fi, Bluetooth, GPS, USB Type-C
CPU	Octa-core ARM@Cortex -A53 MPCore 2.0 GHz
Body	Explosion-proof industrial design, IP65 (IP67 optional) dust and water protection (IEC 60529)
Memory	4GB RAM + 64GB ROM Memory
Languages	English, Ukrainian, Russian *additional languages available by request.
Power supply / Charging	Built-in battery 5100mA/h (Lithium Polymer) / USB 5V/2A
Batteries life	12 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of tester	160x84x17,5 mm / 0.3 kg

BUILT-IN WIDE CALIBRATION LIBRARY



The device has an extensive library of pre-installed factory calibrations that allows users to easily convert measured hardness values to equivalent values across a variety of materials and international hardness scales, in full accordance with ASTM E140 and ISO 18265 standards.

SMART CONNECTIVITY, DURABLE DISPLAY AND HIGH PERFORMANCE



The device features a 5.5-inch high-resolution Corning Gorilla Glass screen for excellent visibility and rugged protection. Powered by an Octa-core ARM® Cortex-A53 processor with 4GB RAM and 64GB memory, it runs Android 11.0 for smooth operation. Built-in GPS, Wi-Fi, Bluetooth (for NOVOTEST Lab Leeb), and a 4G Full Netcom SIM slot ensure constant connectivity for working with protocols, cloud storage, and real-time data transfer.

UCI HARDNESS TESTER LAB UCI

NOVOTEST Lab
Application For Android
Get it on Google Play





Scan to view demo protocol

- ULTRAPORTABLE
- HIGH AUTONOMY
- CALIBRATION FOR ANY METALS
- SPECIAL MULTIFUNCTIONAL NOZZLE

Wireless hardness tester NOVOTEST Lab UCI implements the ultrasonic contact impedance method.

Connect the device to the NOVOTEST Lab application to transform it into a versatile tool with unmatched functionality.



Create graphs, histograms, and statistics effortlessly. Save measurements with comprehensive protocols including text, audio, photos, and videos. Easily transfer test reports with a single click via email or via your preferred messenger or email, and synchronize your archives with cloud storage.

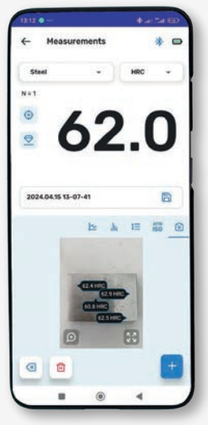
SPECIFICATIONS

UCI probe loads	1kg (10N), 5kg (50N), 10kg (98N)
Measurement range	Vickers HV: 100~800, Rockwell HRC: 20~70, Brinell HB: 90~650 Tensile strength, MPa 370~1740 Measurement ranges can be expanded by the user (for example: 1 – 2000HV)
Measurement accuracy	±15HV, ±2HRC, ±10HB
Scales	HRC, HB, HV, HRA, HRB, MPa
Materials	Pre-calibrated for steel, brass, aluminum Additional custom scales and materials for calibration
Measuring direction	Any direction 360°
Data storage	NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian *additional languages available by request.
Power supply / Charging	Built-in battery / USB 5V
Batteries life	10 h
Operating environment	Temperature: -30°C ~ 60°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of tester	160x26 mm (36 mm with nozzle) / 0.165 kg

UCI HARDNESS TESTER LAB UCI PRO

NEW GENERATION PROBE

NOVOTEST Lab
Application For Android
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Scan to view demo protocol

- ERGONOMIC DESIGN
- BRIGHT CONTRAST DISPLAY
- MEASUREMENTS WITHOUT SMARTPHONE
- NEW HIGH PRECISION MEASUREMENT TECHNOLOGY

Compared to the previous device version, the repeatability of results is significantly improved, with reduced influence from the operator and measurement technique.

There is no need to hold the probe with the applied main load; special technology allows to fix the frequency at the right moment, regardless of the user.



The contrast display allows users to do measurements not only in NOVOTEST Lab, but also without a smartphone. This makes hardness testing quick and easy. The ergonomic design ensures a comfortable grip, preventing slipping, and is suitable for both right- and left-handed users.

SPECIFICATIONS

UCI probe loads	1kg (10N), 5kg (50N)
Measurement range	HV 10 – 1999 (9999), HB 76 – 618, HRB 41 – 105, HRC 20,3 – 68, HRE 70 – 108.5, HRF 82.6 – 115.1, HRA 60.7 – 85.6, HRD 40.3 – 76.9, HR45N 19.9 – 75.4, Knoop HK 87 – 920, Shore HS 34.2 – 97.3, Tensile strength MPa 255 – 2180
Measurement error	<4% (HV5, HV 10)
Scales	HV, HB, HRB, HRC, HRE, HRF, HRA, HRD, HR45N, Knoop, Shore, Tensile strength MPa
Materials	Pre-calibrated for Non-Austenitic Steels, Nickel, Brass, Stainless Steel, Copper, Alloyed White Irons, Aluminum
Measuring direction	Any direction 360°
Data storage	NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian, Spanish *additional languages available by request.
Power supply / Charging	Built-in battery / USB 5V
Batteries life	10 h
Operating environment	Temperature: -30°C ~ 60°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of tester	160x40 mm / 0.18 kg

LEEB HARDNESS TESTER LEEB LITE

NEW



- ULTRAPORTABLE
- HIGH AUTONOMY
- VARIOUS DISPLAY MODES
- PRECALIBRATED FOR DIFFERENT MATERIALS

NOVOTEST Leeb Lite is a reliable and easy-to-use hardness tester that employs the dynamic method. Its simple interface and controls make it convenient even for beginners.



This method is usually used for large products. Its advantages include the application for materials with a coarse-grained structure, non-ferrous metals, low requirements for the quality of the test object surface, as well as ease of use.

SPECIFICATIONS

Leeb probe type	D
Measurement range	HL: 100 – 999
Measurement accuracy	HLD: ±4
Scales	HRC, HRB, HB, HV, HL
Materials	Precalibrated for steel, alloy steel, stainless steel, cast iron, nodular iron, aluminum, brass, bronze, copper
Measuring direction	0°, 45°, 90°, 135°, 180°
Languages	English
Power supply / Charging	Built-in battery / USB 5V
Batteries life	20 h
Operating environment	Temperature: -30°C ~ 60°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of tester	150x45 mm / 0.07 kg

LEEB HARDNESS TESTER LAB LEEB

NEW

NOVOTEST Lab
Application For Android
Get it on Google Play





Scan to view demo protocol

- CALIBRTION FOR ANY SCALE
- NOVOTEST LAB COMPATIBLE
- PHOTO AND VIDEO CAPTURE
- CLOUD STORAGE AND ONE-CLICK REPORTING

This version of the device can connect to NOVOTEST Lab. Combined with a smartphone, it turns into a small portable multifunctional device for measuring, logging and sharing hardness testing results.



Perform data like graphs, histograms, statistics. Save measurements with text-, audio-, photo- and video records. Transfer test reports in one click by any convenient messenger or e-mail. Synchronize archive with cloud storage.

SPECIFICATIONS

Leeb probe type	D
Measurement range	HL: 100 – 999 Measurement ranges can be expanded by the user
Measurement accuracy	HLD: ±4
Scales	HRC, HRB, HB, HV, HL, MPa and can be calibrated for any other scale
Materials	Precalibrated for steel, alloy steel, stainless steel, cast iron, nodular iron, aluminum, brass, bronze, copper Additional custom scales and materials for calibration
Measuring direction	0°, 45°, 90°, 135°, 180°
Data storage	NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian - with NOVOTEST Lab app *additional languages available by request.
Power supply / Charging	Built-in Lion battery / USB 5V
Batteries life	10 h
Operating environment	Temperature: -30°C ~ 60°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of tester	150x50 mm / 0.075 kg

WEB FIRMWARE UPDATE

THE MOST AFFORDABLE COMBINED HARDNESS TESTER IN THE WORLD

COMBINED HARDNESS TESTER T-UD2

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NOVOTEST Lab
Application For Android
Get it on Google Play



SHOCKPROOF RELIABLE HOUSING

SIMPLE AND CONVENIENT INTERFACE

MEASUREMENT OF PRODUCTS WEIGHTING FROM 100g AND LESS

EXPANDING THE CAPABILITIES OF THE DEVICE WITH THE NOVOTEST LAB

Using the Ultrasonic Contact Impedance (UCI) method, Combined Hardness Tester NOVOTEST T-UD2 can measure products with wall thicknesses of 1 mm or even thinner with the help of a UCI Probe Test Stand NOVOTEST.



MEASUREMENT OF PRODUCTS WITH THIN WALLS

The UCI probe allows measurements of products from 100g without additional manipulations, and even less when fixing samples in a vice or special equipment.



SMALL PRODUCTS HARDNESS MEASURING

SPECIFICATIONS

UCI probe types	1kg (10N), 5kg (50N), 10kg (98N)
Leeb probe types	D, DC, DL, C, D+15, E, G
Measurement range	Vickers HV: 100~800; Rockwell HRC: 20~70; Brinell HB: 90~650 Tensile strength, MPa 370~1740 Measurement ranges can be expanded by the user (for example: 1 – 2000HV)
Measurement accuracy	±15HV, ±2HRC, ±10HB, ±4HLD
Scales	UCI probe: HRC, HB, HV, MPa Leeb probe: HRC, HB, HV, HLD, MPa
Materials	UCI probe – pre-calibrated for steel Leeb probe – pre-calibrated for steel, alloy steel, stainless steel, cast iron Additional custom scales and materials for calibration
Measuement direction	Any direction 360°
Data storage	Device - 256 measurements NOVOTEST Lab App - limited only by the memory of the Android gadgets Cloud storage - limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, German, French, Polish, Portuguese, Ukrainian, Russian *additional languages available by request.
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	20 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg

RADIUS SURFACE PRODUCTS AND PLACES DIFFICULT TO ACCESS



The ultrasonic (UCI) probe allows for hardness measurements of products in grooves and gear teeth due to its small contact area. Additionally, a special nozzle can be used to accurately measure the hardness of curved surfaces and wires.

MEASURING HARDNESS OF PRODUCTS WITH HIGH ROUGHNESS AND COARSE-GRAINED MATERIALS



The dynamic (Leeb) measurement method is less demanding on material uniformity and surface roughness. This allows users to measure the hardness of a wide range of alloys and test products without preparing the testing surface.

WEB FIRMWARE UPDATE

COMBINED HARDNESS TESTER T-UD3 LAB



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Application For Android
Get it on Google Play

BUILT-IN CAMERA

NEW BRIGHT SUNLIGHT READABLE DISPLAY

COMPATIBLE WITH NOVOTEST LAB BY DEFAULT

UPDATED UNIT AND INTERFACE DESIGN AND USABILITY

The upgraded version of the popular T-UD3 now has a high contrast display to ensure comfortable operation in both sunny and humid conditions. A rubber bumper protects the unit from damage if dropped.



OPERATION UNDER ANY CONDITIONS

The updated version of the device has a new sunlight readable bright display, updated unit and interface design, as well as improved calibration mode. It simplifies setting up the device for working with various materials. All T-UD3 Lab devices are NOVOTEST Lab compatible by default.



BENEFITS OF THE UPDATED VERSION

SPECIFICATIONS

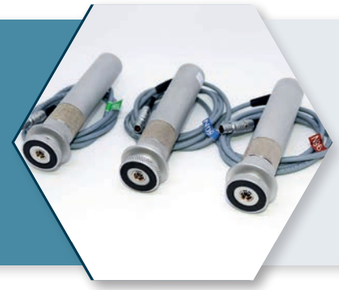
UCI probe types	1kg (10N), 5kg (50N), 10kg (98N)
Leeb probe types	D, DC, DL, C, D+15, E, G
Measurement range	Vickers HV: 100~800, Rockwell HRC: 20~70, Brinell HB: 90~650 Tensile strength, MPa 370~1740 Measurement ranges can be expanded by the user (for example: 1 – 2000HV)
Measurement accuracy	±15HV, ±2HRC, ±10HB, ±4HLD
Scales	UCI probe: HRC, HB, HV, MPa Leeb probe: HRC, HB, HV, HLD, MPa
Materials	UCI probe – pre-calibrated for steel Leeb probe – pre-calibrated for steel, alloy steel, stainless steel, cast iron Additional custom scales and materials for calibration
Measuring direction	Any direction 360°
Data storage	Device – 4GB SD card (~13000 measurements) NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, German, French, Polish, Portuguese, Ukrainian, Russian *additional languages available by request.
Power supply / Charging	3 pcs AA batteries / 5V USB
Batteries life	10 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	160x75x30 mm / 0.3 kg

WIDE RANGE OF HARDNESS TESTING APPLICATIONS



The device has two methods for measuring hardness: dynamic (Leeb) and ultrasonic contact impedance (UCI). These methods allow the user to measure the hardness of both coarse-grained massive products and complex, small products weighing as little as 100 grams and with a thickness of 1 mm or less.

VARIOUS TYPES OF PROBES



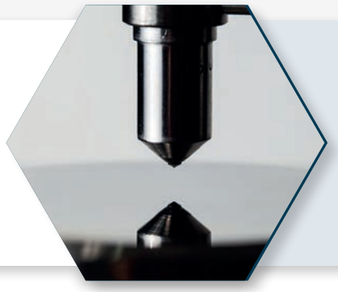
By default, the device is supplied with a 5kg (50N) UCI probe, but for special tasks it can be supplied with probe for reduced and increased load. The device can also be supplied with any type of Leeb probe (D, DC, DL, C, D+15, E, G).

BENCH HARDNESS TESTERS ROCKWELL AND SUPER ROCKWELL



- EASY TO USE
- RELIABLE AND ACCURATE
- THE FASTEST AMONG DIRECT METHODS
- THE RESULT DOES NOT DEPEND ON THE OPERATOR

Bench hardness testers implement the direct method of hardness measurement using Rockwell scales. The direct method provides guaranteed accurate results regardless of the material type, as it directly evaluates the depth of the indenter penetration into the test object.



Having a bench Rockwell hardness tester in your laboratory allows you to easily calibrate a portable device for any, even non-standard material. To do this, several measurements will need to be conducted on 2-3 samples.

SPECIFICATIONS

Model	TS-R	TS-R-C2	TS-SR-C
Scales	HRA, HRB, HRC	HRA, HRB, HRC, HRE, HRF, HRG, HRH, HRK	HR15N, HR30N, HR45N, HR15T, HR30T, HR45T
Test loads	588.4 N (60 kgf) 980.7 N (100 kgf) 1471 N (150 kgf)		147.1N (15 kgf) 294.2N (30 kgf) 441.3N (45 kgf)
Measuring range	HRC: 20-70 HRA: 20-88 HRB: 20-100		HR15N: 70-94 HR30N: 42-86 HR45N: 20-77 HR15T: 67-93 HR30T: 29-82 HR45T: 10-72
Conversion to other scales	Brinell, Vickers (automatic recalculation)		
Load application and removal	Manually	Automatically	
Data output	Dial indicator	LCD digital screen RS-232 interface Printer (optional)	
Max height of specimens	200 mm	170 mm	180 mm
Max depth of specimens	165 mm	165 mm	160 mm
Power supply	Not required	220V, 50Hz	
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C		
Dimensions (LxWxH) and weight	520x240x700 mm / 45 kg	520x240x720 mm / 60 kg	550x230x750 mm / 60 kg

BENCH HARDNESS TESTERS BRINELL



- NOT DEMANDING ON SURFACE
- HIGH MEASUREMENT ACCURACY
- WIDE LOAD RANGE (UP TO 3000 KGF)
- MEASUREMENT OF SMALL AND MASSIVE SAMPLES

Hardness testers implementing the Brinell method of hardness measurement provide the indentation of a carbide ball into the tested sample and the subsequent measurement of the diagonals of the imprint.



The pre-test load and the main load are applied automatically by an electric drive, which simplifies the operator's work. The range of load settings al- lows hardness measurement on almost all Brinell scales.

SPECIFICATIONS

Model	TS-B-C1	TS-B-C2
Scales	HB2.5/62.5, HB2.5/187.5, HB5/62.5, HB5/125, HB5/250, HB5/750, HB10/100, HB10/250, HB10/500, HB10/1000, HB10/1500, HB10/3000	
Measuring range	8-650 HB	
Test loads	62.5kgf (612.9N), 100kgf (980.7N), 125kgf (1226N), 187.5kgf (1839N), 250kgf (2452N), 500kgf (4903N), 750kgf (7355N), 1000kgf (9807N), 1500kgf (14710N), 3000kgf (29420N)	
Conversion to other scales	No	Rockwell, Vickers (automatic recalculation)
Load application and removal	Automatically	
Calculation of results	Manually from hardness tables	Automatically
Microscope magnification	20x (external)	20x (built-in)
Data output	Dial indicator RS-232 interface Printer (optional)	LCD digital screen RS-232 interface Printer (optional)
Max height of specimens	230 mm (optionally up to 400 mm)	185 mm (optionally up to 400 mm)
Max depth of specimens	135 mm	
Power supply	220 V, 50 Hz	
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C	
Dimensions (LxWxH) and weight	650x500x850 mm / 112 kg	550x210x750 mm / 125 kg

BENCH HARDNESS TESTERS VICKERS AND MICRO-VICKERS



- MEASUREMENT OF THIN SAMPLES
- LEAST DESTRUCTIVE DIRECT METHOD
- WIDE RANGE OF MEASURED HARDNESS IN ONE SCALE
- MEASUREMENT OF THE HARDNESS OF SURFACE LAYERS AND HARDENINGS

The Vickers hardness testers use a diamond tetrahedral pyramid as an indenter.

And to measure the indentation, the average of the two diagonals in relation to the applied load is taken.



One of the most accurate methods of measuring hardness, it has a wide range of scales depending on the loads. Microscopes with up to 400x magnification are used to measure the diagonals of the resulting impressions.

SPECIFICATIONS

Model	TS-V-10	TS-V-30	TS-V-50	TS-MCV
Scales	HV 0.3, HV 0.5, HV 1, HV 3, HV 5, HV 10	HV 1, HV 3, HV 5, HV 10, HV 20, HV 30	HV 1, HV 5, HV 10, HV 20, HV 30, HV 50	HV0.01, HV0.025, HV0.05, HV0.1, HV0.2, HV0.3, HV0.5, HV1
Test loads	0.3kgf (2.94N), 0.5kgf (4.9N), 1.0kgf (9.8N), 3.0kgf (29.4N), 5.0kgf (49.0N), 10kgf (98.0N)	1.0kgf (9,8N), 3.0kgf (29,4N), 5.0kgf (49,0N), 10kgf (98,0N), 20kgf (196N), 30kgf (294N)	1.0kgf (9,8N), 5.0kgf (49N), 10kgf (98N), 20kgf (196N), 30kgf (294N), 50kgf (490N)	10gf (0.098N), 25gf (0.245N), 50gf (0.49N), 100gf (0.98N), 200gf (1.96N), 300gf (2.94N), 500gf (4.9N), 1000gf (9.8N)
Measuring range	8-2900 HV			5-3000 HV
Auto-conversion to other scales	Brinell, Rockwell			HRA, HRB, HRC, HRD, HRF, HV, HK, HBW, HR15N, HR30N, HR45N, HR15T, HR30T, HR45T
Indentor	Vickers: four-sided diamond pyramid (136°)			Vickers: four-sided diamond pyramid (136°) Knoop: four-sided diamond pyramid (172.5°) - optionally
Load application and removal	Automatic			Automatic
Microscope magnification	100x (for observation); 200x (for measurement)			100x (for observation); 400x (for measurement)
Data output	Digital LCD-Display RS-232 interface (optional) Printer (optional)			Digital LCD-Display RS-232 interface (optional) Printer (optional)
Max height/depth of specimens	160 / 135 mm			65 / 120 mm
Power supply	220V, 50 Hz			
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C			
Dimensions (LxWxH) and weight	520x190x650 mm / 40 kg			470×330×520 mm / 36 kg

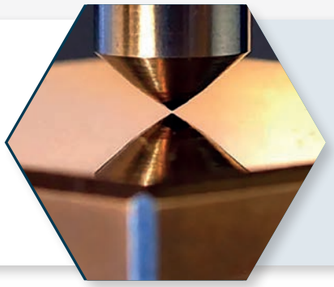
BENCH HARDNESS TESTERS BRINELL, ROCKWELL AND VICKERS

TOUCHSCREEN



- UNMATCHED VERSATILITY
- VERSION WITH LARGE TOUCHSCREEN
- HARDNESS MEASUREMENT BY THREE DIRECT METHODS
- MEASUREMENT OF HARDNESS OF VARIOUS MATERIALS AND SURFACE QUALITY

This version of the hardness testers features three hardness measurement methods with corresponding indenters and loads, making these instruments the most versatile in their class.



TS-BRV hardness tester can be supplied in different versions and packages to solve the widest range of hardness measurement tasks. A modification of the instrument with a large touch screen makes the hardness measurement process as simple and convenient as possible for the operator.

SPECIFICATIONS

Model	TS-BRV	TS-BRV-C
Scales	HRA, HRB, HRC HB/HBW HV	HRA, HRB, HRC, HRD, HRF, HRG, HRH, HRK HB/HBW HV
Test loads	Rockwell: 60 kgf (588N), 100 kgf (980N), 150 kgf (1471N) Brinell: 31.25 kgf (306.5N), 62.5 kgf (612.9N), 187.5 kgf (1839N) Vickers: 30 kgf (294.2N), 100 kgf (980.7N)	Rockwell: 60 kgf (588N), 100 kgf (980N), 150 kgf (1471N) Brinell: 15.625 kgf (153.2N), 31.25 kgf (306.5N), 62.5 kgf (612.9), 125 kgf (1226N), 187.5 kgf (1839N) Vickers: 30 kgf (294.2N), 100 kgf (980.7N)
Measuring range	HRC: 20-70, HRA: 20-88, HRB: 20-100, HB: 8-650, HV: 14-3000	
Conversion to other scales	Manual	Automatic
Load application and removal	Manual	Automatic
Data output	Analog indicator	Large 8 inch touch screen RS-232 interface Printer (optional)
Max height of specimens	Rockwell scale – 170 mm (optionally up to 400 mm) Brinell scale – 140 mm (optionally up to 370 mm) Vickers scale – 140 mm (optionally up to 370 mm)	Rockwell scale – 170 mm (optionally up to 500 mm) Brinell scale – 140 mm (optionally up to 470 mm) Vickers scale – 140 mm (optionally up to 470 mm)
Max depth of specimens	165 mm	165 mm (optionally up to 200 mm)
Power supply	220 V, 50 Hz	
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C	
Dimensions (LxWxH) and weight	520x240x700 mm / 70 kg	550x230x750 mm / 100 kg

SHORE DUROMETER

Depending on the materials being tested, the Shore hardness tester can be of two types: the Shore A scale for soft materials, and the Shore D scale for harder materials.

The Shore hardness tester is designed to measure hardness of a wide range of materials, available in two versions:



TS-A mechanical
(with analogue indicator)



TS-C digital
(with digital display)

SIMPLE AND ROBUST DESIGN

FAST HARDNESS EVALUATION

VARIOUS MODIFICATIONS AND TYPES

SPECIFICATIONS

CHARACTERISTICS	TS-A	TS-C
Data output	Dial indicator	Monochrome display
Measurement scale	Shore A or Shore D (depends on model)	Shore A or Shore D (depends on model)
Hardness measurement working range	10 – 90 HA or 20 – 90 HD (depends on model)	
Resolution	1	0.5
Measurement accuracy	1	
Measurement scale	1.25 mm	
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C	Temperature: -10°C ~ 50°C, Humidity: <95% R.H. at 35°C
Measurement scale	115x60x25 mm / 0.3 kg	115x60x26 mm / 0.3 kg

SHORE HARDNESS TEST STAND

To improve accuracy and repeatability, we recommend using a special shore hardness test stand (available separately).



METAL HARDNESS TEST BLOCKS

Standard hardness test blocks are designed for testing and calibration of hardness measuring instruments according to Brinell, Vickers, Rockwell, Super-Rockwell, Leeb, Shore scales.

On request, our company can produce blocks made of special materials to meet specific requirements.

ROCKWELL HARDNESS



VICKERS HARDNESS



BRINELL HARDNESS



LEEB HARDNESS



Hardness value	Load, kg	Tolerance across surface of test block
HRC: 25±5	150	1.1 HRC
HRC: 45±5	150	0.8 HRC
HRC: 65±5	150	0.5 HRC
HRB: 90±10	100	1.2 HRB
HRA: 83±3	60	0.6 HRA
HV 200±50	10; 5	5 %
HV: 300±50	10; 5	5 %
HV: 450±75	1; 0,5; 0,3; 0,2	5 %
HV 450±75	10; 5; 3; 2	3 %
HV 450±75	100; 50; 30; 20	2 %
HV 800±50	1; 0,5; 0,3; 0,2	5 %
HV 800±50	10; 5; 3; 2	3 %
HV 800±50	100; 50; 30; 20	2 %
HB: 100±25	1000	4 %
HB: 200±50	3000	3 %
HB: 300±50	3000	3 %
HB: 400±50	3000	3 %
HB: 600±50	3000	3 %
HLD 530±40	-	5HLD
HLD 630±40	-	5HLD
HLD 790±40	-	5HLD

SHORE HARDNESS TEST BLOCKS

Shore hardness test blocks are used to check the accuracy of readings and verify Shore hardness testers.

The A scale set includes 6 hardness test blocks of different values, and the D scale set includes 3 hardness test blocks.



EDDY CURRENT FLAW DETECTOR EDDY SENSE

WEB FIRMWARE UPDATE



NEW

- USER FRIENDLY INTERFACE
- VISUAL AND AUDIBLE ALARMS
- AUTO SETUP AND EASY TO USE
- DETECTION OF DEFECTS UNDER THE COATING

A magnetic eddy current flaw detector can identify and evaluate the depth of stress corrosion cracks as small as 2 microns. This high-precision device detects flaws in the material even under non-metallic coatings or corrosion.



User can adjust the material settings with just a button press. Operators can quickly set both audio and light alarm thresholds for defects, greatly simplifying the inspection process.

SPECIFICATIONS

Scanning speed, MIN	50 mm/s
Minimum crack opening	2 µm
Minimum depth	0.3 mm
Frequency range	1 MHz - 3.5 MHz
Languages	English or Ukrainian/Russian *additional languages available by request.
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case Standard for shop and field operation IP54
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	20 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg

CRACK DEPTH METER DEPTH MASTER

WEB FIRMWARE UPDATE

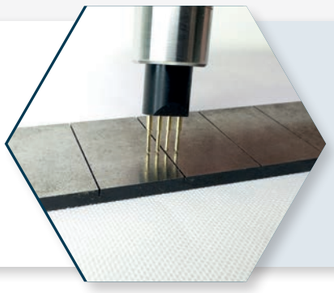


NEW

WEB interface for data transfering

- WIDE MEASURING RANGE
- PROBES OF VARIOUS DESIGNS
- MEASUREMENTS ON CURVED SURFACES
- FERROMAGNETIC AND NON-FERROMAGNETIC MATERIALS TESTING

The crack gauge is designed to measure the depth of cracks appearing on the surface of metals and alloys (including stainless steel, duralumin, titanium), previously detected by other methods.



The device uses the alternating current electropotential method, which allows to determine the depth of a crack more quickly and accurately than with traditional testing methods (ultrasonic and eddy current).

SPECIFICATIONS

Measurement crack depth range	0.5 – 30 mm
Crack depth estimation range	30 – 100 mm
Measurement error	± (0.1h+0.2 mm)
MAX crack opening	3.5 mm (depending on probe)
MIN crack length	5 crack depths or MIN 3 mm
Languages	English or Ukrainian/Russian *additional languages available by request.
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case Standard for shop and field operation IP54
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	20 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg

THICKNESS GAUGE
UT-3M-EMA



WEB interface
for data transfering

- DURABLE METAL HOUSING
- WORKS WHERE CONVENTIONAL UT FAIL
- MEASUREMENTS WITHOUT COU-PLANT AND SURFACE PREPARATION
- ENHANCED PROTECTION AND BATTERY CAPACITY AVAILABLE ON REQUEST

The electromagnetic-acoustic thickness gauge (EMAT) allows users to measure the thickness of metal products with one-side access without using couplant and through a substantial gap of up to 6 mm. This significantly reduces the material and labor required for the measurement process.



EMAT Thickness Gauge NOVOTEST UT-3M-EMA can be equipped with probes for operation on surfaces heated to a temperature of 600 °C, which makes this device the best, and in some cases, the only possible solution.

SPECIFICATIONS

Measurement thicknesses range for steel	0.6 – 300 mm (and more, depending on the probe type and object characteristics)
Coating thickness or air gap range	Up to 6 mm (depending on the object characteristics)
Measurement accuracy	±(0.01h + 0.05)
Measurement resolution	0.01 mm / 0.0001 inch
Measurement units	mm (m/s) / inch (inch/μs)
Probes temperature measurement ranges:	**- Standard probe:** -20 to +50°C **- High-temperature probe:** -20 to +250°C (depending on the conditions and measurement and cooling cycle – up to +600°C)
Ultrasound velocity adjustment range	1000 – 9999 m/s
Data Streaming function (optionally)	Real-time data (measured value) streaming from the device to a PC via cable connection.
Measurement modes	AUTO / MANUAL
Special modes	B SCAN / CONTROL
Data storage	Device - 2GB SD card (~6500 measurements)
Data transfer	PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian
Dimensions and weight of electronic unit	165×90×50 mm / 0.3 kg
Power supply / Charging	Built-in Li-ion battery / 5V USB
Batteries life	8 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C

EMAT ACCESORIES



EMAT PROBES – STANDARD AND HIGH TEMPERATURE

NOVOTEST offers two EMAT probe options: the standard ST-20 and the high-temperature HT-20. Both have identical measurement capabilities, including a range of **0.6 to 300.0 mm** and the ability to measure through coatings up to **6 mm** thick. For typical applications, the ST-20 is recommended. The HT-20, with its ceramic shield, is designed for use on hot surfaces up to **600°C**, such as pipelines and furnace components.



SCANNING TROLLEY FOR EMAT ST-20 PROBE

The scanning trolley is a mechanical fixture designed for smooth and consistent movement of the EMAT ST-20 probe across large metal surfaces. It is **ideal for inspecting** tanks, pipelines, and flat structures where manual scanning is inefficient or unstable. The trolley improves positioning accuracy and signal stability, increasing productivity during thickness mapping and B-Scan inspections.



HT-20 PROBE HANDLE (FOR HIGH-TEMPERATURE OBJECTS)

Handles for the HT-20 probe are available in lengths of **300 mm**, **450 mm**, and **600 mm**. They provide thermal and mechanical protection for the operator's hands and cable, ensuring safe and efficient operation on high-temperature surfaces.



CABLES FOR EMAT PROBES

The standard coaxial cable ensures stable data transmission and durability for regular industrial use. For high-temperature applications, a **1.8 m heat-resistant cable** is available to protect the probe during measurements on hot surfaces.



PROTECTIVE POUCH WITH STRAPS

A durable soft pouch with adjustable straps protects the UT-3M-EMAT device from **dust, moisture, and mechanical damage** during transportation and on-site work.

TOUCHSCREEN

NEW PLATFORM Nexus

WEB interface for data transfering

THICKNESS GAUGE NEXUS EMAT

NEW

NOVOTEST Lab
Application For Android
Get it on Google Play



SUNLIGHT READABLE BRIGHT TOUCHSCREEN TFT

NEW USER-FRIENDLY MODERN INTERFACE

MEASUREMENTS WITHOUT COUPLANT AND SURFACE PREPARATION

EXPANDING THE CAPABILITIES OF THE DEVICE WITH THE NOVOTEST LAB

The electromagnetic-acoustic thickness gauge (EMAT) allows users to measure the thickness of metal products with one-way access without using couplant and through a substantial gap of up to 6 mm. This significantly reduces the material and labor required for the measurement process.



CONTACTLESS MEASUREMENT

The EMA technology produces waves within the material, both ferromagnetic and paramagnetic. This allows for measurements to be made even through a coating or a poor surface, which may not be possible with traditional methods.

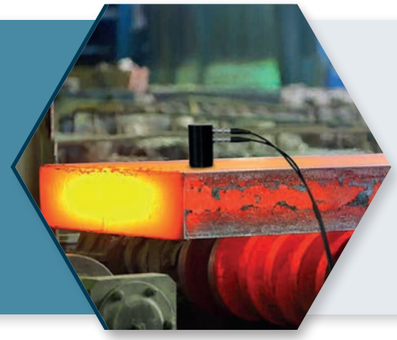


MEASUREMENT THROUGH PAINTED, OXIDIZED OR OILY SURFACES

SPECIFICATIONS

Measurement thicknesses range for steel	0.6 – 300 mm (and more, depending on the probe type and object characteristics)
Coating thickness or air gap range	Up to 6 mm (depending on the object characteristics)
Measurement accuracy	±(0.01h + 0.05)
Measurement resolution	0.01 mm / 0.0001 inch
Measurement units	mm (m/s) inch (inch/μs)
Probes temperature measurement ranges: **- Standard probe** **- High-temperature probe**	-20 to +50°C -20 to +250°C (depending on the conditions and measurement and cooling cycle – up to +600°C)
Ultrasound velocity adjustment range	1000 – 9999 m/s
Gain range	30 – 100 dB (autogain)
Measurement modes	Digital Auto Advanced
Special modes	Spreadsheet B-scan Control
Data storage	Device - 4GB SD card (~13000 measurements) NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, Spanish, Ukrainian, Russian *additional languages available by request.
Power supply / Charging	Built-in Li-ion battery / 5V USB
Batteries life	8 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit	175x85x40 mm / 0.3 kg

HIGH TEMPERATURE PROBES



EMAT Thickness Gauge NOVOTEST NEXUS can be equipped with probes for operation on surfaces heated to a temperature of 600 °C, which makes this device the best, and in some cases, the only possible solution.

USER-FRIENDLY



New intelligent automatic measurement mode that does not require operator intervention. No calibration needed, just speed setting (automatic). The tolerance control mode with automatic defect signaling, a spreadsheet of saved measurements, as well as themes for night and day use make using the device convenient and simple for any user.

GET EMAT TECHNOLOGY
WITH YOUR
ULTRASONIC DEVICE

ACTIVE EMAT PROBE
EMAT-A1



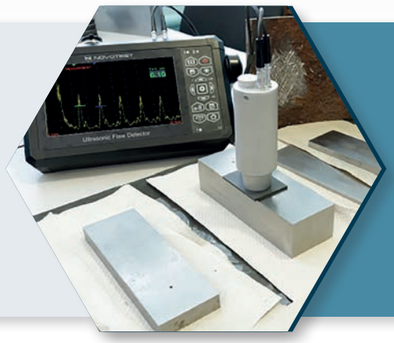
COMPACT
AND AUTONOMOUS

MEASUREMENT
WITHOUT COUPLANT

OPERATION THROUGH
THE COATINGS OR AIR GAP

OPERATES WITH ULTRASONIC
DEVICES OF ANY MANUFACTURER

Active EMAT Transducer EMAT-A1 is a new technical improvement for classic flaw detector/thickness gauge with A-scan. It employs electromagnetic acoustic transducer instead of a conventional piezoelec tric one.



IMPROVEMENT OF STANDARD FLAW DETECTOR

The applications of the transducer include operation without couplings, work on rusted surfaces without preparation, thickness measurement under coatings (paint or other insulating coatings), thickness measurement of high temperature objects and many other tasks not possible with classical piezoelectric transducers.



ADVANTAGES OF EMAT TECHNOLOGY

SPECIFICATIONS

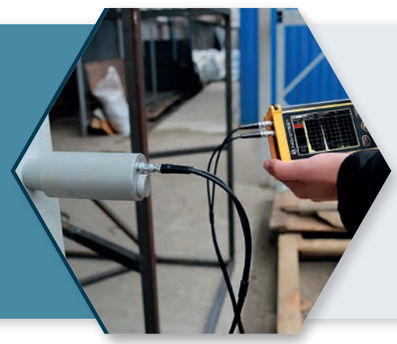
Measurement thicknesses range for steel	0.8 – 300 mm (Depends on object characteristics and flaw detector / thickness gauge)
Coating thickness or air gap range	Up to 3 mm
Transducer type	EMAT, active
Transducer angle	0 degree
Type of ultrasonic wave	Transverse, radially polarized
Connection pattern	Separately-combined
Flaw detector/thickness gauge generator excitation	A-scan with bipolar pulse signal at amplitude of 100V or more
Type of connectors	Lemo 00, 2pcs
Power supply	1 pc AA battery or 14500 / AA charger
Operating environment	Temperature: -30°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight (with batteries)	Ø38x105 mm / 0.25 kg

CONNECTION TO ANY DEVICE



The EMAT-A1 transducer is compatible with all modern ultrasonic flaw detectors and thickness gauges that support A-scan and can excite a bipolar pulse.

COMPACT AND AUTONOMOUS



The EMAT-A1 operates on both a replaceable AA battery and standard lithium-ion batteries. It automatically powers on and off in response to excitation pulses from the flaw detector or thickness gauge, eliminating the need for manual switching.

ULTRASONIC FLAW DETECTOR UD2301



WEB interface for data transfering

- MULTIFUNCTIONAL
- DAC, TVG and DGS FUNCTIONS
- COMPACT, LIGHTWEIGHT AND ERGONOMIC
- FOUR DISPLAY ORIENTATION OPTIONS

The UD2301 Ultrasonic Flaw Detector is a powerful, ergonomic, portable device with all the functions of a general industrial ultrasonic flaw detector. It can be used in the laboratory or workshop and is perfect for field use.



Device can detect various internal defects, violations of the homogeneity of products and structures, measure wall thickness, and test welded joints.

SPECIFICATIONS

Operating frequency range	1 – 10 MHz
Velocity range	1000 – 9999 m/s
Scan range / Delay range (V=6000 m/s)	24 – 6000 mm / 0 – 6000 mm
Measurement accuracy of time / amplitudes	±0.025 μs / ±0.5 dB
Measurement scales	mm
Gain range	0 – 126 dB
Scanning modes	A, B-scan, FFT
Probe types	Straight beam, angle beam, single, dual, echo, echo-echo, EMAT
Measurement modes	DAC, TVG, DGS, AFS
Quantity of control points for DAC, TVG	16
Data storage	Device - 4GB SD card (~13000 measurements)
Data transfer	PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian *additional languages available by request.
Display	TFT/LCD, 480x320 pixels
Power supply / Charging	3 pcs AA batteries / 5V USB
Batteries life, MIN	4 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	162x80x38 mm / 0.35 kg

ULTRASONIC FLAW DETECTOR UD2303

WEB interface for data transfering



- ROBUST METAL CASE
- INCREASED AUTONOMY
- IMPROVED SIGNAL STABILITY
- AWS AND INCHES ARE AVAILABLE

Ultrasonic flaw detector UD2303 is a compact version of an industrial flaw detector with a set of functions and modes that are designed to simplify the routine process of product quality testing as much as possible.



The shock-resistant aluminum alloy housing and high-capacity battery ensure a long service life and the ability to operate in adverse conditions.

SPECIFICATIONS

Operating frequency range	1 – 10 MHz
Velocity range	1000 – 9999 m/s
Scan range / Delay range (V=6000 m/s)	2.5 – 1125 mm / 0 – 6000 mm
Measurement accuracy of time / amplitudes	±0.025 μs / ±0.5 dB
Measurement scales	mm, inch
Gain range	0 – 100 dB
Scanning modes	A, B-scan, FFT
Probe types	Straight beam, angle beam, single, dual, echo, echo-echo, EMAT
Measurement modes	AWS, DAC, TVG, DGS, AFS
Quantity of control points for DAC, TVG	16
Data storage	Device - 4GB SD card (~13000 measurements)
Data transfer	PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian *additional languages available by request.
Display	TFT, 480×320 pixels
Power supply / Charging	Built-in Li-ion battery / USB 5V
Batteries life	8 h
Operating environment	Temperature: -30°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit	165x90x50 mm / 0.5 kg

ULTRASONIC FLAW DETECTOR UD3701

TOUCHSCREEN



WEB interface for data transfering

MULTI TOUCH SCREEN

BRIGHT TFT 7" DISPLAY

DGS, DAC AND TVG MODES

ALL EXPERT-CLASS FUNCTIONS

SPECIFICATIONS

Operating frequency range	1 – 10 MHz
Velocity range	1000 – 9999 m/s
Scan range / Delay range (V=6000 m/s)	42 – 3930 mm / 0 – 1950 mm
Measurement accuracy of time / amplitudes	±0.025 μs / ±0.5 dB
Measurement scales	mm, μs (or inch by request)
Gain range	0 – 105 dB
Scanning modes	A-scan, FFT
Probe types	Straight beam, angle beam, single, dual, echo, echo-echo, EMAT
Measurement modes	Thickness gauge Flaw detector: DAC, TVG, DGS, AFS, AWS (optional)
Quantity of control points for DAC, TVG	16
Data storage	Device - 4GB SD card (~13000 measurements)
Data transfer	PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian *additional languages available by request.
Display	7-inch touch screen, 800x480 pixels, 155x85 mm
Power supply / Charging	Built-in Li-ion battery / 5V charger
Batteries life	20 h
Operating environment	Temperature: -30°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit	295x185x50 mm / 1.4 kg

MULTIFUNCTIONAL



Ultrasonic flaw detector, ultrasonic thickness gauge, inspection settings database, inspection results archive, probes archive - all these modes are available in UD3701, making it truly multifunctional.

ALL MODES IN ONE DEVICE



UD3701 can build and configure the Distance Amplitude Correction (DAC) and Time Varied Gain (TVG) functions, as well as DGS (Distance Gain Size) mode, to estimate the equivalent reflector size.

TOUCHSCREEN INTERFACE



Thanks to the high-resolution color touch screen, the instrument offers an intuitive way to operate all settings and control modes. For example, changing the position of the strobe on the screen without a keyboard or knobs makes using the device very convenient.

UNIVERSALITY OF APPLICATION



The device is ideal for performing ultrasound diagnostics both indoors and outdoors. However, it can be used in the field if necessary. To do this, we recommend us a special cover that protects the device from dirt and moisture, and also allows the operator to have his hands completely free and easily testing of various products on site.

ULTRASONIC THICKNESS GAUGE UT-2A (A-SCAN)

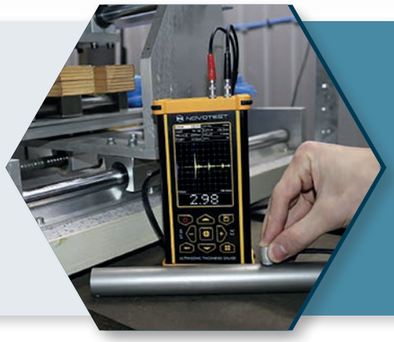


WEB interface
for data transfering

- A-SCAN AND B-SCAN
- WIDE FUNCTIONALITY
- HIGH MEASUREMENT ACCURACY
- SOLUTION OF NON-STANDARD TASKS

HIGH MEASUREMENT ACCURACY

As zero-crossing method of thickness measurement provides a maximum measurement accuracy, this method of measurement does not depend on the signal amplification. High-performance computing FPGA microcircuit ensures high resolution in thickness, while keeping the speed of operation and the stability of the signal.



EASY-TO-USE INTERFACE

This type of gauge is also suitable for inexperienced users, with the digital measurement mode being the same as on the original gauge. The digital thickness values are displayed in large characters and do not need to be adjusted on A-scan. Therefore, simplicity and comfort are identical to the classic Ultrasonic Thickness Gauge UT-1M.



SPECIFICATIONS

Measurement thicknesses range for steel	0.45 – 1500 mm and more (depending on material and surfaces)
Measurement accuracy	±(0.01h + 0.05) mm *for range 0.8 – 300 mm
Basic probes / range for steel	2.5 MHz / 2.5 – 1000 mm 5 MHz / 0.8 – 500 mm 10 MHz / 0.45 – 300 mm
Optional probes / range for steel	1.25 MHz / 4 – 1500 mm 2 MHz / 3 – 1200 mm High-temperature 5MHz (up to 250°C) / 0.8 – 300 mm Echo-Echo 5MHz for through-coating measurements / 3.5 – 26 mm EMAT-A1 / 0.8 – 300 mm
Measurement units	mm (m/s) inch (inch/μs)
Measurement resolution	0.01 mm / 0.001 inch
Ultrasound velocity adjustment range	700 – 17000 m/s
Gain range	0 – 120 dB
Operating modes	A-scan, B-scan, Control mode, Manual
Measurement methods	Echo Echo-Echo (Dual Echo) Peak-Peak
Data storage	4GB SD card (~13000 measurements)
Data transfer	PC: - Online – NOVOTEST.INFO
Languages	English, Spanish, Ukrainian, Russian *additional languages available by request.
Body type / Dust and moisture protection level	Metal, durable / Standard for shop and field operation
Power supply / Charging	Built-in Li-ion battery / 5V USB
Batteries life	10 h (optional 20 h)
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit	165x90x50 mm / 0.5 kg

OPERATING MODES



The UT-2A Thickness Gauge offers useful and special operating modes for increased user convenience. Control mode allows users to set nominal thickness and allow deviation from the nominal value. B-Scan mode displays the product profile with a cross section of the test object by scanning the probe surface. This mode allows the profile (section) of the test object to be visualized.

COMPARATIVE ADVANTAGES OVER CLASSIC THICKNESS GAUGE



Unlike conventional thickness gauges, which only display a thickness value, the A-scan thickness gauge visualizes the signal for subsequent analysis by the operator.

By observing the reflected signals, false triggering can be eliminated and the thickness gauge can be set as correctly and accurately as possible.

ULTRASONIC THICKNESS GAUGES UT-1M



Scan to view demo protocol

VARIOUS TYPES OF PROBES

RAPID THICKNESS TESTING

SIMPLE AND CONVENIENT INTERFACE

VARIOUS DESIGNS OF ELECTRONIC UNITS



NOVOTEST Lab
Application For Android
Get it on Google Play

NOVOTEST UT-1M

The basic ultrasonic thickness gauge that can solve various tasks of thickness measurement. Reliable, simple and time-proven, the gauge has a housing with a protective silicone bumper to prevent it from slipping from hand and in case of falling.



NOVOTEST Lab
Application For Android
Get it on Google Play

NOVOTEST UT-1M-IP

Special version of ultrasonic thickness gauge, designed to work in harsh operating conditions - dusty rooms, high humidity, rain. This version of the device can be supply with unprecedented autonomy (in the special version up to 200 hours of continuous operation).



WEB interface for data transfering

NOVOTEST UT-1M-ST

The version of the thickness gauge in a metal case, designed for extreme operating conditions with a risk of damage to the device during operation. Rugged aluminum housing withstands high static and dynamic loads.

SPECIFICATIONS

Model name	UT-1M	UT-1M-IP	UT-1M-ST
Measurement thicknesses range for steel	0.45 – 1500 mm and more (depending on material and surfaces)		
Measurement accuracy	± (0.01h+0.05) mm *for range 0.8 – 300 mm		
Basic probes / range for steel	2.5 MHz / 2.5 – 1000 mm 5 MHz / 0.8 – 500 mm 10 MHz / 0.45 – 300 mm		
Optional probes / range for steel	1.25 MHz / 4 – 1500 mm 2 MHz / 3 – 1200 mm High-temperature 5MHz (up to 250°C) / 0.8 – 300 mm Echo-Echo 5MHz for through-coating measurements / 3.5 – 26 mm		
Measurement units	mm (m/s) inch (inch/μs)		
Measurement resolution	0.01 mm / 0.0001 inch		
Ultrasound velocity adjustment range	1000-17000 m/s		
Gain range	±20 dB		
Operating modes	Normal B-scan Control mode		
Measurement methods	Echo, Echo-Echo (Through-Coat)		
Data storage	Device - 128 measurements NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage		Device - 128 measurements
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO		PC: - Web interface – NOVOTEST.INFO
Languages	English, Spanish, Ukrainian, Russian *additional languages available by request.		
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case / Standard for shop and field operation	Plastic, sealed / High, IP65 (optionally up to IP67 for water immersion up to 1m deep)	Metal, durable / Standard for shop and field operation
Power supply / Charging	2 pcs AA batteries / AA charger	3 pcs AA batteries / 5V USB	2 pcs AA batteries / AA charger
Batteries life	25 h		
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C		
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg	160x90x28 mm / 0.35 kg	130x90x37 mm / 0.35 kg

ULTRASONIC PROBES AND CABELES



- CUSTOMISATION
- ECHO-ECHO PROBES
- HIGH TEMPERATURE PROBES
- VARIOUS STANDARD PROBES

Our company has extensive experience in manufacturing probes with different parameters of frequency, housing size, lapping to diameters, special requirements for arrow, near zone, focusing etc.



Piezoelectric probes, together with ultrasonic flaw detectors, are designed for inspection of welded and soldered joints, elements of metal structures, pipelines for detection of defects of different orientation (cracks, non-metallic inclusions, non-welds, pores, ricks, etc.).







Also our company produces cables for connection of probes to devices. On special request we can make cables with special shielding, heat-resistant, of specific length and with the most specific connectors.

REFERENCE AND CALIBRATION BLOCKS



- CUSTOMISATION
- WIDE RANGE OF MATERIAL
- GOOD ACOUSTIC SPECIFICATIONS
- HIGH MANUFACTURING ACCURACY



REFERENCE TEST BLOCKS

Reference blocks, which are made of certain materials, of specified geometry: V1, V2, for DAC, AWS etc.



CALIBRATION TEST BLOCKS FOR THICKNESS GAUGES

Step wedge thickness calibration block and a set of ultrasonic standard thickness samples KUSOT-180 (KTM-176), which are used for calibration, adjustment and verification of operation of various ultrasonic thickness gauges.



SPECIAL REFERENCE TEST BLOCKS

Special samples (standard enterprise samples), which are manufactured according to the special needs of a particular enterprise: with artificial reflectors such as flat-bottom hole, lateral cylindrical bore, segmental reflector, angle reflector etc.

COATING THICKNESS GAUGE TP-2020



Scan to view demo protocol

NOVOTEST Lab
Application For Android
Get it on Google Play

HIGH MEASUREMENT SPEED

MULTI-POINT PRECISION CALIBRATION

HIGH MEASUREMENT ACCURACY

INBUILT MEMORY AND TRANSFER TO A PC

SPECIFICATIONS

Measuring thicknesses range (depends on probe type)	0 µm – 60 000 µm / 60 mm / 2.3622 inch
Measuring accuracy (depends on probe)	±(0.03h+0.002) mm
Measuring units	mm, inch, mil, µm
Probe types	Probe F – Coatings on steel (dielectric and conductive coatings on ferromagnetic metals and alloys) Probe NF – Coating on the non-magnetic metals (Any (dielectric or metal) coatings on non-ferrous metals and alloys) Probe M – Thick coatings on metals (dielectric coatings on metals) Probe DSH – Measurement of surface roughness, Rz (After abrasive blasting pre-painting work) Probe DT, probe DTVR – Temperature, humidity and dew point
Data storage	Device – 256 NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface – NOVOTEST.INFO
Languages	English, French, Spanish, Ukrainian, Russian *additional languages available by request.
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case Standard for shop and field operation IP54"
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	20 h
Operating environment	Temperature: -30°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg

Coating Thickness Gauge TP-2020 is designed for measuring the thickness of various coatings on both ferrous and non-ferrous metals. The main advantage among analogues is the wide choice of transducers in a wide range of thicknesses from 1 micron to 60 mm.



WIDE MEASUREMENT RANGE

VARIOUS OPERATING MODES



Normal - current measurement.

Reference - the instrument displays deviations from the set thickness.

Statistics - maximum and minimum value, deviation, average value, number of measurements.

Averaging mode - averages the values of the series.

The thickness gauge is a multifunctional device that can measure the following parameters in addition to coating thickness: groove depth and corrosion, surface roughness, as well as temperature control, ambient humidity and dew point.



MULTIFUNCTIONAL

SIMPLE AND PRACTICAL



The instrument does not require any special operator training. It has a special protective cover that prevents damage if dropped, and the contrast display with adjustable brightness allows use in any lighting condition.

PULSE HOLIDAY DETECTOR SPARK-1

SPARK-1 is a device for detecting defects (thinning, microholes, cracks, etc.) in dielectric coatings on metals. The principle of operation is based on the electrospark method. A probe with an electrode connected to one pole of the voltage source scans the test object along the coating. The second pole of the voltage source from the ground terminal should be connected directly to the metal structure. The electronic unit uses voltage to fix the gaps between the electrode and the conductive base.



SPECIFICATIONS	
Measurement coating thicknesses range on steel	12 mm
Testing materials	Dielectric coatings
Measurement diameter range of the detected defects, not less	0.1 mm²
Output voltage	0 – 40 kV
Output voltage resolution	0.1 kV
Electrode types	T-shaped, sickle, brush, ring, spring and other types of electrodes
Languages	English or Ukrainian/Russian *additional languages available by request.
Body type / Dust and moisture protection level	Aluminum alloy, rubber bumpers
Power supply / Charging	Built-in Li-ion battery / Power supply
Batteries life	15 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	180x115x65 mm / 1 kg



Spring probes for tubes



Band-brush probe

PINHOLE DETECTOR ED-3D

ED-3D designed for rapid non-destructive testing of the continuity of coatings (e.g. porosity of films) up to 500 μm thick according to ASTM G62-A. Pinhole Detector is used to test the porosity of partially painted places and other discontinuities of protective dielectric coatings on metal products by applying low voltage through a sponge which is soaked in a liquid electrolyte with high penetration properties.



SPECIFICATIONS	
Control voltage	9V; 67.5V; 90V
Coating thickness range	0 – 500 μm
Testing materials	Dielectric coatings
Languages	English or Ukrainian/Russian *additional languages available by request.
Body type / Dust and moisture protection level	Aluminum alloy, rubber bumpers
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	10 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	185x90x55 mm / 0.6 kg

FILM APPLICATOR AU-1

AU-1 is designed for application of paints and other materials of required film thickness during the complex tests according to ASTM D 823-E.

Users can set the height of the gap by micrometer heads in the range of 10-6000 μm. The height of the gap should provide the necessary thickness of the paint film. The applicator should be placed on the edge of the test plate, then necessary amount of tested material should be poured in front of the gap and move the applicator along the plate at constant speed of 5-10 cm/s, dispensing the test material on the plate.



SPECIFICATIONS	
Slot width	65, 150, 200, 300 mm and others
Coating thickness range	10 – 6000 μm
Coating thickness accuracy	±5 mm
Dimensions and weight of the device (150 mm model)	160x125x155 mm / 1.6 kg

DEPTH GAUGE LIMIT S-3

Mechanical depth gauge of focal corrosion meets ASTM D 4417-B, SANS 5772, US Navy NSI 009-32, and US Navy PPI 63101-000 and serves for the following tasks (depending on configuration): measuring the peak-to-valley height of a blast cleaned surface; measuring the depth of focal corrosion; and measuring the depth of narrow holes and grooves.



SPECIFICATIONS	
Diameter of the contact pad	10 mm / 25 mm / 40 mm
Minimum diameter of hole or the minimum width of groove	1.7 (for 25 mm pad)
Measurment depth range	0.05 – 8 mm
Testing materials	Metals
Dimensions and weight of the device	110x58x45 mm / 0.15 kg

COATING THICKNESS GAUGE TPN-1

TPN-1 is designed to measure the thickness of both single and multiple layer coatings on any grounds, both metallic and non-metallic. The principle of operation is based on the local cut (notch) of the coating at the tested location and measurement of thickness of this coating. The thickness of coating is determined by the width of notch, it is possible thanks to the special form of cutter of the instrument. The measurement can be done by any portable measuring microscope with a suitable measuring range and discreteness.



SPECIFICATIONS	
Measurement resolution	Depends on the cutter
Measurement accuracy	Half of scale unit of the microscope
Thickness measurement range	Depends on the length of scale microscope (μm)
Testing materials	Metals
Dimensions and weight of the device	170x50x50 mm / 0.36 kg



BENDING COATING TESTER CONICAL BEND IK

The device is a frame in which the truncated cone rod is fixed. A pulling rod is installed in a movable frame with a handle, which is used to bend the sample around the cone. The test sample is fixed in the device with a clamp, and is bent around the cone with a shaft.



BENDING COATING TESTER CYLINDRICAL BEND IR

The device measures the elasticity and bending strength of coatings around cylindrical rods with diameters from 2 to 32 mm. The method consists in determining the minimum diameter of a metal rod, which, when bent, does not cause mechanical destruction or peeling of a single layer or multi-layer paint film from a metal plate.



BENDING COATING TESTER BEND ShG

The device measures the elasticity and strength of coatings when flexed around a set of cylindrical rods. Rod diameters: 1; 2; 3; 4; 5; 6; 8; 10; 12; 15; 16; 20 mm. The operator tests the coating manually to determine the minimum diameter of the rod at which there is no destruction.



BENDING COATING TESTER BEND ShG-2

The modification of the device is similar to the Bending Coating Tester NOVOTEST BEND ShG; the elasticity and strength of coatings is also determined by manual bending of the sample around cylindrical rods with diameters of 9.5 mm, 12.7 mm, 15.9 mm, 19 mm, 25.4 mm, as well as two test surfaces of 3.2 mm and 6.4 mm.



IMPACT TESTER STRIKE UNIVERSAL

STRIKE UNIVERSAL is designed to determine the impact strength of coatings in accordance with various standards. It can be equipped with various strikers and dies depending on regulatory documents.

SPECIFICATIONS				
	GOST 4765	GOST 53007	ISO 6272	ASTM D 2794
Load weight, kg	1; 0.5; 1.5	1; 2 + add. 1; 2	1+ add. 2	1
Device scale length, mm	1200; 500	1200		
Graduation, mm	1; 25 ± 0.5			
Matrix working part diameter, mm	≥40			
Matrix hole diameter, mm	15 or 28	16.3 or 27	16.3 or 27	16.3
Striker ball diameter, mm	8 or 14.1 or 15	12.7 or 15.9 or 20		12.7 or 15.9
Dimensions and weight	1340x275x220 mm / 16 kg 840x275x220 mm / 16 kg	1340x275x220 mm / 16 kg	1340x275x220 mm / 16 kg	1340x275x220 mm / 16 kg

PIPE IMPACT TESTER STRIKE U1-4219

The device is intended for testing the strength of coatings upon impact on pipelines, during their installation and operation. Pipe Impact Tester STRIKE U1-4219 allows testing directly on the pipeline and does not require the production of samples.

SPECIFICATIONS		
	DSTU 4219	GOST 51164
Device scale length	500 mm	
Graduation	10 mm	
Load weight	3 kg	
Striker ball diameter	16 mm	
Diameter of additional striker ball	8, 12.5 mm	
Dimensions and weight	815x200x175 mm / 10 kg	



ERICHSEN CUPPING TESTER SHE-1

The Erichsen Cupping Tester ShE-1 is designed to determine the strength and elasticity of coatings by pressing a 20 mm diameter spherical punch into a coated object.

SPECIFICATIONS	
Spherical punch tip diameter	20 mm
Matrix inner diameter	27 mm
Measurement range	0 – 25 mm
Dimensions and weigh	380×240×210 mm, 17 kg

TENSILE ADHESION TESTER AC-1

Adhesion is the tendency of dissimilar particles or surfaces to stick to each other. Tensile Adhesion Tester AC-1 is a pull-off type adhesion tester for determining the adhesion strength in MPa and can be used in accordance with EN13144, ISO4624 and ISO16276-1.



SPECIFICATIONS		
Lift force range	0 – 200 kgf	
Dollies	№ 1	№ 2
Diameter of dollies / Measurement range	15.1 mm / 10 MPa	19.5 mm / 6 MPa
Measurement resolution	2	1
Dimensions and weight	150x70 mm / 1 kg	

CROSS CUT ADHESION TESTER AN-1

Adhesion Tester AN-1 is designed for cut (parallel or grid) adhesion testing method, and for thickness range of paint coatings up to 200 µs, according to ISO 2409, ISO 16276-2, and ASTM B 3359. Device can be used on both flat and curved surfaces.



SPECIFICATIONS	
Number of cutters	3 (double sided)
Distance between working blades	1, 2, 3 mm (other cutters are optional)
Number of working blades on each cutter	6
Dimensions of a cutter	28x36x4.8 mm
Sharpening angle of the cutting part	30°
Thickness range of coatings	<60 µm – with 1 mm spacing (for hard substrates); <60 µm – with 2mm spacing (for soft substrates); 60-120 µm – with 2 mm spacing (for both soft and hard substrates); 121-250 µm – with 3 mm spacing (for both soft and hard substrates).
Dimensions and weight	170x50x50 mm / 0.25 kg

CROSS HATCH ADHESION PLATE AH-AR

The instrument is designed to measure the adhesion value of coatings following ISO 16276- 2 and ASTM D 3359. Adhesion tester consists of a flat steel plate with normalized slots, which is used as a template to make incisions with a knife.



SPECIFICATIONS	
Number/length/width of cuts, for **- 1 mm** **- 2 mm** **- 3 mm**	 6 pcs / 35 mm / 0.35 mm 6 pcs / 40 mm / 0.45 mm 6 pcs / 50 mm / 0.45 mm
Length/width of X shaped cuts	50 mm / 0.45±1 mm
Angle between X shaped cuts	35°
Coating thickness range, mm	Not rated
Dimensions and weight	80x75x1 mm / 0.025

BITUMEN AND MASTIC INSULATION ADHESION TESTER SM-1M

Adhesion tester SM-1M is a device for measuring the adhesion value of bitumen pipe insulation and other insulating coatings which are based on bitumen. SM-1M is a mechanical instrument which allows determining the adhesion value of quality and quantity, by measuring the strength of sticking the bitumen insulation to the surface of the pipeline.



SPECIFICATIONS	
Measurement range	0 – 39 N
Thickness range of coatings	0 – 15 mm
Diameter of controlled pipes	270 – 1420 mm
Measurement error in the range from 3.9 to 39 N, no more	±(0.5 N/mm + 5%)
Dimensions and weight	230x96x83 mm / 2.5 kg

PEEL ADHESION TESTER AP-1M

Adhesion tester AP-1M is designed to measure the adhesive strength of coatings on various structures, as well as to determine the adhesion value of polymeric insulation tapes commonly used for pipes insulation. Adhesion tester AP-1M is reliable and easy in operation.



SPECIFICATIONS	
The maximum peel force value	100 N/cm
The thickness of the controlled coating	<15 mm
Measurement accuracy	1 N/cm
Peeling angle	180°
Diameter of controlled pipes	270 – 1420 mm
Width of cut tape samples	10 – 40 mm
Dimensions and weight	275x85x30 mm / 0.45 kg



DEVICES FOR COATING STRENGTH AND HARDNESS TESTING



SCRATCH ADHESION TESTER C1-M

Device is used for determining the adhesion and resistance to damage by scratching in according to ASTM D 2197 “Method of determining the adhesion of organic coatings through scratching”. The cutting unit with interchangeable intenders is pressed against the surface with load and moved to the predetermined distance, and then the operator visually assesses the damage.



SCRATCH HARDNESS COATING TESTER TPP-1518

TPP-1518 is used for hardness testing of coatings (paint, mastic, plastic and others) through determining the hardness resistance to indentation of the ball tip diameter of 1 mm and also for testing of the coating resistance to the scratching (ISO1518). The device can be used on uneven surfaces, surfaces with curvature and limited sizes.



PENCIL COATING HARDNESS TESTER TPK-1

The instrument is widely used for hardness testing of powder and liquid paint coatings. Testing starts with the softest pencil leads. If there is no evidence of damage to the tested coating after application, the user must repeat the test with one grade harder pencil leads. The MAX hardness value of pencil leads that leaves no any traces of destruction on the coating, is the hardness value of tested coating (for example: 3H, 2H, H, HB, B, 2B, etc.).



BUCHHOLZ COATING HARDNESS TESTER TB-1

TB-1 is used to measure the hardness of coatings using the indentation method (tapered disc of stainless steel block with constant test load of 500g). The device is placed on the coating for 30 seconds and the length of each indentation in the coating is to be measured using the graduated microscope. Using the conversion scale, users can get the result in Buchholz indentation resistance units.

DEVICES FOR LIQUID MATERIAL TESTING



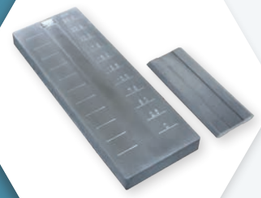
VISCOSITY MUG VMS

Viscosity Dip Mug NOVOTEST VMS is used to determine the convectional viscosity of the dispersion polyvinyl-acetate homopolymers coarse dispersion. The device consists of cylindrical brass vessel with a handle and 3 orifices. The time taken for the fluid to flow from the first hole to the second is recorded.



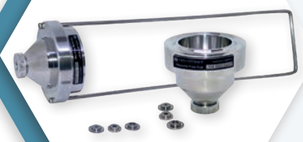
DENSITY CUP P-1

The method of measuring of the density consists in determining the mass of tested material which is placed to the container (pycnometer) of known volume at a certain temperature. The density is calculated by dividing the weight obtained by the volume of the tested liquid. Density cup (pycnometer) NOVOTEST P-1 is complies with ISO 2811-1.



GRINDOMETER GD-1

Grind gauges are used to determine particle size and fineness of grind. The tested materials are paints, chocolates, inks, coating materials, etc. The instrument is made of hardened stainless steel. The scale of the top of GD-1 is graduated in micrometers.



VISCOSITY FLOW CUP VZ-246

Viscosity is an important parameter for lubricants, paints, and other liquids. It characterizes the ability of materials to resist movement between its parts. VZ-246 is designed for determining the conditional viscosity of Newtonian fluids. It can be used on a tripod or with a special stand. It is also suitable for testing liquids, and there is a submersible flow cup available for this purpose.

STRENGTH METER IPSM



- VARIOUS PROBES TYPES
- CRACK DEPTH MEASUREMENT
- ANY MATERIALS CALIBRATION
- NON-DESTRUCTIVE STRENGTH TESTING OF MATERIALS

IPSM is an Ultrasonic Pulse Velocity (UPV) tester is used for strength measurements and to find defects in concrete products, bricks, and other solid materials. It analyzes the propagation of ultrasonic waves in the material to evaluate parameters such as strength, density, elastic modulus, and sound index.

These parameters have a correlation with the velocity of ultrasound propagation in the material.

SPECIFICATIONS

Measurement range of US pulse propagation time	10 – 9999 μs	
Measurement accuracy / resolution of US pulse propagation time	0.5 μs / 0.1 μs	
Measurement methods	Determine the strength Determine the density Determine the modulus of elasticity Determine the sound index	Estimate the crack depth (English method) Estimate the crack depth (Russian method) Performing inspection of the test object
Probes frequency	50 – 100 kHz	
Output voltage	Up to 600 V	
Data storage	Device - 128 measurements	
Data transfer	PC: - Online – NOVOTEST.INFO	
Languages	English or Ukrainian/Russian *additional languages available by request.	
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case / Standard for shop and field operation	
Power supply / Charging	2 pcs AA batteries / AA charger	
Batteries life	10 h	
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C	
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg	

CONCRETE REBOUND HAMMER (SCLEROMETER) MSh



Concrete rebound hammer (sclerometer) is used to test the strength of concrete and other construction materials. The method is based on hitting the concrete surface with the hammer with predetermined (standardized) impact energy and measuring of the height of the hammer rebounding. The strength of concrete is determined with the calibration charts supplied with the instrument.

SPECIFICATIONS

Names / model	NOVOTEST MSh-225	NOVOTEST MSh-75	NOVOTEST MSh-20
Measurement range of strength	10 – 60 MPa	10 – 60 MPa	1 – 25 MPa
Impact energy	2207 J	735 J	196 J
Minimum thickness of testing object	70 mm and more	50 – 100 mm	30 mm and more
Measurement accuracy	10%		
Hardness value of impact plunger working surface, no less	60 HRC		
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C		
Dimensions and weight	20x34x10 mm / 1.1 kg		

CONCRETE COVER METER REBAR DETECTOR



- SCAN MODE WITH SOUND ALARM
- PROTECTIVE LAYER MEASUREMENT
- DETERMINATION OF REINFORCEMENT POSITION
- ASSESSMENT OF REINFORCEMENT DIAMETER



Concrete Cover Meter NOVOTEST Rebar Detector is used to measure the thickness of the concrete cover, determine the location and estimate the diameter of rebar in reinforced concrete products in the conditions of enterprises, construction sites, buildings and structures in use.

SPECIFICATIONS

Range of measuring the thickness of the protective layer	5 – 170 mm
Controlled diameters	6 – 50 mm
Thickness measurement accuracy of the protective layer	(0.03 h + 0.5) mm
Measurement accuracy of the rebar diameter	Not regulated, depends on the testing object
Measuring units	mm, inch (optional)
Languages	English or Ukrainian/Russian *additional languages available by request.
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case Standard for shop and field operation IP54
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	8 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg

STEEL STRUCTURE ANALYZER KRC-M2



WEB interface
for data transfering

- UNIVERSAL DEVICE
- DUPLICATE DISPLAY ON PROBE
- CALIBRATION ON ANY SAMPLES
- WIDE RANGE OF PARAMETERS FOR ASSESSMENT

The main area of application of the steel structure analyzer is the monitoring of the stress-strain state and residual life of pipelines, elevators, cranes and hoists, pressure vessels, and the monitoring of mechanical engineering products and metallurgy.



The device probe is equipped with an additional display and control buttons for basic functions. The device has an archive of measurements with the ability to transfer records to a PC. In calibration mode, the user can build relationships for various characteristics of the metal, as well as change existing calibrations and create new ones.

SPECIFICATIONS

Measurement modes	Measurement of coercive force Current measurement Code measurement (units) Additional scales for calibration
Coercive force measurement range	1 – 40 A/cm / 100 – 4000 A/m
Magnetize	Pulse
Additional scales for calibration	7
Data storage	Device – 4GB SD card (~13000 measurements)
Data transfer	PC: - Web interface – NOVOTEST.INFO
Languages	English, Ukrainian, Russian *additional languages available by request.
Power supply / Charging	Li-Ion battery / 18V charger
Batteries life	8 h
Operating environment	Temperature: -30°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	200x162x50 mm / 1.2 kg

GAUSSMETER MF-1M



WEB interface
for data transfering

- THRESHOLD ALARM FUNCTION
- DC, AC AND PULSED MAGNETIC FIELDS
- SELECTION OF UNITS OF MEASUREMENT
- VARIOUS PROBES AND WIDE MEASUREMENT RANGE

The main purpose of the device is to measure the parameters of a constant magnetic field - intensity (induction), as well as its gradient. The device allows users to determine the residual magnetization of a material after magnetic particle testing, the level of the magnetic component of industrial interference, and the magnetic induction of various devices, components, and products.



The updated device allows users to measure the parameters of an alternating magnetic field – strength values (induction) and parameters of individual magnetic field pulses - peak values of intensity (induction).

SPECIFICATIONS

Measurement range (depends on probe type)	100G – 30 000G	
Measurement accuracy	PH-100 ±(1G+5%) PH-1000 ±(2G+5%)	PH-3000 ±(5G+5%) PH-30000 ±(5G+5%)
Measurement scales	A/cm, G, mT	
Measurement resolution	Ampere/Centimeter (A/cm) 0.1 Gauss (Gs) 0.01 Tesla (mT) 0.1	
Operating modes	Normal, Graphical	
Data storage	Device – 256 measurements	
Data transfer	PC: - Web interface – NOVOTEST.INFO	
Languages	English, Spanish, Ukrainian, Russian *additional languages available by request.	
Body type / Dust and moisture protection level	Plastic, with shockproof silicone case / Standard for shop and field operation	
Power supply / Charging	2 pcs AA batteries / AA charger	
Batteries life	20 h	
Operating environment	Temperature: -30°C ~ 50°C, Humidity: <95% R.H. at 35°C	
Dimensions and weight of electronic unit (with batteries)	122x76x37 mm / 0.25 kg	

MAGNETIC PARTICLE FLAW DETECTOR MPD-17P



- DEMAGNETIZATION FUNCTION
- CONTROL OF MAGNETIZING FORCE
- VARIOUS TYPES OF ELECTROMAGNETS
- CUSTOMIZATION OF ELECTROMAGNETS FOR SPECIAL TASKS

MPD-17P is designed to detect surface and subsurface discontinuities: hairlines, cracks of various types, lack of fusion of welds, flakes, laps, etc.

SPECIFICATIONS

Magnetizing field	AC
Magnetizing current value	10 A
Voltage of electromagnet	36 V
Amplitude value of magnetic field strength electromagnet in the center between the poles (in the air)	240 A/cm
Magnetization time	3 s
Power supply	AC, 220 V ± 10% 50 Hz
Operating environment	Temperature: -5°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit	262x200x130 mm / 6.7 kg

ELECTROMAGNET TYPES:



Type A - Electromagnet with adjustable interpolar distance in the range of 20-160 mm, force - 5 kg (15 kg).



Type D - Electromagnetic with adjustable interpolar distance in the range of 60-220 mm, force - 7 kg (18 kg).



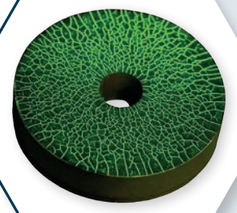
Type E - Rolling electromagnet with an interpolar distance of 110 mm (with roller contact), force - 9 kg.



Type O - Round solenoid with an internal working hole with a diameter of 150 mm.

MAGNETIC TEST SAMPLES

We produce different types of magnetic test samples for MPI, PT and other testing, such as bars, plates, disks with different types of cracks.



The MTU-3 test block is the reference test block according to EN ISO 9934-2. It is used to verify the indication sensitivity of MPI agents.

MAGNETIC PARTICLE TESTING YOKE EMY250-AC/DC



NEW

- AC AND DC MODES
- SIMPLE AND EASY TO USE
- POWERFUL MAGNETIC FIELD
- OPERATES WITHOUT CONTROL UNIT

The EMY250-AC/DC is a lightweight Magnetic Inspection Yoke designed to perform magnetic particle inspections quickly and reliably. The device has fully adjustable legs with a maximum leg spacing of 250 mm, allowing the strong magnetic field to be applied directly to the precise area to be inspected.

SPECIFICATIONS

Leg span	0 – 250 mm
Fields	AC/DC
Defect location	Surface or subsurface
Cord length	2 m
Power supply	115VAC – 50/60 Hz 230VAC – 50/60 Hz
Dimensions and weight	170x170x60 mm / 2.7 kg

MAGNETIC YOKE MPD-DC



Magnetic Yoke consists of two permanent magnets mounted in non-ferromagnetic metal housings and connected to each other by a magnetic core. It allows inspection of products with complex shapes, in hard-to-reach places directly on the structure.

The use of a permanent magnet makes the flaw detector ideal for inspections where access to the power supply is not available or where safety requirements prohibit the use of power.

SPECIFICATIONS

Magnetizing field	DC
Magnetic field strength at the center of the air gap between the poles	200 kA / m
Magnetic field strength in the air in the middle region between the working ends of the magnet, not less	65 kA / m
Lift force, not less	22 kg (50 pounds)
Interpolar distance	350 mm
Dimensions and weight	40x120x360 mm / 0.6 kg

NEW

NOVOTEST Lab
Application For Android
Get it on Google Play

Scan to view demo protocol



DEW POINT METER
LAB DPM

- LOGGER MODE
- CONDENSATE ALARM
- NOVOTEST LAB COMPLIANT
- IR TEMPERATURE PROBE AUTOCALIBRATION

SPECIFICATIONS

Measurement range of probes	Air temperature: -40 ... +120°C Surface temperature: -50...+1000°C Humidity: 0 – 100%
Measurement accuracy	Air temperature: 0,2% Surface temperature: 1% Humidity: 1%
Calculated values	Dew point temperature: -15 ... +40°C Difference between dew point and surface temperature: Depends on measurement conditions
Data storage	NOVOTEST Lab App – limited only by the memory of the Android gadgets Cloud storage – limited only by the memory of the Cloud storage
Data transfer	Wireless connection with Android smartphones, tablets, etc.: - NOVOTEST Lab App PC: - Web interface - NOVOTEST.INFO
Languages	English
Power supply / Charging	2 pcs AA batteries / AA charger
Batteries life	10 h
Operating environment	Temperature: -20°C ~ 50°C, Humidity: <95% R.H. at 35°C
Dimensions and weight of electronic unit (with batteries)	85x42x25 mm / 0.2 kg

The dew point meter DPM allows users to measure the surface temperature air temperature and humidity with a non-contact probe, and calculate the dew point based on the data received.



MEASURES OF DIFFERENT PARAMETERS

Thanks to the special design of the device, and high-tech measuring sensors, and an improved information processor, the temperature measurement is much faster than its predecessor, the KTR-1.



RAPID MEASUREMENT

EXPANDING OPPORTUNITIES WITH NOVOTEST LAB



Due to its integrated Bluetooth module, DPM dew point meter can be connected to NOVOTEST Lab, which significantly extends the functionality of the device and makes it unique in its class.

COMPACT DESIGN AND CONVENIENT INTERFACE



The device is made in a compact, ergonomic body that easily fits into a pocket, and the simple device interface will appeal to even the most demanding user.

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