

## PROFESSIONAL MEASUREMENT TECHNOLOGY

**OVER 65 YEARS OF MEASURING AND TESTING INSTRUMENTS** 



estbo

品

Multi-Tester

50

Profi III LCD

# DIRECTORY FOR SPECIALISTS



04	TESTBOY The Testboy company philosophy
07	GENERAL INFORMATION Safety information
08	CONTINUITY TESTER Testboy 20 Plus
10	<b>VOLTAGE TESTERS</b> Testboy 10, 11, 111, 110, 113, 114, 115 Bit, 105, 40 plus
16	MAGNETIC FIELD TESTERS Testboy 15, 130
18	<b>TWO-POLE VOLTAGE TESTERS</b> Testboy 41 LED, 41 LED plus, 41 DUO, Profi III LED, Profi III LCD
22	MULTIMETERS Testboy 312, 313, 2200, 3000, Pocket 100
28	CURRENT MEASUREMENT CLAMPS Testboy TV 216 N, TV 218, TV 225
32	SOCKET OUTLET TESTERS Testavit Schuki 1 LCD, 3 LCD, 1 A, 3 A, 2 K
36	CABLE DETECTORS, MAINS WIRING TESTERS, FUSE LOCATORS AND WALL SCANNERS Testboy 26, 27 Analog, 27 Digital, 28, 30, TV 700
43	ADAPTERS AND ROTATING FIELD TESTERS Testboy TV 416/432, TV 416/432 (A), TV 410 N, TV 411
47	INSTALLATION AND DEVICE TESTERS Testboy TV 431, TV 441, TV 445, TV 455, TV 465, TV 470
54	THERMOMETERS Testboy TV 323, TV 325
57	LUXMETERS, RANGE FINDERS AND WORKING LIGHTS Testboy TV 333, TV 335, TV 610, Light 500
62	MOULD DETECTORS, HYGROMETERS AND ANEMOMETERS Testboy TV 328, TV 341, 350
66	VEHICLE MEASURING INSTRUMENTS Testboy 50, 55, 65, 70, 72, 74, 75, Car Tester
76	THERMOGRAPHY Testboy TV 292, TV 294 Digital, TV 295 Touch
84	ACCESSORIES Discover the matching accessories



Stands For Quality Since 1953

# OUR CONPANY





## PROFESSIONAL MEASURING AND TESTING INSTRUMENTS – A SUCCESS STORY SINCE 1953

In the early days of the new West German Republic, an ingenious inventor had an idea which was to revolutionise measurement technology in the electrical branch.

The electrician Ludwig Mers developed a continuity tester and called it Testboy. Little did he know that the name was to develop into a synonym for measurement technology.

This was the start of a successful family-led company which continues today. Our current product pallet is the result of a pioneering spirit combined with a flair for knowing what the market needs in terms of measuring and testing instruments.

Faithful to our motto "From the practice for the practice" and working to ensure the continual development of our range, Testboy GmbH has advanced to its current status as an international market leader. Our success is grounded in maximising safety through the provision of quality. We promise to continue this approach. We will work day and night both to maintain and extend the service and delivery capacity to which you have become accustomed. Our highly-trained and motivated specialist personnel will do everything possible to keep up with and satisfy the ever-changing needs of trade, industry and research.

We should like to extend our thanks for the trust which you have invested in us over the course of the last 65 years and the future.

#### **Best wishes from Vechta**

Your Testboy team



Hi, my name is Ludwig, I will accompany you through this catalogue. I hope to be able to provide assistance with a number of decisions. Should you have any questions, just give the people at Testboy a call - they are more than happy to help.

Now, lick your finger and page through...





- // 1953 Establishment of Ludwig Mers as an electrical installation company
- // 1960 Ludwig Mers GmbH & Co. KG Elektrotechnische Spezialfabrik
- // 1993 Takeover of Ludwig Mers GmbH & Co. KG by the current managing director Horst Reysen
- // 1997 Construction of the new company building
- // 2000 Expansion of the warehouse in Vechta
- // 2005 Change of the company name to Testboy GmbH
- // 2005 Construction of an office and warehouse building in Vechta
- // 2008 Expansion of the production facilities and warehouse in Vechta
- // 2013 Celebration of the 60th anniversary of the company; extension of the warehouse and offices



The use of cutting-edge manufacturing technologies has enabled Testboy GmbH to develop into one of the leading manufacturers for robust and professional measuring and testing instruments. Our TÜV-/GS tested, user-friendly and long service life products are internationally known under the brand names "Testboy", "Testavit" and "Schuki". Seeking to keep our customers happy, we subject our product range to continual improvement, taking into account the applicable standards and laws. We place especial value on the clever combination of as many functions as possible in a single instrument.

#### QUALITY AND SERVICE IS TOP PRIORITY AT TESTBOY!

#### TESTBOY GMBH ELEKTROTECHNISCHE SPEZIAL-FABRIK

Beim Alten Flugplatz 3 D-49377 Vechta · Germany Tel. +49 (0) 4441 89112-10 Fax +49 (0) 4441 84536 www.testboy.de

#### **CUSTOMER SERVICES**

Tel. +49 (0) 4441 89112-10 Fax +49 (0) 4441 84536 sales@testboy.de

#### **TECHNICAL HOTLINE**

Tel. +49 (0) 4441 89112-90 Fax +49 (0) 4441 89112-27 support@testboy.de

#### ACCOUNTING

Tel. +49 (0) 4441 89112-13 Fax +49 (0) 4441 89112-22 accounting@testboy.de

#### **QUALITY CONTROL**

Tel. +49 (0) 4441 89112-20 Fax +49 (0) 4441 84536 qc@testboy.de







## GENERAL INFORMATION AND SAFETY INFORMATION

Today, measuring and testing instruments are essential tools when performing construction, repair and maintenance work on electriconic instruments and installations. Modern test instruments must enable the user to perform safety checks, troubleshooting and function tests quickly, safely and reliably. Internationally valid safety standards for the safety of electrical measuring and control equipment are drawn up and ratified by the IEC (International Electrotechnical Commission). This guarantees that tests are performed in accordance with the same criteria and guidelines all over the world.

#### Testing and measuring instruments are tested as follows:

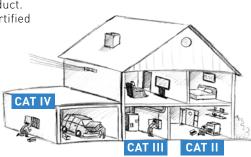
CAT II 600 V | 4000 V Peak surge voltage 12 Ohm source CAT II 1000 V | 6000 V Peak surge voltage 12 Ohm source CAT III 600 V | 6000 V Peak surge voltage 2 Ohm source CAT III 1000 V | 8000 V Peak surge voltage 2 Ohm source CAT IV 600 V | 8000 V Peak surge voltage 2 Ohm source CAT IV 1000 V | 12000 V Peak surge voltage 2 Ohm source

Measuring instruments are classed in accordance with 3 different categories that indicate the ranges for which they are approved:

- CAT II Electrical circuits connected directly to the mains Sockets and long branch lines All sockets more than 10 m away from CAT III All sockets more than 20 m away from CAT IV
- CAT III In building installations, e.g. distributors, cabling, sockets Short lines Distributor boards Sockets for large loads with short lines for supplying electrical energy Lighting systems for large buildings Busbars
- **CAT IV** At the source of the low voltage installation, e.g. electricity meters, main terminal, primary over current protective devices In the open and supply cable feed Supply cables from the connection point to the building Connection between the measuring instrument and the connection point Overhead lines to individual buildings Underground cables to water pumps Supplies

In order to document that the products of a manufacturer comply with IEC/EN 61010-1, the manufacturer can have these products tested by an accredited test body to check whether they conform to the requirements laid out in the standard. Once a test has been passed, the manufacturer is entitled to attach the corresponding quality certificate to its product. As a safety-conscious and responsible manufacturer, all Testboy products are certified by TÜV-SÜD Produkt Service GmbH.









# OUR CONTINUTY TESTERS



## CONTINUITY TESTER WITH EXTERNAL VOLTAGE PROTECTION











#### THE SPECIFICATIONS

	TESTBOY 20 PLUS
CONTINUITY TESTING	Optical 0–20 Ω
	Acoustic 0–250 Ω
TEST VOLTAGE	4.5 V
TEST CURRENT	Optical ~10 mA
	Acoustic ~2 mA
EXTERNAL VOLTAGE PROTECTION	Up to 300 V
OVER-VOLTAGE CATEGORY	CAT II 300 V
INTEGRATED LED TORCH	Yes
STANDARD	EN 61010-1:2010
DIMENSIONS	120 x 60 x 30 mm
WEIGHT	90 g (without battery)
VOLTAGE SUPPLY	3 x 1.5 V
SCOPE OF DELIVERY	2 test leads
ACCESSORIES (OPTIONAL)	inc. crocodile clips Carrying case

## **YOUR BENEFITS**

- // Reliable continuity tester
- // Non-contact voltage sensor
- // High-performance LED torch

The Testboy 2 was the top-selling continuity tester in Germany. The Testboy 20 Plus represents its systematic development.

Its non-contact voltage sensor enables it to detect AC voltages through insulation. Defective lamps in Christmas lights or similar constructions are located accurately within seconds. The installed current warner alerts users to the presence of life-threatening voltage. The electronics also enable a single-pole phase search.

# OUR VOLTAGE TESTERS

Nacier

nader

häger



resteo

6

## **NON-CONTACT VOLTAGE TESTERS**





#### THE SPECIFICATIONS

	TESTBOY 10	TESTBOY 11	TESTBOY 111
DISPLAY	Optical	Optical + acoustic	Optical + acoustic
MEASURE- MENT RANGE	110-1000 V AC		
OVER-VOLTAGE CATEGORY CAT III 1000 V / CAT IV 600 V			
INTEGRATED LED FLASHLIGHT	No	No	Yes
STANDARD	EN 61010-1:2010		
HOUSING	Impact and break-proof ABS plastic		
DIMENSIONS	146 x 26 mm	146 x 26 mm	160 x 25 mm
WEIGHT	22 g	22 g	45 g
VOLTAGE SUPPLY	2 x 1.5 V AAA Micro, LR03		





YOUR	BENEFITS
------	----------

- // Capacitative measurement procedure
- // Alarm signal (Testboy 11, 111)
- // LED flashlight (Testboy 111)
- // CAT III 1000 V / CAT IV 600 V

The Testboy 10, 11 and 111 non-contact voltage testers detect live conductors on cable connections, cable drums, sockets, switches, junction boxes etc. A capacitive measurement procedure obviates the need for a current flow; interruptions can be indicated quickly to the nearest centimetre.

## TESTBOY 110, 113, 114

NON-CONTACT VOLTAGE TESTERS FROM 12 V AC



# PRODUCT VIDEO: WWW.TESTBOY.DE





	TESTBOY 110	TESTBOY 113	TESTBOY 114
DISPLAY	Optical	Optical + acoustic	Optical + vibrating
MEASURE- MENT RANGE	12-1000 V AC		
OVER-VOLTAGE Category	CAT III 1000 V / CAT IV 600 V		
INTEGRATED LED FLASHLIGHT	Yes		
STANDARD	EN 61010-1:2010		
HOUSING	Impact and break-proof ABS plastic		
DIMENSIONS	160 x 25 mm		
WEIGHT	45 g		
VOLTAGE 2 x 1.5 V AAA Micro, LR03			

THE SPECIFICATIONS

## **YOUR BENEFITS**

- // Capacitative measurement procedure
- // Measurements from 12 V
- // LED flashlight
- // Vibrating indication (Testboy 114)

As the systematic development of the familiar voltage tester, the Testboy 110, 113 and 114 non-contact voltage testers detect a live conductor from 12 V AC, even in low volt systems. The capacitive measurement procedure used means that invisible fractures in extension cables or a defective lamp in a chain of lights can be detected to the nearest centimetre within a few seconds.





THE SPECIFICATIONS



## A NON-CONTACT VOLTAGE TESTER FROM 12V AC WITH INTEGRATED BIT RECEIVER





	TESTBOY 115 BIT
DISPLAY	Optical
VOLTAGE RANGE	12-1000 V AC
OVER-VOLTAGE CATEGORY	CAT III 1000 V / CAT IV 600 V
STANDARD	IEC/EN 61010-1
HOUSING	Fibre-glass reinforced plastic housing
DIMENSIONS	150 x 25 mm
WEIGHT	45 g
VOLTAGE SUPPLY	2 x 1.5 V AAA Micro, LR03
SCOPE OF DELIVERY	Bag and 2 bits (Phillips and slotted)



// Practical bit socket

// Measurements from 12 V AC

// Capacitative measurement procedure

The innovative Testboy 115 Bit non-contact voltage tester detects live conductors from 12 V AC up to 1000 V AC, even in low voltage systems. Cable breaks in extension cables, defective lamps, light chains or defective fuses are located without any power flow within seconds and to the nearest centimetre using the capacitative measurement procedure. An optical display conveys the voltage indication: a red LED with voltage indication from 110 V – 1000 V AC; a blue LED if the 12V mode is activated; a purple LED with a voltage indication of 12 V – 1000 V AC. The Testboy 115 Bit recognizes phase conductors in single phase and three-phase networks. A bit socket performs a screwdriver function.



## NON-CONTACT VOLTAGE TESTER WITH SAFETY LEVEL CAT IV 1000 V





#### THE SPECIFICATIONS

	TESTBOY 105
DISPLAY	Optical, acoustic, vibrating
MEASUREMENT RANGE	12-1000 V AC
OVER-VOLTAGE CATEGORY	CAT IV 1000 V
INTEGRATED LED FLASHLIGHT	Yes
STANDARD	IEC/EN 61010-1 (DIN VDE 0411)
HOUSING	Impact and break-proof ABS plastic
DIMENSIONS	160 x 25 mm
WEIGHT	45 g
POWER SUPPLY	2 x 1.5 V AAA Micro





## YOUR BENEFITS

- // Capacitative measurement procedure
- // Optical, acoustic and vibrating indication
- // Measurements from 12 V AC
- // LED flashlight
- // CAT IV 1000 V
- // IEC/EN 61010-1 (DIN VDE 0411)

A further non-contact voltage tester is the Testboy 105. This detects live conductors from 12 V AC to 1000 V in CAT IV. The optical, acoustic and vibrating indication makes it especially easy and reliable to use. The capacitive measurement procedure enables detection of invisible interruptions in cables in a few seconds within only a few millimetres tolerance.



**VOLTAGE TESTER** 







## THE SPECIFICATIONS

	TESTBOY 40 PLUS
INDICATION	Optical, 8 LEDs
VOLTAGE RANGE	6-400 V AC/DC
OVER-VOLTAGE CATEGORY	CAT III 400 V
POLARITY	Yes (+,- LED)
PROTECTION CLASS	IP 65
DIMENSIONS	120 x 60 x 30 mm
WEIGHT	100 g
VOLTAGE SUPPLY	via measurement object
ACCESSORIES (OPTIONAL)	Carrying case

## YOUR BENEFITS

// Voltage range up to 400 V AC/DC

- // Phase search to the protective earth conductor
- // Voltage supply via the measurement object
- // easy handling

Robust and user-friendly, the ergonomic structure of the Testboy 40 Plus makes for easy handling and operation and guarantees a long service life. The voltage tester reliably indicates DC and AC voltages from 6 to 400 V. Moreover, the electronics enable phase search to the protective earth conductor.

# OUR MAGNETIC FIELD TESTERS



## NON-CONTACT MAGNETIC FIELD TESTERS





#### THE SPECIFICATIONS

	TESTBOY 15	TESTBOY 130
INDICATION	Optical, LED	
MEASUREMENT RANGE	All magnetic fiel	ds
INTEGRATED LED FLASHLIGHT	Νο	Yes
STANDARD	EN 61010-1:2010	)
DIMENSIONS	142 x 26 mm	160 x 25 mm
WEIGHT	22 g	45 g
VOLTAGE SUPPLY	2 x 1.5 V type AA	A Micro, LR03
COLOUR	Black	





// Non-contact testing of all magnetic fields// High-performance LED flashlight (Testboy 130)

The Testboy 15 and Testboy 130 magnetic field testers are suited to the rapid and precise testing of electro-magnetic switches and valves. Their tip lights up to indicate the presence of permanent, DC or AC magnetic fields. The level of sensitivity which they provide means that it is often not necessary to dismantle machine covers or cladding. This means that the function test can be carried out without the need for any setting-up time to stop the machine.

# TWO-POLE VOLTAGE TESTER



## TWO-POLE VOLTAGE TESTER WITH SAFETY LEVEL CAT IV 1000 V



## THE SPECIFICATIONS

	TESTBOY 41 LED	TESTBOY 41 LED PLUS	TESTBOY 41 DUO
INDICATION	Optical, LED	Optical, LED	Optical, LED and LCD
TEST RANGE SELECTION	Automatic	Automatic	Automatic
VOLTAGE RANGE	6-1000 V AC/DC	6–1000 V AC/DC	6-1000 V AC/DC T-RMS
TWO-POLE PHASE SE- QUENCE TESTING	-	Yes	-
RCD TESTING	-	Yes	-
POLARITY	Yes (LED)	Yes (LED)	Yes (LCD)
OVER-VOLTAGE CATEGORY	CAT III 1000 V / CAT IV 600 V		
CONTINUITY TESTING	0–200 k $\Omega$ with acoustic signal		
SINGLE-POLE PHASE TESTING	Yes		
PELV INDICATION	Optical and vi	brating	
AUTO POWER-OFF	Yes		
4 MM PROBE ADAPTER	Removable		
PROTECTION CLASS	IP 65		
STANDARD	EN 61243-3:2014		
WEIGHT	250 g		
VOLTAGE SUPPLY	2 x 1.5 V AAA		
ACCESSORIES (OPTIONAL)	Carrying case		





## YOUR BENEFITS

- // Overvoltage category CAT III 1000 V / CAT IV 600 V
- // Voltage indication up to 1000 V AC/DC
- // Continuity testing
- // T-RMS testing procedure for non-sinusoidal voltage e.g. in an industrial application (model TB 41 DUO)

The user-friendly structure of the Testboy 41 series - with its well thought out, tried-and-tested single-hand use and a durable housing - guarantees a long operational life and convinces all who use it. The two-pole voltage tester reliably indicates DC and AC voltages in the range from 6 to 1000 V. The electronics enables phase search to the protective earth conductor. The Testboy 41 LED Plus also permits phase sequence testing and FI-/RCD testing. The double indication on the Testboy 41 DUO means that LED meets LCD.

## TESTBOY PROFI III LED

## TWO-POLE VOLTAGE TESTER AT THE HIGHEST SAFETY LEVEL CAT IV IN ACCORDANCE WITH THE LATEST STANDARDS





#### THE SPECIFICATIONS

	TESTBOY PROFI III LED
INDICATION	Optical, LEDs
TEST RANGE SELECTION	Automatic
VOLTAGE RANGE	6-1000 V AC / 6-1400 V DC
OVER-VOLTAGE CATEGORY	CAT IV 1000 V
CONTINUITY TESTING	0–200 kΩ optical/acoustic
PHASE INDICATOR	> 100 V AC
SINGLE-POLE PHASE TESTING	Yes
TWO-POLE PHASE SEQUENCE TESTING	Yes
FI-/RCD TESTING	30 mA at 230 V AC using two buttons
POLARITY	Yes (+,- LED)
PELV INDICATION	Optical and vibrating
TEST LOCATION LIGHTING	White LED
AUTO POWER-OFF	Yes
4 MM PROBE ADAPTER	Removable
PROTECTION CLASS	IP 65
STANDARD	EN 61243-3:2014
DIMENSIONS	300 x 75 x 20 mm
WEIGHT	270 g
VOLTAGE SUPPLY	2 x 1.5 V AAA (information about contact-hazardous voltage even without batteries)
ACCESSORIES (OPTIONAL)	Carrying case

## YOUR BENEFITS

- // Highest safety level CAT IV 1000 V
- // Practical one-hand operation
- // Robust, safe structure
- // Testing without finger contact

The Testboy Profi III LED represents the systematic development of our popular Testboy Profi LED Plus. It convinces due to its user-friendly handling, stable and safe structure and conforms to all requirements placed on modern voltage testers by a specialist. Its highest safety level (CAT IV 1000 V) makes it suitable for measurements on hybrid and electric vehicles, as well as photovoltaic installations. Voltage testing is possible even up to 1400 V DC. Voltage recognition is performed both optically and with a vibration. The safety level CAT IV 1000 V is almost unique for a voltage tester.

## TESTBOY PROFI III LCD

## TWO-POLE VOLTAGE TESTER AT THE HIGHEST SAFETY LEVEL CAT IV IN ACCORDANCE WITH THE LATEST STANDARDS.



## YOUR BENEFITS

- // Highest safety level CAT IV 1000 V
- // Large, illuminated LCD
- // Voltage indication up to 1000 V AC and 1400 V DC
- // Resistance testing 10 to 199.9 kΩ
- // Frequency display up to 500 Hz
- // T-RMS testing procedure for non-sinus voltage e.g. in an industrial application

The Testboy Profi III LCD is the top model of our tried-andtested Profi series. No conventionally-available two-pole voltage tester has so many comparable functions. The innovative two-pole voltage tester convinces with a wide performance spectrum and practical one-hand operation. It enables tests without finger contact; the highest safety level, CAT IV 1000 V suits it to performing measurements on



BE

#### THE SPECIFICATIONS

	TESTBOY PROFI III LCD
INDICATION	Optical, LED
TEST RANGE SELECTION	Automatic
VOLTAGE RANGE	3-1000 V AC (T-RMS/RMS) 4-1400 V DC
OVER-VOLTAGE CATEGORY	CAT IV 1000 V
RESISTANCE TESTING	10–199.9 kΩ
CONTINUITY TESTING	0–10 k $\Omega$ with acoustic signal
FREQUENCY INDICATION	0-500 Hz
SINGLE-POLE PHASE TESTING	Yes
TWO-POLE PHASE SEQUENCE TESTING	Yes, at > 200 V AC
FI-/RCD TESTING	30 mA at 230 V AC using two buttons
POLARITY	Yes (- in the LCD)
PELV INDICATION	Optical and vibrating
TEST LOCATION LIGHTING	White LED
DATA-HOLD FUNCTION	Voltage and resistance
AUTO POWER-OFF	Yes
4 MM PROBE ADAPTER	Removable
PROTECTION CLASS	IP 65
STANDARD	EN 61243-3:2014
DIMENSIONS	300 x 75 x 20 mm
WEIGHT	270 g
VOLTAGE SUPPLY	2 x 1.5 V AAA (information about contact-hazardous voltage even without batteries)
ACCESSORIES (OPTIONAL)	Carrying case

hybrid and electric vehicles and photovoltaic installations. A voltage test is even possible up to 1400 V DC. This top-quality instrument is characterised by its insusceptible and safe characteristics and complies with all the requirements set by a professional on a modern voltage tester. Voltage recognition is performed both optically and with a vibration. The safety level CAT IV 1000 V is almost unique for a voltage tester.

## 

000

Intersule

h fin fin

TRI SCHOOL ST

.....



## INDUSTRIAL DIGITAL MULTIMETER WITH USB INTERFACE



## THE SPECIFICATIONS

	TESTBOY 312	
INDICATION	44 mm large, illuminated LCD, 4 ¾ digit	
DC VOLTAGE	50 mV, 500 mV, 50 V, 500 V, 1000 V ± 0.5 %	
AC VOLTAGE (T-RMS)	50 mV, 500 mV, 50 V, 500 V, 1000 V	± 0.5 %
DC CURRENT	500 μA, 5 mA, 500 mA, 5 A, 10 A	± 0.5 %
AC CURRENT	500 μA, 5 mA, 500 mA, 5 A, 10 A	± 1.5 %
RESISTANCE	500 Ω, 5 kΩ, 50 kΩ, 500 kΩ, 5 MΩ ± 0,1 % 50 MΩ ± 0,5 %	
DUTY CYCLE	5 Hz–500 kHz, 1–99 %	
LOGIC FREQUENCY	5 Hz–5 MHz ± 0.006 %, Vpp 2–5 V square wave	
LINEAR FREQUENCY	10 Hz–200 kHz ± 0.006 %, Vpp 10 mV sensitive	
CONTINUITY TEST	With acoustic signal	
DIODE TEST	Forward voltage in mV	
CAPACITY	up to 5000 μF	
MEASUREMENT Range Selection	Automatic and manual	
AUTO POWER-OFF	15 minutes	
DATA-HOLD FUNCTION	Yes	
OVER-VOLTAGE CAT- EGORY	CAT III 1000 V	
STANDARD	EN 61010-1; EN 61010-2-033	
DIMENSIONS	200 x 100 x 40 mm	
WEIGHT	600 g	
VOLTAGE SUPPLY	6 x 1.5 V AAA LR03	
PC INTERFACE	USB interface	
SCOPE OF DELIVERY	inc. carrying case, operating manual, test leads, Windows software on a CD ROM and a USB cable	





## **YOUR BENEFITS**

- // Large LCD with bar graph display
- // T-RMS
- // USB interface
- // Auto/manual range

The high accuracy of measurement is the stand-out characteristic of the Testboy 312 digital multimeter. Its extremely effective measurement procedure prevents measuring errors in the case of non-sinusoidal or non-linear curves. The Testboy 312 also features further important functions such as relative, min./max. and frequency measurement and a USB interface, through which all measurement results can be evaluated using Windows software. The tremendous flexibility of the Testboy 312 makes it especially useful for industrial applications.



## A DIGITAL MULTIMETER WITH AUTOMATIC MEASURING RANGE PROTECTION



## YOUR BENEFITS

- // Automatic measuring range protection
- // Large LCD with background lighting
- // Temperature measurement

The Testboy 313 digital multimeter provides a number of standard functions and is especially safe to operate. The automatic measuring range protection rules out maloperation. It is also fitted with a clear and easily legible 28 mm LCD display and background lighting.



	TESTBOY 313	
INDICATION	37 mm large, illuminated LCD	
DC VOLTAGE	200 mV, 2 V, 20 V, 200 V 600 V	±0.5 %, ±3 digits ±0.8 %, ±5 digits
AC VOLTAGE (T-RMS)	2 V, 20 V, 200 V 600 V	±1.0 %, ±5 digits ±1.2 %, ±5 digits
DC CURRENT	2 mA, 20 mA 200 mA 10 A	±1.0 %, ±3 digits ±1.5 %, ±3 digits ±2.0 %, ±5 digits
AC CURRENT	2 mA, 20 mA, 200 mA 10 A	±1.0 %, ±5 digits ±1.5 %, ±3 digits ±2.0 %, ±8 digits
RESISTANCE	200 Ω, 2 kΩ, 20 kΩ, 200 kΩ 2 MΩ, 20 MΩ	±1.0 %, ±5 digits ±1.0 %, ±5 digits ±1.0 %, ±5 digits ±1.5 %, ±5 digits
DIODE TEST	Yes	
CONTINUITY TEST	Yes	
TEMPERATURE MEASUREMENT	-20–1000°C with K-type sensor	
MAXIMUM INPUT VOLTAGE	600 V AC/DC	
INPUT IMPEDANCE	> 7.5 MΩ, type 10 MΩ (ACV & DCV)	
AC VOLTAGE RANGE	50-400 Hz	
FREQUENCY MEASUREMENT RANGE	0-20 kHz	
CAPACITY MEASUREMENT RANGE	up to 20 µF	
FUSES	200 mA (self-resett 10 A/1000 V (flink)	ing
OPERATING TEMPERATURE RANGE	0-40 °C (32-104 °F)	
STORAGE TEMPERATURE RANGE	-10-50 °C (14-122 °F)	
OVER-VOLTAGE CATEGORY	CAT III 600 V	
STANDARD	EN 61010-1; EN 610	10-2-033
DIMENSIONS	200 x 89 x 38 mm	
WEIGHT	380 g inc. batteries	
VOLTAGE SUPPLY	1 x 9 V block battery	/
SCOPE OF DELIVERY	inc. test leads, carry K-type sensor (0–18	



## DIGITAL MULTIMETER WITH CABLE FRACTURE DETECTOR AND IONISATION CURRENT MEASUREMENT





## YOUR BENEFITS

- // Non-contact cable break detector
- // LED flashlight
- // Auto-range function

The Testboy 2200 variable digital multimeter has all the functions requisite to universal operation in electrical installation, service and industrial applications. Practical and easy to operate, it provides precise measurements. Equipped with all standard functions, the Testboy 2200 also permits the measurement of ionisation currents. User protection is improved by the inbuilt contact-free cable fracture detector. An integrated LED torch facilitates working in poorly-lit locations.





	TESTBOY 2200	
DC VOLTAGE	200 mV 2 V, 20 V, 200 V, 400 V	±0.5 %, ±3 digits ±0.8 %, ±5 digits
AC VOLTAGE	2 V, 20 V 200 V, 400 V	±1.5 %, ±5 digits ±1.5 %, ±5 digits
DC CURRENT	200 μΑ, 2000 μΑ 4 Α	±1.0 %, ±3 digits ±1.2 %, ±5 digits
AC CURRENT	200 μΑ, 2000 μΑ 4 Α	±1.3 %, ±5 digits ±1.5 %, ±8 digits
RESISTANCE	200 Ω 2 kΩ, 20 kΩ, 200 kΩ	±1.0 %, ±5 digits ±1.8 %, ±5 digits
	2 ΜΩ 20 ΜΩ	±1.0 %, ±5 digits ±1.8 %, ±5 digits
DIODE TEST	Test current 0.6 mA Off-load voltage type 1.	5 V
CONTINUITY TEST	Signal tone upon resista	ance < 50 Ω
NON-CONTACT VOLTAGE TEST	100-600 V AC	
MAXIMUM INPUT VOLTAGE	400 V AC/DC	
INPUT IMPEDANCE	> 7.5 MΩ, type 10 MΩ (ACV & DCV)	
AC VOLTAGE RANGE	50-400 Hz	
FUSES	μΑ-/mA range F 200 mA/400 V 4 A range F4 A/400 V	
OPERATING TEMPERATURE RANGE	0–40 °C (32–104 °F)	
STORAGE TEMPERATURE RANGE	-10-50 °C (14-122 °F)	
LED TORCH	White high-performance LED	
AUTO POWER-OFF	15 minutes	
OVER-VOLTAGE Category	CAT II 400 V, CAT III 300 V	
STANDARD	EN 61010-1:2010; EN 61010-2-030:2010; EN 61010-2-033:2012; EN 61010-031/ A1:2008	
DIMENSIONS	140 x 70 x 35 mm	
WEIGHT	250 g inc. batteries	
VOLTAGE SUPPLY	2 x 1.5 V AAA LR03	
SCOPE OF DELIVERY	inc. CAT III test leads, system carrying case	



## DIGITAL MULTIMETER WITH CABLE FRACTURE DETECTOR AND THE SAFETY LEVEL CAT IV





## YOUR BENEFITS

- // Fracture and impact-proof ABS housing
- // Non-contact cable break detector
- // LED torch
- // Auto-range function

The modern design, cutting-edge technology and extended range of functions provided by the Testboy 3000 digital multimeter enables its universal deployment in both an industrial and commercial setting. The combination of the fracture and impact-proof ABS housing with the ease of handling provided by the Testboy 3000 permits its deployment in the most challenging of environments. Its significant functions include the non-contact cable fracture detector, an LED torch and an auto-range function.



	TESTBOY 3000	
DC VOLTAGE	200 mV 2 V, 20 V, 200 V, 600 V	±0.5 %, ±3 digits ±0.8 %, ±5 digits
AC VOLTAGE	2 V, 20 V 200 V, 600 V	±1.5 %, ±5 digits ±1.5 %, ±5 digits
DC CURRENT	200 μΑ, 2000 μΑ 10 Α	±1.0 %, ±3 digits ±1.2 %, ±5 digits
AC CURRENT	200 μΑ, 2000 μΑ 10 Α	±1.3 %, ±5 digits ±1.5 %, ±8 digits
RESISTANCE	200 Ω 2 kΩ, 20 kΩ, 200 kΩ 2 MΩ 20 MΩ	±1.0 %, ±5 digits ±1.0 %, ±5 digits ±1.0 %, ±5 digits ±1.8 %, ±5 digits
CONTINUITY TEST	Signal tone upon res	sistance < 50 Ω
DIODE TEST	Test current 0.6 mA No-load voltage type	e 1.5 V
NON-CONTACT VOLTAGE TEST	100–600 V AC (optical and acoustic)	
MAXIMUM INPUT VOLTAGE	600 V AC/DC	
INPUT IMPEDANCE	> 7.5 MΩ, type 10 MΩ (ACV & DCV)	
AC VOLTAGE RANGE	50-400 Hz	
OPERATING TEMPERATURE RANGE	0-40 °C (32-104 °F)	
STORAGE TEMPERATURE RANGE	-10-50 °C (14-122 °F)	
LED TORCH	White high-performance LED	
AUTO POWER-OFF	15 minutes	
OVER-VOLTAGE CATEGORY	CAT IV 600 V	
STANDARD	EN 61010-1:2010; EN 61010-02- 030:2010; EN 61010-031:2002; EN 61010-2-033:2012	
DIMENSIONS	165 x 85 x 32 mm	
WEIGHT	300 g inc. batteries	
VOLTAGE SUPPLY	2 x 1.5 V AAA	
SCOPE OF DELIVERY	inc. test leads Carrying case	

## TESTBOY POCKET 100

## **DIGITAL MULTIMETER**



25

## THE SPECIFICATIONS

	TESTBOY POCKET 100	
INDICATION	LCD with 4 digits	
AC VOLTAGE	0 – 600 V	±0.8 %, ±3 digits
DC VOLTAGE	0 – 600 V	±0.8 %, ±2 digits
RESISTANCE	0 – 60 Ω	±2.0 %, ±5 digits
INPUT IMPEDANCE ACV & DCV	10 MΩ	
AC VOLTAGE RANGE	40 –1000 Hz	
FREQUENCY MEASUREMENT	0 -10 MHz	±1.0 %, ±5 digits
CAPACITY MEASURE- MENT RANGE	0 – 60 mF	±4.0 %, ±3 digits
CONTINUITY TEST	Yes signal tone upon re	sistance < 50 Ω
DIODE TEST	Yes	
DUTY CYCLE IN %	Yes	±3.0 %, ±3 digits
DATA-HOLD FUNCTION	Yes	
MEASUREMENT RANGE SELECTION	Automatic	
OVER-VOLTAGE Category	CAT III 600 V	
STANDARD	EN 61010-1, EN 61010-2-33	
OPERATING TEMPERATURE RANGE	0 – 40 °C / 32–104 °F (≤ 75 % RH)	
OVER-VOLTAGE Category	CAT II 400 V, CAT III 300 V	
STORAGE TEMPERATURE RANGE	-10 – 50 °C / 14–122 °F (≼ 75 % RH)	
DIMENSIONS	133 x 62 x 27 mm	
WEIGHT	115 g inc. batteries	
VOLTAGE	2 x 1.5 V AAA, LR03	
SCOPE OF DELIVERY	inc. test leads	







// Fracture and impact-proof ABS housing// Highly legible LCD display with background lighting

// Data-hold function

// T-RMS

The Testboy Pocket was (and still is) a firm favourite amongst professional and hobby electricians alike. The Testboy Pocket 100 represents the systematic development of this handy multimeter. Its compact structure, large display and the many functions of this easy-to-operate instrument makes it the ideal companion ion in all standard professional and DIY applications.

# OUR CURRENT MEASUREMENT CLAMPS



**DIGITAL CLAMP METER** 





## YOUR BENEFITS

- // Wide range of functions
- // Highly legible LCD
- // LED measurement location lighting
- // Non-contact measurement of frequency and probe rate
- // T-RMS measurement procedure for non-sinus voltages

This multitalent combines the functions of a current clamp and multimeter With its wide range of measurement functions, the Testboy TV216N digital clamp meter is just the right helper for use in service, industry or installation. Useful details, such as the large display, manual or automatic measurement range selection and measurement position lighting, make for especially easy and reliable operation. The carrying case included in the scope of delivery protects the instrument and all its accessories even during transport.



	TESTBOY TV 216 N	
INDICATION	LCD with 4 digits	
AC CURRENT T-RMS (40-400 HZ, LOWEST RESOLUTION 10 MA)	60 A, 600 A	±3.0 %, ±10 digits
DC CURRENT (LOWEST RESOLUTION 10 MA)	60 A, 600 A	±3.0 %, ±10 digits
AC VOLTAGE T-RMS (40-400 HZ, LOWEST RESOLUTION 100 MV)	Up to 600 mV 6 V, 60 V 600 V	±1.5 %, ±10 digits ±1.2 %, ±5 digits ±1.5 %, ±10 digits
DC VOLTAGE (LOWEST RESOLUTION 100 MV)	600 mV, 6 V, 60 V 600 V	±0.8 %, ±3 digits ±1.0 %, ±5 digits
FREQUENCY MEASURE- MENT CLAMP (LOWEST RESOLUTION 100 MHZ)	600 Hz, 1 kHz > 1 A AC rms	±1.5 %, ±5 digits
FREQUENCY MEASURE- MENT CONNECTOR	600 Hz, 6 kHz, 10 kHz, > 0.2 V AC rms	±1.5 %, ±5 digits
RESISTANCE	600 Ω, 6 kΩ, 60 kΩ, 600 kΩ, 6 MΩ 60 MΩ	±1.2 %, ±2 digits ±2.0 %, ±5 digits
INPUT RESISTANCE	10 MΩ	
DUTY CYCLE	10-95 %, ±3.0 %, > 1	A AC rms
FREQUENCY RANGE	10 Hz to 1 kHz	
CAPACITY MEASUREMENT	Up to 60 mF	
DIODE TEST (LOWEST RESOLUTION 1 MV)	Test current ~1 mA Test voltage ~3.3 V	
CONTINUITY TEST	Signal tone upon resistance < 30 $\Omega$	
MEASUREMENT RANGE SELECTION	Automatic or manual	
LIGHTING OF THE MEASUREMENT LOCATION	LED	
DATA-HOLD FUNCTION	Yes	
OVER-VOLTAGE CATEGORY	CAT III 600 V	
STANDARD	EN 61010-01:2010; EN 61010-2- 030:2010; EN 61010-2-032:2012; EN 61010-2-033: 2012; EN 6110-031/A1:2008	
DIMENSIONS	220 x 75 x 35 mm	
WEIGHT	340 g	
VOLTAGE SUPPLY	3 x 1.5 V AAA, LR03	
SCOPE OF DELIVERY	OPE OF DELIVERY inc. test leads and carrying case	



## A MINIATURE DIGITAL CLAMP METER





#### THE SPECIFICATIONS

	TESTBOY 218	
INDICATION	LCD WITH 3 3/4 DIGITS, 4000 COUNTS	
DC CURRENT	40 A, 200 A	±3.0 %, ±5 digits
AC CURRENT (T-RMS)	40 A, 200 A	±2.5 %, ±8 digits
RESOLUTION	0.01 A at 40 A 0.1 A at 200 A	
MAX. CONSUMPTION	ø 21 mm	
SAMPLING RATE	3 x per second	
OPERATING TEMPERATURE RANGE	0–40 °C / 32–104 °F, <75 %RH	
STORAGE TEMPERATURE RANGE	-20-60 °C / -4-140 °F, <80 %RH	
DATA-HOLD FUNCTION	Yes	
AUTO POWER-OFF	Yes	
OVER-VOLTAGE CATEGORY	CAT III 300 V	
STANDARD	EN 61010-1:2010; EN 61010-02- 030:2010; EN 61010-02-032:2012	
DIMENSIONS	155 x 50 x 25 mm	
WEIGHT	95 g	
VOLTAGE SUPPLY	2 x 1.5 V, LR44	
SCOPE OF DELIVERY	inc. carrying case	

## **YOUR BENEFITS**

// Extremely compact construction
// T-RMS
// Data-hold function

Small but perfectly formed! With real effective value measurement (True RMS) and a sensor rate of 3 per second, it provides exact measurement results even in difficult-to access locations. The clamps can be applied wherever you can fit your hand. Despite its compact construction the Testboy TV 218 convinces with useful functions such as data-hold or auto power-off.



FLEXIBLE DIGITAL CLAMP METER





## THE SPECIFICATIONS

	LCD with 4 digits		
AC CURRENT T-RMS (40 – 1000 HZ) LOWEST RESOLUTION 10 mA)	60 A 600 A 3000 A	±3.0 %, ±5 digits ±3.0 %, ±5 digits ±3.0 %, ±5 digits	
AC VOLTAGE T-RMS (40 - 2000 HZ ) (LOWEST RESOLUTION 0.001 V)	6 V 60 V 600 V	±1.5 %, ±5 digits ±1.5 %, ±5 digits ±1.5 %, ±5 digits	
DC VOLTAGE LOWEST RESOLUTION D.001 V)	6 V 60 V 600 V	±1.0 %, ±3 digits ±1.0 %, ±5 digits ±1.0 %, ±5 digits	
FREQUENCY MEASUREMENT CLAMP (LOWEST RESOLUTION 0.1 HZ)	40 -1000 Hz > 1 A AC rms	±0.5 %, ±5 digits	
FREQUENCY MEASUREMENT CONNECTOR (LOWEST RESOLUTION 1 HZ)	40 Hz –10 kHz > 0.5 V AC rms	±0.5 %, ±5 digits	
RESISTANCE	6 kΩ, 60 kΩ, 600 kΩ, 6 MΩ ±1,0 %, ±3 digit		
NPUT RESISTANCE	2 ΜΩ		
CONTINUITY TEST	Signal tone upon resistance < 50 Ω		
LIGHTING OF THE MEASUREMENT LOCATION	LED		
FREQUENCY RANGE	10 Hz to 1 kHz		
CAPACITY MEASUREMENT	Up to 60 mF		
DIODE TEST MAXIMUM CONSUMPTION: Ø 26 MM / LOWEST RESOLUTION 1 MV)	Test current ~1 mA Test voltage ~3.3 V		
CONTINUITY TEST	Signal tone upon re	sistance < 30 Ω	
MEASUREMENT RANGE SELECTION	Automatic or manua	Automatic or manual	
LIGHTING OF THE MEASUREMENT LOCATION	LED		
DATA-HOLD FUNCTION	Yes		
DVER-VOLTAGE Category	CAT IV 600 V		
DIMENSIONS	324 x 178 x 30 mm		
WEIGHT	210 g		
VOLTAGE SUPPLY	3 x 1.5 V AAA, LR03		



## R BENEFITS

- // Wide range of functions
- // Highly legible LCD display
- // LED measurement location lighting
  // Non-contact measuring procedure
- of frequencies // T-RMS measurement procedure for non-sinus voltages suitable for higher line cross-sections

The wide range of measurement functions and high flexibility of the Testboy TV 225 clamp meter permits its universal deployment. Useful features, such as the large LC display with background lighting, real effective value measurement (True RMS) automatic measuring range selection and measurement position lighting, make for especially practical and safe operation.



# OUR SOCKET OUTLET TESTERS

## TESTBOY TESTAVIT SCHUKI 1 LCD / 3 LCD





## SOCKET OUTLET TESTERS







#### THE SPECIFICATIONS

	TESTAVIT SCHUKI 1 LCD	TESTAVIT SCHUKI 3 LCD	
INDICATION	Optical, LCD and LED		
OPERATING VOLTAGE	230 V, 50 Hz		
VOLTAGE SUPPLY	via test object, max.	3 mA	
RCD TEST	Yes (via test button)	No	
RATED LEAKAGE CURRENT	30 mA at 230 V AC	Νο	
PROTECTION CLASS	IP 40		
OVER-VOLTAGE CATEGORY	CAT II 300 V		
STANDARD	EN 61010-1:2010; EN	EN 61010-1:2010; EN 61010-2-030:2010	
OPERATING TEMPERATURE	0-50 °C		
DIMENSIONS	60 x 60 mm	60 x 60 mm	
WEIGHT	54 g	54 g	
SCOPE OF DELIVERY	inc. operating manual		

## **YOUR BENEFITS**

- // Quick and safe checking of installations
- // Finger contact to check the protective earth connection
- // FI test (Schuki 1 LCD)
- // FI test (30 mA at 230 V AC)

The Testavit Schuki 1 LCD and 3 LCD enable specialists to check easily whether sockets, cable drums or connecting cables are correctly connected in 230 V installations. Three LEDs permits quick and clear determination of the connection status. The finger contact enables testing for the presence of impermissibly high contact voltage at the protective earth connection. The Testavit Schuki 1 LCD can also be used to trigger a 30 mA FI circuit breaker (RCD).

## TESTBOY TESTAVIT SCHUKI 1 A / 3 A



## SOCKET OUTLET TESTERS





#### THE SPECIFICATIONS

	TESTAVIT SCHUKI 1A	TESTAVIT SCHUKI 3A	
INDICATION	Optical, LED		
OPERATING VOLTAGE	230 V, 50 Hz	230 V, 50 Hz	
VOLTAGE SUPPLY	via test object	via test object	
RCD TEST	Yes (via test button)	No	
RATED LEAKAGE CURRENT	30 mA	Νο	
PROTECTION CLASS	IP 40		
OVER-VOLTAGE CATEGORY	CAT II 300 V		
STANDARD	IEC/EN 61010-1 (DIN VDE 0411)		
OPERATING TEMPERATURE	0-50 °C		
DIMENSIONS	60 x 60 mm	60 x 60 mm	
WEIGHT	40 g		

## **YOUR BENEFITS**

// Quick and safe checking of installations
// FI test (Schuki 1A)

The Testavit Schuki 1 A and 3 A socket outlet testers are essential test instruments for all professional tradesmen. They indicate all hazardous connection errors at sockets, cable drums and connection cables in 230 V installations via specific LED combinations. This enables the quick and safe checking of installations. The Testavit Schuki 1a is also fitted with an FI test circuit.

## TESTBOY TESTAVIT SCHUKI 2 K





## SOCKET OUTLET TESTER



#### THE SPECIFICATIONS

	TESTAVIT SCHUKI 2K
INDICATION	Optical, glow lamps
OPERATING VOLTAGE	230 V, 50 Hz
VOLTAGE SUPPLY	via test object
RATED LEAKAGE CURRENT	10 mA, 30 mA, 100 mA, 300 mA, 500 mA
TRIP-OUT TIME	200 ms
RCD TEST	via test button
OVER-VOLTAGE CATEGORY	CAT II 300 V
STANDARD	EN 61010-1 (DIN VDE 0411)
DIMENSIONS	100 x 50 x 75 mm
WEIGHT	250 g
SCOPE OF DELIVERY	inc. operating manual and carrying case

## YOUR BENEFITS

*II* Easy checking of difficult-to-access sockets*II* FI test with adjustable rated leakage current

The Testavit Schuki 2K can be used to check sockets in 230-V installations for the correct connection of the conductor and to perform an FI test. The cable with a two-pin earthed plug makes for easy use in difficult-to-access areas.

# USB BNC RJ11



#### CABLE DETECTOR SET WITH LED FLASHLIGHT



ロシ

Stands For Q Since 1953

LED

#### THE SPECIFICATIONS **TESTBOY 26** INDICATION Continuous or alternating tone LED TORCH Yes EN 61010-1:2010; STANDARD EN 61010-2-030:2010: EN 61010-031/A1:2008 230 x 55 x 23 mm (receiver) DIMENSIONS 55 x 57 x 23 mm (transmitter) WEIGHT 244 g **VOLTAGE SUPPLY** 2 x 9 V block battery SCOPE OF DELIVERY Carrying case and operating manual Adapter set (coaxial, F and RJ11 adapters)



## YOUR BENEFITS

- // Variable volume setting
- // Maximum cable length 8000 m (unloaded)
- // LED flashlight

The Testboy 26 cable detector set is a location instrument with an integrated LED flashlight which simplifies the detection of lines in a wall and cable ducts. A signal is modulated on a cable end via the crocodile clips or an optional adapter using the transmitter. The other end of the cable can then be found quickly and precisely using the receiver without contact or the need to strip the cable insulation. A pulsing or constant tone can be selected on the location instrument. Twisted two-core cables can be identified exactly in telecommunications and network technology. The device is also fitted with an adapter set with which to locate COAX-, F- and RJ11 connections.



## CABLE DETECTOR SET, EXTERNAL VOLTAGE PROTECTION UP TO 400 V





THE SPECIFICATIONS		
	TESTBOY 27 ANALOG	
INDICATION	Optical and acoustic	
EXTERNAL VOLTAGE PROTECTION	to 400 V	
DIMENSIONS	245 x 60 x 29 mm (receiver) 135 x 60 x 33 mm (transmitter)	
WEIGHT	318 g (inc. batteries)	
OPERATING		

OPERATING TEMPERATURE	5 °C – 40 °C
VOLTAGE SUPPLY	5 x 1.5V type AA (transmitter and receiver)
COLOUR	Red
SCOPE OF DELIVERY	Carrying case and adapter set with coax, F and RJ11 adapter

## YOUR BENEFITS

// Voltage proof up to 400 V

// Practical LED display

// Adjustable transmission and reception level

The Testboy 26 cable detector set is a development of the Testboy 26. This new location instrument, voltage-proof up to 400 V locates lines in walls and cable ducts. An signal is modulated on a cable end via the crocodile clips or an optional adapter using the transmitter. The other end of the cable can then be found quickly and precisely using the receiver without contact or the need to strip the cable insulation. A continual or alternating tone can be selected on the location instrument.



## YOUR BENEFITS

- // Voltage proof up to 400 V
- // Location of lines in the soil
- // Practical LED display

// Adjustable transmission and reception level

The Testboy 27 digital also sends an optical signal. Twocore cables can also be identified in telecommunications and network technology. It is also fitted with an RJ11 connection. The Testboy 27 digital permits the location of lines and cables in the ground e.g. to locate the limiting wire of a mowing robot.

1. 11	THE SPECIFICATIONS	
		TESTBOY 27 DIGITAL
	INDICATION	Optical and acoustic
	EXTERNAL VOLTAGE PROTECTION	to 400 V
	DIMENSIONS	245 x 60 x 29 mm (receiver) 135 x 60 x 33 mm (transmitt
incl. adapter	WEIGHT	318 g (inc. batteries)
met. adapter		

5 °C – 40 °C

er)

Black

OPERATING TEMPERATURE

COLOUR

**VOLTAGE SUPPLY** 

SCOPE OF DELIVERY

## CABLE DETECTOR SET, EXTERNAL VOLTAGE PROTECTION UP TO 400 V

in the

estboy

estbo

Stands For Quality Since 1953



ter)

5 x 1.5V type AA (transmitter and receiv-

Carrying case and adapter set with coax, F and RJ11 adapter





## MAINS WIRING TESTERS FOR USB, RJ11, RJ45 AND BNC LINES





#### THE SPECIFICATIONS

	TESTBOY 28
INDICATION	LCD
MEASURING APPLICATION	USB, RJ11, RJ45, BNC lines Cable length measurement
DIMENSIONS	150 x 65 x 25 mm
WEIGHT	190 g inc. battery
VOLTAGE SUPPLY	1 x 9 V block battery
SCOPE OF DELIVERY	inc. carrying case

## YOUR BENEFITS

// Clear display

// Maximum cable length 8000 m (unloaded)

// Simple troubleshooting

The Testboy 28 is a handy digital multifunction network tester and cable length measuring device with sound generator and port finder function. The test results are displayed on the clear LC display. Conventional cable formats can be examined for interruptions, crossover, transposition, short circuits or split-pairs instantly using the Testboy 28. Cable length can also be measured. A handy and easy-to-use test instrument, the Testboy 28 is indispensable for professional users and fitters.



**FUSE LOCATOR** 







	TESTBOY 30
PERATING VOLTAGE	100-240 V AC
PERATING REQUENCY	50-60 Hz
DJUSTABLE ENSITIVITY	Yes
ONTACT-FREE CABLE	Yes
VER-VOLTAGE ATEGORY	CAT II 300 V
TANDARD	EN 61010-1
PERATING EMPERATURE RANGE	0-40 °C / 32-104 °F ( 75 % RH)
TORAGE EMPERATURE RANGE	-10-50 °C / 14-122 °F ( 75 % RH)
IMENSIONS ECEIVER	190 x 54 x 37 mm
IMENSIONS RANSMITTER	95 x 56 x 30 mm
VEIGHT RECEIVER	130 g inc. batteries
EIGHT TRANSMITTER	85 g
OLTAGE SUPPLY	1 x 9 V block battery
COPE OF DELIVERY	inc. carrying case

## YOUR BENEFITS

- // Automatic switching between test
  and search mode
  // Automatic search mode
- // Optical and acoustic indication

The Testboy 30 fuse locator locates circuit breakers with absolute certainty and assigns them to the corresponding socket. It instrument set consists of two units: The transmitter and the receiver. The adjustable responsivity facilitates exact localisation. This enables the operator to assign circuits in unfamiliar installations (e.g. in old buildings or newly purchased houses) so as to be able to identify subsequent installations. The receiver of the set can also be used as a contact-free voltage tester.



#### **DIGITAL WALL SCANNER**



#### Heimwerker-Test.de 06/2017 Top class

Heimwerker Praxis 2/2017

1.4; Top class Cost/performance: "Good - excel-

lent"





#### THE SPECIFICATIONS

	TESTBOY 700
INDICATION	Acoustic and optical on a high contrast LCD with background lighting and traffic light indication
SCANNING DEPTH	80 mm ferrous metals 60 mm non-ferrous metals 22 mm wood 50 mm live lines
AUTOMATIC CALIBRATION	Yes
AUTO POWER-OFF	Yes
DIMENSIONS	145 x 68 x 25 mm
WEIGHT	160 g
VOLTAGE SUPPLY	1 x 9 V block battery
SCOPE OF DELIVERY	Carrying case



// Practical traffic light indication
// Contrasting LCD with background lighting
// Automatic calibration

The easily legible and bright display of the Testboy TV 700 gives comprehensive information about the scanning result. Nothing is hidden, from the lateral distance and material to the installation depth. It registers magnetic and non-metalic metals as well as wood or live lines. The approach of objects is indicated by an LED lamp and a bar chart in the display and enables simple, millimetre-exact location within a matter of seconds. Operation is self-explanatory after consultation of the operating manual included in the scope of delivery.

# OUR ADAPTERS & ROTATING FIELD TESTERS

## TESTBOY TV 416/432 (A)

#### **CEE ADAPTERS\***







HASE SEQUENCE	Glow lamps	No	
OLTAGE SUPPLY	via test object		
DVER-VOLTAGE Category	CAT II 300 V	CAT II 300 V	
DIMENSIONS	165 x 65 mm	165 x 65 mm	
VEIGHT	250 g		

**\*ONLY FOR TEST PURPOSES** 

THE SPECIFICATIONS



- // Unbreakable PE housing
- // Can be combined with the Testavit Schuki 1A, 2K and 3A
- // Phase sequence indication (only TV 416/432)

The Testboy TV416/432 (A) consists of a compact CEE adapter consisting of a combination of a CEE plug (16A or 32A) a Schuko socket and a self-closing folding cover. It is also equipped with integrated electronics for phase sequence measurement (only TV 416/432). Used in combination with the Testavit Schuki 1A, 2K and 3A socket outlet testers, it can determine wiring errors or test the effectiveness of the FI circuit breaker.



**ROTATING FIELD TESTER** 





#### THE SPECIFICATIONS

	TESTBOY TV 410N
INDICATION	Optical, 5 glow lamps
RATED VOLTAGE	400 V AC
CURRENT CONSUMPTION	< 3 mA
FREQUENCY RANGE	50/60 Hz
DUTY CYCLE	30 sec.
VOLTAGE SUPPLY	From the measurement object
HOUSING	Impact and break-proof ABS plastic
DIMENSIONS	115 x 60 x 25 mm
WEIGHT	75 g
SCOPE OF DELIVERY	inc. professional probes, 4 mm safety cable, professional crocodile clips and carrying case

An indispensable tool for all those working on with low voltage three-phase alternating current. It is in constant use.



Testboy

// Comprehensive connection cable set
// Impact-resistant and unbreakable
ABS housing

The five glow lamps on the Testboy TV 410 N rotating field tester confirms the presence of all three phases. It is demonstrated by the direction of the rotary field. The impact-resistant, unbreakable ABS plastic housing, the fully insulated 4 mm connectors and the associated comprehensive and adaptable connection cable set ensure safe testing and rapid location of the phasing in a three-phase system. This instrument can work without an additional power supply.



## NON-CONTACT ROTATING FIELD AND ROTARY TESTER









#### THE SPECIFICATIONS

	TESTBOY TV 411	
INDICATION	OPTICAL, 6 LEDs	
VOLTAGE RANGE	70-600 V AC	
FREQUENCY RANGE	50/60 Hz	
TEST LEAD LENGTH	50 cm	
OVER-VOLTAGE- CATEGORY	CAT III 600 V	
HOUSING	ABS plastic	
DIMENSIONS	110 x 70 x 30 mm	
WEIGHT	220 g (inkl. Batterien)	
VOLTAGE SUPPLY	2 x 1,5 V AA	
SCOPE OF DELIVERY	inc. professional probes, 4 mm safety cable, professional crocodile clips and carrying case	

## YOUR BENEFITS

- // Non-contact measurement of the phase sequence and rotating field
- // Integrated rotary tester
- // Quick recording LED display

The Testboy TV 411 non-contact rotating field and rotary tester is especially suited to performing servicing in motor installations and multi-phase networks, as it displays the phase sequence and direction of the rotary field of the external conductor optically through six LEDs. An agile service application enables contact-free measurement with the coloured insulated clamps and minimises the danger of contact with electrically active conductors. The connected rotary tester works without contact to ascertain the direction of rotation of the motor shaft by measuring the alternating magnetic field.

# ODDR INSTALLATION & DEVICE TESTERS



#### **DIGITAL INSULATION TESTER**







#### THE SPECIFICATIONS

INDICATION	Large LC display with bar graph display		
	Large LC display with bar graph display		
INSULATION RESISTENCE	0.01 ΜΩ-100 GΩ		
TEST VOLTAGE (TEST CURRENT MAX. 3 mA)	250 V DC 500 V DC 1000 V DC 2500 V DC	0 – 250 ΜΩ 0 – 500 ΜΩ 0 – 1000 ΜΩ 0 – 1 GΩ	±3 %, ±5 digits ±3 %, ±5 digits ±3 %, ±5 digits ±3 %, ±5 digits ±3 %, ±5 digits
RESISTANCE TESTING	up to 200 Ω		
CONTINUITY TEST	Signal tone upon resistance < 3 $\Omega$		
AC VOLTAGE	0 – 200 V 200 – 750 V	0.1 V 1 V	±1.5 %, ±5 digits ±1.5 %, ±5 digits
DC VOLTAGE	0 – 200 V 200 – 1000 V	0.1 V 1 V	±1.5 %, ±5 digits ±1.5 %, ±5 digits
AUTO POWER-OFF	Yes		
DATA-HOLD FUNCTION	Yes		
MEASURED VALUE MEMORY	For 20 measured values		
RELATIVE VALUE MEASUREMENT	Yes		
OVER-VOLTAGE CATEGORY	CAT IV 600 V / CAT III 1000 V		
DIMENSIONS	193 x 150 x 75 mm		
WEIGHT	1245 g		
VOLTAGE SUPPLY	6 x 1.5 V C LR1	4	
SCOPE OF DELIVERY	inc. test lead set and carrying case		

## **YOUR BENEFITS**

- // Test with four selectable test voltages (250 V, 500 V, 1000 V, 2500 V)
- // Continuity test
- // DC and AC voltage measurement

Testboy has developed the Testboy TV 431 digital insulation tester for simple testing of the insulation resistance of devices, electrical systems and circuits. Four selectable test voltages up to 2500 V enable especially meaningful measurement results. The ability to perform AC and DC voltage measurements and continuity and resistance measurements considerably extends the area of application.



#### DIGITAL EARTH RESISTANCE TESTER

Testboy

TV 441





	TESTBOY TV 441		
INDICATION	LC display with bar graph display		
EARTH RESISTANCE	0 – 29.99 Ω 30 – 99.99 Ω 100 – 999 Ω 1 – 4 kΩ	±2 %, ±6 digits ±3 %, ±3 digits ±3 %, ±3 digits ±3 %, ±3 digits ±3 %, ±3 digits	
EARTH VOLTAGE	0 – 200 V, 50/60 Hz	±1.5 %, ±5 digits	
MEASUREMENT SYSTEM	Constant current, 3 mA (800 Hz)		
AUTO POWER-OFF	After approx. 15 min	After approx. 15 minutes	
MEASURED VALUE RECORDING	Max., Min., average value		
RELATIVE VALUE MEASUREMENT	Yes		
MEASURED VALUE MEMORY	Yes (for 100 measured values)		
OVER-VOLTAGE CATEGORY	CAT III 300 V		
STANDARD	IEC/EN 61010-1 (DIN	IEC/EN 61010-1 (DIN VDE 0411)	
DIMENSIONS	193 x 150 x 75 mm		
WEIGHT	955 g		
VOLTAGE SUPPLY	6 x 1.5 V AA, LR06		
SCOPE OF DELIVERY	inc. earth rod, test le case	inc. earth rod, test lead set and carrying case	

# Concentration of the second se

## YOUR BENEFITS

#### // Auto power-off

// Measured value memory for 100
 measured values

Earthing systems and their connections are subject to the influence of atmospheric conditions. The earth electrodes are also subject to corrosion resulting from the water and salts in the soil. The Testboy TV 441 digital earth resistance tester is designed for checking the resistance between the reference earth and the connection point of the earthing system in accordance with IEC/EN 61010-1 (DIN VDE 0411). To conduct the measurement, an alternating current is fed between the auxiliary earthing rod and the earth electrode to be measured. The voltage drop is measured and the earth resistance is determined (three conductor method) with a probe positioned in the area of the reference earth of the earth to be measured.



#### **INSTALLATION TESTER DIN VDE 0100-600**









#### THE SPECIFICATIONS

	TESTBOY TV 445
INDICATION	128 x 64 pixels with background lighting and integrated Good/Bad display indication
VOLTAGE MEASUREMENT	0-550 V AC
EARTH RESISTANCE MEASUREMENT	0–9999 Ω
INSULATION RESISTANCE TEST VOLTAGE	0–999 MΩ 50 V, 100 V, 250 V, 500 V, 1000 V
RCD TESTING CONTACT VOLTAGE RCD-UC TRIP-OUT TIME TRIP-OUT CURRENT	Type A, AC 0–100 V 0–2500 ms 10 mA, 15 mA, 30 mA, 100 mA, 300 mA, 500 mA, 1000 mA
OPERATING TEMPERATURE	0-40 °C
OVER-VOLTAGE CATEGORY	CAT III 600 V, CAT IV 300 V
TEST STANDARDS	DIN VDE 0100-600, ÖVE E8001, NIN/NIV
HOUSING	Robust plastic with integrated magnetic clamp
VOLTAGE SUPPLY	6 x NiMH battery or battery AA
SCOPE OF DELIVERY	inc. universal test lead 3 x 1.5 m, test cable for Schuko sockets, 3 probes (blue, black, green), 3 crocodile clips (blue, black, green), mains adapter and bat- teries, carry strap, quick guide, product test data and carrying case

## YOUR BENEFITS

#### // Auto power-off

// Measured value memory for 100
 measured values

The Testboy TV 445 installation tester enables checks in accordance with DIN VDE 0100-600. It is particularly easy to operate, not least due to the large LC display and specific help screens, which provide exact descriptions of how to perform a measurement. Already stored safety and RCD (FI) characteristics evaluate the result using a Good/Bad message.

With FI measurement, an automatic mode performs all requisite measurements sequentially. The Testboy TV 445 is an easy-to-use DIN VDE 0100 measuring instrument. This lightweight, robust and ergonomic instrument with an integrated magnet holder enables you to work without getting tired.



## DIN VDE 0100-600 INSTALLATION TESTER WITH COMPLETE EVALUATION SOFTWARE











#### THE SPECIFICATIONS

	TESTBOY TV 455
INDICATION	128 x 64 pixels with background lighting and integrated Good/Bad display indication
VOLTAGE MEASUREMENT	0-550 V
EARTH RESISTANCE MEASUREMENT	0–9999 Ω
INSULATION RESISTENCE	0.15 MΩ bis 1 GΩ
TEST VOLTAGE	50 V, 100 V, 250 V, 500 V, 1000 V
RCD TESTING CONTACT VOLTAGE RCD-UC TRIP-OUT TIME TRIP-OUT CURRENT	Type A, AC, B 0-100 V 0-2500 ms 10 mA, 30 mA, 100 mA, 500 mA, 1000 mA
MEASURED VALUE MEMORY	1900 measured values
OVER-VOLTAGE CATEGORIES	CAT III 600 V, CAT IV 300 V
TEST STANDARDS	DIN VDE 0100-600, ÖVE E8001, NIN/NIV
OPERATING TEMPERATURE	0-40 °C
HOUSING	Robust plastic with integrated magnetic clamp
INTERFACE	USB
VOLTAGE SUPPLY	6 x NiMH battery or battery AA
SCOPE OF DELIVERY	inc. universal test lead 3 x 1.5 m, test cable for Schuko sockets, probes, crocodile clips, mains adapter and batteries, carry strap, quick guide, CD with PC software, factory calibration certificate and carrying case

## YOUR BENEFITS

- // Testing in accordance with DIN VDE 0100-600, ÖVE E8001, NIN/NIV
- // USB interface and PC software
- // Testing of AC/DC sensitive RCDs (TYPE B)
- // Integrated test lead calibration
- // Protocol in accordance with ZVEH (optional)

Its counterpart the Testboy TV 445 is highly respected in the specialist world. The further developed Testboy TV 455 is just as suitable (impressively so) for tests performed in accordance with DIN VDE 0100-600. It is also equipped with an integrated test lead calibration. The large LCD display with integrated background lighting makes it easy to read off results, notifications, measurement parameters and messages. Two GOOD/BAD LED indicators are located on the side of the LC display. A USB interface means that the measurement results (up to 1,900 measured values) can be easily evaluated using the PC software included in the scope of delivery. It enables the testing of TYPE B AC/DC sensitive RCDs.



#### **DEVICE TESTER DIN VDE 0701/0702**







#### THE SPECIFICATIONS

	TESTBOY TV 465
INDICATION	128 x 64 pixels with background light- ing and integrated Good/Bad display indication
PROTECTIVE CONDUCTOR RESISTANCE TEST CURRENT	0–1999 Ω 200 mA
INSULATION RESISTANCE TEST VOLTAGE	0–199.9 MΩ up to 500 V DC
ALTERNATIVE LEAKAGE CURRENT	0–20.0 mA
MEASURING VOLTAGE	0-300 V
POLARITY TESTING	Test voltage <50 V AC
MEASUREMENT RANGE SELECTION	Automatic
OVER-VOLTAGE CATEGORY	CAT II 300 V
PROTECTION CLASS	1, 11, 111
TEST STANDARDS	DIN VDE 0701-0702, DGUV specifica- tion 3, BetrSichV, ÖVE E8701/E8702
DIMENSIONS	235 x 140 x 80 mm
WEIGHT	1195 g
INTERFACES	USB and RS-232
VOLTAGE SUPPLY	6 x 1.2 V NiMH battery or 6 x 1.5 V AA
SCOPE OF DELIVERY	inc. user manual, mains adapter and batteries, system carrying case, test lead with test probe and crocodile clip
ACCESSORIES (OPTIONAL)	Memory expansion and software, USB interfaces cable

#### D N B

- Testing in accordance with DIN VDE 0701-0702, // DGUV regulation 3, BetrSichV, ÖVE E 8701/E 8702
- // Integrated compensation module
  // Menu-controlled help function
- // Battery capacity sufficient for approx. 2600 test objects (depending on the number of measurements)
- // Screening test possible

The Testboy TV465 is a mains-independent device tester for testing mobile devices in accordance with DIN VDE 0701/0702. The instrument is easy to operate, permitting quick and easy testing of electrical equipment or tools with an ON / OFF switch, heating devices, motor devices, lamps, multiple distributors and household appliances. Pre-programmed or self-defined test sequences, the menu-assisted help function and the Good/Bad messages means that the Testboy TV465 is especially easy to operate, enabling quick and easy testing.



#### VDE TESTER DIN 0701/0702/EN 62353







#### THE SPECIFICATIONS

	TESTBOY TV 470	
INDICATION	128 x 64 pixels wit	h background lighting
PROTECTIVE CONDUC- TOR RESISTANCE	0.1-2 Ω	±10 %
INSULATING RESISTANCE	0.1–200 MΩ	±10 %
CONTACT CURRENT	0.1-20 mA	±5 %
SUBSTITUTE LEAKAGE CURRENT	0.1-20 mA	±5 %
LOAD CURRENT	0.2-16.0 A	±5 %
CAPACITY	50-3700 V A	±5 %
PELV TEST	from 25 V eff.	
INPUT CURRENT	Max. 16 A	
DATA MEMORY	up to 500 test objects	
OVER-VOLTAGE CATEGORY	CAT II 600 V	
TEST STANDARDS	DIN VDE 0701/0702, EN 62353	
OPERATING TEMPERATURE	0-40 °C	
DIMENSIONS	250 x 170 x 55 mm	
WEIGHT	1445 g	
INTERFACE	USB	
VOLTAGE SUPPLY	230 V ±10 %; 50 Hz ±2 %	
SCOPE OF DELIVERY	inc. test lead set, Windows® software CD, USB connection cable, carrying case, mains lead and bar code scanner	

## YOUR BENEFITS

- // Specified test sequence with Good/Bad message
- // Help screen for each measurement
- // Bar code scanner
- // Protocol software
- // DAkkS calibration certificate logging

The Testboy TV 470 is a handy test instrument designed for safety and repeat testing of mobile equipment in accordance with DIN VDE 0701/0702 and EN 62353. The level of safety required for mobile devices can only be guaranteed by regular testing. The self-explanatory operability of the Testboy TV 470 and its logging software and DAkkS calibration certificate enables companies to carry out checks and documentation themselves in accordance with the standards.

The ability to run semi-automatic test sequences saves a lot of time. The bar code scanner included in the scope of delivery means that the annual check need only scan the instrument, perform the test and load the data in the software. This automatically assigns the results to the correct customer in the database.

# OUR THERMOMETERS

estbe IV325



**INFRARED THERMOMETERS** 









#### THE SPECIFICATIONS

	TESTBOY TV 323
INDICATION	LCD with background lighting
DETECTOR	Thermopile
MEASUREMENT OPTICS	12:1
LASER POINT	Switchable
MEASUREMENT RANGE	-50-550 °C, -58-1022 °F
MEASUREMENT ACCURACY	±2.0 °C, ±3.6 °F
RESPONSE TIME	<1s
RANGE EXCEEDED INDICATOR	"1" upon exceeding the meas- urement range
EMISSIVITY	0.95 (fixed)
AUTO POWER-OFF	After c. 10 s
DATA-HOLD FUNCTION	Yes
MIN./MAX. VALUE INDICATION	Yes
OPERATING TEMPERATURE	0-50 °C, 32-122 °F
HUMIDITY	10-80 % RH
HOUSING	Impact and break-proof ABS plastic
DIMENSIONS	152 x 94 x 38 mm
WEIGHT	127 g
VOLTAGE SUPPLY	2 x 1.5 V AAA LR03

## **YOUR BENEFITS**

// Data-hold function

// Auto power-off

// Min./max. value indication

The pistol form Testboy TV 323 infrared thermometer convinces thanks to its easy operation. Its integrated laser pointer permits point- exact temperature measurement. The manually selectable display illumination ensures that the measured data can be read off even in poor light conditions. It features an extended temperature range from -50° C to 550° C (-58° F to 1022° F) and a min./max. value indication. The emissivity is set to 0.95 so that it can measure the majority of materials such as concrete, wood or coated surfaces excellently. It is well suited for daily use in the trade and industry.



#### INFRARED THERMOMETER WITH ADJUSTABLE EMISSION VALUE





## YOUR BENEFITS

- // Min./max. value memory/alarm function
- // Adjustable emissivity
- // Averaging
- // Connection for conventional K-type sensor

The Testboy TV 325 infrared thermometer impresses with its many useful functions, for example, min./max. value memory with alarm function and averaging. The non-contact measurement range extends from -60° C to 500° C (-76° F to 932° F). The emissivity can be set from 0.10 to 1.00 in 0.01 increments Infrared measuring instruments register the infrared radiation emitted from a measurement object and use it to calculate temperature. In this context, emissivity describes the ability of a body to emit infrared energy to its surroundings. It is also fitted with a connection



#### THE SPECIFICATIONS

	TESTBOY TV 325
INDICATION	LCD with background lighting
DETECTOR	Thermopile
MEASUREMENT OPTICS	12:1
LASER POINT	Switchable
MEASUREMENT RANGE	-60-500 °C, -76-932 °F infrared -64-1400 °C, -82,3-1999 °F with K-type sensor
MEASUREMENT ACCURACY INFRARED	Object 15-35 °C, ambient 25 °C: ±1.0°C, ±1.8°F Object -33-15 °C and 35-500 °C, ambi- ent 23 °C ±3 °C: ±2°C, 4°F or ±2 %, the greater value applies
MEASUREMENT ACCURACY K-TYPE SENSOR	Ambient 23°C ± 6°C: ±1 °C, 1.8 °F or ±1 %, the greater value applies
EMISSIVITY	0.95 specified, adjustable from 0.10–1.00 in 0.01 increments
RESOLUTION	0.1° (-9.9–199.9°)
RESPONSE TIME	< 0.5 s
MIN./MAX. VALUE MEM- ORY	With alarm function
AVERAGING	Yes
AUTO POWER-OFF	After c. 10 s
DATA-HOLD FUNCTION	Yes
TEMPERATURE SENSOR	Connection for K-type sensor
OPERATING TEMPERA- TURE	0-50 °C, 32-122 °F
HUMIDITY	10-90 % RH
HOUSING	Impact and break-proof ABS plastic
DIMENSIONS	49 x 133 x 146 mm
WEIGHT	222 g
VOLTAGE SUPPLY	2 x 1.5 V AAA, LR03
SCOPE OF DELIVERY	inc. carrying case and K-type sensor (-50-200 °C)

for conventional K-type sensors; this increases the measurement range to -64° C to 1400° C (-82,3° F to 1999° F). The comprehensive performance spectrum and easy handling of the TV 325 makes it especially suited to mobile use in locations with poor access and in industrial systems. It is also just as useful in car workshops, heating, cooling and air-conditioning systems and in electrical trades.

# OUR LUXMETERS, RANGE FINDER & WORKING LIGHT



**DIGITAL LUXMETER** 





#### THE SPECIFICATIONS

	TESTBOY TV 333
INDICATION	18 mm high LCD
MEASUREMENT RANGE	0–100000 lx
MEASUREMENT RATE	0.4 s
RANGE EXCEEDED INDICATOR	"1" upon exceeding the meas- urement range
OPERATING TEMPERATURE	0-50 °C (32-122 °F)
DIMENSIONS	130 x 72 x 30 mm
WEIGHT	40 g
VOLTAGE SUPPLY	1 x 9 V block battery
SCOPE OF DELIVERY	inc. carrying case, operating manual

## YOUR BENEFITS

- // Free-moving sensor with coiled cable
- // Large, high-contrast display
- // Sensor cover

Lux (lx) is the physical unit for the strength of illumination provided by a source of light. Derived from the Latin for light (lux) this unit indicates how much light from a lighting source falls on a surface. The Testboy TV 333 digital luxmeter can be used to measure the light strength in a particular location. The freely mobile sensor affords access to poorly-accessible locations. The silicon photo diodes behind a large diffuser enables precise measurements of up to 100.000 lx. Some 100,000 lx can be measured outside on a bright sunny day; the lighting strength in a TV studio amounts to c. 1.000 lx, whilst a candle provides 1 lx from a metre.

The Testboy TV 333 is suitable for performing measurements in a range of contexts including offices, conference rooms, classrooms and other public buildings.

#### BENEFITS U

- // Artificial light sensitive photo diode (e.g. LED illumination)
- Adjustable colour temperature 11
- // Data-hold function
  // Sensor cover

The Testboy TV 335 spectral light meter is suitable for measuring the light strength of LEDs. The digital luxmeter is easy to use and stable and has a large measurement range up to 400,000 lx. The artificial light- sensitive photo diode with adjustable colour temperature measures all light sources including LED illumination. The large LC display ensures quick and reliable reading of the measurement result.

#### THE SPECIFICATIONS

	TESTBOY TV 335
INDICATION	LCD with 3 ½ digits and bar chart
MEASUREMENT RANGE	20, 200, 2000 , 20000, 400000 lx 20, 200, 2000, 40000 fc 0~ 999900 cd
ACCURACY	3 % V(λ) adjustment 2 % cosine correction
SENSOR	Silicone photo diode
SPECTRAL RANGE	320–730 nm
SAMPLING RATE	ø 2 measurements per second
OPERATING TEMPERATURE	-10-50 °C / 14-122 °F
MAX. RELATIVE AIR HUMIDITY	85 % (not condensing)
DIMENSIONS	89 x 190 x 42.5 mm
WEIGHT	250 g (inc. battery)
VOLTAGE SUPPLY	1 x 9 V block battery
SCOPE OF DELIVERY	inc. carrying case

#### LED LUXMETER TO 400.000 LX











#### LASER RANGE FINDER







#### THE SPECIFICATIONS

	TESTBOY TV 610
INDICATION	LCD with background lighting
MEASUREMENT RANGE	0.05–60.00 m
MEASUREMENT ACCURACY	± 1.5 mm
RESOLUTION	1 mm
MEASUREMENT FUNCTIONS	Continuous measurement Addition/subtraction Surface area calculation Volume calculation Pythagoras calculation Maxmin. Value, indirect meas- urement via two or three-point measurement
REFERENCE POINT	Leading edge, rear edge Stop angle from corner
MEASURED VALUE MEMORY	The last 20 measured values
MEASURING UNITS	Meter, feet, inches
AUTO POWER-OFF	After c. 180 s
OPERATING TEMPERATURE	0-40 °C
DIMENSIONS	124 x 49 x 27 mm
WEIGHT	130 g
VOLTAGE SUPPLY	2 x 1.5 V AAA, LR03
SCOPE OF DELIVERY	inc. carrying case

## OUR BENEFITS

- // Range up to 60 m
- // Addition/subtraction
- // Surface area calculations
- // Volume calculations// Pythagoras calculations

The unhandy yardstick is outperformed by the Testboy TV 610 laser range finder. It provides reliable measures of distances of up to 60 metres and enables addition and subtraction. In addition to lengths, it can measure volume, surface area and perform Pythagoras calculations, and uses two or three point indirect measurement procedures to determine height. It is fitted with an easily legible LCD with background lighting and spirit level The device switches off automatically following idle time to protect the batteries.



## YOUR BENEFITS

- // 27 high-performance LEDs
- // c. 4.5 h operating life
- // Maintenance-free NiMH battery
- // IP 54
- // breakage and impact-resistant ABS housing

The Testboy Light 500 is a high-performance LED work light with an impact-proof, acid and oil resistance housing. Fitted with 27 super-bright white LEDs and a maintenance-free NiMH batter, it provides up to 4 ½ hours of illumination. The integrated microprocessor ensures optimum charging, operational reliability and brightness control. The light can be secured laterally using its two integrated holding magnets or from with the hook on the top cap. It is especially suited to use in a cramped working environment.

#### PRODUCT VIDEO: WWW.TESTBOY.DE









	TESTBOY LIGHT 500
LIGHTING UNIT	27 bright white LEDs
LED CONFIGURATION	1 x centre row as a spot 2 x outside rows as diffused light
SUSPENSION	Attachment hook, can be rotated through 360°
ATTACHMENT	2 holding magnets
SERVICE LIFE	4.5 h
CHARGING TIME	2 h
PROTECTION CLASS	IP 54
STANDARD	EN 61010-1 (DIN VDE 0411)
DIMENSIONS	320 x 40 x 45 mm
WEIGHT	320 g
VOLTAGE SUPPLY	1 x 3.6 V 1800 mAh NiMH battery
SCOPE OF DELIVERY	inc. charger 230 V AC and 12 V DC

## TESTBOY LIGHT 500

LED WORKING LIGHT WITH NIMH

**BATTERY AND HOLDING MAGNETS** 

## OUR MOULD DETECTOR, HYGROMETER & ANEMOMETER

TV 341



#### **DEW-POINT MEASURING INSTRUMENT** (MOULD DETECTOR)







	TESTBOY TV 328	
INDICATION	LCD with background lighting	
DETECTOR	Thermopile	
MEASUREMENT OPTICS	12:1	
MEASUREMENT RANGE	-20-350 °C, 4-662 °F infrared -10–40 °C, 14–140 °F with ambient sensor	
MEASUREMENT ACCURACY INFRARED	Object 10-30 °C: ±1 °C, ±1.8 °F Object -20-10 °C and 30-200°C: ±3 °C, 4 °F or ±2 %, the greater value applies	
EMISSIVITY	0.75, 0.85 and 0.95 pre-set	
RESOLUTION	0.1 °	
RESPONSE TIME	< 0.5 s	
AUTO POWER-OFF	After c. 25 s	
DATA-HOLD FUNCTION	Yes	
OPERATING TEMPERATURE	-10-40 °C, -14-140 °F	
HUMIDITY	10-90 % RH	
LASER CLASS	II, 650 nm, <1 mW	
HOUSING	Impact and break-proof ABS plastic	
DIMENSIONS	56 x 194 x 162 mm	
HUMIDITY	10-90 % RH	
WEIGHT	222 g	
VOLTAGE SUPPLY	1 x 9 V block battery	
SCOPE OF DELIVERY	inc. carrying case	



- // Dew point display
- // Relative humidity measurement
- // Laser ring
- // Adjustable emissivity
  // Averaging

The Testboy TV 328 dew-point measuring instrument locates areas threatened by mould and hidden and invisible thermal bridges and can thus be used to prevent mould accretion. The measurement range extends from -20°C to +200°C with infrared and from -10°C to +40°C with an ambient sensor. The comprehensive performance spectrum such as the thermopile measurement optics of 12:1, a switchable laser ring, relative humidity measurement, a switchable display illumination and a selectable emissivity makes the Testboy TV328 the ideal companion for mobile use.



**HYGROMETER** 







#### THE SPECIFICATIONS

	TESTBOY TV 341
MEASUREMENT RANGE	0 – 55 %
MEASUREMENT ACCURACY	± 2 %
RESOLUTION	0.1 %
MEASUREMENT FUNCTIONS	Hold, max., min. value
AUTO POWER-OFF	Yes
OPERATING TEMPERATURE	-10 – 50 °C / 14–122 °F
STORAGE TEMPERATURE	-20 – 60 °C
DIMENSIONS	143 x 55 x 28 mm
WEIGHT	115 g
VOLTAGE SUPPLY	3 x 1.5 V AAA
SCOPE OF DELIVERY	inc. operating manual and carrying case

## **UR BENEFITS**

- // No separate test leads or probes
- // Auto power-off
  // Integrated self-testing unit

The Testboy TV 341 is a handy instrument for measuring the moisture content in building materials. This precise test instrument is fitted with integrated and slimline measurement probes, which enable the testing of a wide range of materials, without causing visible damage. This includes timber, plywood, fixing plates, veneers, gypsum or plasterboard. The measurement probes can also be used to measure the temperature. The measurement probes are protected during transport by a practical cap. The instrument features a max./min. value memory for the measurement of large surfaces and quantities. A hold function facilitates measurements in poorly-accessible locations by saving a measured value in the display at the press of a button.



#### DIGITAL WHEEL ANEMOMETER (WIND METER)







#### THE SPECIFICATIONS

	TESTBOY TV 350		
INDICATION	LCD with background lighting		
WIND SPEED	0.80 - 30.0 m/s 1.4 - 108.0 km/h 0.9 - 67.0 mil/h 80 - 5900 ft/m 1.3 - 98.5 ft/s 0.8 - 58.0 kn	±2.0 %, ±50 digits ±2.0 %, ±50 digits	
AIR TEMPERATURE	-20 – 60 °C -4 – 140 °F	±1.5 °C ±2.7 °F	
RELATIVE AIR HU- MIDITY	20 – 90 % RH	±3.0 % RH at 25 °C	
AIR FLOW	0 – 9999 m³/s (CMS) 0 – 99990 m³/m (CMM) 0 – 99990 ft³/m (CFM)		
MIN./MAX. VALUE MEMORY	Yes		
AUTO POWER-OFF	Yes		
TEMPERATURE UNITS	°C /°F		
AMBIENT TEMPERATURE	Yes		
DEW-POINT TEMPERATURE	Yes		
WET-BULB TEMPERATURE	Yes		
INTERFACE	USB		
DIMENSIONS	85 x 165 x 38 mm (W x H x D)		
WEIGHT	200 g	200 g	
VOLTAGE SUPPLY	1 x 9 V block battery		
SCOPE OF DELIVERY	Inc. carrying case		

## YOUR BENEFITS

- // Illuminated LC display
- // Min./max. value memory
- // USB interface for evaluating the data on PC (Windows)

A wheel anemometer is a small, almost free-range wind generator. The Testboy TV 350 is the ideal assistant when working with all heating, ventilation and air conditioning systems. In addition to wind speeds from 0.80 to 30.0 m/s, the Testboy TV 350 measures relative humidity from 20 to 90 %., air temperature from – 20 to +60°C, air flow from 0 to 9999 m³/sec, dew point temperature and air volumes. The measured values can be recorded via the integrated USB interface and the software included in the scope of delivery. The user can switch between all international measuring units such as metres, kilometres, feet, miles and knots.



# OUR VEHICLE MEASURING NSTRUMENTS



#### **BRAKE FLUID TESTER DOT 4**











#### THE SPECIFICATIONS

	TESTBOY 50
INDICATION	Optical via 5 LEDs
MEASUREMENT RANGE	DOT 4
PROTECTION CLASS	IP40
STANDARD	EN 61010-1:2010
DIMENSIONS	152 x 23.5 mm
WEIGHT	40 g
VOLTAGE SUPPLY	1 x 12 V, type V23

## **YOUR BENEFITS**

// Checks of brake fluids DOT 4

- // Illuminated measurement probes
- // Long service life, as acid and alkali-resistant

The Testboy 50 is a handy testing pin which can test the brake fluids DOT 4 very quickly. Five LEDs precisely indicate the water content in brake fluids manufactured on a glycol basis. Brake fluid is hygroscopic, absorbing water from the air humidity. This makes it suitable for quick checking during the order acceptance in car workshops.

The United States Department of Transportation (DOT) standard number 116 stipulates the minimum requirements placed on glycol-based (DOT 3, DOT 4, DOT 5.1) and silicone based brake fluid (DOT 5).



#### BRAKE FLUID TESTER DOT 3, DOT 4, **DOT 5.1**





#### THE SPECIFICATIONS

	TESTBOY 55
INDICATION	Optical via 3 LEDs
MEASUREMENT RANGE	DOT 3, DOT 4, DOT 5.1
PROTECTION CLASS	IP 40
STANDARD	EN 61010-1:2010
DIMENSIONS	152 x 23.5 mm
WEIGHT	40 g
VOLTAGE SUPPLY	2 x 1.5 V AAA, LR03

## **UR BENEFITS**

// Checks of brake fluids DOT 4 DOT 4, DOT 5.1 // Measurement location lighting

// Long service life, as acid and alkali-resistant

The Testboy 55 is a handy testing pin which can test the brake fluids DOT 3, DOT 4 and DOT 5.1 very quickly. Five LEDs provide a clear indication of the water content in brake fluids manufactured on a glycol base. Brake fluid is hygroscopic, absorbing water from the air humidity. This makes the Testboy 55 the perfect instrument for car, HGV and motorbike workshops alike.

The United States Department of Transportation (DOT) standard number 116 stipulates the minimum requirements placed on glycol-based (DOT 3, DOT 4, DOT 5.1) and silicone based brake fluid (DOT 5).



## CAR MULTIMETER WITH TEMPERATURE MEASUREMENT



## YOUR BENEFITS

- // Speed measurement
- // Closing angle measurement (ignition point)
- // Duty cycle measurement
- // LCD with autom. background lighting
- // Data-hold function

The Testboy 65 is especially well suited for application in the automotive and workshop sector. In addition to the standard multimeter functions which it provides, the Testboy 65 enables easy measurement of the speed, closing angle duty cycle and temperature measurement from -40 to 1000 °C. The comparably low cost of the Testboy 65 and its broad range of deployment makes it a firm favourite amongst DIY workers.

Extremely robust and easy to operate, it convinces in every-day use.





#### THE SPECIFICATIONS

	TESTBOY 65	
INDICATION	LCD with automatic background lighting, 3 ½ digit, 1999	
DC VOLTAGE	200 mV, 2 V, 20 V, 120 V	±0.5 %, ±5 digits
AC VOLTAGE	50 V	±1.2 %, ±5 digits
DC CURRENT	20 mA, 200 mA 20 A	±1.8 %, ±3 digits ±3.0 %, ±5 digits
RESISTANCE	200 Ω, 2 kΩ, 20 kΩ, 200 kΩ 2 MΩ 200 MΩ	±1.0 %, ±5 digits ±1.0 %, ±5 digits ±(measured value-10) x 5 %, ±5 digits
TEMPERATURE MEASUREMENT	-40-0 °C 0-400 °C 400-1000 °C	±2.0 %, ±8 digits ±2.0 %, ±3 digits ±1.0 %, ±3 digits
SPEED MEASUREMENT	500–10000 min <sup>-1</sup>	±3.0 %, ±5 digits
CLOSING ANGLE MEASUREMENT	0–120 °	±3.0 %, ±5 digits
DUTY CYCLE MEASUREMENT	0–100 %	±3.0 %, ±5 digits
FREQUENCY MEASUREMENT	0-200 kHz	±2.0 %, ±5 digits
DIODE TEST	Supply current approx. 25 mA	
CONTINUITY TEST	0-45 Ω	
MAX. INPUT VOLTAGE	120 V DC / 50 V AC	
INPUT IMPEDANCE	10 MΩ (DCV), 4.5 MΩ (ACV)	
VOLTAGE BAND WIDTH AC	40-400 Hz	
OPERATING TEM- PERATURE RANGE	0-40 °C (32-104 °F)	
STORAGE TEMPER- ATURE RANGE	-10-50 °C (14-122 °F)	
AUTO POWER-OFF	15 minutes	
DATA-HOLD Function	Yes	
DIMENSIONS	180 x 84 x 55 mm	
WEIGHT	335 g inc. battery	
VOLTAGE SUPPLY	1 x 9 V block battery	
SCOPE OF DELIVERY	inc. safety measureme sensors (0–180 °C) and	· · · · · · · · · · · · · · · · · · ·



#### COATING THICKNESS TESTER WITH IN-TERCHANGEABLE PROBE



#### THE SPECIFICATIONS

	TESTBOY 70	
INDICATION	LCD with 4 digits	
MEASUREMENT RANGE	0–1250 µm 0–50 mil	± 2.5 μm, ± 1–3 % ± 1–3 %
MINIMUM MEASURING AREA	ø 5 mm	
MINIMUM CURVATURE RADIUS	Fe: Convex 1.5 mm NFe: 3 mm	
MINIMUM BASE MATERIAL THICKNESS	Fe: 0.5 mm NFe: 0.3 mm	
OPERATING TEMPER- ATURE	0-40°C	
STANDARD	EN 61010-1 (DIN VDE 0411)	
DIMENSIONS	158 x 74 x 31 mm	
WEIGHT	220 g	
VOLTAGE SUPPLY	4 x 1.5 V AAA, LR03	
SCOPE OF DELIVERY	inc. Fe probe and service case	

## **YOUR BENEFITS**

// Large LCD

// Interchangeable probe for measurements on magnetic and non-magnetic metallic bases

The Testboy 70 coating thickness tester is a durable, splash-proof, high-precision measuring instrument and measures all non-magnetic coatings such as as paints, enamel, chrome, copper, zinc etc. on steel or iron. With its interchangeable probe, the Testboy 70 enables measurement of all insulating coatings on non-magnetic, metallic bases such as aluminium, copper or brass. Coating thickness testing is a central part of many applications including galvanizing and coating.





#### COATING THICKNESS METER WITH COMBINATION PROBE





#### THE SPECIFICATIONS

	TESTBOY 72	ТЕЅТВОУ 72	
INDICATION	LCD with 3 digits		
MEASUREMENT RANGE	0-2000 μm 0-80 mil	±2 μm, ±3 %, ±0.1 with ±3 %	
MINIMUM MEASURING AREA	ø 7 mm		
MINIMUM CURVATURE RADIUS	Fe: Convex 1.5 mm NFe: 3 mm		
MINIMUM BASE MATERIAL THICKNESS	Fe: 0.7 mm NFe: 0.7 mm		
MEASURED VALUE MEMORY	10 values		
OPERATING TEMPERATURE	0-40 °C		
STANDARD	EN 61010-1 (DIN VDE 0411)		
DIMENSIONS	94 x 48 x 24.2 mm		
WEIGHT	72 g		
VOLTAGE SUPPLY	1 x 1.5 V AAA, LR03		
SCOPE OF DELIVERY	inc. service case and calibration plate		

## **YOUR BENEFITS**

- // Combination probe for magnetic and non-magnetic bases
- // Measured value memory
- // Adjustable display alignment

The Testboy 72 coating thickness tester uses a combination probe to perform reliable measurements of all types of insulated coatings on magnetic and non-magnetic metallic bases. Switching is performed automatically. Self-calibration is performed using test films included in the scope of delivery. The integrated measured value memory stores the last ten measured values. The adjustable display alignment means that measurements can be performed under the most difficult of conditions.



## COATING THICKNESS TESTER WITH LED DISPLAY





#### THE SPECIFICATIONS

	TESTBOY 74	
INDICATION	Optical via 3 LEDs	
MEASUREMENT RANGE	0-400 µm	± 15 %
MINIMUM MEASURING AREA	ø 7 mm	
MINIMUM BASE MATERIAL THICKNESS	Fe: Convex 0.8 mm	
OPERATING TEMPER- ATURE	0-40°C	
DIMENSIONS	160 x 33 mm	
WEIGHT	80 g	
VOLTAGE SUPPLY	1 x 12 V type V23	

## YOUR BENEFITS

// Clear LED display
// Quick, uncomplicated checks

With its clear LED display, the Testboy 74 coating thickness tester permits the quick and easy control of all non-magnetic coatings such as paints, enamel, chrome, copper, zinc etc. on steel or iron. It is especially suitable for use in car workshops to perform quick checks on vehicles for previous accident damage.





## MATERIAL THICKNESS METER





#### THE SPECIFICATIONS **TESTBOY 75** INDICATION LCD with 4 digits MEASUREMENT 1.2-200 mm ± 0.5 mm RANGE RESOLUTION 0.1 mm SMALLEST ø 5 mm MEASURING AREA RESONANCE 500-9000 m/s FREQUENCY MATERIALS Steel, aluminium, copper, brass, quartz glass, PVC, zinc, cast iron, polyethylene, grey cast iron etc. OPERATING 0-50 °C TEMPERATURE STANDARD EN 61010-1 (DIN VDE 0411) DIMENSIONS 158 x 74 x 31 mm WEIGHT 220 g **VOLTAGE SUPPLY** 3 x 1.5 V AAA, LR03 SCOPE OF DELIVERY

/ inc. ultrasonic sensor, glycerine and service case

## YOUR BENEFITS

- // Large measurement range
- // High accuracy of measurement
- // Adjustable resonance frequencies

The Testboy 75 material thickness meter serves the measurement of the material thickness of metals, plastics and glass. Using an ultrasonic sensor, the instrument is able to determine accurately the material thicknesses of steel, aluminium, copper, brass, quartz glass, PVC, zinc, cast iron, polyethylene and grey cast iron. The ability to set the resonance frequency means that other materials can be measured. The simple and safe handling and high precision of the Testboy 75 material thickness meter explains its success. It is suitable for many Quality Assurance applications in the car and industrial sector.

Thickness measurements using a material thickness meter are an important aspect of many production and material testing procedures. The thickness of acoustically conductive materials can be measured using ultrasonic testing. It is also possible to ascertain interior and exterior material defects in conforming materials and hollow articles.



#### **VOLTAGE TESTER**





#### THE SPECIFICATIONS

	TESTBOY CAR TESTER
INDICATION	Optical via 4 LEDs
MEASUREMENT RANGE	3-48 V DC
STANDARD	EN 61010-1:2010; EN 61010-2-030:2010
DIMENSIONS	145 x 25 x16 mm
WEIGHT	120 g
VOLTAGE SUPPLY	via measurement object

## YOUR BENEFITS

// Polarity display
// Integrated piercing probe

The Testboy Car Tester is ideal for troubleshooting from 3 to 48 V DC in the car, commercial vehicle and all other sectors. Four LEDs indicate the voltage and polarity. The integrated piercing probe facilitates the testing of lines. The crocodile clips mean no problems in establishing the earth connection.



## Wissen, was los ist! Akustische und optische Signalgeber

## We know what's going on! Acoustic and optical signaling

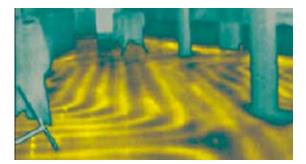




# OUR THERMOGRAPHY INSTRUMENTS

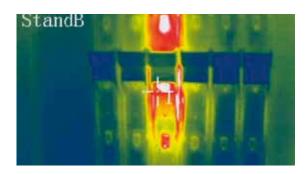






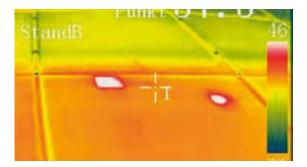
#### **HEATING AND PLUMBING**

The detection of sources of heat or cold, e.g. leak detection in the event of a burst pipe, underfloor heating, panel heating, etc.



## ELECTRICAL ENGINEERING, ELECTRONICS

Functional monitoring of individual components, e.g. switching cabinet thermal imaging, cable detection



StandB

## **PHOTOVOLTAICS**

Checking installed panels, e.g. hotspot, poor contacts, overheating of the inverter

## CONSTRUCTION INDUSTRY, BUILDING MATERIALS

Building thermal imaging, thermal bridges, checking of insulation, windows, mould, etc.



All objects with a temperature greater than absolute zero emit infrared radiation. Infrared radiation cannot be seen by the naked human eye. Thermal imagers can convert infrared radiation into electric signals, thereby making them visible. As almost every component that absorbs or transmits energy heats up prior to outage, infrared thermography represents one of the most effective and reliable technologies for performing preventive maintenance. It is a quick, thorough and safe procedure with which to identify problems before malfunctions occur.

Whether used in industrial plants, switch cabinets, controllers or buildings: Testboy thermal imagers provide powerful options for diagnosis. Using our imagers for the early identification of problems and error sources brings a range of advantages, including the prevention of production downtimes and fires and can bring energy savings. The high-resolution sensors in the Testboy thermal imager enable detailed image evaluation. Using the TV 309, TV 304, TV 294 Digital and TV 295 models even enable on-site evaluation.



Professional report creation on infrared and building inspections

Developed by thermal imaging experts, the Testboy Reporter software has been optimised to produce comprehensive and meaningful inspection reports quickly. The look, structure and information content of the report can be saved individually by the user as a template with the required diagrams, text elements and company logo. The radiometric images – each pixel has a saved value – can be adapted, thereby enabling measurement points and line profiles to be set or the temperature scale or colour palette to be changed. The evaluations calculated in the report are adapted automatically.





## IR THERMAL IMAGER – VIEWING THE INVISIBLE IN THE ENTRY LEVEL







## YOUR BENEFITS

- // Digital camera for image overlay
- // Integrated colour display
- // Easy operation
- // Universal deployment, robust and reliable

We may not have worked out how to square the circle, but we have invented an infrared thermometer with thermal imager features: the Testboy TV 292. This thermal imager is the successor to the TV 291, which "Motor & Maschine" found to be "excellent". All this at a price which makes for an easy purchase decision. The digital overlay of a real image camera in 25% steps makes for very easy handling even for the novice. It provides all the advantages of thermal imaging technology in the location of temperature problems from

#### THE SPECIFICATIONS

	TESTBOY TV 292
RESOLUTION	60 x 60 pixels
TEMPERATURE RESOLUTION	(NETD) 0.15 °C / 0.27 °F
FIELD OF VIEW (FOV) MIN. FOCUS DISTANCE	20° x 20°   0.5 m fix
SENSOR DATA CAPTURE	6 Hz
SPECTRAL RANGE	8 – 14 µm
LC DISPLAY	2.4"-Colour-LCD
CCD CAMERA	300.000 pixels
TEMPERATURE RANGE	-20 – 300 °C / -4 – 572 °F
ACCURACY	±2 °C or ±2 % (the greater value applies)
EMISSIVITY CORRECTION	Variable from 0.1 to 1.0 (in 0.01 increments)
COLOUR PALETTE	6 (iron bow, rainbow, rainbow higher contrast, grey scales (white hot) and grey scales (black hot))
IMAGE	Fading the visual depiction with the infrared image in 25-% steps
OTHER SETTINGS	Date, time, unit of temperature
STORAGE MEDIUM	MicroSD card
DATA FORMAT	ВМР
VOLTAGE SUPPLY	4x 1.5V AA
ENERGY SAVING FUNCTION	8 – 14 µm
OPERATING TEMPERATURE	-5 – 40 °C / 23 – 104 °F
HUMIDITY	≤ 90 % not condensing
STORAGE TEMPERATURE	-20 – 55 °C / -4 – 131 °F
DIMENSIONS	223 x 88 x 65 mm
WEIGHT	310 g
SCOPE OF DELIVERY	inc. carrying case, SD card

-20 to 300° C, which remain hidden to typical IR thermometers. The user can select from up to six colour palettes. The Testboy TV 292 is suited to preventive maintenance, process monitoring, leak detection and the localisation of heating pipes. The installed digital camera ensures image overlay via the IR image and has an integrated 2.4" colour LCD display. A variable micro SD card keeps the transfer of the saved data to the memory system classic.

# 4 DIGITAL

## **IR THERMAL IMAGER WITH 50HZ TECHNOLOGY**





## AREAS OF PPLICATION

- $\parallel$
- of heating pipes Building thermography //
- //
- // The localisation of defective panels

## UR BENEFITS

- // 50-Hz technology
- // Digital camera for image overlay// Digital panorama view
- // Language recording voice
- // On-site analysis
- // Alarm function
- // Two sensor resolutions available
- 11 Fall height 2 m
- // Testboy Reporter Software

The robust construction of the universally-deployable and affordable Testboy TV 294 Digital thermal imager means that it can withstand even rough conditions. The TV 294-160 has a 160 x 120 pixel resolution; the TV294-384 even provides an exceptional 384 x 288 pixel resolution. Their 50-Hz technology delivers clear images in real time and produces thermographical recordings of even fast movements during the process. A digital camera performs actual image overlay. The comprehensive measuring functions enable analysis to be performed directly on site. These models come equipped with 11 colour palettes , 4 mobile measuring points, 3 mobile measuring surfaces, 2 linear measurements and isothermal analysis. Data is saved on a 2 GB MicroSD card and is delivered with complete "Testboy-Reporter" processing software.

### THE SPECIFICATIONS

IMAGING PERFORMANCE	TESTBOY TV 294 - 160 DIGITA	L TV 294 - 384 DIGITAL
SENSOR TYPE	Focal Plane Array (FPA), unco	oled microbolometer
RESOLUTION	160 x 120 pixels	384 x 288 pixels
PIXEL SIZE   SENSOR SIZE	25 µm   4 x 3 mm	25 μm   9.6 x 7.2 mm
SPATIAL RESOLUTION (IFOV)	2.73 mrad	1.37 mrad
TEMPERATURE RESOLUTION (NETD)	≤0.08 °C at 30 °C	≤0.06 °C at 30 °C
FIELD OF VIEW (FOV)   MIN. FOCUS DISTANCE	25° x 19°   0.1 m	
SENSOR DATA CAPTURE	50 Hz	
SPECTRAL RANGE	8–14 μm	
FOCUS   ZOOM	manual   2x electronic	
IMAGE/DISPLAY		
LC DISPLAY	2.7"-Colour-LCD	
	50/60 Hz	
CCD CAMERA		
PRESENTATION	1.3 megapixel       Panorama view	
MEASUREMENT CHARACTERISTICS		
	20.250.90	
	-20-350 °C	
	±2 °C or ±2 % (the greater value applies)	
	Variable from 0.1 to 1.0 (in 0.01 increments)	
MOVEABLE MEASURING POINTS   SURFACE AREAS LINE MEASUREMENT	4 3 2	
SURFACES MINMAX. TEMPERATURE   AVERAGE VALUE	yes   yes	
ISOTHERM ANALYSIS/TEMPERATURE DIFFERENCE	yes   yes	
ALARM ACOUSTIC   OPTICAL	yes   yes	
COLOUR PALETTE	11	
IMAGE SETTINGS	automatic/manual (enhancem	ent and brightness)
AMBIENT TEMPERATURE INFLUENCE	Automatic correction in accord	lance with user entry
CORRECTION FOR ATMOSPHERIC RADIATION	Automatic correction in accordance with user entry	
OTHER SETTINGS	Date, time, unit of temperatur	e, language
IMAGE STORAGE		
STORAGE MEDIUM	MicroSD card 2 GB	
STORAGE	Automatic/manual single image storage	
DATA FORMAT	JPEG, with thermal measured data	
VOICE ANNOTATIONS	Up to 60 s per image	
VOLTAGE SUPPLY		
BATTERY OPERATION	Li-lon battery, operating time	up to 3 h per battery, intelligent charger
EXTERNAL VOLTAGE SUPPLY	10-15 V DC	
ENERGY SAVING FUNCTION	Automatic power-off, sleep m	ode adjustable
INTERFACES		
VIDEO OUTPUT   AUDIO OUTPUT	PAL/NTSC   3.5 mm jack plug	
USB	Yes	
ENVIRONMENTAL CONDITIONS		
FALL HEIGHT	Up to 2 m	
OPERATING TEMPERATURE	-15-50 °C	
HUMIDITY	<pre> &lt;15-50 °C  &lt; 90 % not condensing</pre>	
PROTECTION CLASS	IP54	
STORAGE TEMPERATURE	- 25-60 °C	
PHYSICAL PROPERTIES		
DIMENSIONS	245 × 105 × 230 mm	
WEIGHT (EXC. BATTERY)	1 kg	
	1/4"-20	
	Class 2, 1 mW / 635 nm (red)	
EQUIPMENT		
SCOPE OF DELIVERY		arger with power supply unit, USB cable, lens cover, es, audio and video cables, operating manual, Testboy

# 95 TOUCH

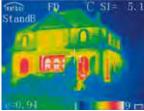
**IR THERMAL IMAGER WITH 50HZ TECHNOLOGY** 







- $\parallel$
- //
- //
- // Research and development
- // //



## OUR BENEFITS

- // Touch screen
- // Bluetooth
- // Ethernet interface
- // LED light and laser pointer
- // Digital camera for image overlay
  // On-site analysis
- // Alarm function
- // Testboy reporter software

The innovative TV 295 Touch thermal imager is fitted with a 3.5 inch touch screen, LED lighting and a laser pointer; its robust construction enables it to withstand even rough conditions. The TV 295-160 has a 160 x 120 pixel resolution; the TV295-384 provides an exeptional 384 x 288 pixel resolution. The 50 Hz technology and Bluetooth® and Ethernet interface of the instruments mean that they can be subject to various deployments and are suitable for performing real time process monitoring. A digital camera performs actual image overlay. The comprehensive measuring functions provided by the devices enable analysis to be performed directly on site. The devices are equipped with 11 colour palettes, 5 mobile measuring points and 5 mobile measuring surfaces, 2 linear measurements and isothermal analysis. Data is saved on a 2 GB MicroSD card and is delivered with complete "Testboy-Reporter" processing software.

### THE SPECIFICATIONS

IMAGING PERFORMANCE	TESTBOY TV 295 - 160 TOUCH	TV 295 - 384 TOUCH
SENSOR TYPE	Focal Plane Array (FPA), uncooled mi	
RESOLUTION	160 x 120 pixels	384 x 288 pixels
PIXEL SIZE   SENSOR SIZE	25 µm   4 x 3 mm	25 μm   9.6 x 7.2 mm
SPATIAL RESOLUTION (IFOV)	2.73 mrad	1.37 mrad
TEMPERATURE RESOLUTION (NETD)	≤0.08 °C at 30 °C	≤0.06 °C at 30 °C
FIELD OF VIEW (FOV)   MIN. FOCUS DISTANCE	25° x 19°   0.5 m	
SENSOR DATA CAPTURE	50 Hz	
SPECTRAL RANGE	8–14 µm	
FOCUS   ZOOM	Manual   2–4x electronic	
IMAGE/DISPLAY		
LC DISPLAY	3.5" colour LCD (640 x 480 pixels) wit	h touch function
IMAGE FREQUENCY	50/60 Hz	
CCD CAMERA	3 megapixels (inc. LED light)	
PRESENTATION	Overlay of IR image and CCD image (fi	usion), panorama view
MEASUREMENT CHARACTERISTICS		
TEMPERATURE RANGE	-20-350 °C (option up to +1000 °C)	-20-600 °C (option up to +1200 °C)
ACCURACY	±2 °C or ±2 % (the greater value appl	
EMISSIVITY CORRECTION	Variable from 0.1 to 1.0 (in 0.01 increments)	
MOVEABLE MEASURING POINTS   SURFACE AREAS LINE MEASUREMENT	5 5 2	
SURFACES MINMAX. TEMPERATURE   AVERAGE VALUE	ves ves	
ISOTHERM ANALYSIS/TEMPERATURE DIFFERENCE	yes   yes	
ALARM ACOUSTIC   OPTICAL	yes i yes yes i yes	
COLOUR PALETTE	yes i yes 11	
		hrightness
AMBIENT TEMPERATURE INFLUENCE	automatic/manual (enhancement and brightness)	
	Automatic correction in accordance with user entry	
CORRECTION FOR ATMOSPHERIC RADIATION	Automatic correction in accordance with user entry	
	Date, time, unit of temperature, langu	
STORAGE MEDIUM	MicroSD card 8 GB (max. 32 GB)	
STORAGE	Automatic/manual single image storage	
	JPEG, with thermal measured data; H	1.264 video transfer via network
VOICE ANNOTATIONS	Up to 60 s per image	
VOLTAGE SUPPLY		
BATTERY OPERATION	Li-lon battery, operating time up to 3	h per battery, intelligent charger
EXTERNAL VOLTAGE SUPPLY	10-15 V DC	
ENERGY SAVING FUNCTION	Automatic power-off, sleep mode adju	ustable
INTERFACES		
VIDEO OUTPUT   AUDIO OUTPUT	PAL/NTSC   3.5 mm jack plug	
USB	yes   yes   yes	
ENVIRONMENTAL CONDITIONS		
FALL HEIGHT	Up to 2 m	
OPERATING TEMPERATURE	-15-50 °C	
HUMIDITY	≤ 90 % not condensing	
PROTECTION CLASS	IP54	
STORAGE TEMPERATURE	- 25-60 °C	
PHYSICAL PROPERTIES		
DIMENSIONS	245 × 105 × 230 mm	
WEIGHT (EXC. BATTERY)		
	1 kg	
	1/4"-20	
	Class 2, 1 mW / 635 nm (red)	
EQUIPMENT	Treasure to the test of te	
SCOPE OF DELIVERY		with power supply unit, USB cable, lens cover, lio and video cables, operating manual, Testbo

# OUR ACCESSORIES





#### **CROCODILE CLIPS**

Testboy 65, Testboy Pocket 100, Testboy 2200, Testboy 3000, Testboy Pocket, Testboy 20 Plus, Testboy TV 216N, Testboy TV 215N, Testboy TV 225, Testboy TV 460, Testboy TV 470, Testboy TV 410N, Testboy 313 and Testboy 312



#### **GS-38 PROBES**

Testboy Profi III LED and Testboy Profi III LCD



## **REMOVABLE PROBES**

Testboy Profi III LED and Testboy Profi III LCD

#### **ADAPTER FOR K-TYPE SENSOR**

Testboy 313, Testboy 65



Testboy TV 325, Testboy 313, Testboy 65, Testboy TV 326, Testboy TV 327

1| TP-K02 immersion probe Measurement range: -50-700°C Tolerance: ±2.2°C

2| TP-K03 surface probe, straight Measurement range: -50-400°C Tolerance: ±2.2°C

3| TP-K04 penetration probe Measurement range: -50-600°C Tolerance: ±2.2°C

4| TP-K05 surface probe, curved Measurement range: -50-400°C Tolerance: ±2.2°C

5| TP-K06 room probe Measurement range: -50-800°C Tolerance: ±2.2°C

## **TEST LEAD SET CAT III**

Testboy 20 Plus, Testboy 65, Testboy Pocket 100, Testboy TV 216N, Testboy TV 215N, Testboy TV 225, Testboy 312, Testboy 313, Testboy 2200, Testboy TV 460 and Testboy TV 470

TEST LEAD SET CAT IV Testboy 3000

CASES

Two-pole voltage tester, continuity tester and multimeter









## D D MARKETING

## **TESTBOY DISPLAY**

- // Display for 4 Testboy 313 Digital multimeter, 10 Testboy Profi III LED/LCD or 21 non-contact voltage testers from 12 V
- // Individual configuration possible

### **TESTBOY PACKAGE**

- // Display for 21 non-contact voltage testers from 12 V
- // Stand-up display
- // Individual configuration possible (e.g. TB 110, 130, 114)









- // Top technology from Testboy to handle
- // The best-possible presentation of the instruments
- // intercultural configuration possible
- // Depicted examples:
  - 2 Testboy Profi III LED, 2 Testboy Profi III LCD,
  - 1 Testboy 40 Plus, 2 Testboy 20 Plus, 1 Testboy Light 500, 2 Testboy 3000,

  - 1 Testboy Pocket, 1 Testboy 312, 1 Testboy TV 216N, 1 Testboy 218,

  - 1 Testboy 26, 1 Testboy 110, 1 Testboy 113,
  - 1 Testboy TV 325










CATALOGUE RECEIVED FROM: