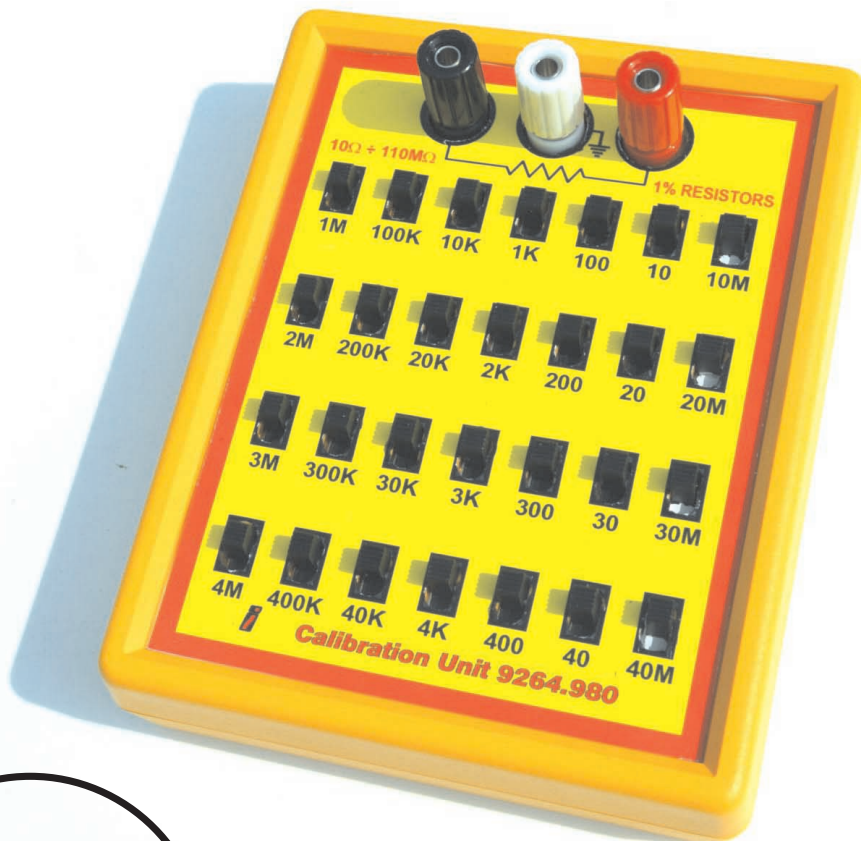


Calibration Unit

mod.9264.980

INSTRUCTION MANUAL



EC CONFORMITY

Unit 9264.980 conforms to EC directives **EMC - 2014/30/UE**, the following harmonized standards are in use EN 60204-1, EN 61000-6-1, EN 61000-6-3.

WARRANTY

This unit is guaranteed against all defects due to faulty materials and workmanship, within 12 months from the date of purchase.

A use not conforming to what specified might be dangerous to the safety of the operator and may damage the unit.

In such circumstances the manufacturer is relieved of any liability and the warranty itself will decay.

REPAIR

Repairs have not been attempted by anyone other than authorized repair distributors.

Environment protection

Separate collection. This product must not be disposed of with normal household waste.

Should you find one day that your product needs replacement, or if it is of no further use to you, do not dispose of it with household waste. Make this product available for separate collection.

Separate collection of used products and packaging allows materials to be recycled and used again.



Re-use of recycled materials helps prevent environmental pollution and reduces the demand for raw materials.

Local regulations may provide for separate collection of electrical products from the household, at municipal waste sites or by the retailer when you purchase a new product.



TECNICAL FEATURES

Resistance Box with 1% resistors, for the calibration of wriststrap and ESD footwear testers

Range: $10\Omega \div 110M\Omega$ (resolution 10Ω)

Tolerance: 1%

Power: 1W for resistors up to 4MW

..... 0,5W for resistors from 10MW to 40MW

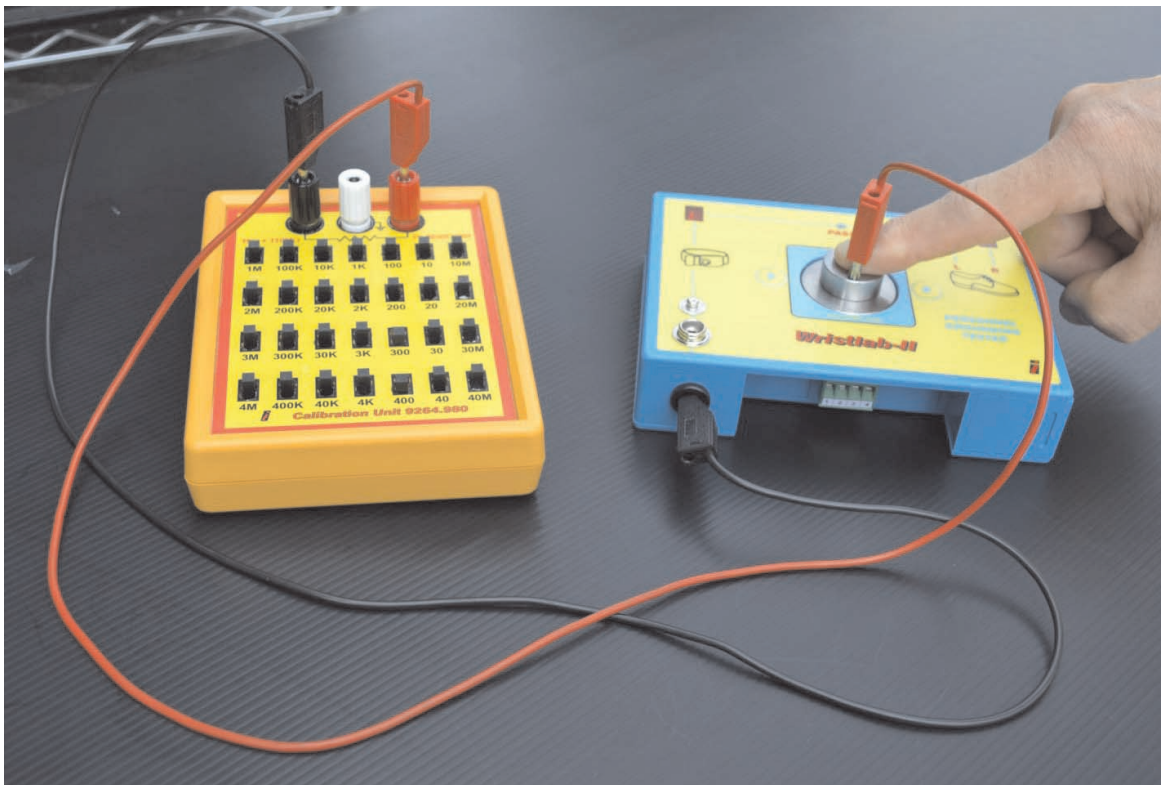
Operative Voltage: 250Vac Max

Dimensions: 14,7 x 11,7 x 5,5 cm

Weight: 320 g

CALIBRATION CHECK FOR WRISTLAB-II 9264.960

WRIST-STRAP CALIBRATION CHECK ACCORDING IEC61340-5-1



Connect cables as in the picture above:
BLACK WIRE = WRIST-STRAP INPUT
RED WIRE = TOUCHPLATE ADAPTOR

Lower limit for wrist-strap = $750K\Omega \pm 10\%$

Set Resistance Box at $675K\Omega$ ($750K-10\%$)

Start measuring by pressing the adaptor on the TOUCHPLATE

Display on the left = **LOW**

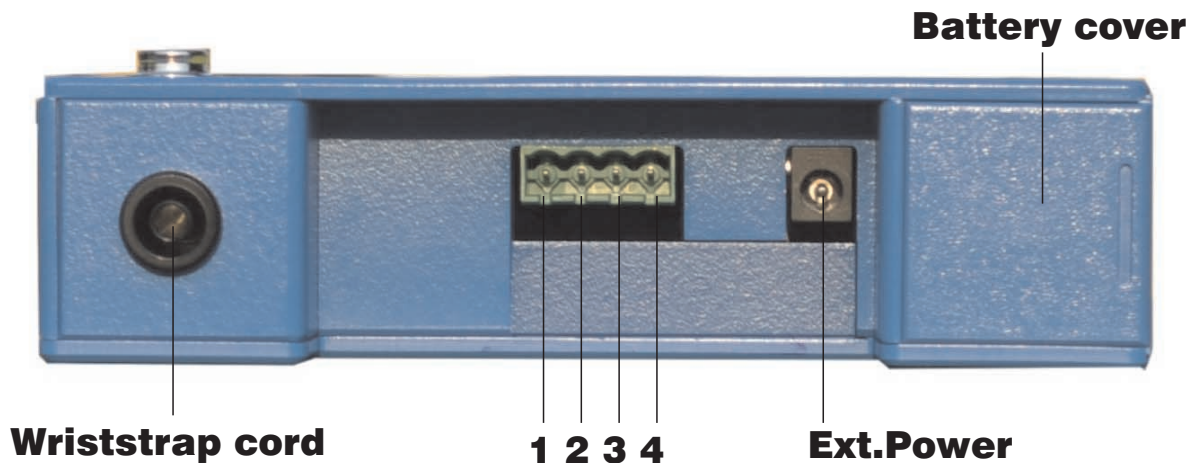
Set Resistance Box at $825\text{K}\Omega$ ($750\text{K}+10\%$)
Start measuring by pressing the adaptor on the TOUCHPLATE
Display on the left = **PASS (display off)**

Upper limit for wrist-strap = $35\text{M}\Omega \pm 10\%$

Set Resistance Box at $31.5\text{M}\Omega$ ($35\text{M}-10\%$)
Start measuring by pressing the adaptor on the TOUCHPLATE
Display on the left = **PASS (display off)**

Set Resistance Box at $38.5\text{M}\Omega$ ($35\text{M}+10\%$)
Start measuring by pressing the adaptor on the TOUCHPLATE
Display on the left = **HIGH**

FOOTWEAR CALIBRATION CHECK ACCORDING IEC61340-5-1



Connect cables as in the picture above:
BLACK WIRE =
3 (IN)Metallic plate for measuring LEFT footwear
or
4 (IN)Metallic plate for measuring RIGHT footwear

RED WIRE = TOUCHPLATE ADAPTOR

Lower limit for footwears = $100\text{K}\Omega \pm 10\%$

Set Resistance Box at $90\text{K}\Omega$ ($100\text{K}-10\%$)
Start measuring by pressing the adaptor on the TOUCHPLATE
Display of the corresponding footwear = **LOW**

Set Resistance Box at $110\text{K}\Omega$ ($100\text{K}+10\%$)
Start measuring by pressing the adaptor on the TOUCHPLATE
Display of the corresponding footwear = **PASS (display spento)**

Upper limit for footwears = $35\text{M}\Omega \pm 10\%$ (SEE NOTE 1)

Set Resistance Box at $31.5\text{M}\Omega$ ($35\text{M}-10\%$)

Start measuring by pressing the adaptor on the TOUCHPLATE
 Display of the corresponding footwear = **PASS (display off)**

Set Resistance Box at $38.5\text{M}\Omega$ ($35\text{M}+10\%$)

Start measuring by pressing the adaptor on the TOUCHPLATE
 Display of the corresponding footwear = **HIGH**

NOTE 1

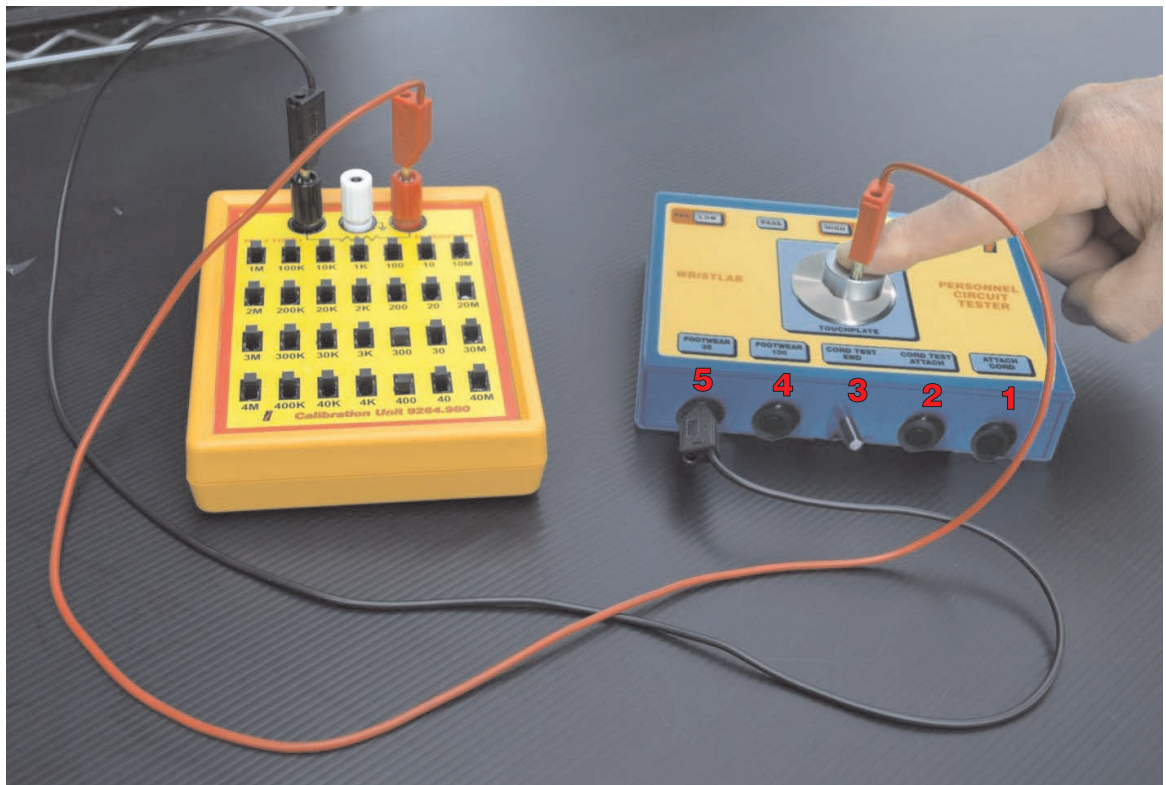
THE WRISTLAB-II ALLOW THE SETTING OF MANY UPPER THRESHOLDS FOR FOOTWEAR IN ACCORDANCE WITH THE REQUIREMENTS OF THE USER.

FOR THRESHOLDS DIFFERENT FROM $35\text{M}\Omega$ PROCEED IN THE SAME WAY BY SETTING THE VALUES OF THE TABLE BELOW:

UPPER LIMIT	PASS resistance	HIGH resistance
$70\text{M}\Omega$	$63\text{M}\Omega$	$77\text{M}\Omega$
$100\text{M}\Omega$	$90\text{M}\Omega$	$110\text{M}\Omega$
$140\text{M}\Omega$ (*)	$126\text{M}\Omega$	$154\text{M}\Omega$
$200\text{M}\Omega$ (*)	$180\text{M}\Omega$	$220\text{M}\Omega$

(*) ATTENTION: THE LIMITS: $140\text{M}\Omega$ AND $200\text{M}\Omega$ ARE INTENDED FOR THE "HAND FREE MODE" AND NEED A DIFFERENT PROCEDURE , NOT POSSIBLE TO TEST THEM WITH THIS CALIBRATION UNIT.

CALIBRATION CHECK FOR WRISTLAB 9265.030



Parameters control :

Wrist-strap low limit	0.75M Ω	$\pm$ 50K Ω
Wrist-strap high limit	35M Ω	$\pm$ 2M Ω
Cord only low limit	0.75M Ω	$\pm$ 50K Ω
Cord only high limit	5M Ω	$\pm$ 250K Ω
Footwear low limit	50K Ω	$\pm$ 10K Ω
Footwear upper limit (primary protection)	35M Ω	$\pm$ 2M Ω
Footwear upper limit (secondary protection)	100M Ω	$\pm$ 5M Ω

Lower limit for wrist-strap (750K Ω)

Cable connection:

BLACK WIRE = 1 (WRIST-STRAP INPUT)

RED WIRE = TOUCHPLATE ADAPTOR

Set Resistance Box at 700K Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = LOW (RED LED)

Set Resistance Box at 800K Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = PASS (GREEN LED)

Upper limit for wrist-strap (35M Ω)

Cable connection:

BLACK WIRE = 1 (WRIST-STRAP INPUT)

RED WIRE = TOUCHPLATE ADAPTOR

Set Resistance Box at 33M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = PASS (LED VERDE)

Set Resistance Box at 37M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = HIGH (LED GIALLO)

Lower limit for footweares (50K Ω)

Cable connection:

BLACK WIRE = 5 (FOOTPLATE INPUT, primary protection)

RED WIRE = TOUCHPLATE ADAPTOR

Set Resistance Box at 40K Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = LOW (RED LED)

Set Resistance Box at 60K Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = PASS (GREEN LED)

Cable connection:

BLACK WIRE = 4 (FOOTPLATE INPUT, secondary protection)

RED WIRE = TOUCHPLATE ADAPTOR

and repeat the measuring .

Upper limit for footwears (35M Ω)

Cable connection:

BLACK WIRE = 5 (FOOTPLATE INPUT, primary protection)

RED WIRE = TOUCHPLATE ADAPTOR

Set Resistance Box at 33M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = **PASS (GREEN LED)**

Set Resistance Box at 37M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = **HIGH (YELLOW LED)**

Upper limit for footwears (100M Ω)

Cable connection:

BLACK WIRE = 4 (FOOTPLATE INPUT, secondary protection)

RED WIRE = TOUCHPLATE ADAPTOR

Set Resistance Box at 95M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = **PASS (GREEN LED)**

Set Resistance Box at 105M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = **HIGH (YELLOW LED)**

Upper limit for WRIST-STRAP cord (5M Ω)

Cable connection:

BLACK WIRE = 2 (CORD TEST INPUT)

RED WIRE = TOUCHPLATE ADAPTOR

Set Resistance Box at 4,75M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = **PASS (GREEN LED)**

Set Resistance Box at 5,25M Ω

Start measuring by pressing the adaptor on the TOUCHPLATE

RESULT = **HIGH (YELLOW LED)**