



PGT[®] 120 Personnel Grounding Tester with RS232 interface (Part No.: 7100.PGT120.COM)

- The Personnel Grounding Tester PGT[®] 120 is a wrist strap and footwear tester for access control of ESD protected areas (EPA)
- The test result is indicated with audible and visual signals. A relay with a dry contact provides the connection to a door opening system. (Adjustable door opening time 1s and 3s)
- **RS232 interface to process measurement data and test results in ASCII i.e. with time attendance systems**
- Power supply: External power supply unit
- Wrist strap, right and left shoe testing is simultaneously possible by separate measuring circuits
- In combination with a barrier gate, the footwear measurement can be performed in series without pressing a button (hands-free mode).
- Separate measurement of left and right shoe
- Lower limit disabling is possible
- The unit can be used on bench tops or as a wall mounted unit (Wall mounting requires an additional wall mounting plate)

Limit values and measure mode:

	Measuring range / Test voltage	Standard
Wrist strap / coil cord	750 k Ω - 35 M Ω	IEC 61340-5-1
Footwear worn on metal plate (values for each shoe)	(100 k Ω *) - 35 M Ω <u>or</u> (100 k Ω *) - 70 M Ω * lower limit <i>can be disabled</i>	IEC 61340-5-1
Footwear in series	140 M Ω <u>or</u> 70 M Ω (both shoes in series)	---
Test voltage (without load)	100V/DC <i>changeable to 50V or 30V</i>	IEC 61340-5-1



Dimensions:
150 x 200 x 65 mm

Supplied with:

- Footwear electrode,
- Power supply 240 V AC,
- 9 V battery
- Manual and calibration certificate (German/English)



Picture: Footwear electrode for separate shoe testing
(350 x 500 x 8 mm)



- ▶ 1 year limited warranty
- ▶ Recommended calibration interval: 2 years

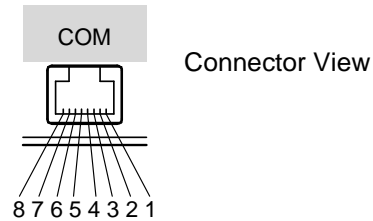
Interface description

A computer or a terminal can be connected to the serial RS232 interface. Data is in ASCII format, a computer with terminal program is sufficient to monitor measurement data in plain text.

Connection:

Western modular RJ45 socket on the rear.

- Pin 4 = GND
- Pin 5 = RxD
- Pin 6 = TxD



Interface settings:

9600 baud, 8 data bit, no parity, 1 stop bit (9600,8,n,1)

Data is embedded in control character

<STX> = "Start of Text" (ASCII 002) and
<ETX> = "End of Text" (ASCII 003)

No.	Description	Start	Prefix		Data	End	
1	value footwear in series	<STX>	RSG	<SP>	value in kOhm	<ETX>	<CR> <LF>
2	value wrist strap	<STX>	RHG	<SP>	value in kOhm	<ETX>	<CR> <LF>
3	value left shoe	<STX>	RSL	<SP>	value in kOhm	<ETX>	<CR> <LF>
4	value right shoe	<STX>	RSR	<SP>	value in kOhm	<ETX>	<CR> <LF>
5	test OK	<STX>	ERG	<SP>	OK	<ETX>	<CR> <LF>
6	test failed	<STX>	ERG	<SP>	Error no.	<ETX>	<CR> <LF>

<CR> = control character "Carriage Return" (ASCII 013)
 <LF> = control character "Line Feed" (ASCII 010)
 <SP> = Space (ASCII 032)

Example:

Data : <STX>RHG 2671<ETX><CR><LF>
 <STX>ERG OK<ETX><CR><LF>

Sense : Resistance wrist strap 2,671 MOhm,
 Test result OK

Please read the user's manual for details about interface commands and error codes.



Footwear electrode

Simultaneous left- and right shoe testing

Footwear and wrist strap test

Simultaneous footwear and wrist strap test



Hands-free-Mode

Footwear test without pressing a button

Accessories (optional):

- Wall Mounting Plate Part No. 7100.PGT100.101
- Calibration Unit for PGT[®]120 Part No. 7100.PGT120.CU
- Mat for footwear electrode with yellow bevelled edges Part No. 7100.PGT120.SM



- Label printer + Controller to record and print test results Part No. 7100.PGT120.COM.D

