

Prüfball SPB Digital

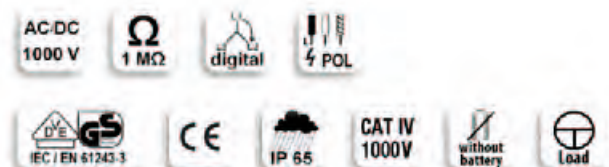
Digital indication without battery



SPB 1000L ohne zuschaltbare Last
CAT IV / 1000 V

The Prüfball SPB digital combines the latest microcontroller applications with approved features of the analog Prüfball - robust, precise and maintenance-free

- Safety casing made of solid rubber extremely impact resistant, dust- and waterproof
- Direct reading of all functions without keypress
- Phase, phase sequence and continuity test, connectible 30 mA (RCD-tripping)
- Reliable phase sequence test by microcontroller analysis, possible with gloves
- Without battery, maintenance-free lifelong





Instrument for professional use in power engineering

The Prüfball digital is a maintenance-free voltage-continuity tester for energy supply and industry:

The new digital Prüfball SPB 500L and SPB 1000L supplements our analog Prüfball series which is successful since over 60 years.

The device provides direct reading without keypress.

A load of approx. 35 mA at 230 V can be connected by actuating the push-button (only SPB 500L).

Clear display

Reliable test by two display systems and connectible load:

- bright LEDs and illuminated LCD
- high accuracy
- connectible low resistive load for RCD tripping
- without battery, maintenance-free lifelong



1. bargraph
2. large numerals and symbols for voltage AC/DC and resistance
3. light diodes
4. indication of connected load
5. arrow for phase sequence
6. indication when test prod applied to phase



Approved safety concepts

The case of solid rubber encloses the measuring system and switching mechanism:

- impact-resistant, shockproof
- dust- and waterproof, outdoor type
- overvoltage protection - CAT IV
- current limiting safety components in accordance with latest standards
– without semiconductor
- secure two-hand tripping device for low resistive checks through patented special push-button with wide contact gap

Wide range of accessories

(Accessories are not included in scope of delivery)

- bags
- extensions for tests at overhead lines
- plastic casing for extensions
- test prods for test objects difficult to access
- insertion prods for underground cable
- adapter for the test lines with 4 mm standard plug



Technical data

Two-pole voltage tester Prüfball SPB-L tested and certified by VDE in accordance with EN/IEC 61243-3 (VDE 0682 part 401)

Type / Nominal voltage

SPB 500L	50 ... 500 V AC/DC
SPB 1000L	50 ... 1000 V AC/DC

Display range

SPB 500L	50 ... 500 V AC/DC
SPB 1000L	50 ... 1000 V AC/DC

Frequency

0 - 2000 Hz

Voltage indication

high-impedance, direct reading:

LED > 50 V ~ and > 120 V + -

LCD > 50 V backlight

(accuracy 2,5% + 5 digit)

⊕ low resistive connected: additional display symbol for connected load (only SPB 500L)

Continuity

0 ... 1000 kΩ (resolution 50 kΩ +/- 150 kΩ)

Phase / Phase sequence / Polarity

capacitive, without accessible electrode

arrows for phase sequence

POL for phase unipolar

tests possible with gloves

voltage type - / ~

Input resistance

direct: 500L: 150-190 kΩ,
1000L: 300-350 kΩ

⊕ switched: 4,3...7 kΩ

Current peak value

direct: < 3,5 mA

⊕ switched: < 300 mA

(35 mA at 230 V - RCD tripping)

On-time

30 seconds

Overvoltage category

CAT IV in accordance with IEC 60664-1 (VDE 0110)

Surge voltage strength

case insulation to user: 19,2 kV

switching mechanism between test prods:

8 kV, SPB 500L, 12 kV SPB 1000L without push-button

Insulation test

6 kV unit inspection of case and line

Operating temperature

-15°C ... +45°C

Power supply

maintenance-free - without battery,

test functions voltage, phase sequence are

supplied from the mains, continuity by Li-accu with

automatic charging function

Casing

unbreakable silicone rubber, display cover made

of indestructible polycarbonate

Protection category

IP 65, device can be used in moist environments

Line

PUR control cable, 1000 V, 1m

with protective cap for electrodes

Dimensions / Weight

274 x 75 x 47 mm (display part) / approx. 415 g

Art.-no.	Type / Label
81422	Prüfball SPB 500L
81423	Prüfball SPB 1000L
81019	Thread test electrode
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