

Vehicle charging inlet - CHARX T1HCI12-1AC80-2,0M1



1271836

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CHARX connect, Vehicle charging inlet, for charging electric vehicles with alternating current (AC), AC type 1, IEC 62196-2, SAE J1772, 80 A / 250 V (AC), length: 2 m (AC cables), locking actuator: 12 V, 4-pos., Front and rear mounting, M6, X-Line, housing: black, A protective cap is supplied as standard for the AC contacts.

Product Description

Vehicle charging inlet for charging with alternating current (AC), compatible with type 1 AC vehicle charging connectors (EVSE), for installation in electric vehicles for e-mobility (EV).

Commercial Data

Item number	1271836
Packing unit	1 pc
Minimum order quantity	1 pc
Sales Key	XWCAIB
Product Key	XWCAIA
GTIN	4063151463618
Weight per Piece (including packing)	1,925 g
Weight per Piece (excluding packing)	1,925 g
Customs tariff number	85444290
Country of origin	PL

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Technical Data

Notes

General	A protective cap is supplied as standard for the AC contacts.
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Product properties

Product type	Vehicle charging inlet
Application	for charging electric vehicles with alternating current (AC) for installation in electric vehicles (EV)
Locking type	Locking in the inserted state with a locking mechanism
Charging standard	AC type 1
Charging mode	Mode 2, 3

Electrical properties

Type of signal transmission	Pulse width modulation with modulated Powerline communication in accordance with ISO/IEC 15118 / DIN SPEC 70121
Note on the connection method	Crimp connection, cannot be disconnected
Insulation resistance	> 200 M Ω
Coding	2.7 k Ω (between PE and CS)
Temperature monitoring	AC contacts: PTC chain (DIN EN 60738-1)
Type of charging current	AC single-phase
Charging power	20 kW
Charging current	80 A

Power contact

Number	3 (L1, N, PE)
Rated voltage	250 V AC
Rated current	80 A AC

Signal contact

Number	2 (CP, CS)
Rated voltage	30 V AC
Rated current	2 A

(PTC chain)

Sensor type	PTC chain
Standards/regulations	DIN EN 60738-1
Messbereich_Widerstand	790 Ω ... 1420 Ω
Resistance	max. 1200 Ω \pm 5 K
TEST Umgebungstemperatur Neu	-40 $^{\circ}$ C ... 130 $^{\circ}$ C
Cable structure	5 x 0,5 mm ²
External cable diameter	1.6 mm -0.2 mm
Bending radius	min. 15 mm
Cable weight	7 kg/km

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Cable resistance	≤ 37.1 Ω/km
Single wire, color	brown, gray
	brown, yellow, green

Locking actuator

Operating voltage	12 V
Note number of positions	4-pos.
Position of the locking actuator	top center

Dimensions

Dimensional drawing	
Width	90 mm
Height	90 mm
Depth	127.1 mm
Bore dimensions	73 mm x 73 mm, 73 mm x 73 mm

Material specifications

Material	Plastic
	Silver

Connector

Insertion/withdrawal cycles	> 10000
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Cable / line

Cable length	2 m (AC cables)
	2 m (PE cable)
	1 m (Locking actuator cables)
	1 m (Temperature sensors cables)
	1 m (Communications cables)

AC cable

Cable weight	approx. 226 kg/km
Conductor structure	2 x 16 mm ²
External cable diameter	9.9 mm ±0.3 mm
Outer sheath, material	Silicone
External sheath, color	orange
Conductor resistance	≤ 1.16 Ω/km
Cable weight	approx. 166 kg/km
Conductor structure	1 x 16 mm ²
External cable diameter	7 mm ±0.2 mm

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Outer sheath, material	Silicone
External sheath, color	green-yellow
Conductor resistance	≤ 1.16 Ω/km
Cable weight	7 kg/km
Conductor structure	4 x 0.5 mm ²
External cable diameter	1.6 mm -0.2 mm
Outer sheath, material	PVC
Conductor resistance	≤ 37.1 Ω/km

Temperature sensor technology cable

Cable weight	7 kg/km
Conductor structure	2 x 0.5 mm ²
External cable diameter	1.6 mm -0.2 mm
Outer sheath, material	PVC
Conductor resistance	≤ 37.1 Ω/km
Ambient temperature (operation)	-40 °C ... 130 °C

Communication cable

Cable weight	7 kg/km
Conductor structure	0.5 mm ² + 0.5 mm ²
External cable diameter	1.6 mm -0.2 mm
Outer sheath, material	PVC
Conductor resistance	≤ 37.1 Ω/km
Single wire, cross section	16 mm ²

Mechanical properties

Mechanical data

Insertion force	< 75 N
Withdrawal force	< 75 N

Environmental and real-life conditions

Ambient conditions

Degree of protection	IP55 (plugged in; when plugged in and ready to operate, the degree of protection is only ensued if both plug-in components are original products from Phoenix Contact or suitable standard-compliant products)
	IP67 (Inner area of vehicle charging inlet)
Altitude	4000 m (above sea level)

Standards and regulations

Standards

Standards/regulations	IEC 62196-2
	SAE J1772

Mounting

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Mounting type	Front and rear mounting (0 to 90 degree frontal inclination possible)
Mounting hole diameter	6.70 mm (ø)
Fixing screws	M6
Screws included in the scope of delivery	none

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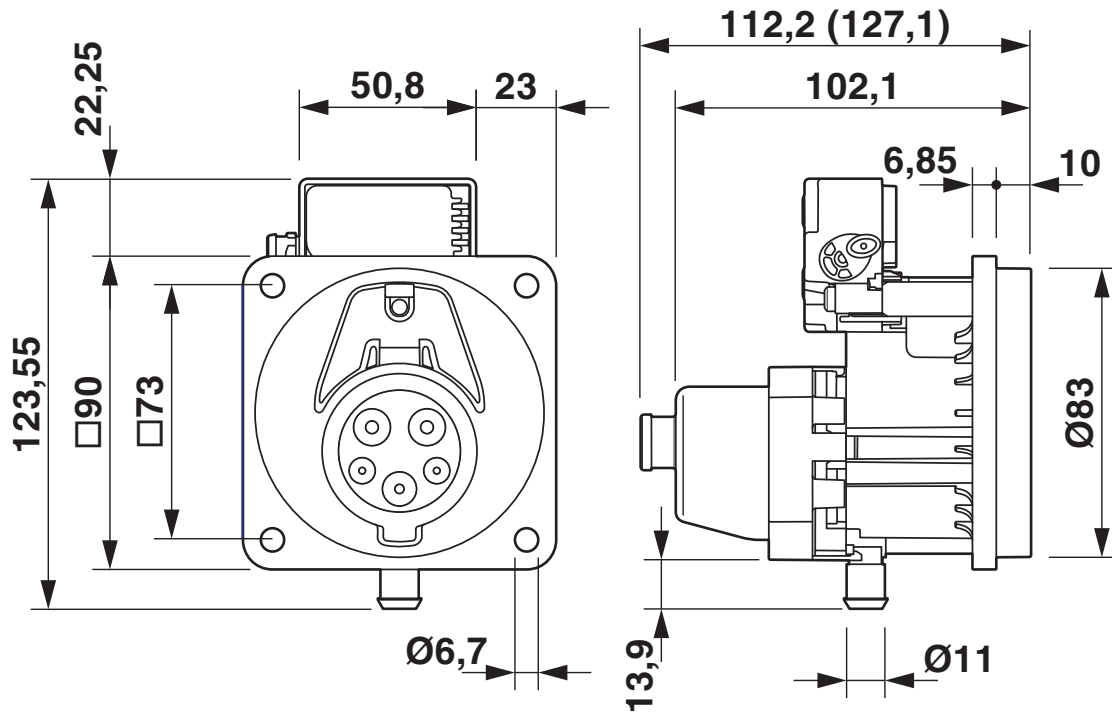


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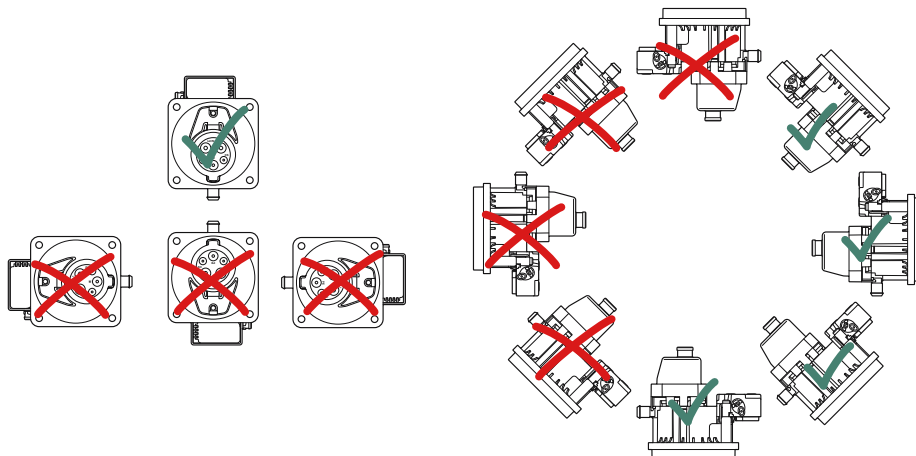
Drawings

Dimensional drawing



Dimensional drawing

Connection diagram

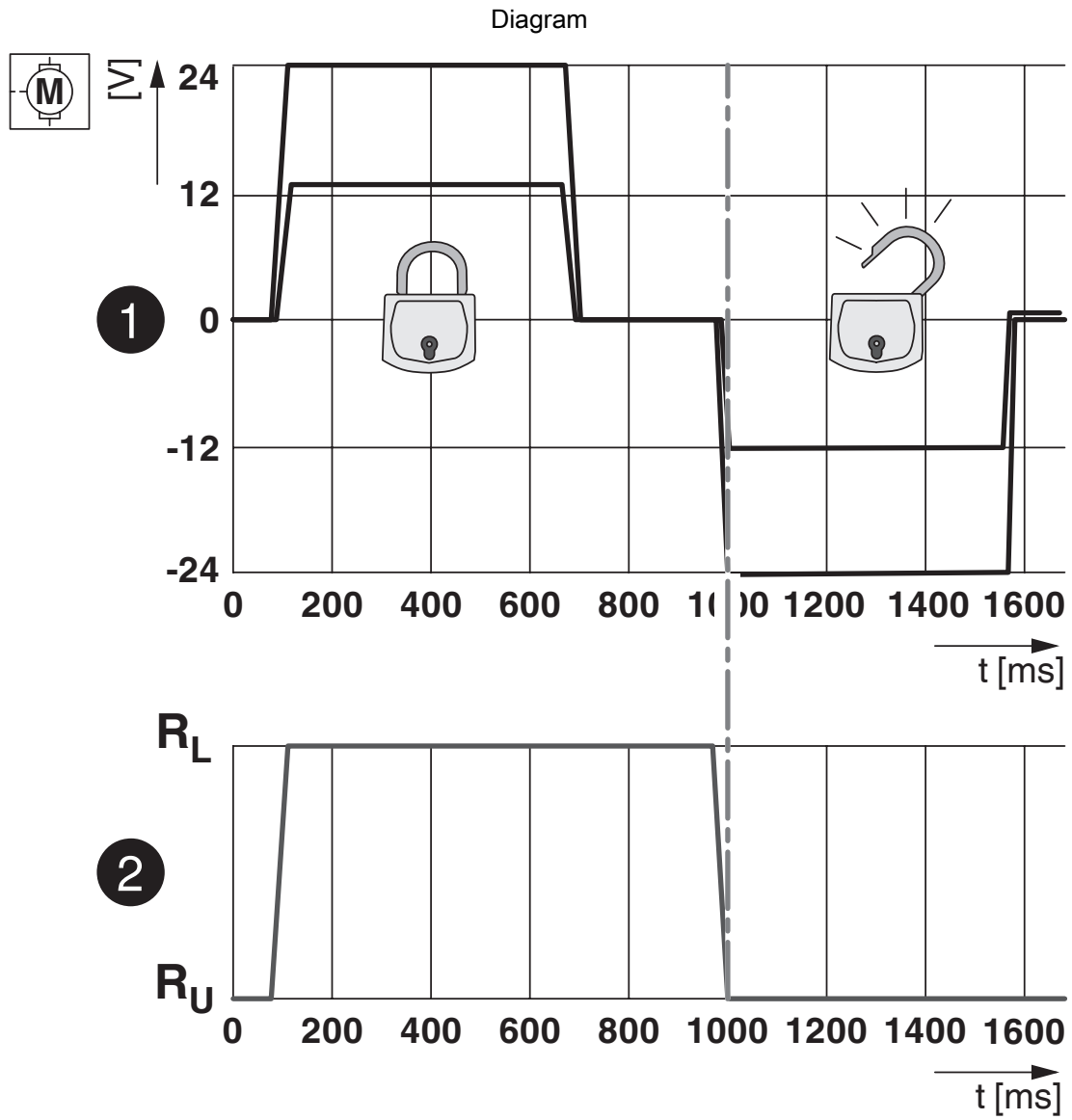


Installation positions

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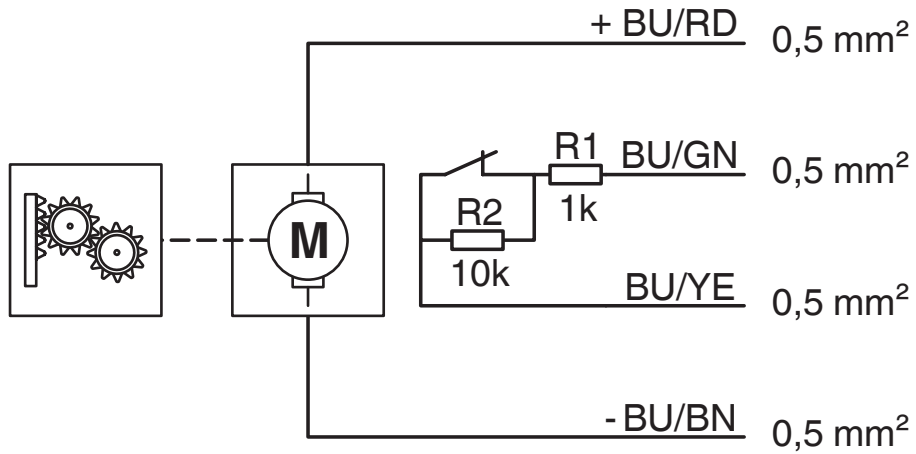
Locking states of the locking actuator

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Schematic diagram



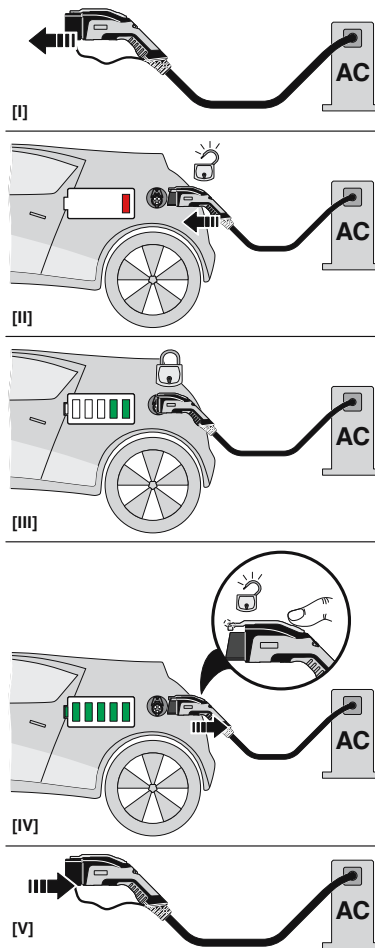
Block diagram of the locking actuator

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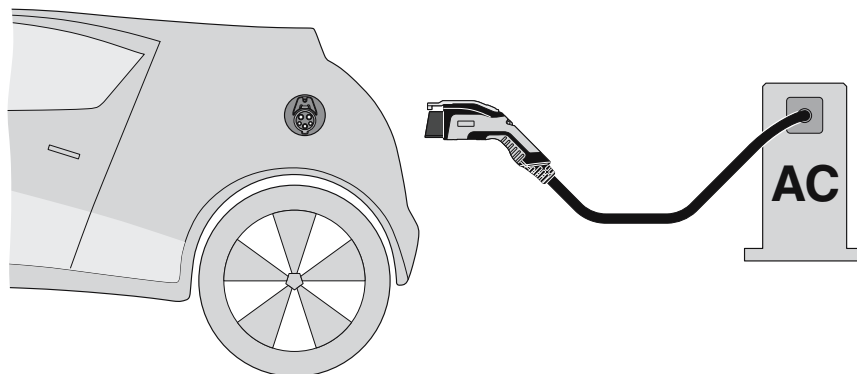
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Functional drawing



Operating instructions

Connection diagram



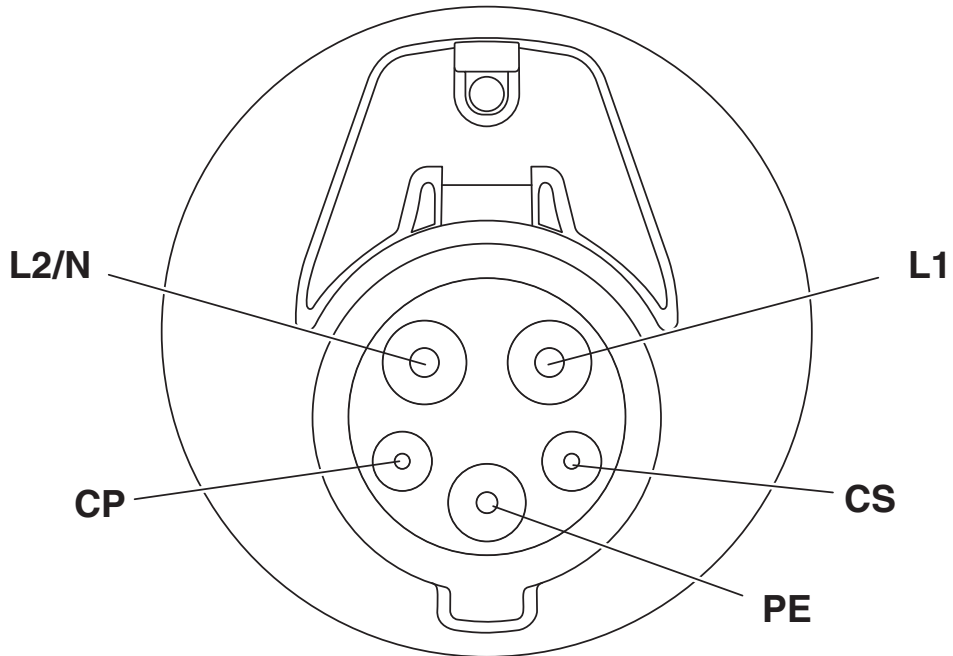
Terminology definition

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Connection diagram



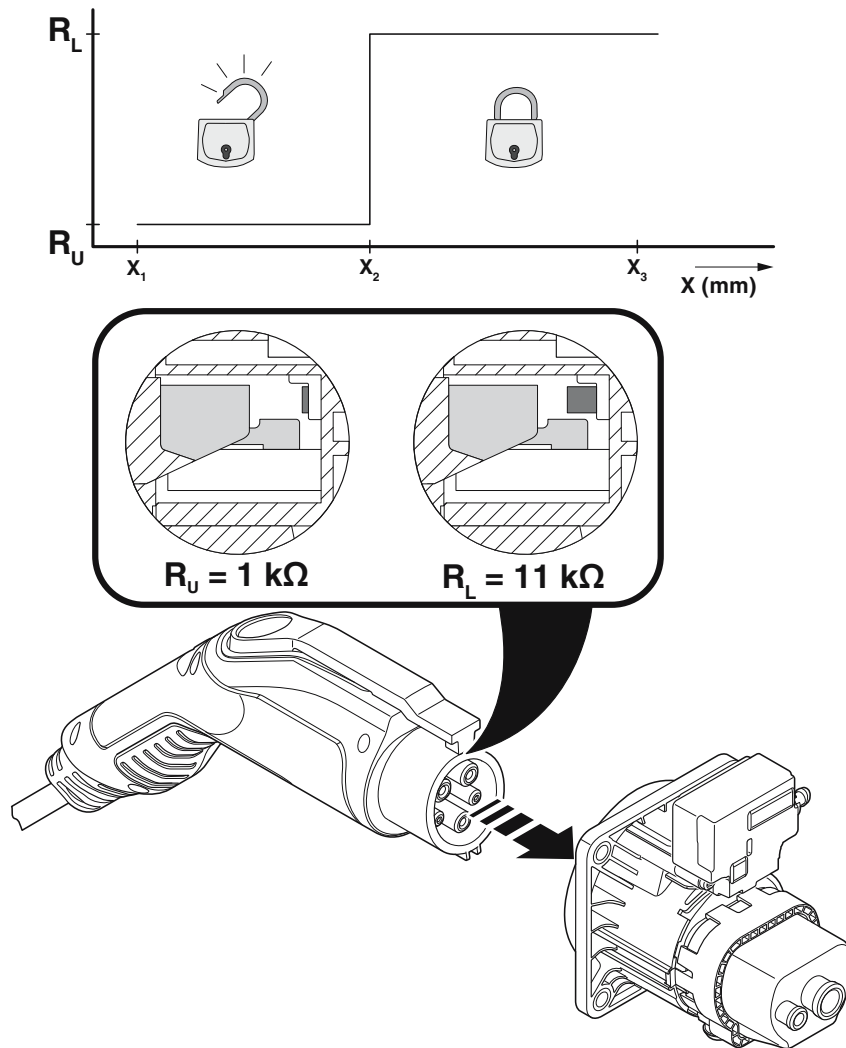
Pin assignment of vehicle charging inlets

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Schematic diagram



Detection for Vehicle Connector

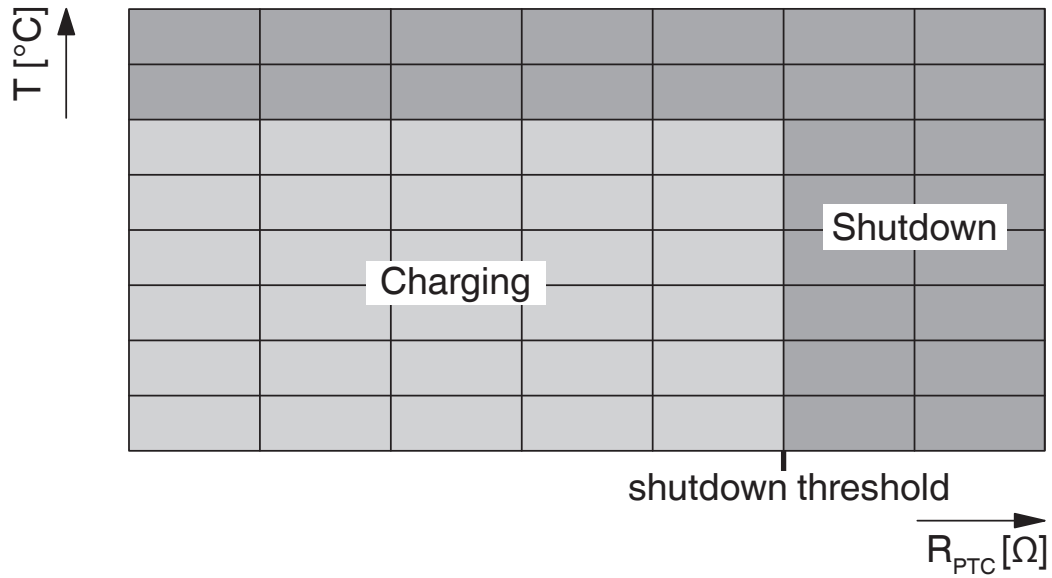
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Schematic diagram



Temperature sensor technology resistance range at AC contacts

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Classifications

ECLASS

ECLASS-10.0.1	27144706
ECLASS-11.0	27144706

ETIM

ETIM 8.0	EC002898
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UNSPSC

UNSPSC 21.0	39121800
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Environmental Product Compliance

REACH SVHC	Lead 7439-92-1
	Dechlorane Plus

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