

IEC Appliance Inlet C20 with Circuit Breaker TA45



C20



70° C

**Description**

- Panel Mount:
Screw-on version from front or rear side, snap-in version from front side
- 2 Functions:
Appliance Inlet Protection class I, circuit breaker type TA45 2-pole
- Quick connect terminals 6.3 x 0.8 mm
- Alternative: version with line filter [EF12](#)

Approvals

- VDE License Number: 40001029
- UL License Number: E96454

Characteristics

- All single elements are already wired
Unwired versions available on request
- Line switch non-illuminated or illuminated
Thermal overload protection
Optional with undervoltage- or remote trip release
- Qualified for use in equipment according IEC/EN 60950

Other versions on request

- Unwired versions

References

[General Product Information](#)

Weblinks

[Approvals](#), [RoHS](#), [CHINA-RoHS](#), [Mating Connectors](#), [e-Store](#), [Distributor-Stock-Check](#), [Accessories](#)

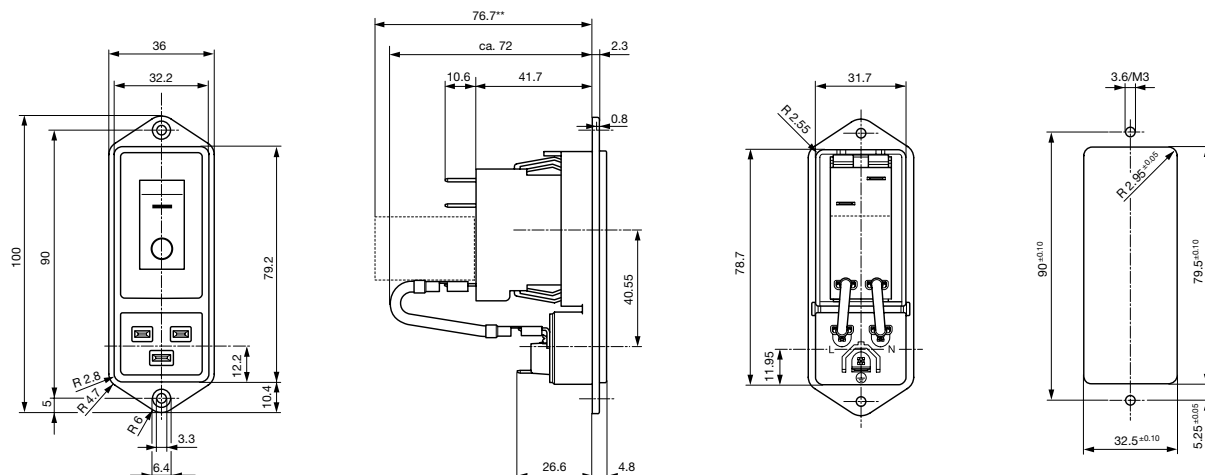
Technical Data

Ratings IEC	16 A / 250VAC; 50Hz
Ratings UL/CSA	20A / 125/250VAC; 60Hz
Dielectric Strength	> 1.5 kVAC between L-N > 3 kVAC between L/N-PE (1 min/50Hz)
Allowable Operation Temp.	-10 °C to 55 °C
Degree of Protection	from front side IP 40 acc. to IEC 60529
Protection Class	Suitable for appliances with protection class 1 acc. to IEC 61140
Terminal	Quick connect terminals 6.3 x 0.8 mm
Panel Thickness s	Screw: max 8 mm Mounting screw torque max 0.5 Nm Snap-in: 1.5/2/2.5 mm
Material: Housing	Thermoplastic, black, UL 94V-0

Appliance Inlet	C20 acc. to IEC/EN 60320-1, UL 498, CSA C22.2 no. 42 (for cold conditions) pin-temperature 70 °C, 16 A, Protection Class 1
Circuit Breakers	Acc. IEC/EN 60934, UL 1077, CSA 22.2 no. 235 2-pole rocker switch, illuminated or non-illuminated. Optional with undervoltage- or remote trip release Short circuit capacity Icn: at $I_n < 3A/240VAC$: $10 \times I_n$ at $I_n \geq 3A/240VAC$: 300A
Line Switch	Rocker switch 2-pole, non-illuminated or illuminated, acc. to IEC 61058-1 Technical details

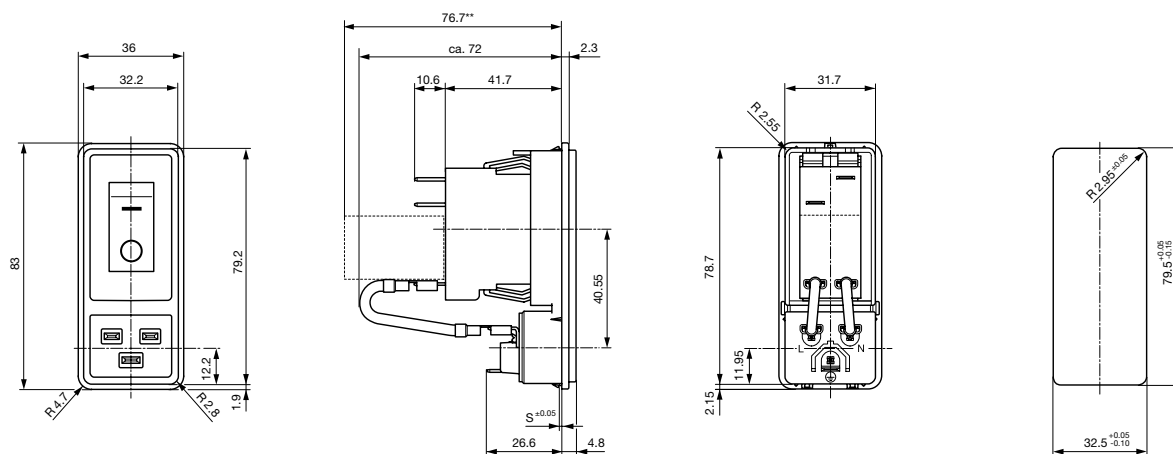
Dimensions

Screw on PCB mounting



** --- Version TA45 with undervoltage release

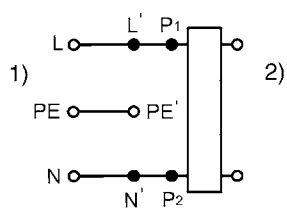
Snap-in mounting



**--- Version TA45 with undervoltage release

Diagrams

Diagram



- 1) Line
2) Load

Table 1 Selection for type TA45

Order example



- Line switch
- 2-pole, rocker actuated
- Quick connect terminal
- Other types on request

Diagram

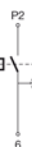
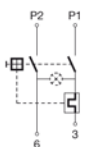
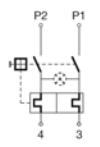
Thermal overload protection

without

with 1-pole

with 2-pole

Without illumination

**ABC****ABT****ABD**

With illumination

220...240 V

110...120 V

A02**A04****A12****A14****A32****A34****Colours****Switch front**

W black
B black
6 black

Rocker

white
 black
 – orange transp.

Rocker legend**Surface****Illustration****Colour of print****F** embossed

white

H printed

black

K printed

white

L printed**Surface****Illustration****Colour of print****M** printed

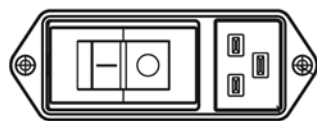
black

P printed

white

R printed

black

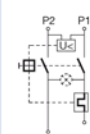
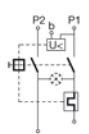
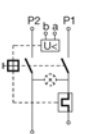
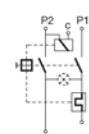
Position of the rocker legend
e.g F**Rated current:**

- Without thermal overload protection: code **C00** } $I_n = 20 \text{ A}$

- With thermal overload protection: rated current $I_n \text{ (A)}$

I_n	Code	I_n	Code	I_n	Code	I_n	Code
10,0	100	13,0	130	16,0	160	19,0	190
11,0	110	14,0	140	17,0	170	20,0	200
12,0	120	15,0	150	18,0	180		

Other rated currents on request

Without release: code C0**Undervoltage release****U****E****Z****Remote trip release****A****Code**Rated
voltage U_n

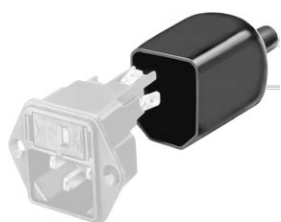
•	•	•
•	•	•
•	•	•

•	2	240 V AC
•	3	230 V AC
•	4	120 V AC

Packaging unit 20 Pcs

Accessories

Description



Assorted Covers
Rear Cover

0859.0109



Cord retaining kits
Cord retaining strain relief

Flat head, Z

0888.0021

Flat head, H

4700.0008

Mating Outlets/Connectors

Category / Description

Connector Overview complete



IEC Connector C19, Rewireable, Straight

0104

IEC Connector C19, Rewireable, Angled

1651

IEC Connector C19, Rewireable, Straight

1652

IEC Connector C19, Rewireable, Angled

4790

IEC Connector C19, Rewireable, Straight

4795

Connector further types to EF11



Power Cord Overview complete

Power Cord with IEC Connector C19, Straight

1654

Power Cord further types to EF11



Power Supply or Interconnection Cord Overview complete

Divers Power Supply and Interconnection Cords 10 A

4300.0920

Divers Power Supply and Interconnection Cords 16 A

6003.0395

Divers Power Supply and Interconnection Cords 16 A

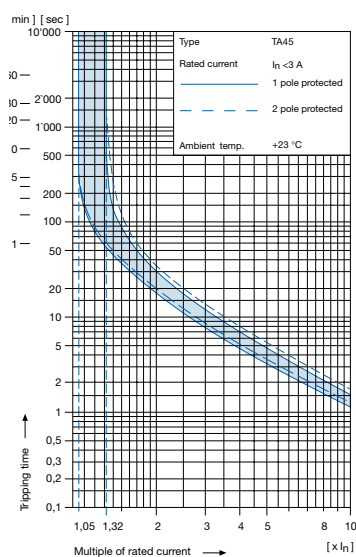
6009.5195

Power Supply or Interconnection Cord further types to EF11

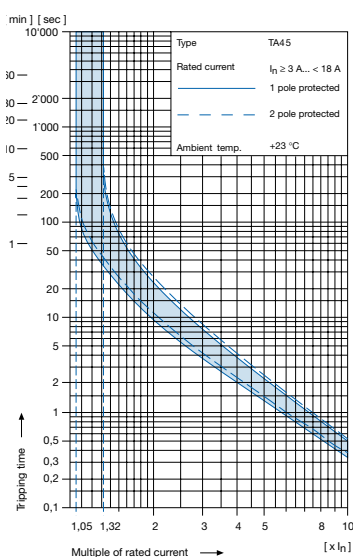
Technical data (continued)

Circuit breaker

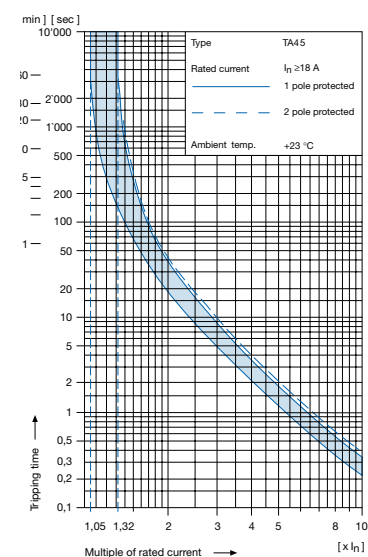
Tripping characteristics

 $I_n < 3 \text{ A}$ 

Tripping characteristics

 $I_n \geq 3 \dots < 18 \text{ A}$ 

Tripping characteristics

 $I_n \geq 18 \text{ A}$ 

1) Effect of ambient temperature

The unit is calibrated for an ambient temperature of +23 °C. To determine the rated current for a lower or higher ambient temperature, use a correction factor from the table below:

* Ambient temperature [°C]	Correction factor
-10	0,89
- 5	0,91
0	0,92
+23	1,00
+30	1,03
+40	1,08
+55	1,16

* Temperature must be measured at the rear of the breaker next to the terminals after equipment operating temperature has been reached.

1) Example

Rated current at +23 °C

6,0 A

Ambient temperature

+40 °C

Correction factor

1,08

Chosen rated current at

+40 °C ambient temperature

6 A x 1,08 = 6,5 A

Order code for EF11 (order example)

Type	Order code TA45 (2-pole rocker-switch without accessories)
EF11.	A B T W F 1 5 0 C 0 .
	see table 1

Please note that Schurter will establish an internal new part number for logistical use in addition to the order code. The format of this internal part number is, for example EF11.3103.0010.01

Wiring
1 = wired

Protection class
0 = Class I, housing black

Panel mount
0 = Screw-on version
2 = Snap-in version s = 1,5 mm
3 = Snap-in version s = 2,0 mm
4 = Snap-in version s = 2,5 mm

Terminals
1 = Quick connect terminals 6,3 x 0,8 mm

00 = without line filter