## IEC Appliance Inlet C20 with Filter, ECO design, front or rear side Mounting



Screw-on or rivet mounting from front or rear side Screw-on mounting



Screw-on mounting from rear side, integrated thread Screw-on mounting



Snap-in mounting from front side Snap-in version



See below: Approvals and Compliances

## Description

#### - Panel mount :

- Screw-on version from front or rear side, snap-in version front side 2 Functions :
- Appliance Inlet Protection class I , Line filter in standard and medical version
- Quick connect terminals

# **Unique Selling Proposition**

- ECO design
- Metal flange for optimal shielding
- Compact design
- V-Lock cord retaining

### Characteristics

- Optimal shielding due to completely closed filter case, unpotted Suitable for assembly in metal plated plastic housings
- Version with class X1 and X2 (standard version) capacitors
- Universal line filter for standard applications
- Suitable for use in medical equipment according to IEC/UL 60601-1 (1 MOOP, 1 MOPP)
  - For applications according IEC/UL 62368-1 we recommend variants with bleed resistor

## Other versions on request

- Solder terminals
- Medical Version (M80)
- Capacity CX 330 nF

## References

Fits to type: 4790; 4795 0104; 0104U; 1651; 1652; 1654; 4790; 4 795; VAC19KS

Alternative: version without line filter 4793; 4798

### Weblinks

pdf data sheet, html datasheet, General Product Information, Approvals, Distributor-Stock-Check, Accessories, Detailed request for product

Newly available variants corresponding to V-Lock mating cordset. The connector is equipped with a notch intended for use with the latching cordset. The cord latching system prevents against accidental removal of the cordset.

Technical Data			
Ratings IEC	16A @ Ta 40 °C / 250 VAC; 50 Hz	Appliance inlet/-outlet	C20 acc. to IEC 60320-1,
Ratings UL/CSA	20 A @ Ta 40 °C / 250 VAC; 60 Hz		UL 498, CSA C22.2 no. 42 (for cold
Leakage Current	standard < 0.5 mA (250 V / 60 Hz) medical < 5 µA (250 V / 60 Hz)		conditions) pin-temperature 70 °C, 16A, Protection Class I
Dielectric Strength	> 1.7 kVDC between L-N > 2.7 kVDC between L/N-PE Test voltage (2 sec)	Line Filter	Standard and Medical Version, IEC 60939, UL 1283, CSA C22.2 no. 8 Technical Details
Impulse Withstand Voltage	> 2.5 kV between L-N (CX2)	MTBF	> 3'000'000 h acc. to MIL-HB-217 F
	> 4 kV between L-N (CX1) > 5 kV between L/N-PE (Cy2) voltage (1.2/50 µs)		
Allowable Operation Tempe-	-25°C to 85°C		
rature			
Climatic Category	25/085/21 acc. to IEC 60068-1		
IP-Protection	front side IP40 acc. to IEC 60529		
Protection Class	Suitable for appliances with protection class I acc. to IEC 61140		
Terminal	Quick connect terminal 6.3 x 0.8 mm		
Panel Thickness S	Screw: max 8 mm		
	Mounting screw torque max 0.5 Nm		
	Snap-in: 0.8mm to 3mm		
	(all steps with one variant)		
Material	Themoplast / steel tin-plated, black / metallic, UL 94V-0		

## **Approvals and Compliances**

Detailed information on product approvals, code requirements, usage instructions and detailed test conditions can be looked up in Details about Approvals

SCHURTER products are designed for use in industrial environments. They have approvals from independent testing bodies according to national and international standards. Products with specific characteristics and requirements such as required in the automotive sector according to IATF 16949, medical technology according to ISO 13485 or in the aerospace industry can be offered exclusively with customer-specific, individual agreements by SCHURTER.

### Approvals

The approval mark is used by the testing authorities to certify compliance with the safety requirements placed on electronic products. Approval Reference Type: 5130

Approval Logo	Certificates	Certification Body	Description
10	VDE Approvals	VDE	Certificate Number: 104884
c <b>FL</b> <sup>°</sup> us	UL Approvals	UL	UR File Number: E72928

# **Product standards**

Product standards that are referenced

Organization	Design	Standard	Description
IEC	Designed according to	IEC 60320-1	Appliance couplers for household and similar general purposes
IEC	Designed according to	IEC 60939	Passive filters for suppressing electromagnetic interference
IEC.	Designed according to	IEC 60127-6	Miniature fuses. Part 6. Fuse-holders for miniature fuse-links
IEC	Designed according to	IEC 61058-1	Switches for appliances. Part 1. General requirements
(UL)	Designed according to	UL 498	Standard for Attachment Plugs and Receptacles
(ŲL)	Designed according to	UL 1283	Passive filters for suppressing electromagnetic interference
GEA Group	Designed according to	CSA C22.2 no. 42	General Use Receptacles, Attachment Plugs, and Similar Wiring Devices
GE Group	Designed according to	CSA C22.2 no. 8	Electromagnetic interference (EMI) filters

## Application standards

Application standards where the product can be used

Organization	Design	Standard	Description
IEC.	Suitable for applications acc.	IEC/UL 62368-1	Audio/video, information and communication technology equipment - Part 1: Safety requirements
IEC	Suitable for applications acc.	IEC 60601-1	Medical electrical equipment - Part 1: General requirements for basic safety and essential performance

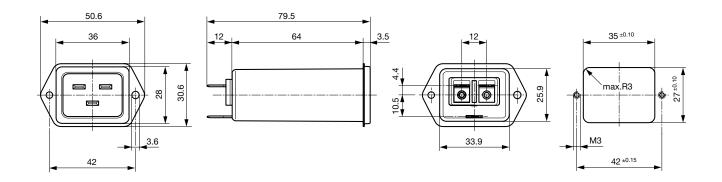
# Compliances

The product complies with following Guide Lines

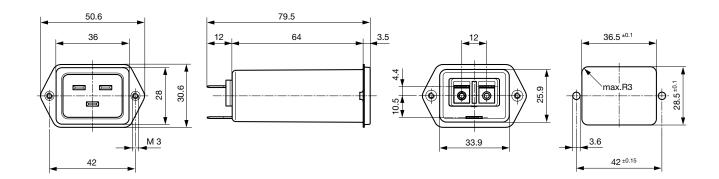
Identification	Details	Initiator	Description
CE	CE declaration of conformity	SCHURTER AG	The CE marking declares that the product complies with the applicable requirements laid down in the harmonisation of Community legislation on its affixing in accordance with EU Regulation 765/2008.
UK CA	UKCA declaration of conformity	SCHURTER AG	The UKCA marking declares that the product complies with the applicable requirements laid down in the British Amendment of Regulation (EC) 765/2008.
RoHS	RoHS	SCHURTER AG	Directive RoHS 2011/65/EU, Amendment (EU) 2015/863
<b>©</b>	China RoHS	SCHURTER AG	The law SJ / T 11363-2006 (China RoHS) has been in force since 1 March 2007. It is similar to the EU directive RoHS.
REACH	REACH	SCHURTER AG	On 1 June 2007, Regulation (EC) No 1907/2006 on the Registration, Evaluation, Authorization and Restriction of Chemicals 1 (abbreviated as "REACH") entered into force.
V-Lock		SCHURTER AG	V-Lock system are based on a matching plug-dose combination. The connector is equipped with a notch intended for use with the latching cordset. The cord latching system prevents against accidental removal of the cordset.
T	Medical Equipment	SCHURTER AG	Suitable for use in medical equipment according to IEC/UL 60601-1 (1 MOOP, 1 MOPP)

## **Dimension** [mm]

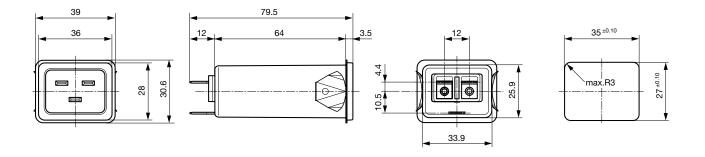
Front or rear side mounting for screws with nuts or blind rivets



# Rear side mounting with pre-formed, threaded holes for M3 screws



Snap-in mounting from front side

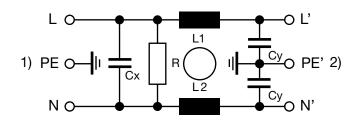


# **Technical Data of Filter-Components**

Rated Current [A]	Filter-Type	Inductances L [mH]	Capacitance CX [nF]	Capacitance CY [nF]	<b>R [M</b> Ω]
16	Standard version	2 x 0.6	100	2.2	1
16	Standard version	2 x 0.6	330	2.2	1
20	Standard version	2 x 0.3	100	2.2	1
20	Standard version	2 x 0.3	330	2.2	1
16	Medical Version (M5)	2 x 0.6	100	-	1
20	Medical Version (M5)	2 x 0.3	100	-	1

## Diagrams

Standard version

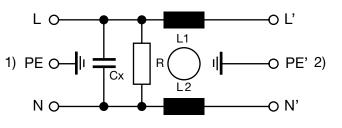




1) Line

2) Load

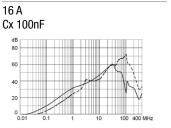
16 A

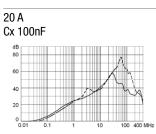


1) Line 2) Load

# Attenuation Loss

Standard version

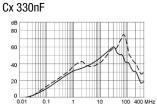


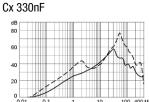




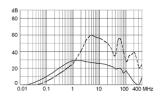
 $50\Omega$  common mode

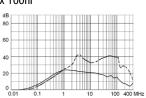
# 20 A





20 A Cx 100nF





# Variants

Rated Current IEC [A]	Rated Current UL [A]	Filter-Type	Panel mounting	Mounting side	Terminal	Capacitor	V-Lock	Order Number
16	16	Standard version	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.2000
16	20	Standard version	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.2001
16	16	Standard version	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.2100
16	20	Standard version	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.2101
16	16	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 330nF		5130.0600
16	20	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 330nF		5130.0601
16	16	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.0000
16	16	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF	٠	5130.0000.21
16	20	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.0001
16	16	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.0100
16	20	Standard version	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.0101
16	16	Standard version	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.1000
16	20	Standard version	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.1001
16	16	Standard version	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.1100
16	20	Standard version	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.1101
16	20	Medical Version (M5)	Snap-in	Front Side	Quick connect terminals	X1 100nF		5130.2301
16	16	Medical Version (M5)	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.2200
16	20	Medical Version (M5)	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.2201
16	16	Medical Version (M5)	Snap-in	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.2300
16	16	Medical Version (M5)	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.0200
16	20	Medical Version (M5)	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.0201
16	16	Medical Version (M5)	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.0300
16	16	Medical Version (M5)	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF	•	5130.0300.21
16	20	Medical Version (M5)	Screw-on/Rivet	Front Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.0301
16	16	Medical Version (M5)	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.1200
16	20	Medical Version (M5)	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X2 100nF		5130.1201

Rated Current IEC [A]	Rated Current UL [A]	Filter-Type	Panel mounting	Mounting side	Terminal	Capacitor	V-Lock	Order Number
16	16	Medical Version (M5)	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.1300
16	20	Medical Version (M5)	Screw	Rear Side	Quick connect terminals 6.3 x 0.8 mm	X1 100nF		5130.1301

Availability for all products can be searched real-time: https://www.schurter.com/en/info-center/support-tools/stock-check-distributors

Type for screw on mounting from rear side has pre-threaded holes for M3 screws

Packaging unit	20 Pcs

## Accessories

Description



Wire\_Harness Wire harness for SCHURTER products





Cord\_retaining\_kits Cord retaining strain relief

Flat head, L

4700.0011

# Mating Inlets/Plugs

Category / Description



#### Connector Overview complete

4795, Mounting: Power Cord, Cable Connector: IEC C19	4795
4790, Mounting: Power Cord, Screw Connector: IEC C19	4790

# Mating Outlets/Connectors



4795, Mounting: Power Cord, Cable Connector: IEC C19	4795
4790, Mounting: Power Cord, Screw Connector: IEC C19	4790
0104U, Mounting: Power Supply Cord, Screw clamps Connector: IEC C19	0104U

# Mating Outlets/Connectors shuttered



## Power Cord Overview complete

Connector Overview complete

VAC19KS, Overview, V-Lock cord retaining, diverse Connector IEC C19, diverse, black

VAC19KS