

FN2020A-30-08

SAP Code: 800901



- Chassis mount
- 30 A EMC filter with screw terminals
- General
- 1 Phase

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Family Technical Specifications

Operating frequencyDC to 400 HzAltitude2000m (above derating applies)**Rated currents30High potential test voltageP -> N 1100 VDC for 2 sec (30 and 60 A types) P -> PE 2000 VAC for 2 sec (B types) P -> N 760 VAC for 2 sec (B types)Temperature range (operation and storage)-25°C to +100°C (25/100/21)**Certified toUL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 (applies to AC and DC applications)Flammability corresponding toLaces for -07 version: UL 94 VW-1 Terminal plastic for -06/-08 version: UL 94 V-0 Grommet for -07 version: UL 94 V-0Design corresponding toUL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939Overvoltage categoryIl acc. IEC 60664-1Pollution degree2 acc. IEC 60664-1	Rated voltage*	250 VAC, 50/60 Hz 250 VDC
Rated currents High potential test voltage P -> N 1100 VDC for 2 sec (30 and 60 A types) P -> PE 2000 VAC for 2 sec P -> PE 2500 VAC for 2 sec (B types) P -> N 760 VAC for 2 sec (1 to 20 A types) P -> N 760 VAC for 2 sec (1 to 20 A types) Temperature range (operation and storage) Certified to UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 (applies to AC and DC applications) Flammability corresponding to Laces for -07 version: UL 94 VW-1 Terminal plastic for -06/-08 version: UL 94 V-0 Grommet for -07 version: UL 94 V-0 UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 Il acc. IEC 60664-1	Operating frequency	DC to 400 Hz
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P -> PE 2000 VAC for 2 sec P -> PE 2500 VAC for 2 sec (B types) P -> N 760 VAC for 2 sec (1 to 20 A types) P -> N 760 VAC for 2 sec (1 to 20 A types) -25°C to +100°C (25/100/21)** Certified to UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 (applies to AC and DC applications) Flammability corresponding to Laces for -07 version: UL 94 VW-1 Terminal plastic for -06/-08 version: UL 94 V-0 Grommet for -07 version: UL 94 V-0 Design corresponding to UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 Overvoltage category Il acc. IEC 60664-1	Rated currents	30
Certified to UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 (applies to AC and DC applications) Flammability corresponding to Laces for -07 version: UL 94 VW-1 Terminal plastic for -06/-08 version: UL 94 V-0 Grommet for -07 version: UL 94 V-0 UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 Overvoltage category Il acc. IEC 60664-1	High potential test voltage	P -> PE 2000 VAC for 2 sec P -> PE 2500 VAC for 2 sec (B types)
AC and DC applications) Laces for -07 version: UL 94 VW-1 Terminal plastic for -06/-08 version: UL 94 V-0 Grommet for -07 version: UL 94 V-0 UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 Overvoltage category Il acc. IEC 60664-1	Temperature range (operation and storage)	-25°C to +100°C (25/100/21)**
Terminal plastic for -06/-08 version: UL 94 V-0 Grommet for -07 version: UL 94 V-0 UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939 Overvoltage category Il acc. IEC 60664-1	Certified to	
Overvoltage category II acc. IEC 60664-1	Flammability corresponding to	Terminal plastic for -06/-08 version: UL 94 V-0
o tel veltage sategory	Design corresponding to	UL 1283, CSA 22.2 No. 8 1986, IEC/EN 60939
Pollution degree 2 acc. IEC 60664-1	Overvoltage category	II acc. IEC 60664-1
	Pollution degree	2 acc. IEC 60664-1

^{*} maximum RMS operating voltage at rated frequency or the maximum DC operating voltage ** for dedicated requests exceeding this specification (e.g. -40 $^{\circ}$ C or higher altitude) please contact your local Schaffner Sales office

Approvals & Compliances













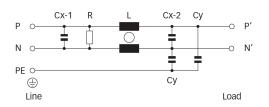
Features and Benefits

- FN 2020 filters are designed for easy and fast chassis mounting
- FN 2020 B versions without capacitors to earth comply to 1MOP for ME (medical equipment) acc. IEC 60601-1
- FN 2020 A versions with low capacitance to earth for safety critical applications with necessity for low leakage currents
- All filters provide a general purpose conducted attenuation performance, based on chokes with high saturation resistance and excellent thermal behavior
- FN 2020 filters can be used to cover a broad range of usage and they offer a good size/ amperage ratio
- FN 2020 filters are also available as two-stage filters (FN 2060, FN 2070 series) for more noisy environment
- Various terminal options allow you to select the desired connection style

Typical Applications

- Electrical and electronic equipment
- Consumer goods
- Household equipment
- Medical equipment
- Office automation equipment
- Datacom equipment

Typical electrical schematic



General Specification

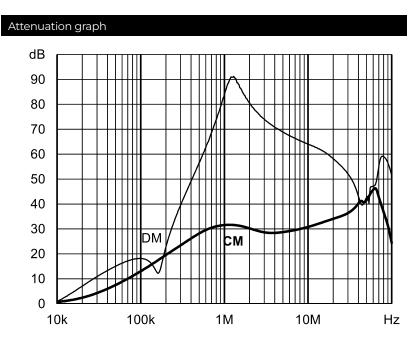
Voltage AC	250 (Volt)
Nominal Frequency	50
Rated Current @ambient	30
Ambient temperature [°C]	40

Electric Specification

Leakage current (IEC60939) [mA]	0.07
Leakage current (Schaffner) [mA]	0.14
Input terminal	08 - M4 screw terminal
Output terminal	08 - M4 screw terminal
Resistance	470 (Kiloohm)

Attenuation Specification

DM attenuation @ 150kHz [dB]	10 (Decibels)
Inductance L1 [µH]	0.67 (Millihenry)
Capacitance Cx1 [µF]	0.47 (Microfarad)
Capacitance Cyl [nF]	0.47 (Nanofarad)



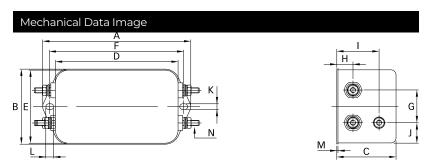
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Schaffner Group DATA SHEET 13. Jul 2023

Mechanic Specification

Length [mm]	94
Width [mm]	56
Height [mm]	45.4
Volume [cm3]	239 (Cubic Centimeter)
NetWeight [kg]	470 (Gram)
Power Loss [W]	6.3 (Watt)

Schaffner schemes



Dimensions

A [mm]	113.5
B [mm]	57.5
C [mm]	45.4
D [mm]	94
E [mm]	56
F [mm]	103
G [mm]	25
H [mm]	12.4
I [mm]	32.4
J [mm]	15.5
K [mm]	4.4
L [mm]	6
M [mm]	1-
N [mm]	M4