

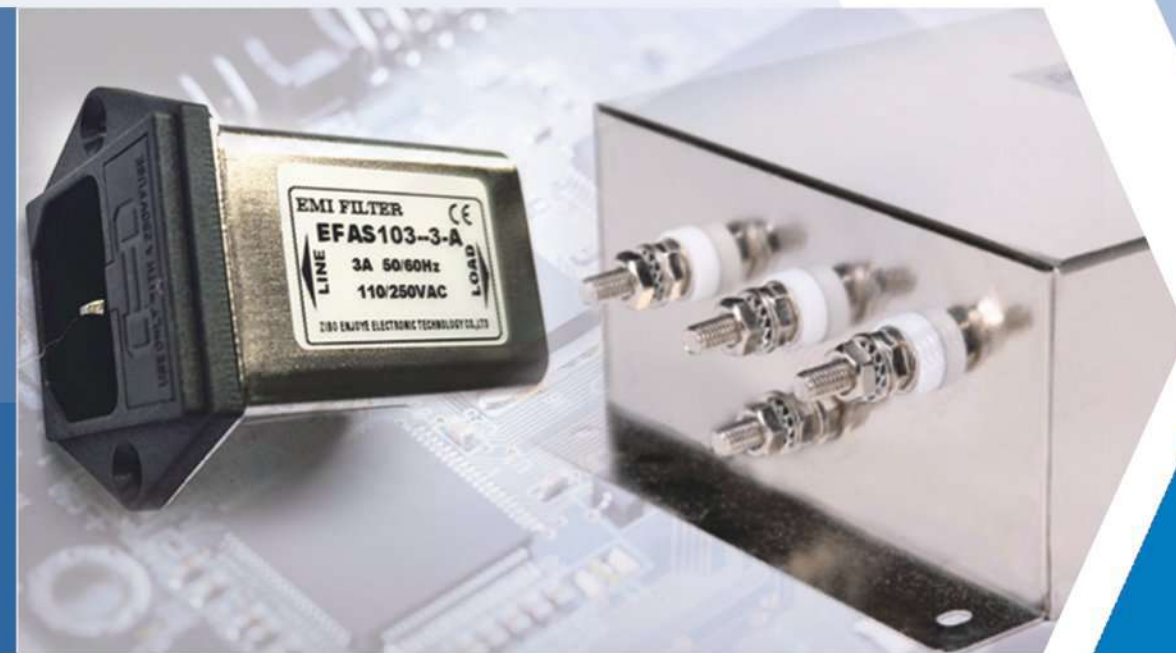


EMI/EMC FILTER

The world's leading provider of EMC solution



ENJOYE ELECTRONIC TECHNOLOGY CO.,LTD



📍 Address: QILU INTERNATIONAL PLASTIC AND CHEMICAL
ZONE, LINZI, ZIBO, SHANDONG, CHINA

☎ 24 hours hotline: 86-13869325606

📠 Fax: 86-533-7608158

✉ Email: info@zbenjoye.com

🌐 Web: www.enjoyelec.com

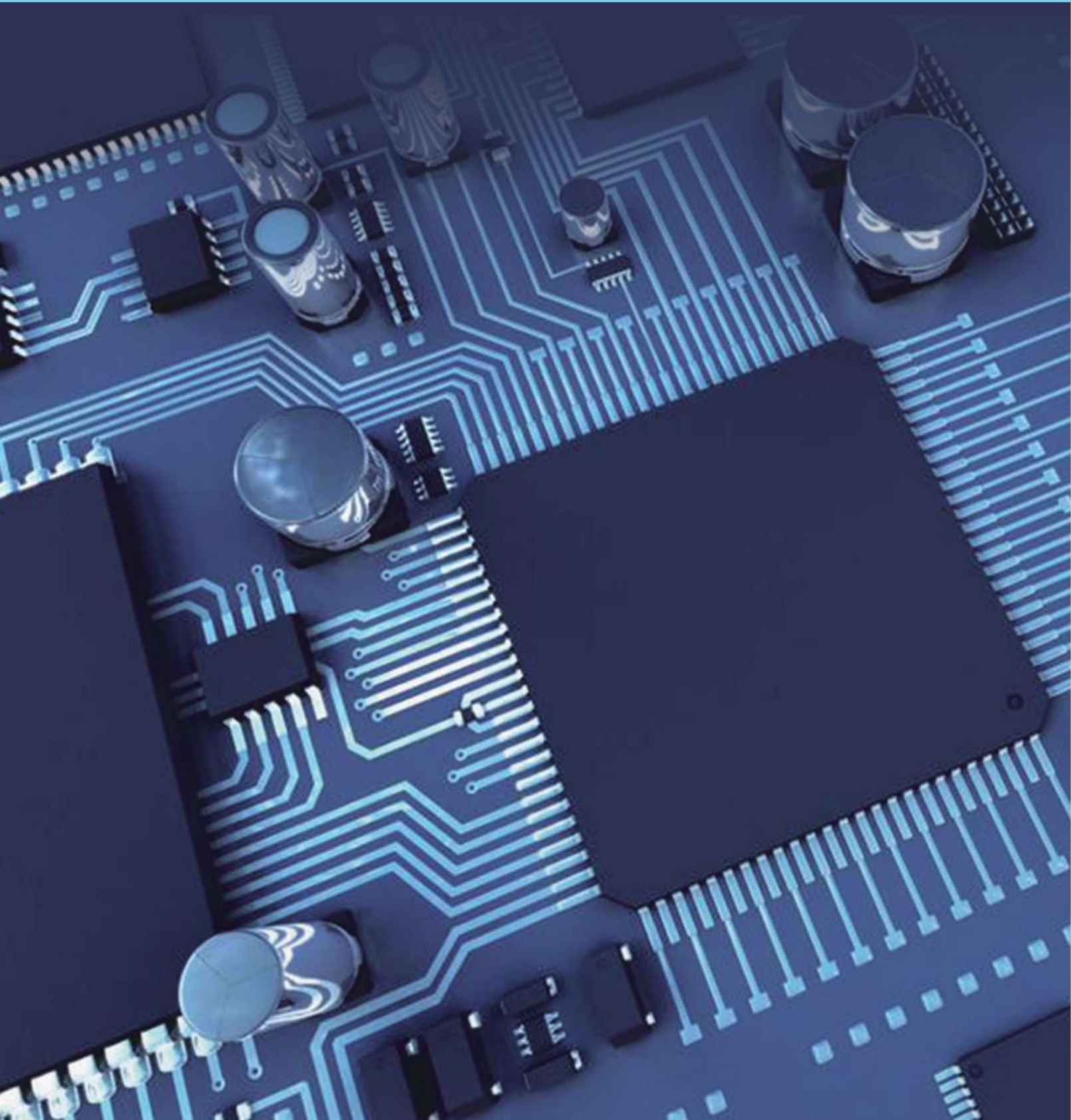
ENJOYE ELECTRONIC TECHNOLOGY CO.,LTD

Introduction

Enjoye electronic is an EMI/EMC power filter manufacturing enterprise with business in R&D, production, manufacturing, sales and service. With the philosophy to be a global provide of total solution for ElectroMagnetic Interference problem, Enjoye insists on constantly self-improvement and seeks greater improvement during the 10 years.

Enjoye has wide range of filtration product from 1A to 3000A, which are widely used in instruments and meters, medical equipments, electrical equipments, communication power supplies, UPS, frequency conversion equipments, elevator equipments and others. We also have ISO 9001:2008 to ensure the product quality. And also obtained the cUL,IMQ, CQC, CE, ROHS certifications to meet the market.

Enjoye strives to succeed by maximizing every employee's potential. Our objective is to satisfy our customers, profitably grow our business while practicing ethical behavior. We will also continue to prosper by embracing these principles. Enjoye will deliver good products and excellent service to the whole world.




Summary

AC Single Phase Series Filters	
1-Stage. EFA101/EFA102 Series	3
2-Stage. EFA201/EFA202/EFA200 Series	5
3-Stage. EFA301 Series	7
Terminal Block. EFA105-T Series	9
DC Series Filters	
1-Stage. EFAD101/EFAD102 Series	11
2-Stage. EFAD202/EFAD200 Series	13
AC 3-Phase 3-Line Series Filters	
1-Stage. EFC101 Series	15
2-Stage. EFC201 Series	17
Compact Dimension. EFC203-T Series	19
Terminal Block. EFC101-T Series	21
AC 3-Phase 4-Line Series Filters	
1-Stage. EFN101 Series	23
2-Stage. EFN201/EFC200 Series	25
3-Stage. EFN301 Series	27
Inverter Series Filters	
Input. EFC301 Series	29
Output. EFC302 Series	31
IEC Socket Series Filters	
EFAS103 Series	33
EFAS103-A/C Series	35
EFAS103-B Series	37
EFAS103-D Series	39
PCB Series Filters	
AC EFP104/EFP204/EFP200 Series	41
DC EFPD104/EFPD204/EFPD200 Series	43
Household Series Filters	
EFAH106/EFAH107/EFAH108 Series	45
EFAH109 Series	46
EMI Suppression Component	
EFSC Series	47
Customized Series Filters	48

● AC Single Phase Series Filters

EFA101/EFA102 Series

- Effectively suppress the electromagnetic interference on line to line and line to ground
- Highly efficient and cost-effective
- Suitable for switching power supply, UPS, vending machines, embroidery machines, oscilloscopes, industrial computers, controllers and many other devices
- Safety approval: 






ROHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A ~ 250A
Test Voltage	line-line	1760VDC	Climatic Category	25/085/21
	line-ground	2000VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination		
							
EFA101-1-W	1A	<0.5mA	Fig.1	Fig.1	---	---	○
EFA101-3-W	3A	<0.5mA	Fig.1	Fig.1	---	---	○
EFA101-6-W	6A	<0.5mA	Fig.1	Fig.1	---	---	○
EFA101-10-F	10A	<0.5mA	Fig.2	Fig.1	---	○	---
EFA102-6-M/F	6A	<1.0mA	Fig.3/ Fig.4	Fig.2	M4	○	---
EFA102-10-M/F	10A	<1.0mA	Fig.3/ Fig.4	Fig.2	M4	○	---
EFA102-20-M/F	20A	<1.0mA	Fig.3/ Fig.4	Fig.2	M4	○	---
EFA102-30-M	30A	<1.0mA	Fig.5	Fig.2	M6	---	---
EFA102-50-M	50A	<2.0mA	Fig.6	Fig.2	M6	---	---
EFA102-100-M	100A	<2.0mA	Fig.7	Fig.2	M8	---	---
EFA102-150-M	150A	<2.0mA	Fig.8	Fig.2	M10	---	---
EFA102-200-M	200A	<2.0mA	Fig.8	Fig.2	M10	---	---

Diagrams

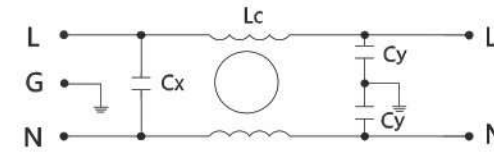


Fig.1

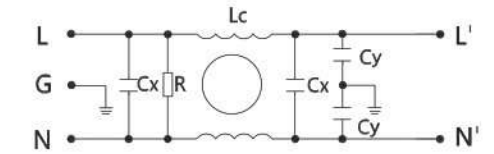
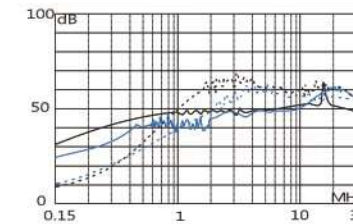


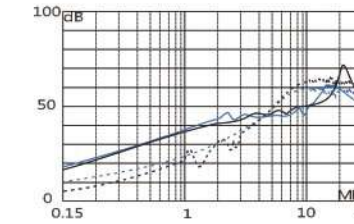
Fig.2

Insertion loss(dB)

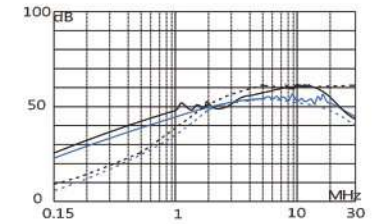
— common mode — differential mode



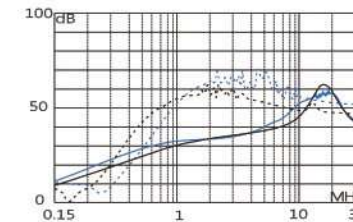
EFA101-1-W EFA101-3-W



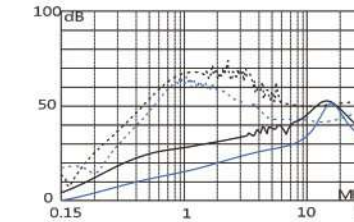
EFA101-6-W EFA101-10-F



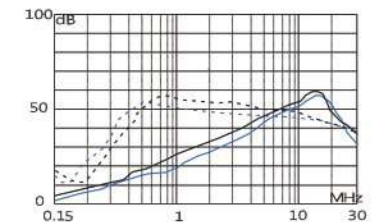
EFA102-6-M/F EFA102-10-M/F



EFA102-20-M/F EFA102-30-M



EFA102-50-M EFA102-100-M



EFA102-150-M EFA102-200-M

Dimensions(mm)

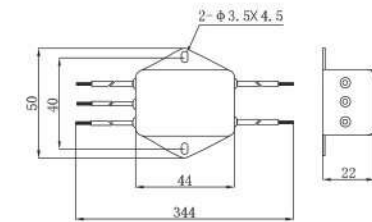


Fig.1

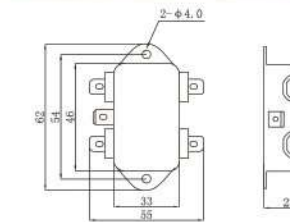


Fig.2

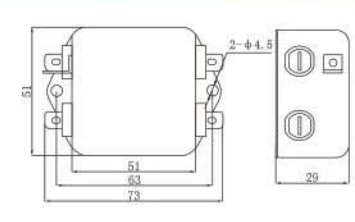


Fig.3

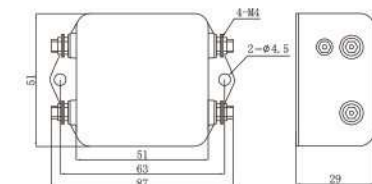


Fig.4

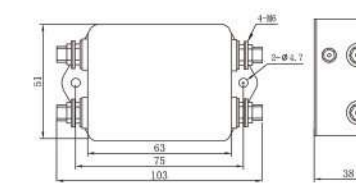


Fig.5

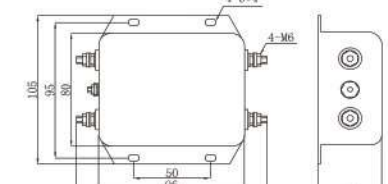


Fig.6

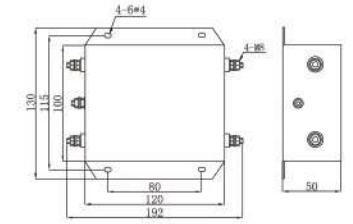


Fig.7

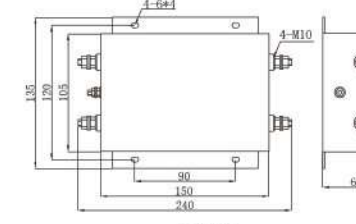



Fig.8

AC Single Phase Series Filters

EFA201/EFA202/EFA200 Series

- High security and reliability, high performance filters
- Excellent performance of suppressing common mode and differential mode interference
- Highly cost-effective, various connection ways
- Suitable for switching power supply, UPS, ATM, bill counter, embroidery machine, fuel dispenser, engraving machine, controller, industrial computer, scientific analytical instruments and other power electronic equipments as well as inverter equipments
- Safety approval: 






RoHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~250A
Test Voltage	line-line	1760VDC	Climatic Category	25/085/21
	line-ground	2000VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination		
							
EFA201-1-W	1A	<0.5mA	Fig.1	Fig.1	---	---	○
EFA201-3-W	3A	<0.5mA	Fig.2	Fig.1	---	---	○
EFA201-6-W	6A	<0.5mA	Fig.2	Fig.1	---	---	○
EFA201-10-F	10A	<1.0mA	Fig.3	Fig.1	---	○	---
EFA202-6-M/F	6A	<1.0mA	Fig.3	Fig.2	M4	○	---
EFA202-10-M/F	10A	<1.0mA	Fig.3	Fig.2	M4	○	---
EFA202-20-M/F	20A	<1.0mA	Fig.4	Fig.2	M4	○	---
EFA202-50-M	50A	<2.0mA	Fig.6	Fig.2	M6	---	---
EFA202-100-M	100A	<2.0mA	Fig.7	Fig.2	M8	---	---
EFA202-200-M	200A	<2.0mA	Fig.7	Fig.2	M10	---	---
EFA200-1-W	1A	<0.5mA	Fig.1	Fig.3	---	---	○
EFA200-3-W	3A	<0.5mA	Fig.2	Fig.3	---	---	○
EFA200-6-M/F	6A	<1.0mA	Fig.3	Fig.3	M4	○	---
EFA200-10-M/F	10A	<1.0mA	Fig.3	Fig.3	M4	○	---
EFA200-20-M	20A	<1.0mA	Fig.5	Fig.3	M4	---	---
EFA200-50-M	50A	<2.0mA	Fig.6	Fig.3	M6	---	---

Diagrams

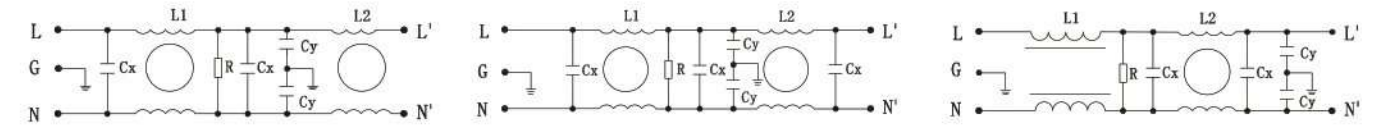
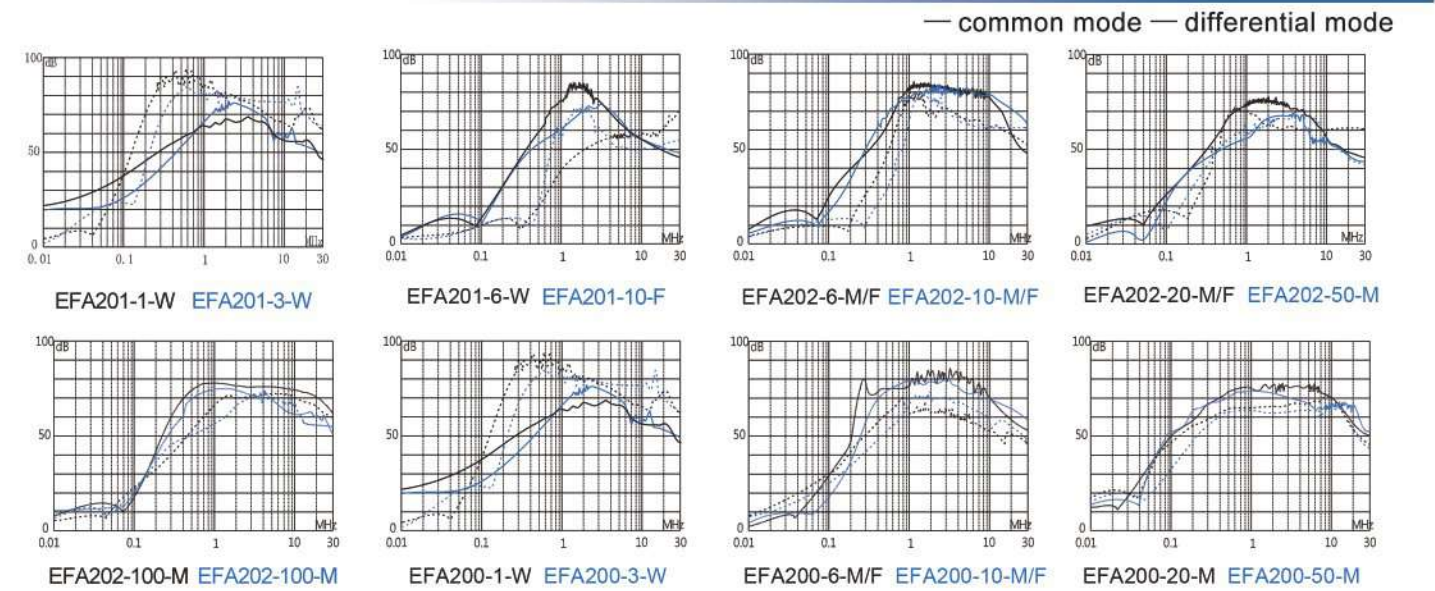


Fig.1

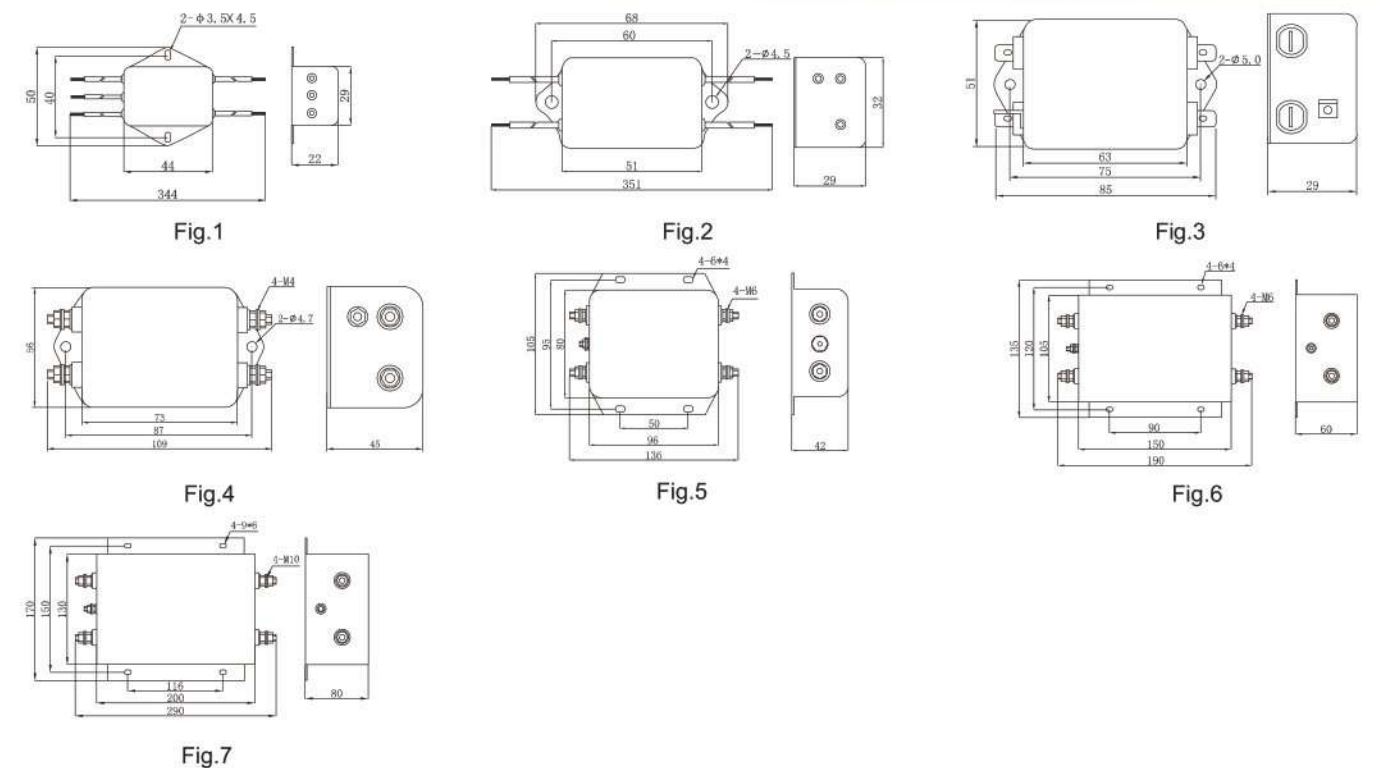
Fig.2

Fig.3

Insertion loss(dB)




Dimensions(mm)



AC Single Phase Series Filters

EFA301 Series

- High security and reliability, high performance filters
- Good performance of suppressing common mode and differential mode interference at frequency range 10KHz~30MHz
- Highly cost-effective, various connection ways
- Suitable for switching power supply, UPS, ATM, bill counter, embroidery machine, fuel dispenser, engraving machine, controller, industrial computer, scientific analytical instruments and other power electronic equipments as well as inverter equipments
- Safety approval: 






ROHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~630A
Test Voltage	line-line	1760VDC	Climatic Category	25/085/21
	line-ground	2000VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination		
							
EFA301-1-W	1A	<1.5mA	Fig.1	Fig.1	---	---	○
EFA301-3-F	3A	<1.5mA	Fig.2	Fig.1	---	○	---
EFA301-6-M	6A	<1.5mA	Fig.3	Fig.1	M4	---	---
EFA301-10-M	10A	<2.5mA	Fig.3	Fig.1	M4	---	---
EFA301-20-M	20A	<2.5mA	Fig.3	Fig.1	M4	---	---
EFA301-50-M	50A	<2.5mA	Fig.4	Fig.1	M6	---	---

Diagrams

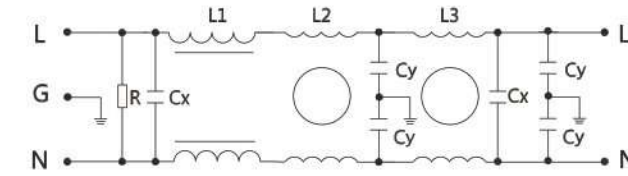
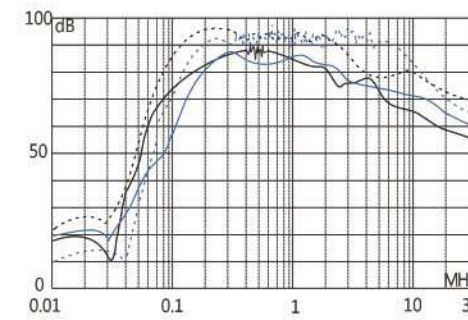
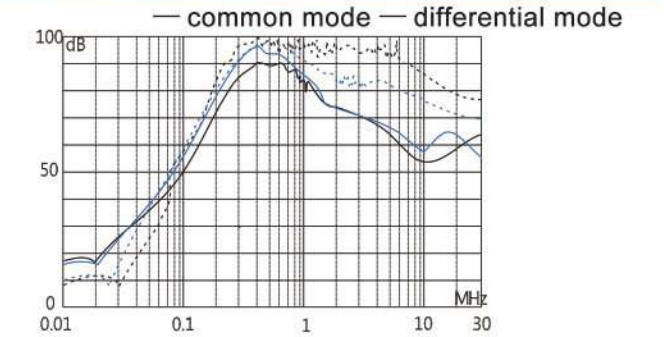


Fig.1

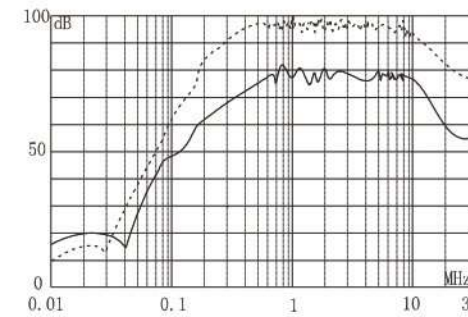
Insertion loss(dB)



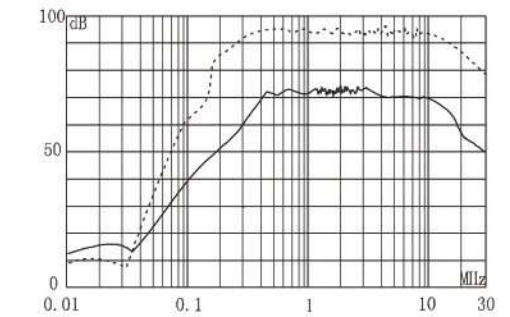
EFA301-1-W EFA301-3-F



EFA301-6-M EFA301-10-M



EFA301-20-M



EFA301-50-M

Dimensions(mm)

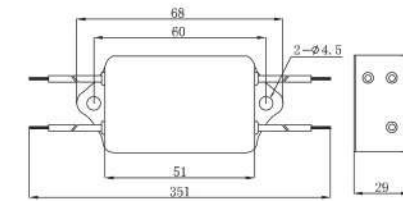


Fig.1

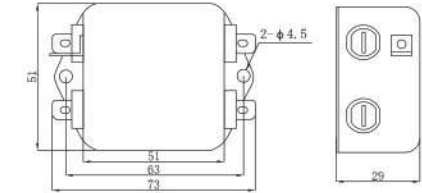


Fig.2

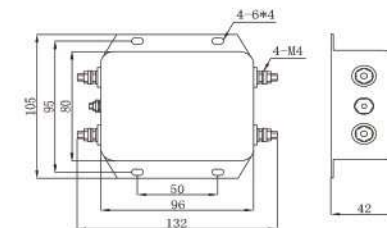


Fig.3

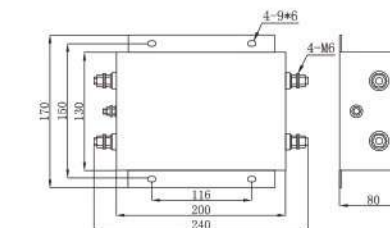


Fig.4

AC Single Phase Series Filters

EFA105-T Series

- Terminal blocks as customer request
- High performance AC filters with much better common and differential mode attenuation performance
- Applications for electrical & electronic equipment, Single phase servo motor and electric vehicle, charging post, etc.
- Safety approval: 




ROHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	1A-30A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
					
EFA105-5-T	1.5A	<0.5mA	Fig.1	Fig.1	○
EFA105-10-T	10A	<0.5mA	Fig.1	Fig.1	○
EFA105-15-T	15A	<0.5mA	Fig.1	Fig.1	○
EFA105-20-T	20A	<0.5mA	Fig.1	Fig.1	○

Diagrams

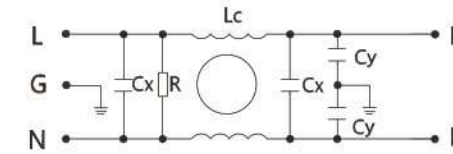
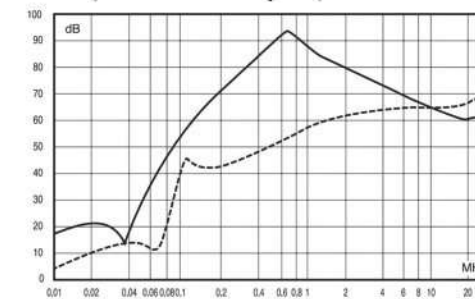


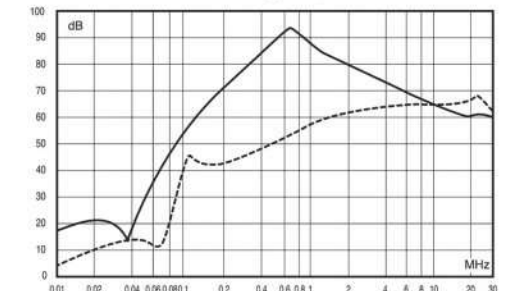
Fig.1

Insertion loss(dB)

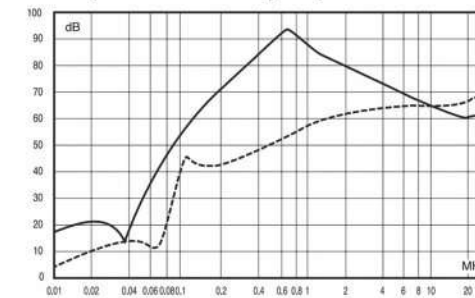
— common mode — differential mode



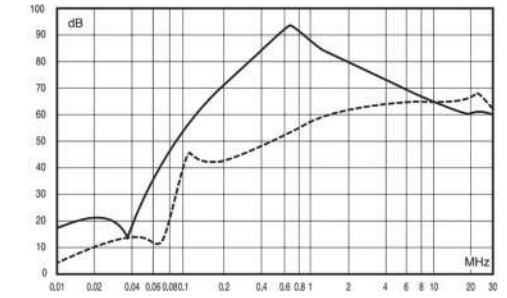
EFA105-5-T



EFA105-10-T



EFA105-15-T



EFA105-20-T

Dimensions(mm)

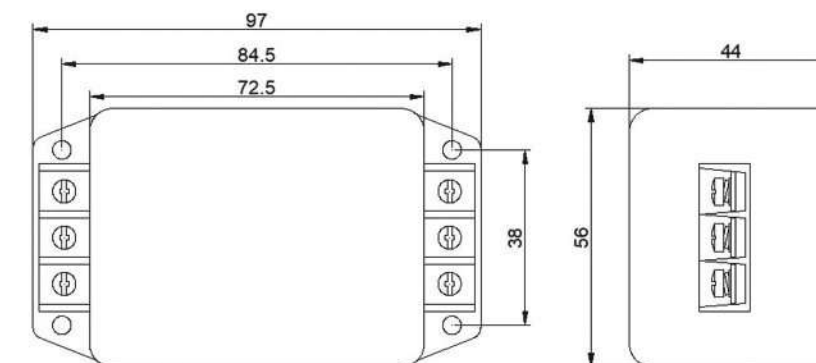



Fig.1

DC Series Filters

EFAD101/EFAD102 Series

- Specially designed for suppressing the noise on DC power line
- Compact structure, good attenuation effect
- Highly cost-effective, various connection ways
- Suitable for all kinds of DC electronic equipments, such as switching power supply, PBX and so on
- Safety approval: 





ROHS

Technical data

Rated Voltage	24VDC~250VDC	Rated Current@40°C	0.5A~250A
Operating Frequency	DC	Climatic Category	25/085/21

Filter Selection Table

Part No.	Rated current @40°C	Dimension	Electrical schematics	Termination		
						
EFAD101-1-W	1A	Fig.1	Fig.1	--	--	○
EFAD101-3-W	3A	Fig.1	Fig.1	--	--	○
EFAD102-6-F	6A	Fig.2	Fig.2	--	○	---
EFAD102-10-F	10A	Fig.2	Fig.2	--	○	---
EFAD102-50-M	50A	Fig.3	Fig.2	M6	---	---
EFAD102-100-M	100A	Fig.4	Fig.2	M8	---	---

Diagrams

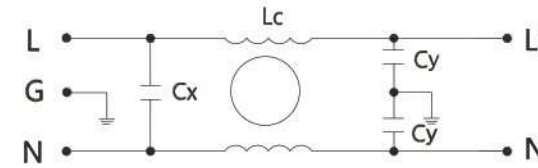


Fig.1

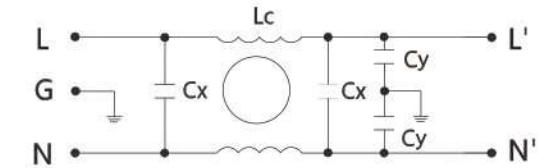
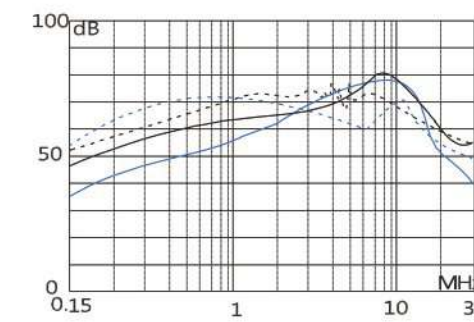
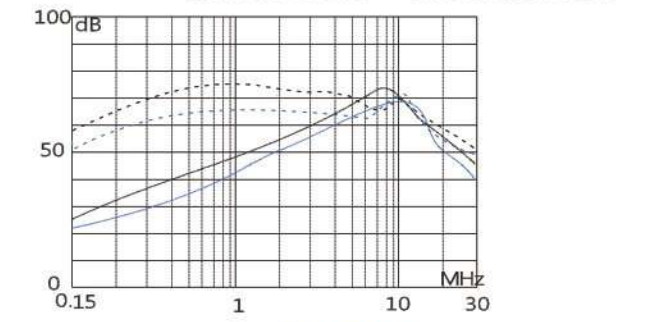


Fig.2

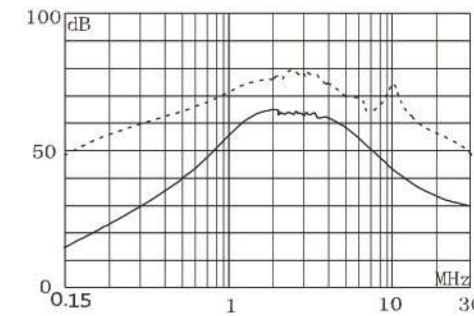
Insertion loss(dB)



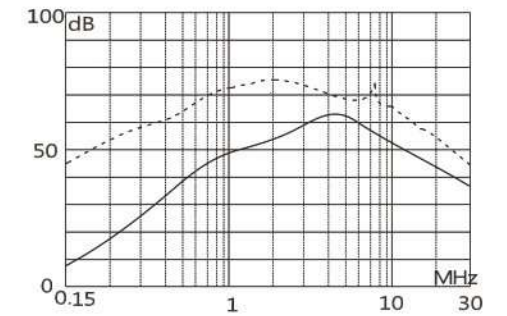
EFAD101-1-W EFAD101-3-W



EFAD102-6-F EFAD102-10-F



EFAD102-50-M



EFAD102-100-M

Dimensions(mm)

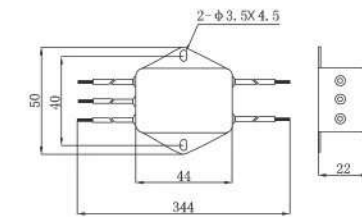


Fig.1

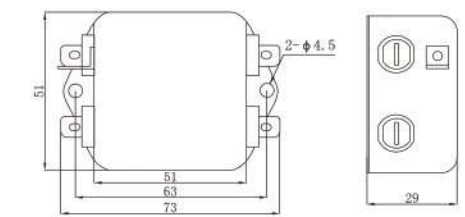


Fig.2

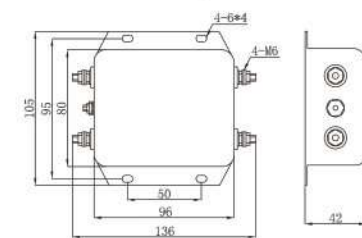


Fig.3

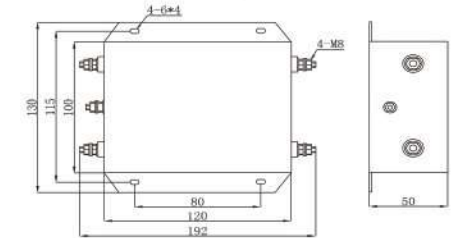



Fig.4

DC Series Filters

EFAD202/EFAD200 Series

- Specially designed for suppressing the noise on DC power line
- Excellent low and high frequency attenuation effect
- Highly cost-effective, various connection ways
- Suitable for all kinds of DC electronic equipments, such as switching power supply, PBX and so on
- Safety approval: 




RoHS

Technical data

Rated Voltage	24VDC~250VDC	Rated Current@40°C	0.5A~250A
Operating Frequency	DC	Climatic Category	25/085/21

Filter Selection Table

Part No.	Rated current @40°C	Dimension	Electrical schematics	Termination		
						
EFAD202-20-M/F	20A	Fig.3	Fig.1	M4	○	---
EFAD202-30-M/F	30A	Fig.3	Fig.1	M4	○	---
EFAD202-50-M	50A	Fig.4	Fig.1	M6	---	---
EFAD202-80-M	80A	Fig.5	Fig.1	M8	---	---
EFAD200-1-W	1A	Fig.1	Fig.2	---	---	○
EFAD200-3-W	3A	Fig.1	Fig.2	---	---	○
EFAD200-6-F/W	6A	Fig.1/Fig.2	Fig.2	---	○	○
EFAD200-10-F	10A	Fig.2	Fig.2	---	○	---

Diagrams

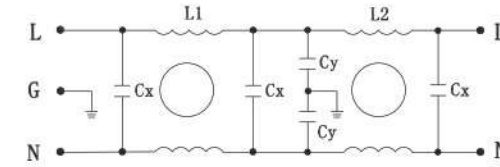


Fig.1

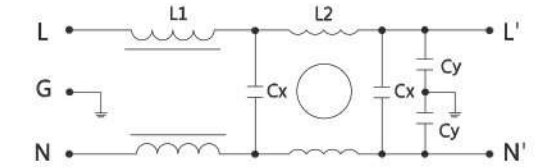
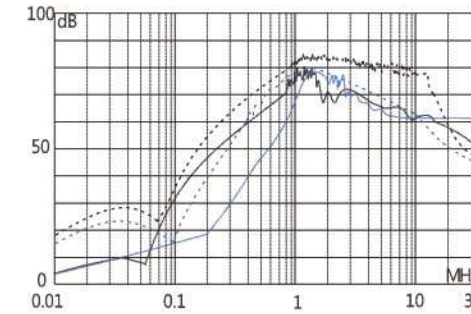


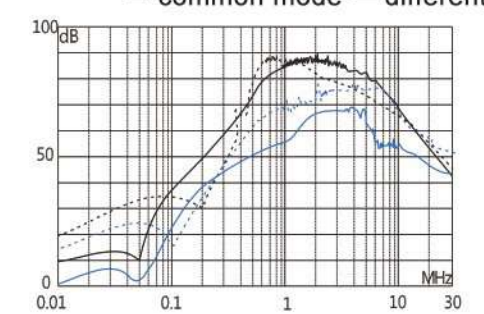
Fig.2

Insertion loss(dB)

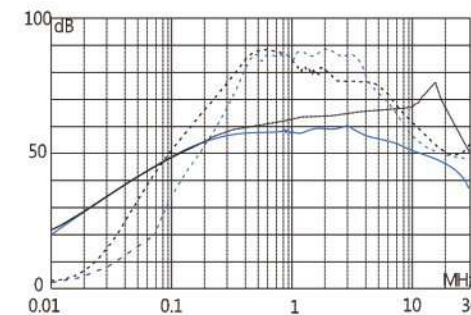
— common mode — differential mode



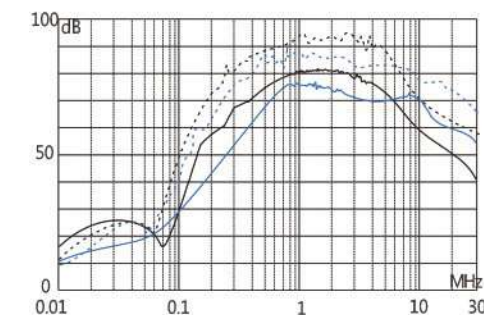
EFAD202-20-M/F EFAD202-30-M/F



EFAD202-50-M EFAD202-80-M



EFAD200-1-W EFAD200-3-W



EFAD200-6-F/W EFAD200-10-F

Dimensions(mm)

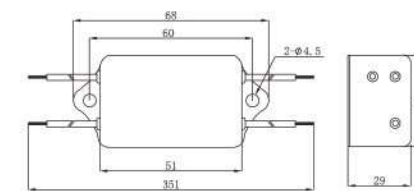


Fig.1

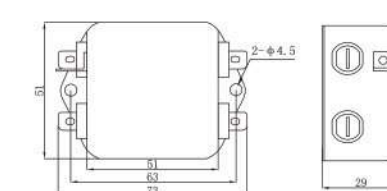


Fig.2

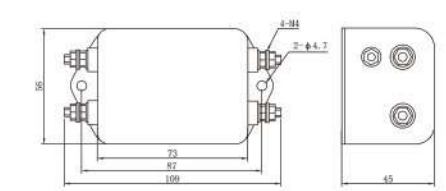


Fig.3

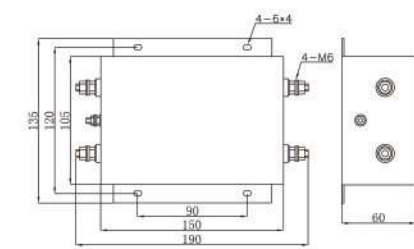


Fig.4

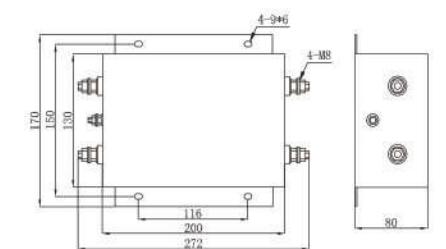



Fig.5

● AC 3-Phase 3-Line Series Filters

EFC101 Series

- Low leakage current, small size
- Widely used in many kinds of electronic equipments with connection way "△", such as printer, packing machine, textile equipment, industrial air conditioner, UPS, X-ray, CT and so on
- Safety approval: 



RoHS

Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	1A~250A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Termination
				
EFC101-6-M	6A	<2.0mA	Fig.1	M4
EFC101-10-M	10A	<2.0mA	Fig.1	M4
EFC101-20-M	20A	<2.0mA	Fig.1	M4
EFC101-30-M	30A	<2.0mA	Fig.2	M6
EFC101-40-M	40A	<2.0mA	Fig.2	M6
EFC101-50-M	50A	<3.0mA	Fig.3	M6
EFC101-80-M	80A	<7.0mA	Fig.4	M8
EFC101-100-M	100A	<7.0mA	Fig.4	M8
EFC101-150-M	150A	<7.0mA	Fig.4	M10
EFC101-200-M	200A	<7.0mA	Fig.4	M10

Diagrams

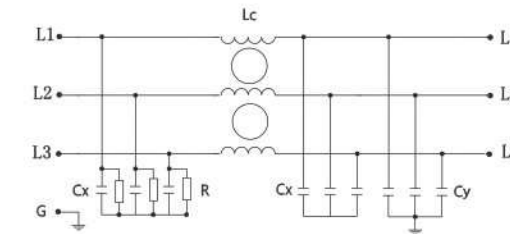
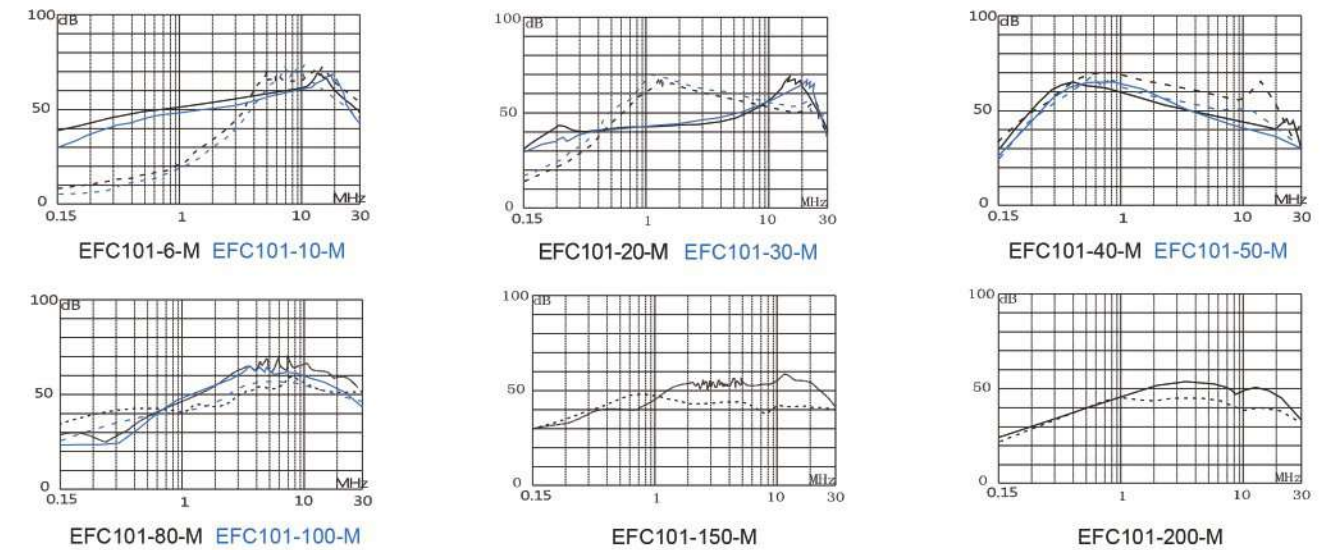
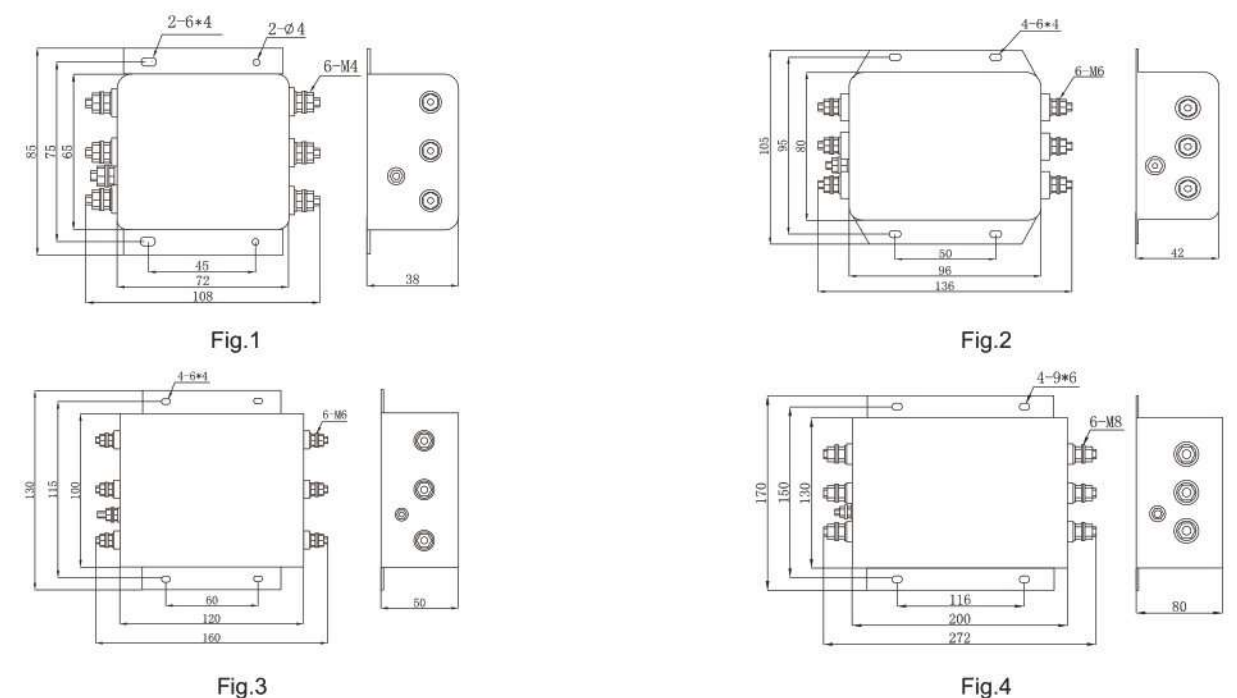


Fig.1

Insertion loss(dB)




Dimensions(mm)



● AC 3-Phase 3-Line Series Filters

EFC201 Series

- Low leakage current, good performance of suppressing common mode and differential mode interference
- Widely used in many kinds of electronic equipments with connection way "△", such as printers, packing machine, textile equipment, industrial air conditioner, UPS, X-ray, CT and so on
- Safety approval: 




RoHS

Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	1A~1200A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
					
EFC201-10-M	10A	<4.0mA	Fig.1	Fig.1	M4
EFC201-20-M	20A	<4.0mA	Fig.1	Fig.1	M4
EFC201-50-M	50A	<7.0mA	Fig.2	Fig.1	M6
EFC201-100-M	100A	<7.0mA	Fig.3	Fig.1	M8
EFC201-150-M	150A	<7.0mA	Fig.4	Fig.1	M10
EFC201-200-M	200A	<7.0mA	Fig.4	Fig.1	M10
EFC200-6-M	6A	<4.0mA	Fig.5	Fig.2	M4
EFC200-10-M	10A	<4.0mA	Fig.5	Fig.2	M4
EFC200-20-M	20A	<10.0mA	Fig.1	Fig.2	M4
EFC200-50-M	50A	<15.0mA	Fig.3	Fig.2	M6

Diagrams

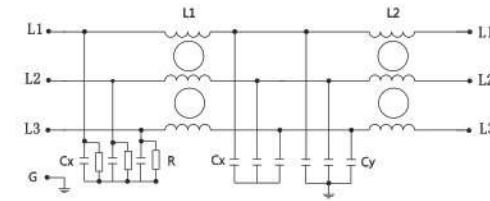


Fig.1

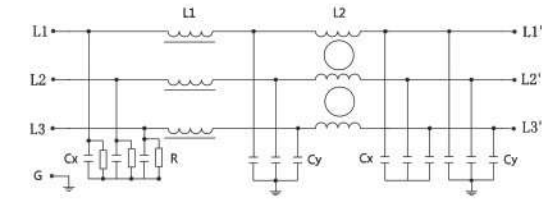
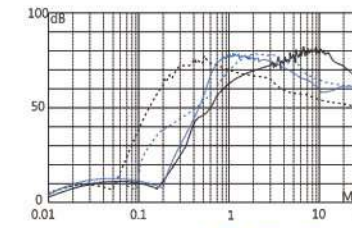


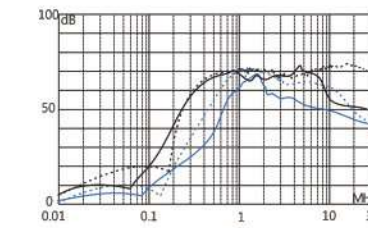
Fig.2

Insertion loss(dB)

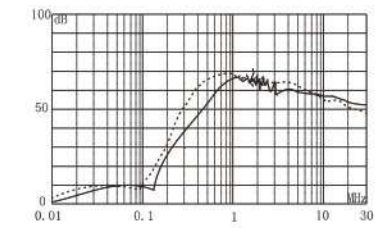
— common mode — differential mode



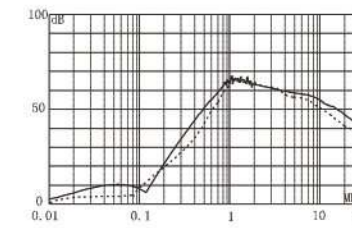
EFC201-10-M EFC201-20-M



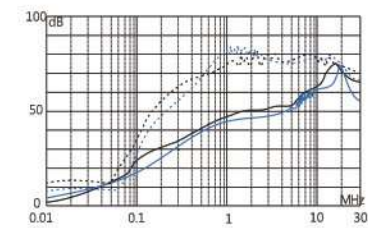
EFC201-50-M EFC201-100-M



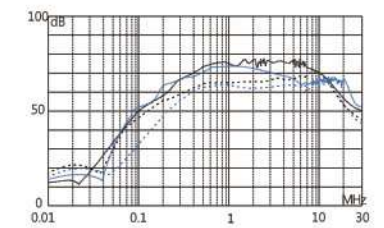
EFC201-150-M



EFC201-200-M



EFC200-6-M EFC200-10-M



EFC200-20-M EFC200-50-M

Dimensions(mm)

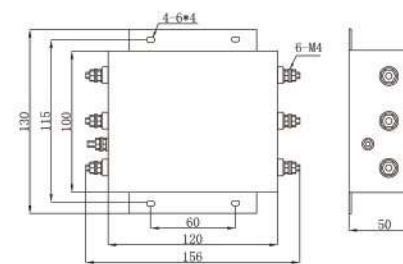


Fig.1

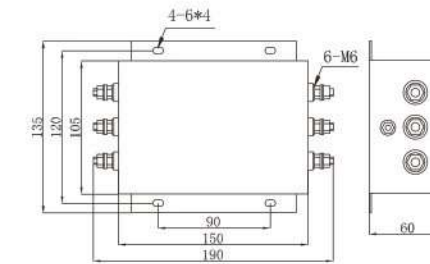


Fig.2

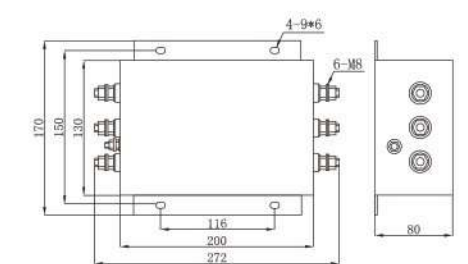


Fig.3

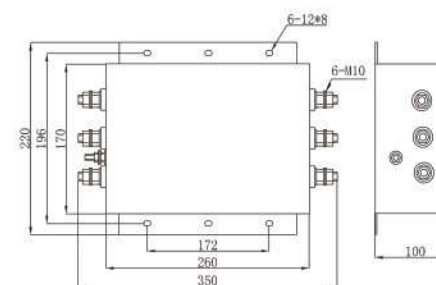


Fig.4

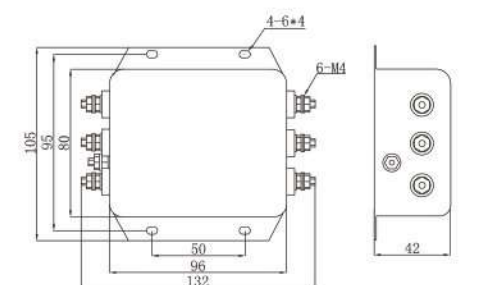


Fig.5

● AC 3-Phase 3-Line Series Filters

EFC203-T Series

- 3 Phase 10A-1600A
- Easy connection Terminal Block, compact and light
- Available for strong interference environments, inverter equipments, etc.
- Safety approval: 



RoHS

Technical data

Rated Voltage	400/250 VAC		Rated Current@40°C	5A-200A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Diagrams	Dimensions (mm)							
			A	B	C	D	E	F	H	J
EFC203-5-T	5A	Fig.1	168	180	190	190	20	39	74	M4
EFC203-10-T	10A	Fig.1	168	180	190	190	20	39	74	M4
EFC203-20-T	20A	Fig.1	220	235	242	250	25	44	74	M5
EFC203-30-T	30A	Fig.1	240	235	270	271	30	49	84	M5
EFC203-50-T	50A	Fig.1	220	235	250	275	60	84	89	M6
EFC203-65-T	65A	Fig.1	220	235	250	275	60	84	89	M6
EFC203-80-T	80A	Fig.1	240	255	270	308	60	84	139	M6
EFC203-100-T	100A	Fig.1	240	255	270	326	65	94	149	M10
EFC203-130-T	130A	Fig.1	240	255	270	326	65	94	149	M10
EFC203-150-T	150A	Fig.1	240	255	270	326	65	94	149	M10
EFC203-200-T	200A	Fig.1	350	365	380	450	102	120	170	M10

Diagrams

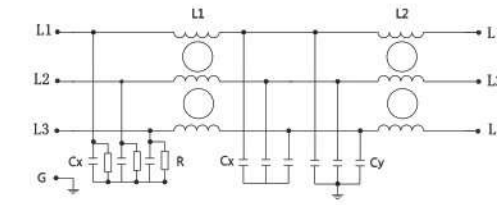
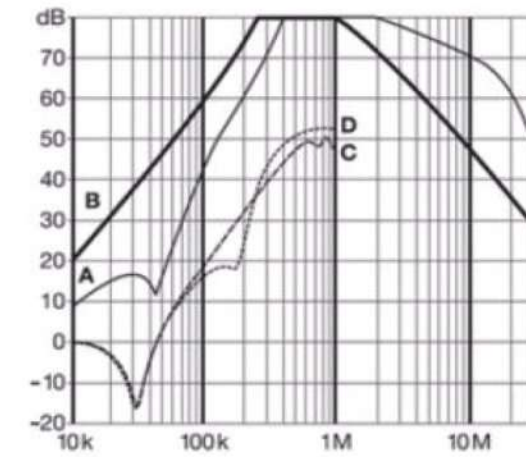


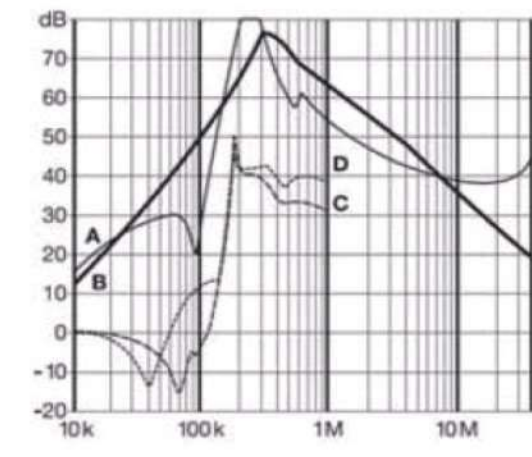
Fig.1

Insertion loss(dB)

— common mode — differential mode



10A-50A



65A-200A.

Dimensions(mm)

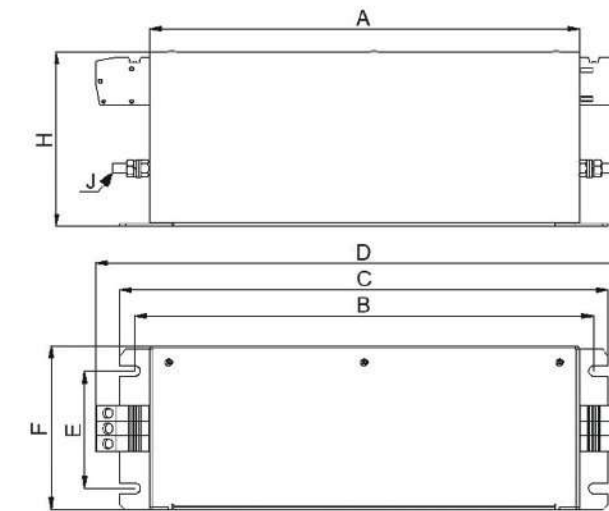



Fig.1

● AC 3-Phase 3-Line Series Filters

EFC101-T Series

- Available for terminal block with cover
- Excellent low frequency attenuation effect, good performance of suppressing common mode and differential mode interference
- Terminal block connector, easy to connect the wire, high security and reliability
- Suitable for machine tool device, industrial power supply, inverter power supply, inverter equipment and so on
- Safety approval: 

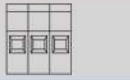


RoHS

Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	6A~200A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-ground	2700VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Termination
				
EFC101-6-T	6A	<7.0mA	Fig.1	○
EFC101-10-T	10A	<7.0mA	Fig.1	○
EFC101-20-T	20A	<7.0mA	Fig.1	○
EFC101-30-T	30A	<7.0mA	Fig.1	○
EFC101-40-T	40A	<7.0mA	Fig.2	○
EFC101-50-T	50A	<7.0mA	Fig.2	○
EFC101-65-T	65A	<7.0mA	Fig.2	○
EFC101-80-T	80A	<7.0mA	Fig.3	○
EFC101-100-T	100A	<7.0mA	Fig.3	○

Diagrams

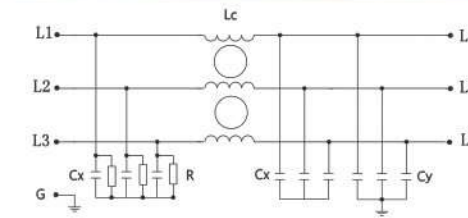
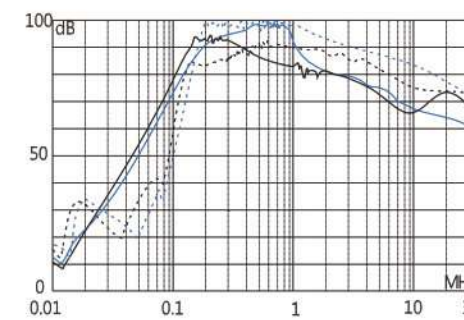
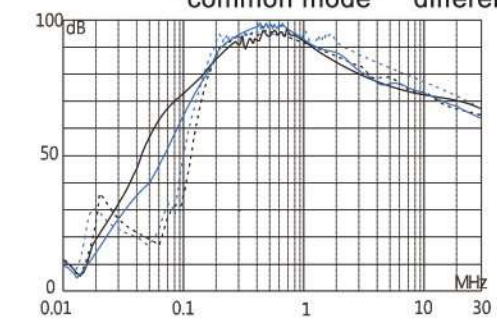


Fig.1

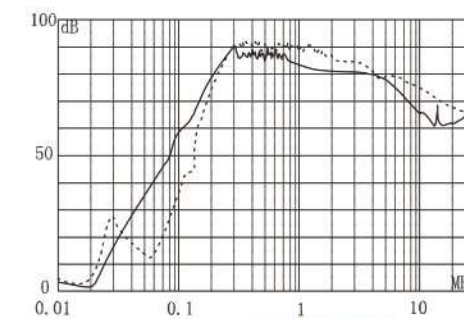
Insertion loss(dB)



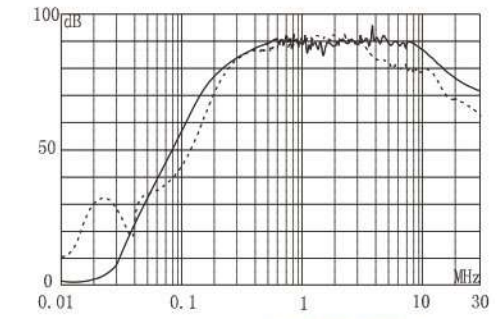
EFC101-6-T EFC101-10-T



EFC101-20-T EFC101-30-T EFC101-40-T



EFC101-50-T EFC101-65-T



EFC101-80-T EFC101-100-T

Dimensions(mm)

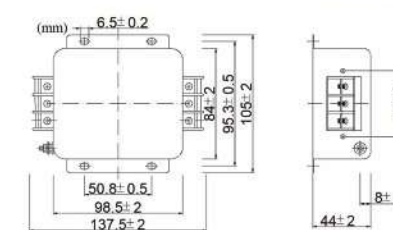


Fig.1

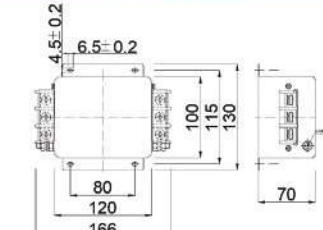


Fig.2

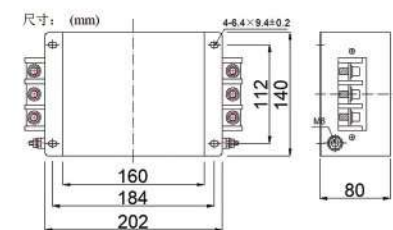



Fig.3

AC 3-Phase 4-Line Series Filters

EFN101 Series

- Low leakage current, small size
- Three-phase with neutral line
- Widely used in machine tool device, inverter power supply, inverter equipment, industrial equipment, medical appliance and so on
- Safety approval: 







ROHS

Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	1A~250A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-neutral	1760VDC		
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Termination	
					
EFN101-6-M/F	6A	<2.0mA	Fig.1	M4	
EFN101-10-M/F	10A	<2.0mA	Fig.1	M4	
EFN101-20-M	20A	<2.0mA	Fig.2	M4	---
EFN101-30-M	30A	<4.5mA	Fig.2	M6	---
EFN101-40-M	40A	<4.5mA	Fig.3	M6	---
EFN101-50-M	50A	<4.5mA	Fig.4	M6	---
EFN101-80-M	80A	<8.0mA	Fig.5	M8	---
EFN101-100-M	100A	<8.0mA	Fig.5	M8	---
EFN101-150-M	150A	<8.0mA	Fig.5	M10	---
EFN101-200-M	200A	<20.0mA	Fig.5	M10	---

Diagrams

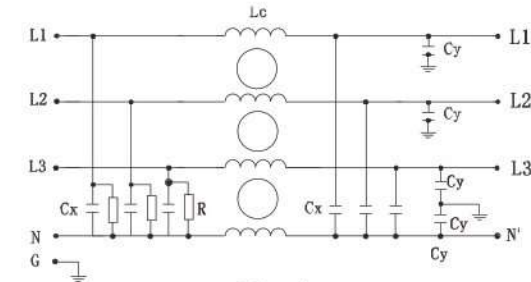
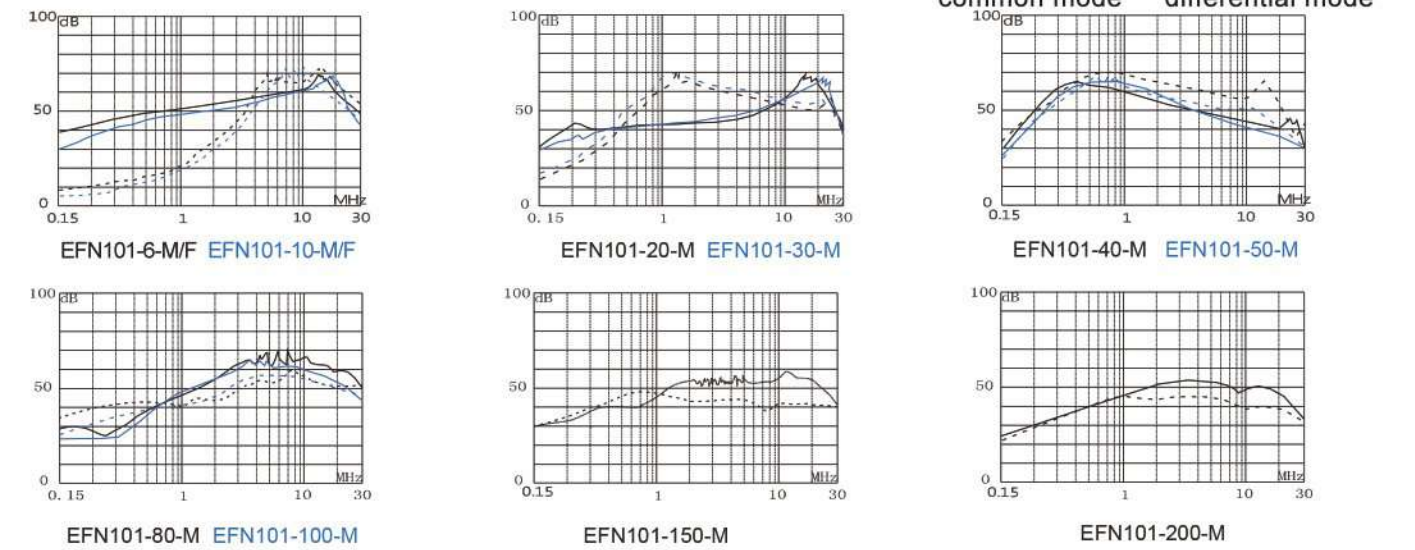
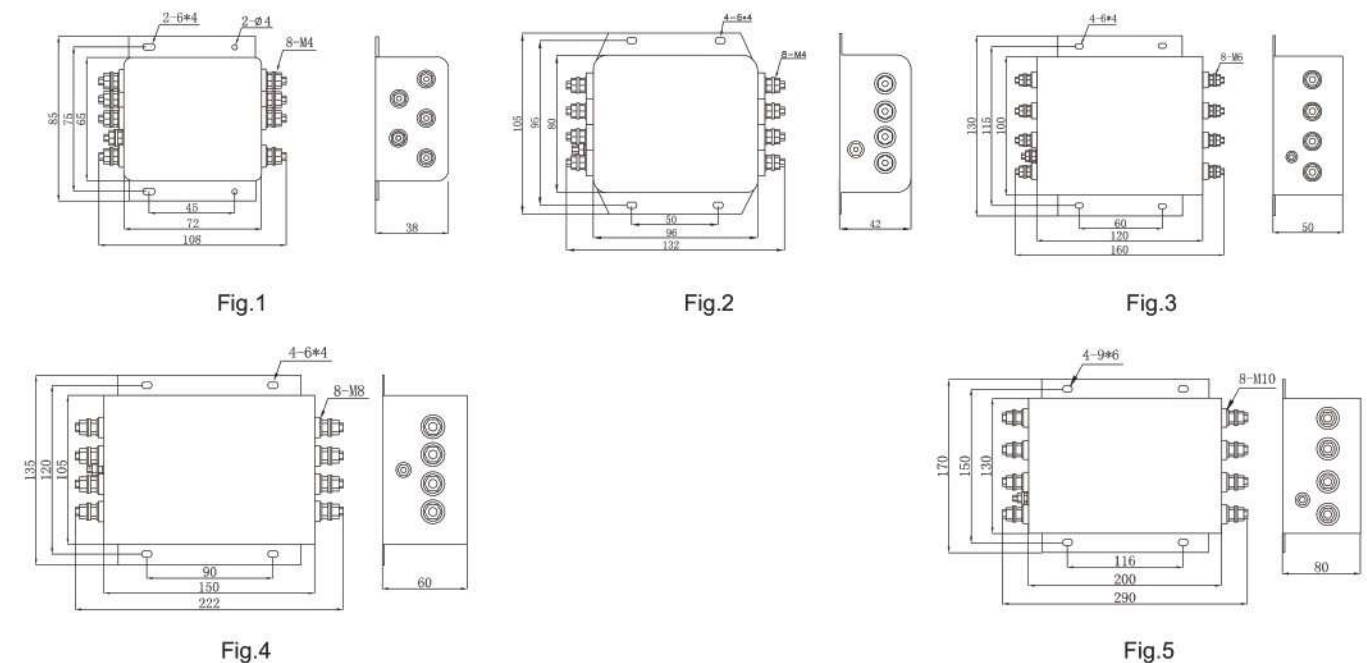


Fig.1

Insertion loss(dB)




Dimensions(mm)



● AC 3-Phase 4-Line Series Filters

EFN201/EFN200 Series

- Low leakage current, good performance of suppressing common mode and differential mode interference
- Three-phase with neutral line
- Widely used in machine tool device, inverter power supply, inverter equipment, industrial equipment, medical appliance and so on
- Safety approval: 




RoHS

Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	1A~400A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-neutral	1760VDC		
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
					
EFN201-10-M	10A	<2.0mA	Fig.1	Fig.1	M4
EFN201-20-M	20A	<2.0mA	Fig.1	Fig.1	M4
EFN201-50-M	50A	<4.0mA	Fig.2	Fig.1	M6
EFN201-100-M	100A	<8.0mA	Fig.2	Fig.1	M8
EFN201-150-M	150A	<12.0mA	Fig.3	Fig.1	M10
EFN201-200-M	200A	<12.0mA	Fig.3	Fig.1	M10
EFN200-6-M	6A	<2.0mA	Fig.4	Fig.2	M4
EFN200-10-M	10A	<2.0mA	Fig.4	Fig.2	M4
EFN200-20-M	20A	<4.0mA	Fig.1	Fig.2	M4
EFN200-50-M	50A	<4.0mA	Fig.2	Fig.2	M6

Diagrams

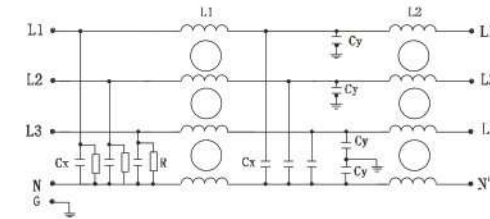


Fig.1

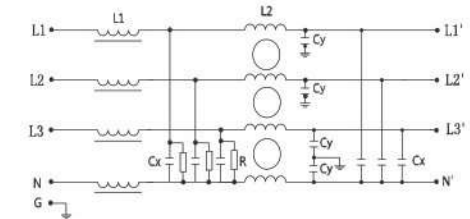
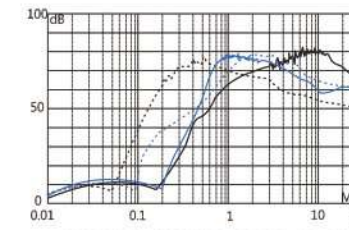


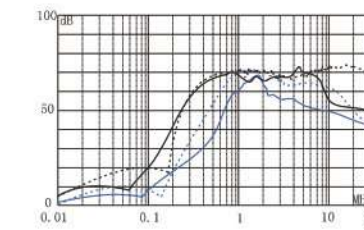
Fig.2

Insertion loss(dB)

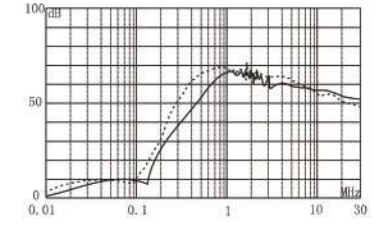
— common mode — differential mode



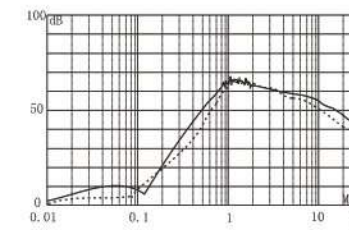
EFN201-10-M EFN201-20-M



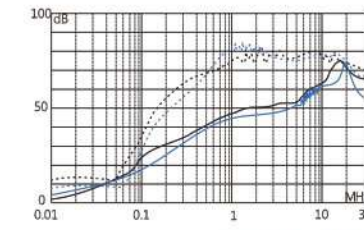
EFN201-50-M EFN201-100-M



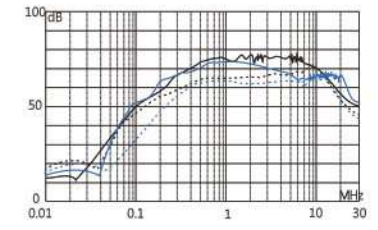
EFN201-150-M



EFN201-200-M



EFN200-6-M EFN200-10-M



EFN200-20-M EFN200-50-M

Dimensions(mm)

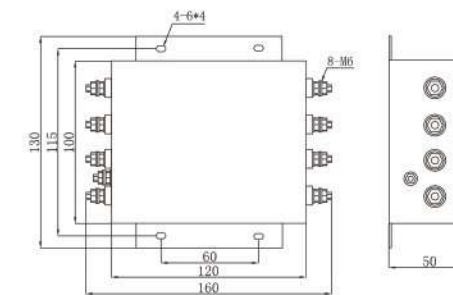


Fig.1

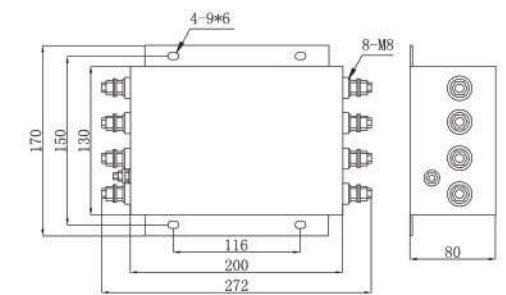


Fig.2

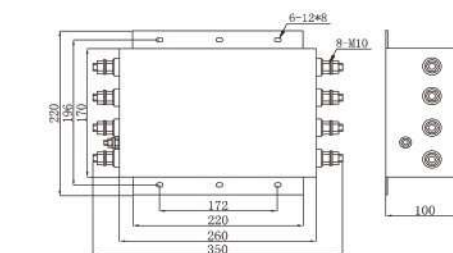


Fig.3

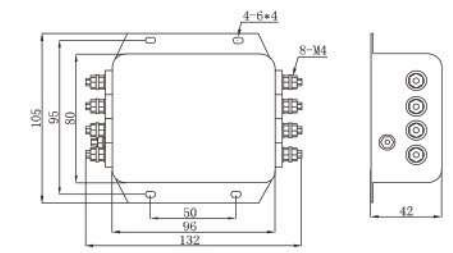



Fig.4

● AC 3-Phase 4-Line Series Filters

Efn301 Series

- Effectively suppress the interference at wide band ranging from 10KHz to 30MHz
- Three-phase with neutral line
- Widely used in machine tool device, inverter power supply, inverter equipment, industrial equipment, medical appliance and so on
- Safety approval: 




RoHS

Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	1A~400A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-neutral	1760VDC		
	line-ground	2700VDC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Termination
				
Efn301-6-M	6A	<8.0mA	Fig.1	M4
Efn301-10-M	10A	<8.0mA	Fig.1	M4
Efn301-25-M	25A	<8.0mA	Fig.2	M6
Efn301-30-M	30A	<8.0mA	Fig.2	M6
Efn301-40-M	40A	<8.0mA	Fig.2	M6
Efn301-50-M	50A	<8.0mA	Fig.2	M6
Efn301-60-M	60A	<8.0mA	Fig.2	M6
Efn301-80-M	80A	<16.0mA	Fig.3	M8
Efn301-100-M	100A	<16.0mA	Fig.3	M8
Efn301-120-M	120A	<16.0mA	Fig.4	M8
Efn301-150-M	150A	<16.0mA	Fig.4	M10
Efn301-200-M	200A	<24.0mA	Fig.4	M10

Diagrams

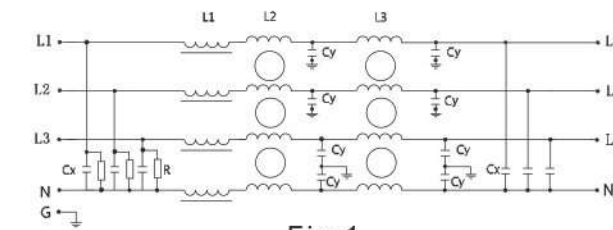
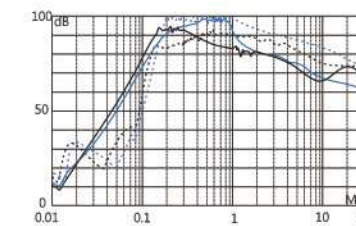


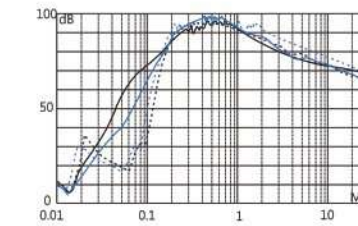
Fig.1

Insertion loss(dB)

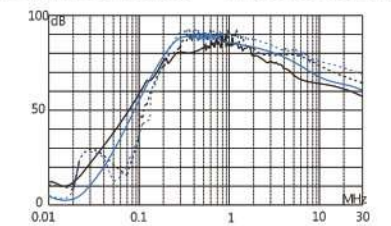
— common mode — differential mode



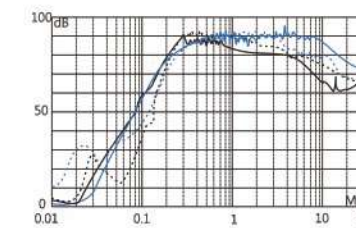
Efn301-6-M Efn301-10-M



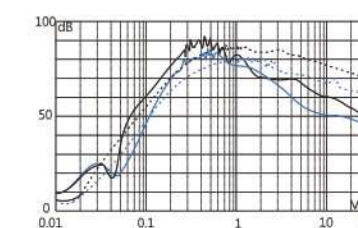
Efn301-25-M Efn301-30-M



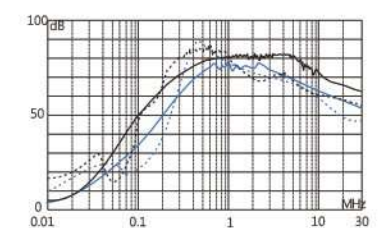
Efn301-40-M Efn301-50-M



Efn301-60-M Efn301-80-M



Efn301-100-M Efn301-120-M



Efn301-150-M Efn301-200-M

Dimensions(mm)

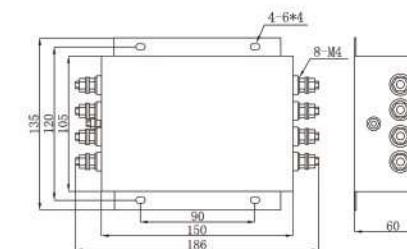


Fig.1

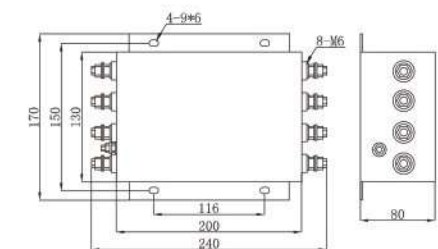


Fig.2

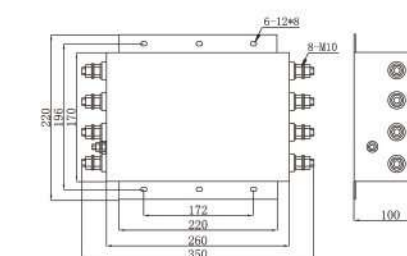


Fig.3

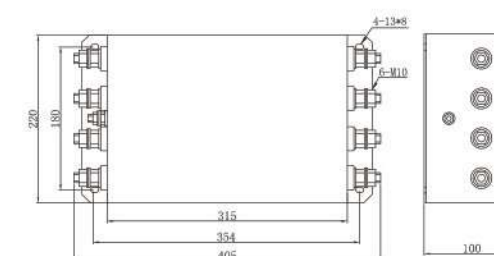


Fig.4

Inverter Series Filters

EFC301 Series

- Specially designed based on the frequency-domain characterization of interference generated by inverter input towards electric network and other digital equipments
- Good performance of suppressing common mode and differential mode interference, effectively suppress the conducted interference from inverter
- Various connection ways, protective covers and terminal block terminals optional
- Suitable for working place with strict requirement of environment
- Safety approval:



ROHS

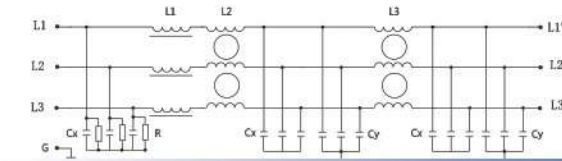
Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	6A~1200A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-ground	2700VDC	Operating Frequency	50/60Hz

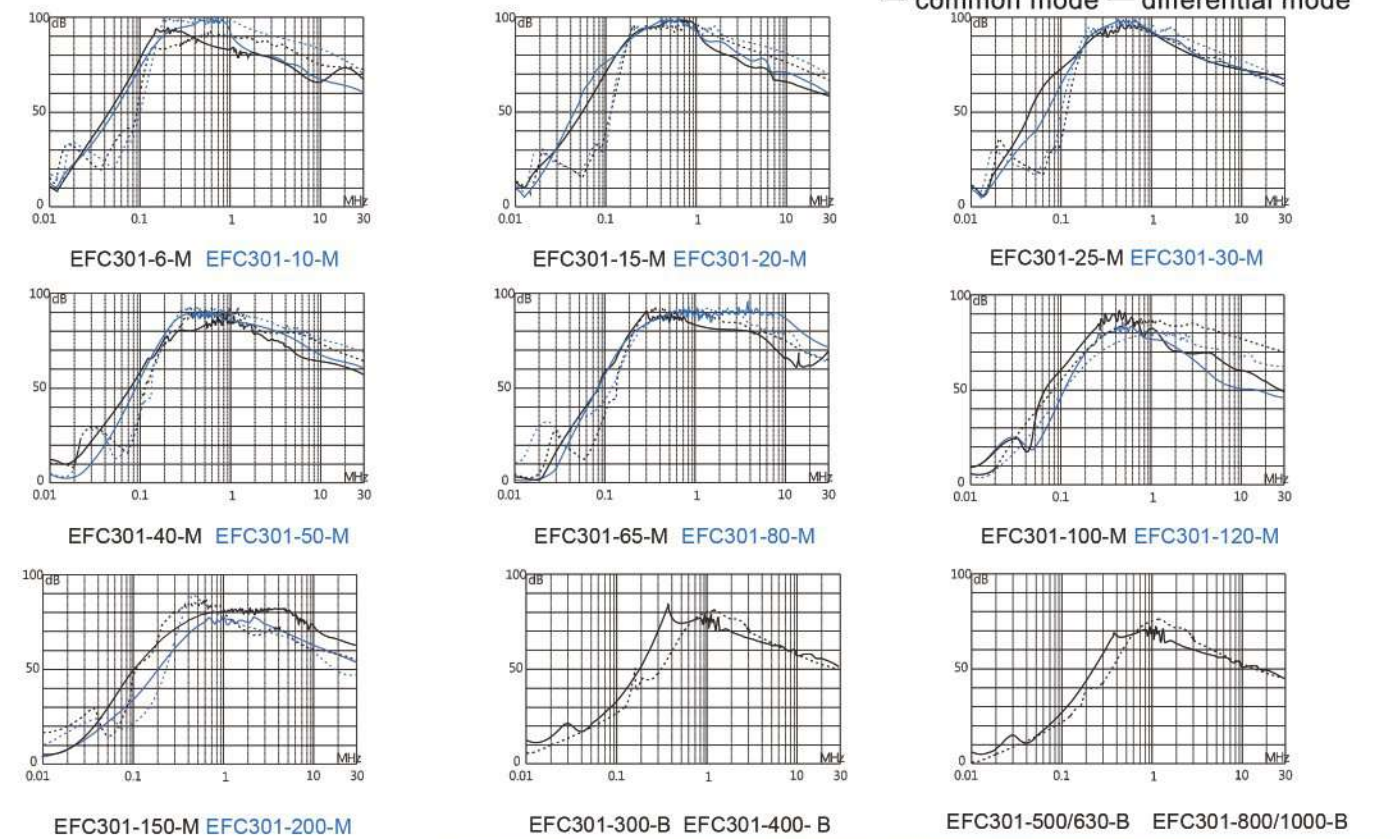
Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Inverter capacity (KVA)	Dimension	Termination	
EFC301-6-M	6A	<7.5mA	1.5	Fig.1	M4	---
EFC301-10-M	10A	<7.5mA	3.0	Fig.1	M4	---
EFC301-15-M	15A	<7.5mA	5.5	Fig.1	M4	---
EFC301-20-M	20A	<7.5mA	7.5	Fig.1	M4	---
EFC301-25-M	25A	<7.5mA	11.0	Fig.2	M6	---
EFC301-30-M	30A	<7.5mA	15.0	Fig.2	M6	---
EFC301-40-M	40A	<13.0mA	18.5	Fig.2	M6	---
EFC301-50-M	50A	<13.0mA	22.0	Fig.2	M6	---
EFC301-65-M	65A	<13.0mA	30.0	Fig.2	M6	---
EFC301-80-M	80A	<40.0mA	37.0	Fig.3	M8	---
EFC301-100-M	100A	<40.0mA	45.0	Fig.3	M8	---
EFC301-120-M	120A	<40.0mA	55.0	Fig.3	M8	---
EFC301-150-M	150A	<50.0mA	75.0	Fig.3	M10	---
EFC301-200-M	200A	<50.0mA	95.0	Fig.4	M10	---
EFC301-300-B	300A	<45.0mA	110/132	Fig.5	---	○
EFC301-400-B	400A	<45.0mA	160	Fig.5	---	○
EFC301-500-B	500A	<60.0mA	200	Fig.3	---	○
EFC301-630-B	630A	<60.0mA	315	Fig.6	---	○
EFC301-800-B	800A	<90.0mA	375	Fig.6	---	○
EFC301-1000-B	1000A	<90.0mA	450	Fig.6	---	○

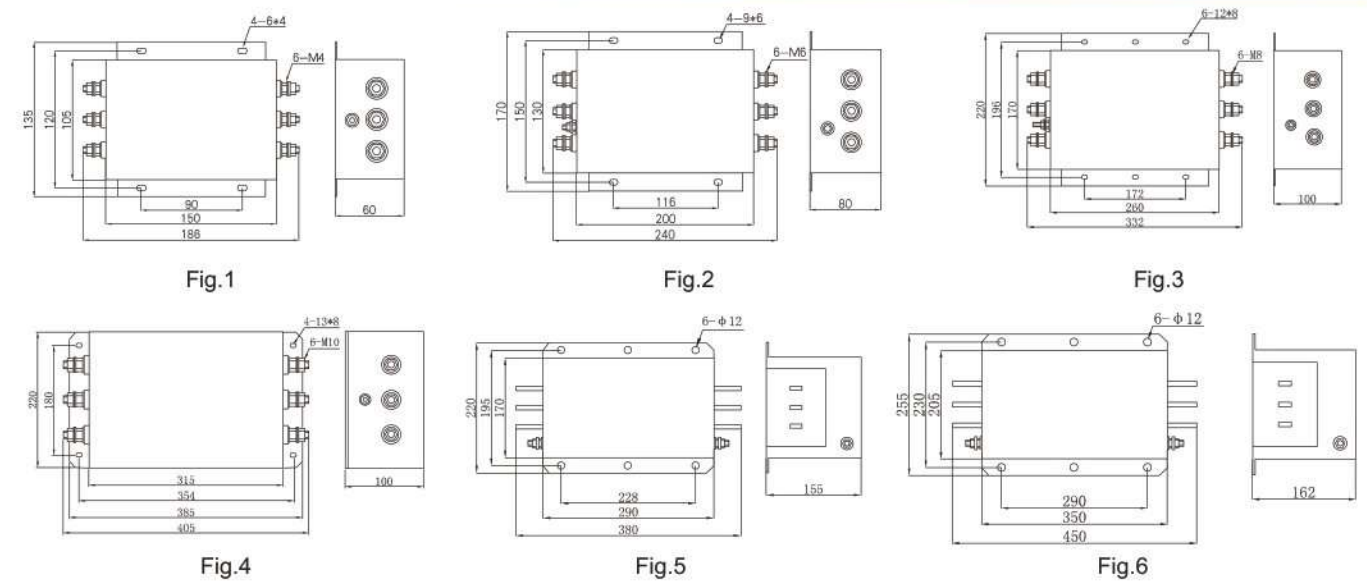
Diagrams



Insertion loss(dB)




Dimensions(mm)



Inverter Series Filters

EFC302 Series

- Specially designed based on the frequency-domain characterization of interference generated by inverter output to load
- Effectively reduce the interference generated by inverter output
- Various connection ways, protective covers and terminal block terminals optional
- Safety approval: 



ROHS

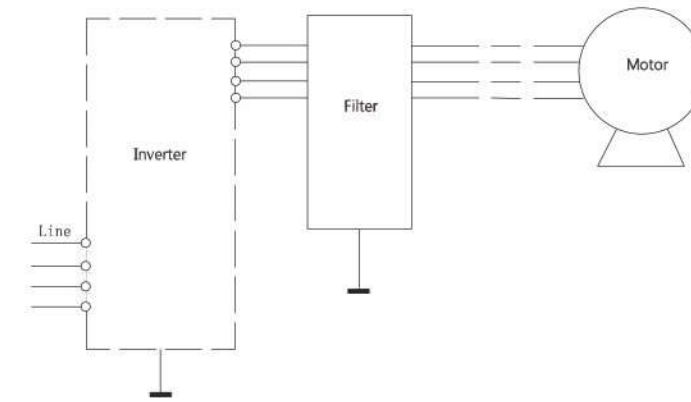
Technical data

Rated Voltage	250/440VAC		Rated Current@40°C	6A~1200A
Test Voltage	line-line	2250VDC	Climatic Category	25/085/21
	line-ground	2700VDC	Operating Frequency	50/60Hz

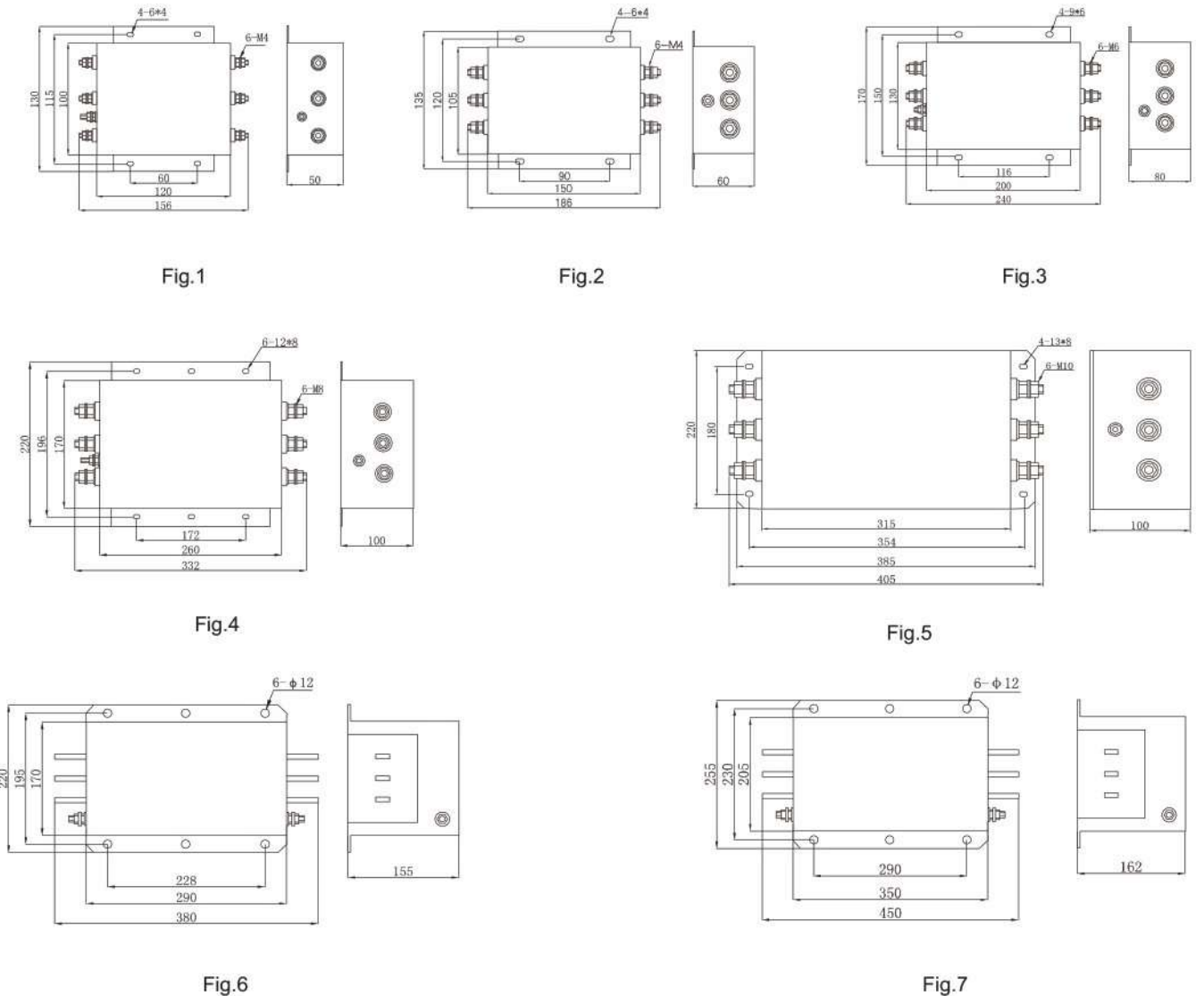
Filter Selection Table

Part No.	Rated current @40°C	Inverter capacity (KVA)	Dimension	Termination	
					
EFC302-6-M	6A	1.5	Fig.1	M4	---
EFC302-10-M	10A	3.0	Fig.1	M4	---
EFC302-15-M	15A	5.5	Fig.1	M4	---
EFC302-20-M	20A	7.5	Fig.2	M4	---
EFC302-25-M	25A	11.0	Fig.2	M6	---
EFC302-30-M	30A	15.0	Fig.2	M6	---
EFC302-40-M	40A	18.5	Fig.2	M6	---
EFC302-50-M	50A	22.0	Fig.3	M6	---
EFC302-65-M	65A	30.0	Fig.3	M6	---
EFC302-80-M	80A	37.0	Fig.3	M8	---
EFC302-100-M	100A	45.0	Fig.3	M8	---
EFC302-120-M	120A	55.0	Fig.4	M8	---
EFC302-150-M	150A	75.0	Fig.4	M10	---
EFC302-200-M	200A	95.0	Fig.5	M10	---
EFC302-300-B	300A	110/132	Fig.6	---	○
EFC302-400-B	400A	160	Fig.6	---	○
EFC302-500-B	500A	200	Fig.7	---	○
EFC302-630-B	630A	315	Fig.7	---	○
EFC302-800-B	800A	375	Fig.7	---	○
EFC302-1000-B	1000A	450	Fig.7	---	○

Working principle graph




Dimensions(mm)



IEC Socket Series Filters

EFAS103 Series

- Specially designed for IEC standard connector
- Small size, compact structure, easy to install and cost-effective
- Medical appliances optional
- Safety approval: 






RoHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~16A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination		
							
EFAS103-1	1A	<0.5mA	Fig.1	Fig.1	○	---	---
EFAS103-3	3A	<0.5mA	Fig.1	Fig.1	○	---	---
EFAS103-6	6A	<0.5mA	Fig.1	Fig.1	○	---	---
EFAS103-10	10A	<0.5mA	Fig.1	Fig.1	○	---	---
EFAS103-15	15A	<3.0mA	Fig.2	Fig.1	---	○	---
EFAS103-16	16A	<3.5mA	Fig.3	Fig.1	---	---	○

Diagrams

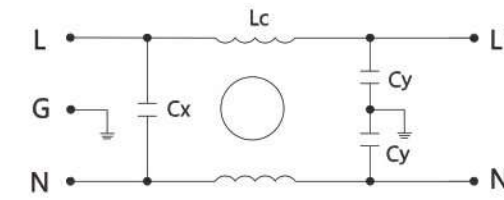
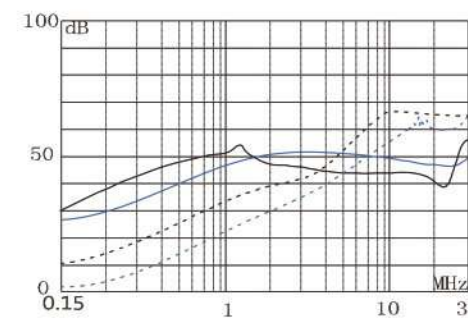
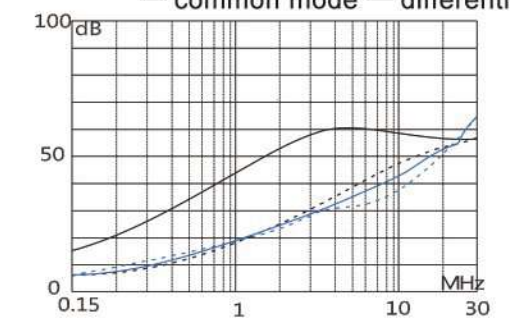


Fig.1

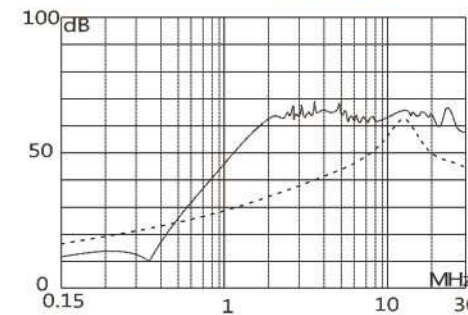
Insertion loss(dB)



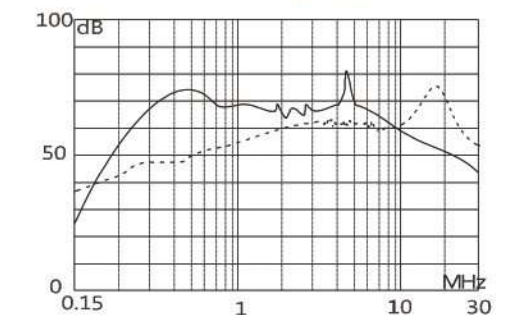
EFAS103-1 EFAS103-3



EFAS103-6 EFAS103-10



EFAS103-15



EFAS103-16

Dimensions(mm)

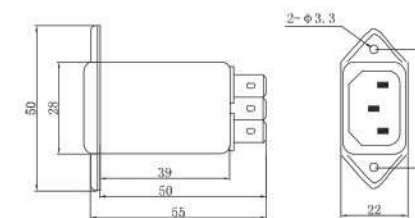


Fig.1

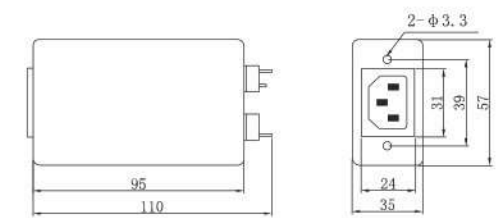


Fig.2

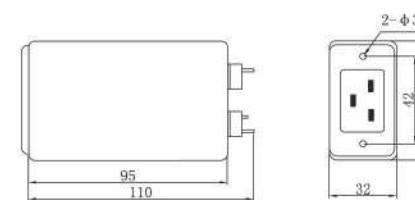



Fig.3

IEC Socket Series Filters

EFA103-A/C Series

- Specially designed for IEC standard connector
- One or two fuses can be installed
- Safe and reliable, easy to install and cost-effective
- Medical appliances optional
- Safety approval: 

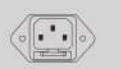


ROHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~10A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
					
EFAS103-1-A	1A	<0.5mA	Fig.1	Fig.1	○
EFAS103-3-A	3A	<0.5mA	Fig.1	Fig.1	○
EFAS103-6-A	6A	<0.5mA	Fig.1	Fig.1	○
EFAS103-10-A	10A	<0.5mA	Fig.1	Fig.1	○
EFAS103-1-C	1A	<0.5mA	Fig.2	Fig.2	○
EFAS103-3-C	3A	<0.5mA	Fig.2	Fig.2	○
EFAS103-6-C	6A	<0.5mA	Fig.2	Fig.2	○
EFAS103-10-C	10A	<0.5mA	Fig.2	Fig.2	○

Diagrams

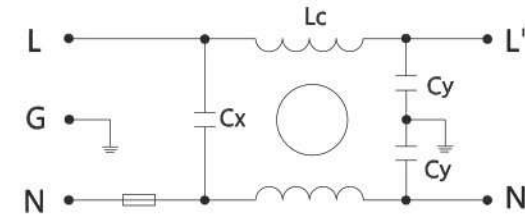


Fig.1

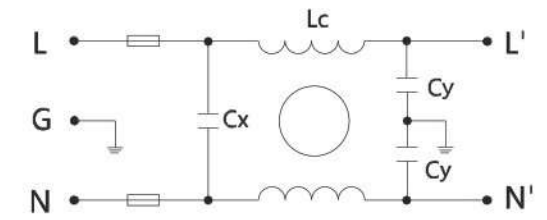
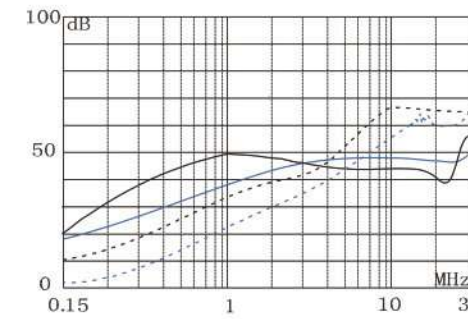


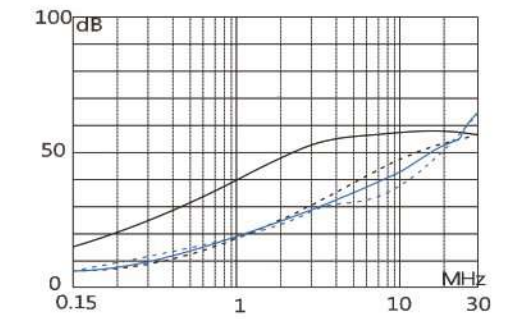
Fig.2

Insertion loss(dB)

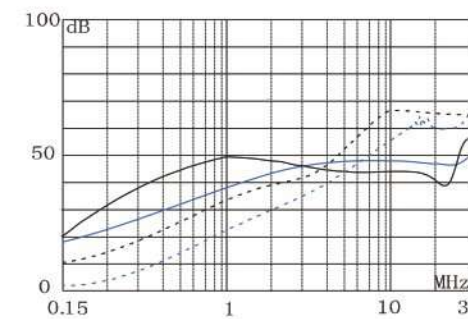
— common mode — differential mode



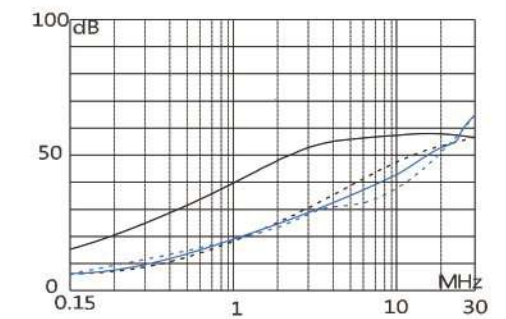
EFAS103-1-A EFAS103-3-A



EFAS103-6-A EFAS103-10-A



EFAS103-1-C EFAS103-3-C



EFAS103-6-C EFAS103-10-C

Dimensions(mm)

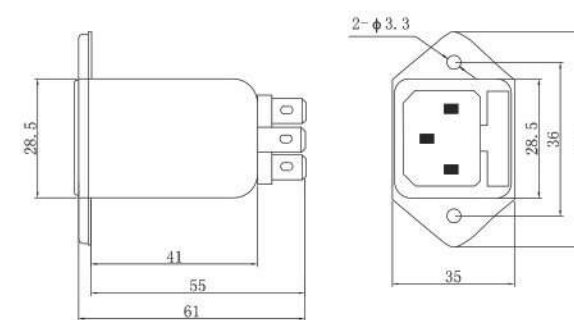


Fig.1

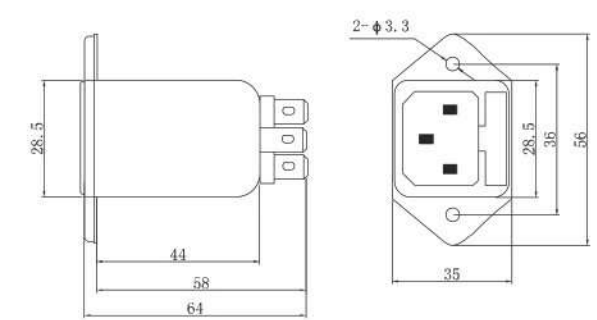



Fig.2

IEC Socket Series Filters

EFAS103-B Series

- Specially designed for IEC standard connector
- With one fuse and switch control
- Safe and reliable, easy to install and cost-effective
- Medical appliances optional
- Safety approval: 




RoHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~ 10A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
					
EFAS103-1-B	1A	<0.5mA	Fig.1	Fig.1	○
EFAS103-3-B	3A	<0.5mA	Fig.1	Fig.1	○
EFAS103-6-B	6A	<0.5mA	Fig.1	Fig.1	○
EFAS103-10-B	10A	<0.5mA	Fig.1	Fig.1	○

Diagrams

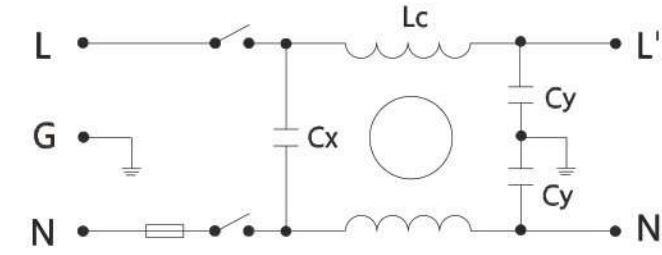
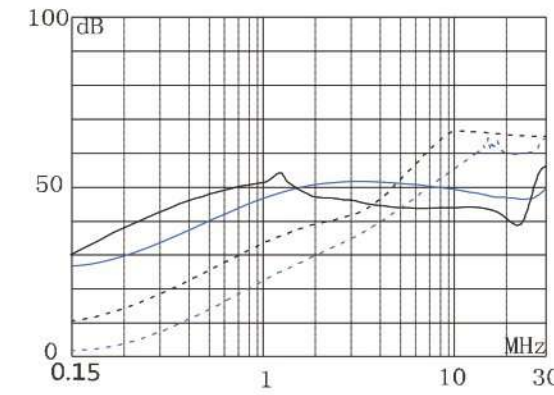


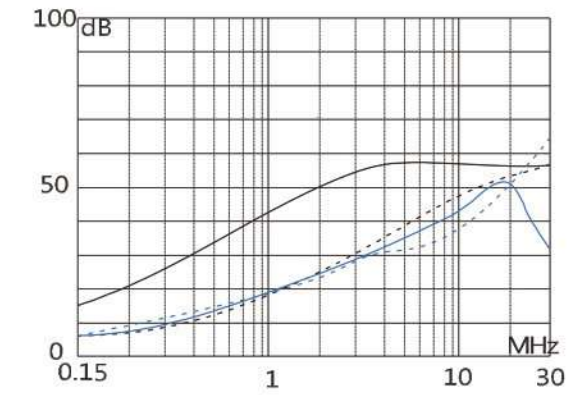
Fig.1

Insertion loss(dB)

— common mode — differential mode



EFAS103-1-B EFAS103-3-B



EFAS103-6-B EFAS103-10-B

Dimensions(mm)

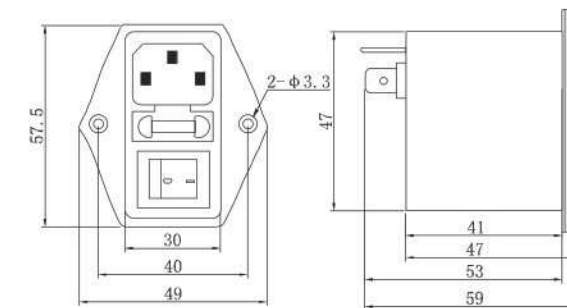



Fig.1

IEC Socket Series Filters

EFAS103-D Series

- Standard IEC inlet with two fuse at the input end
- Fast and simple mounting, highly cost effective
- Applications for Household small tools,IT, telecommunication equipment and Test and measurement equipment,etc.
- Safety approval: 




RoHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~10A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
					
EFAS103-1-D	1A	<0.5mA	Fig.1	Fig.1	○
EFAS103-3-D	3A	<0.5mA	Fig.1	Fig.1	○
EFAS103-6-D	6A	<0.5mA	Fig.1	Fig.1	○
EFAS103-10-D	10A	<0.5mA	Fig.1	Fig.1	○

Diagrams

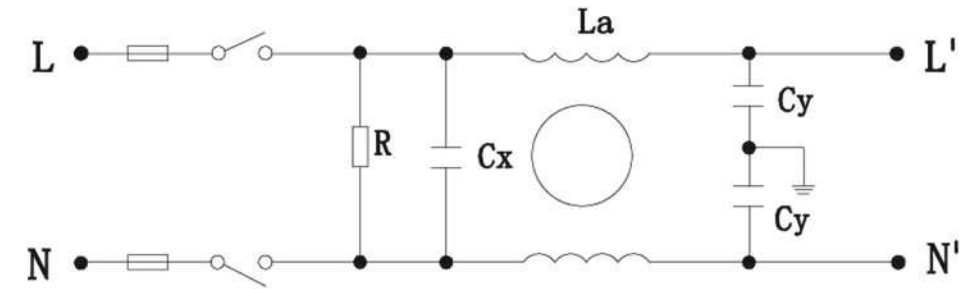
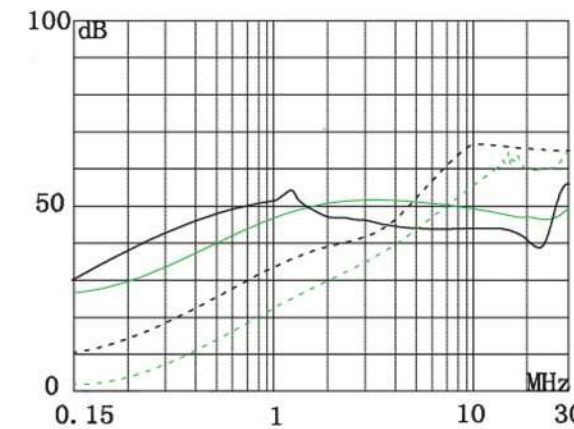


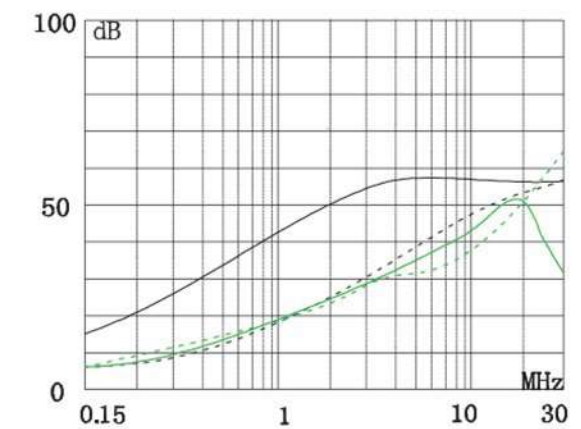
Fig.1

Insertion loss(dB)

— common mode — differential mode



EFAS103-1-D EFAS103-3-D



EFAS103-6-D EFAS103-10-D

Dimensions(mm)

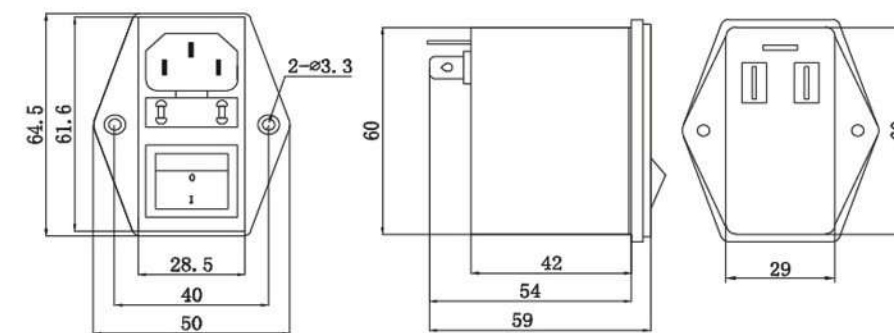



Fig.1

PCB Series Filters

EFP104/EFP204/EFP200 Series

- Effectively suppress the noise interference on line to line and line to ground
- Plastic or metal cover, specially designed for PCB
- Small size, compact structure, easy to install and cost-effective
- Suitable for exchange machine, alarm, controller, LCD, satellite TV system and other ultra-small devices
- Safety approval: 



RoHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	0.5A~6A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current @40°C	Leakage current 250VAC/50Hz @20°C	Dimension	Electrical schematics	Termination
EFP104-0.5	0.5A	<0.5mA	Fig.1	Fig.1	
EFP104-1	1A	<0.5mA	Fig.1	Fig.1	
EFP104-3	3A	<0.5mA	Fig.1	Fig.1	
EFP104-6	6A	<0.5mA	Fig.1	Fig.1	
EFP204-1	1A	<0.5mA	Fig.2	Fig.2	
EFP204-3	3A	<0.5mA	Fig.2	Fig.2	
EFP200-1	1A	<0.5mA	Fig.3	Fig.3	
EFP200-3	3A	<0.5mA	Fig.3	Fig.3	

Diagrams

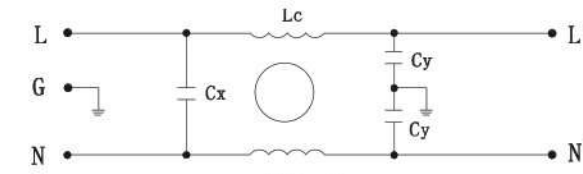


Fig.1

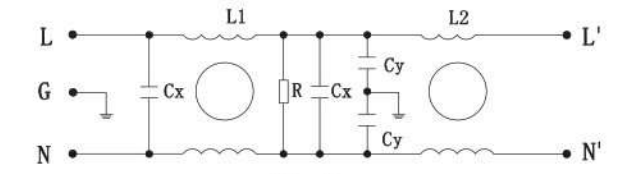


Fig.2

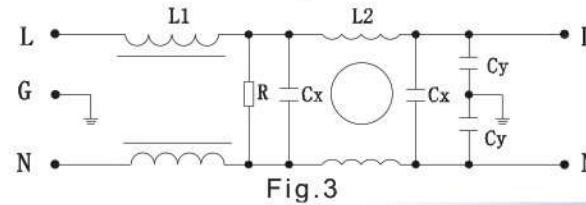
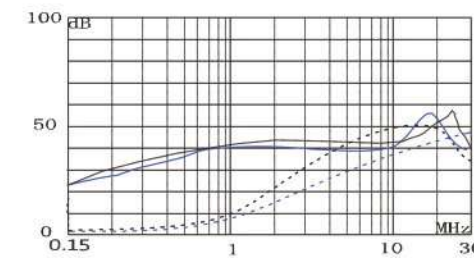
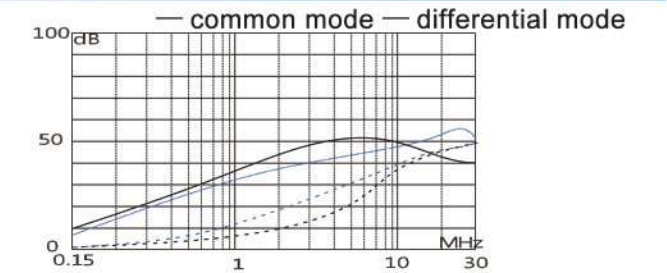


Fig.3

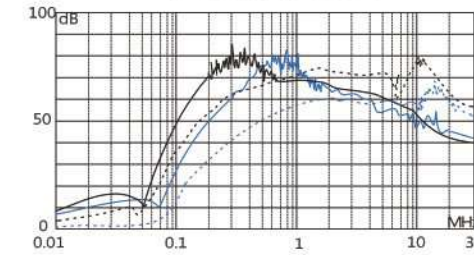
Insertion loss(dB)



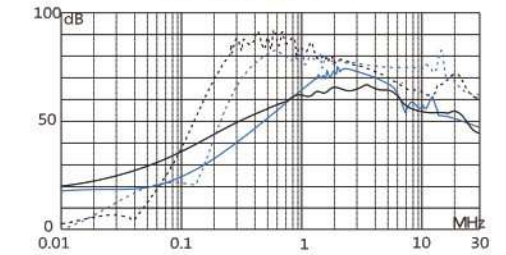
EFP104-0.5 EFP104-1



EFP104-3 EFP104-6



EFP204-1 EFP204-3



EFP200-1 EFP200-3

Dimensions(mm)

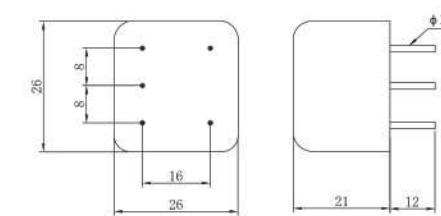


Fig.1

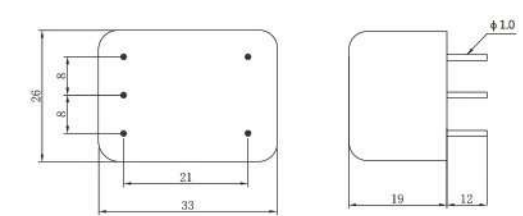


Fig.2

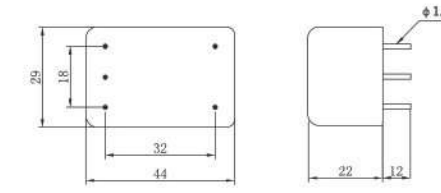



Fig.3

PCB Series Filters

EFPD104/EFPD204/EFPD200 Series

- DC filters with good performance of suppressing noise interference on line to line and line to ground
- Plastic or metal cover, specially designed for PCB
- Small size, compact structure, easy to install and cost-effective
- Suitable for DC miniature electronic equipments
- Safety approval: 



RoHS

Technical data

Rated Voltage	24VDC~250VDC	Rated Current@40°C	0.5A~6A
Operating Frequency	DC	Climatic Category	25/085/21

Filter Selection Table

Part No.	Rated current @40°C	Dimension	Electrical schematics	Termination
EFPD104-0.5	0.5A	Fig.1	Fig.1	
EFPD104-1	1A	Fig.1	Fig.1	
EFPD104-3	3A	Fig.1	Fig.1	
EFPD104-6	6A	Fig.1	Fig.1	
EFPD204-1	1A	Fig.2	Fig.2	
EFPD204-3	3A	Fig.2	Fig.2	
EFPD200-1	1A	Fig.3	Fig.3	
EFPD200-3	3A	Fig.3	Fig.3	

Diagrams

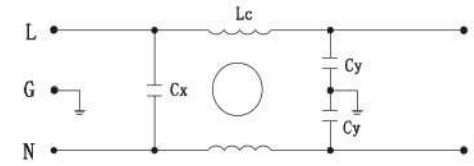


Fig.1

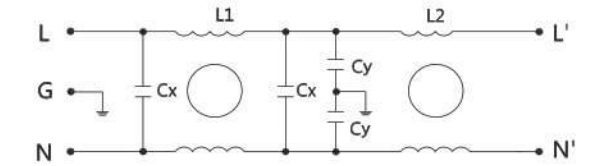


Fig.2

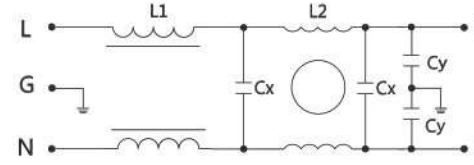
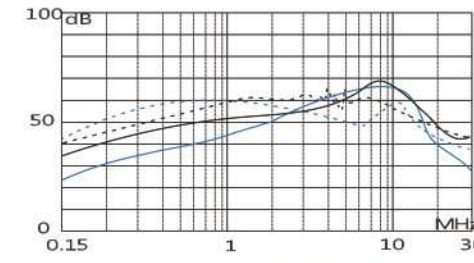
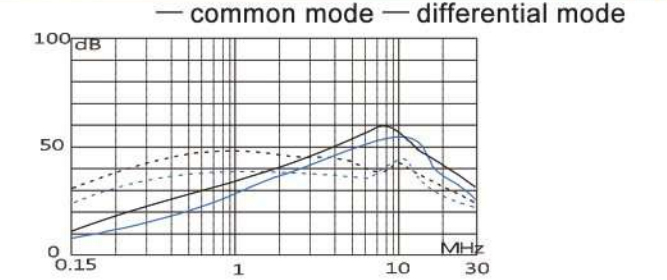


Fig.3

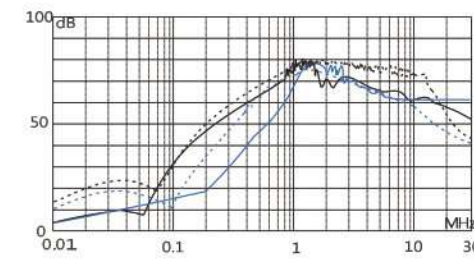
Insertion loss(dB)



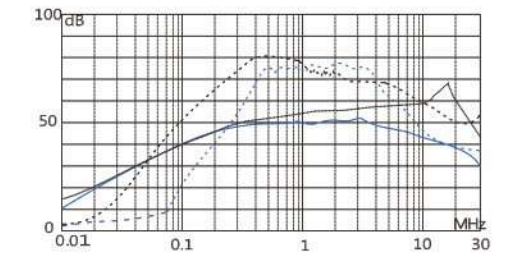
EFPD104-0.5 EFPD104-1



EFPD104-3 EFPD104-6



EFPD204-1 EFPD204-3



EFPD200-1 EFPD200-3

Dimensions(mm)

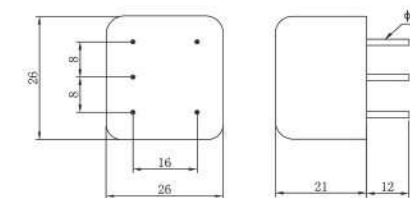


Fig.1

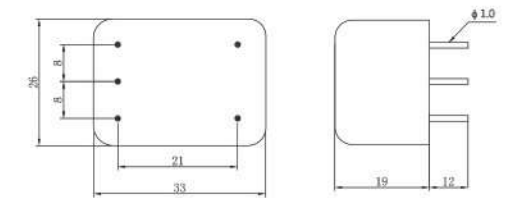


Fig.2

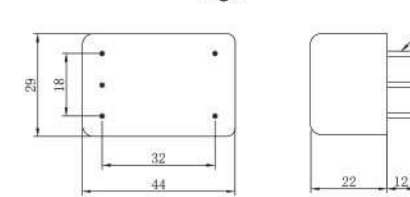



Fig.3

Household Series Filters

EFAH106/EFAH107/EFAH108 Series

- Low leakage current, good attenuation effect, high security and reliability
- Plastic cover, easy to install
- Specially designed for household appliances, highly cost-effective
- Safety approval: 









ROHS

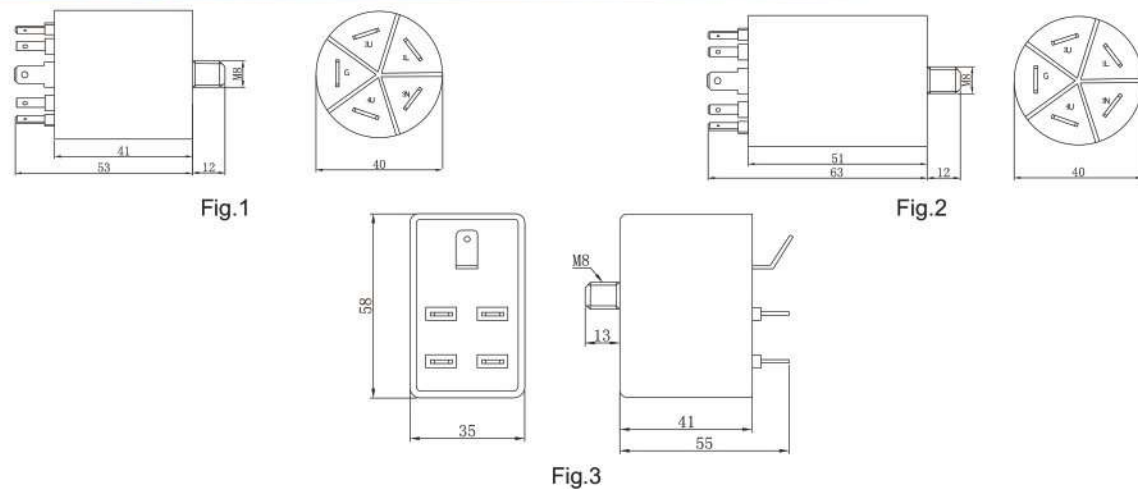
Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	6A~16A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current@40°C	Leakage current 250VAC/50Hz	Dimension	Termination
EFAH106-6	6A	<0.5mA	Fig.1	
EFAH106-10	10A	<0.5mA	Fig.1	
EFAH107-10	10A	<1.0mA	Fig.2	
EFAH107-16	16A	<1.0mA	Fig.2	
EFAH108-10	10A	<0.5mA	Fig.3	
EFAH108-16	16A	<0.5mA	Fig.3	

Dimensions(mm)



Household Series Filters

EFAH109 Series

- Well eliminate the interference from common mode and differential mode
- Sealed by plastic case outside and epoxy resin inside
- Low current leakage, can be adapted to the harsh environment






ROHS

Technical data

Rated Voltage	110/250VAC		Rated Current@40°C	10A~16A
Test Voltage	line-line	1500VDC	Climatic Category	25/085/21
	line-ground	1500VAC	Operating Frequency	50/60Hz

Filter Selection Table

Part No.	Rated current@40°C	Leakage current 250VAC/50Hz	Dimension	Termination
EFAH109-10	10A	<0.5mA	Fig.1	
EFAH109-15	15A	<1.0mA	Fig.1	
EFAH109-16	16A	<1.0mA	Fig.1	

Dimensions(mm)

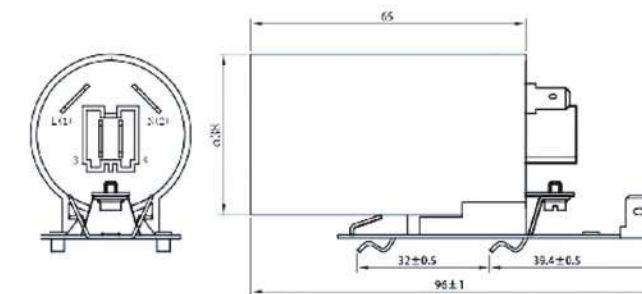


Fig.1

● EMI Suppression Component

EFSC Series

- Effectively absorb high-frequency clutter, very high resistivity and magnetic conductivity
- Equivalent to inductor and resistor in series connection
- Suitable for all kinds of signal cables and power cables

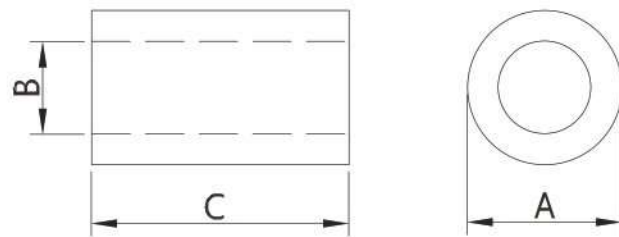


RoHS

Filter Selection Table

Product	Part No.	Dimension(mm)				Resistance (Ω)	
		A	B	C	D	25MHz	100MHz
EMI ferrite core	EFSC-10	3.5±0.2	1.3±0.1	3.0±0.3	/	20	30
	EFSC-11	4.0±0.2	2.0±0.2	3.0±0.3	/	12	20
	EFSC-12	5.0±0.2	2.4±0.2	6.35±0.3	/	16	30
	EFSC-13	6.0±0.3	3.0±0.2	3.0±0.3	/	12	30
	EFSC-40	7.8±0.2	4.2±0.2	13.0±0.2	/	56	100
	EFSC-41	10.3±0.3	5.8±0.2	10.2±0.3	/	44	61
	EFSC-42	14.2±0.3	6.35±0.2	28.5±0.5	/	150	220
	EFSC-43	16.0±0.5	4.3±0.2	17.5±0.8	/	120	220
	EFSC-44	16.0±0.4	9.0±0.3	4.0±0.3	/	16	36
	EFSC-45	17.5±0.3	9.5±0.3	28.0±0.5	/	96	150
	EFSC-46	20.5±0.4	10.3±0.3	10.0±0.5	/	40	70
	EFSC-90	25.0±0.5	15.0±0.4	12.0±0.4	/	37	70
	EFSC-91	26.0±0.5	12.8±0.4	28.5±0.5	/	450	600

Dimensions(mm)



EMI ferrite core

● EMI/EMC Filters

Customized Series Filters

- Customized case for both metal or plastic case
- Combination with different terminal
- Specially designed according to the requirements of customers

