

Compact EMI/RFI Filter for Motor drives Application

Feature and Benefits

- High performance filter for mainly industrial motor drive applications with significant interference levels
- Attenuation performance for Class B compliance in applications comprising multiple motor drives (e.g. machine tool with up to 8 driving axes with ~10 to 20 m motor cable each)
- Broadband filter performance with low frequency attenuation down to 10 kHz for reliable suppression of conducted interference
- Slim book-style shape requiring minimum cabinet space and allowing convenient installation right beside the motor drive
- Touch-safe terminal blocks provide unsurpassed electrical safety and contacting cross section according to EN 60204-1 installation standard



Technical specifications

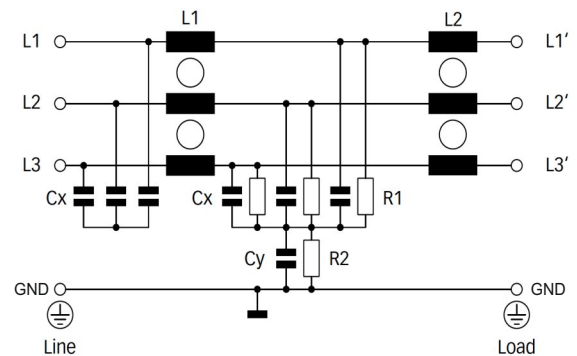
Maximum continuous operating voltage	3x520/300 VAC, 50/60Hz
Operating Frequency	50/60Hz
Rated Currents	35 to 300A @50°C
High Potential Test voltage	L-GND 2250 VDC for 2 sec L - L 1150 VDC for 2 sec
Temperature range (operation and storage)	-25°C to +100°C (25/100/21)
Certified to	UL 1283, EC/EN60939 (Applies to AC and DC Applications)
Flammability Corresponding to	UL 94V-2 better
Protection Category	IP 20, Ip00
Overload Capability	1.5x Rated Current for 60 sec, once/hour

- New solid safety connector blocks available for the whole range
- Exceptional attenuation performance from 10 kHz to 30 MHz
- Excellent saturation resistance up to 30 m cable length
- Most compact and slim filter design in fit with class C1 & C2 limit

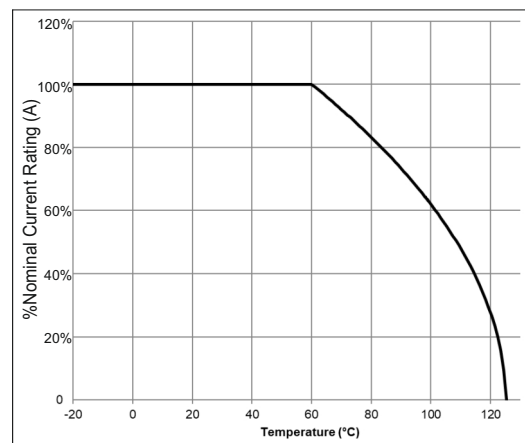
Typical Application

- Three-phase variable speed motor drives, servo drives, inverters and converters
- Converter for renewable energy generation like machines or process automation equipment
- HVAC equipment, elevators, power supplies, UPS and further three-phase applications
- Thyristor Drive, Elevators & Cranes



ELECTRICAL SCHEMATIC



Temperature Derating Curve for EMC Filters Rated at 50°C Ambient and 100°C Maximum



FILTER SELECTION TABLE

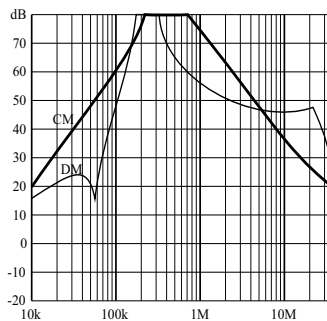
Filters**	Rated current @50°C (40°C)	Leakage current @480VAC/50Hz	Typical drive Power Rating	Power Loss @25°C/50Hz	Connction type Input/Output	Weight
	A	mA	kW	W	 	Kg
BL330-35-T	35 (38.4)	6.8	22	11.8	T	2.50
BL330-50-T	50 (54.8)	9.3	30	18	T	3.50
BL330-80-T	80 (87)	10	45	25.9	T	5.00
BL330-110-T	110 (120)	10	55	32.7	T	5.50
BL330-150-T	150 (164)	10	75	50	T	8.50
BL330-200-T	200 (219)	10	110	67.2	T	9.10
BL330-250-B	250 (250)	10	132	37	B	9.25
BL330-300-B	300 (320)	10	160	54	B	12.00

* Calculated at rated current, 440 VAC (BL330)/480 VAC (BL330) and cos phi=0.8. The exact value depends upon the efficiency of the drive, the motor and the entire application.

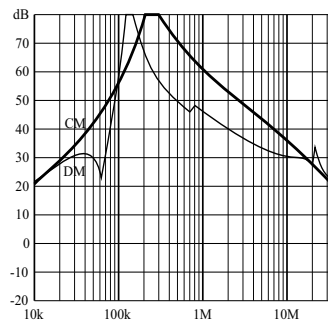
** Standardized calculated leakage current acc. IEC60939 under normal operating conditions (BL330 at 480 VAC).

TYPICAL INSERTION LOSS, dB (50/50 Ohm)

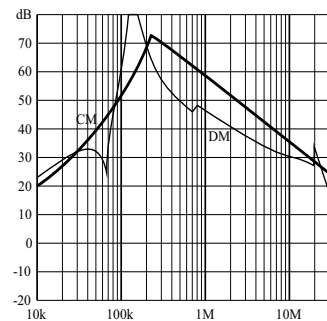
35 to 80 A types



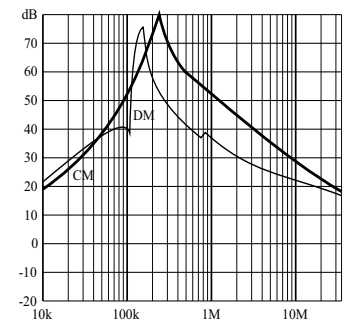
110 and 150 A types



200 A types

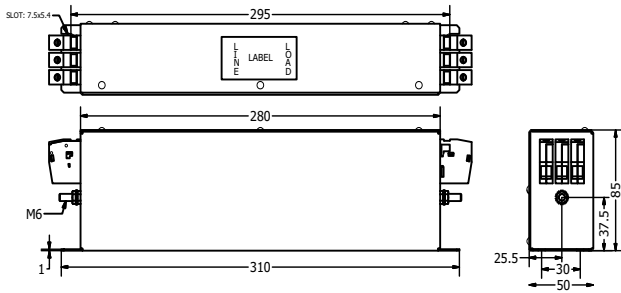


250 and 300 A types

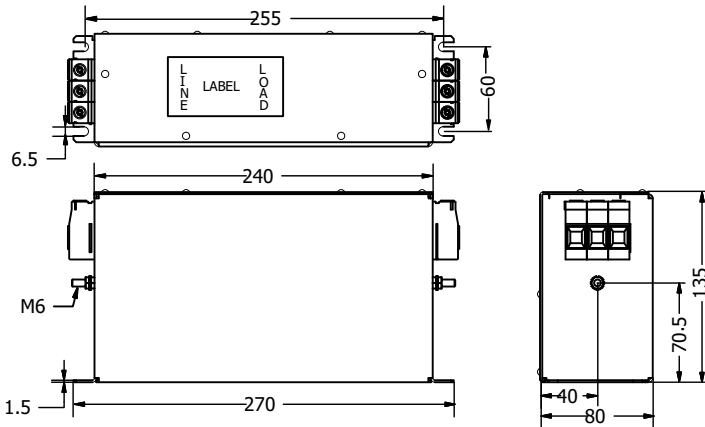


MECHANICAL DETAILS

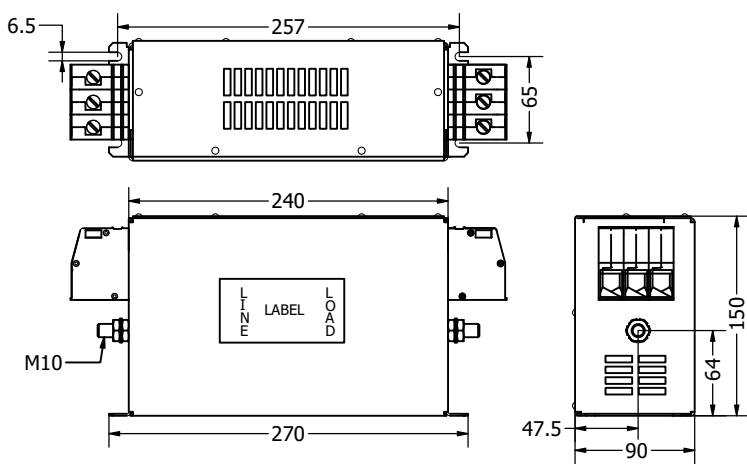
35 Amp Terminal block (10mm²)



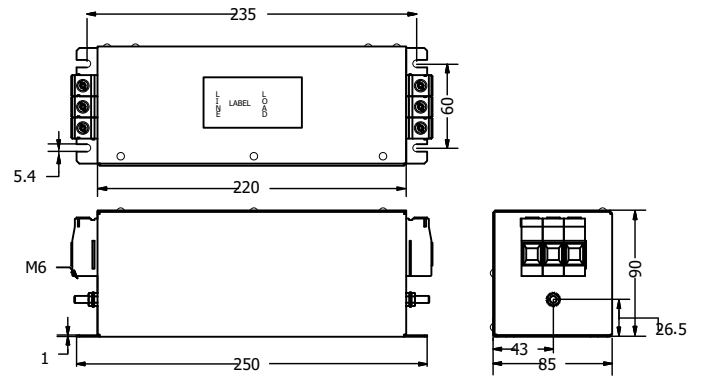
80 Amp Terminal block (25mm²)



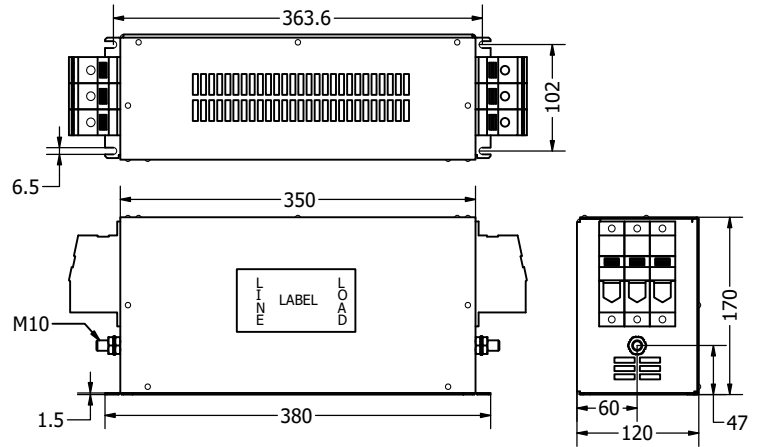
110Amp Terminal block (50mm)



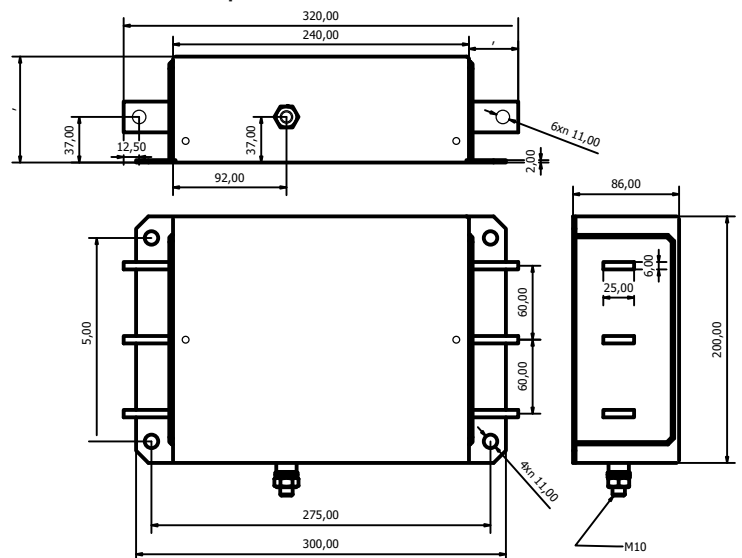
50 Amp Terminal block (25mm²)



150 & 200Amp Terminal block (95mm²)



250 & 300Amp Bus bar Terminal



**All Dimension are in mm