



## APPLICATION GUIDE

Enerdoor parallel filter series includes three phase and three phase plus neutral products designed to work in a frequency range between 50 kHz to 10 MHz. This series significantly reduces radio frequency interference to below the European Standard limit of 150 kHz.

The FIN130SP and 230SP filters have a resonance frequency of 150 kHz and provide a significant interference reduction in the frequency range of 50 kHz to 5 MHz.

The FIN730, 735 and 740 filters reduce interference in the frequency range of 30 kHz to 10 MHz.

This series offers terminal block connections with screw and DIN rail mounting installation.

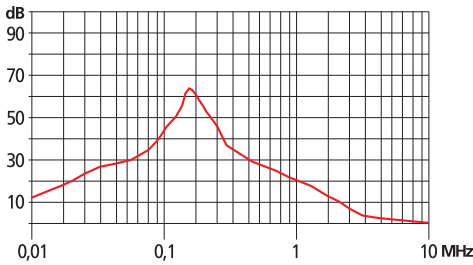
## ELECTRIC CHARACTERISTICS

Capacitor dielectric	<b>Film polypropylene</b>
Capacitor electrodes	<b>Vacuum deposited aluminium layers</b>
Capacitor construction	<b>Extended double side metallized carrier film with internal series connection and metallized film</b>
Resistor construction	<b>Metallic layer</b>
Coating	<b>Solvent resistant (UL94 V-I) plastic case with flame retardant (UL94 V-0) epoxy resin sealing</b>
Standard reference	<b>IEC 68</b>
Resistance power	<b>3 W</b>
Voltage category	<b>Nominal voltage at 85° C</b>
Max repetitive pulse rise time	<b>650 V/μs</b>
Max non repetitive pulse rise time	<b>1000 V/μs</b>
Capacitor dissipation factor	<b>&lt;5x10<sup>-4</sup> measured at 1 kHz / 25±5°C</b>
Insulation resistance	<b>&gt;30 GΩ between terminals after 1 minute of energisation at 100 V / 25 ± 5°C</b>
Climatic class	<b>- 40 / +85 °C</b>

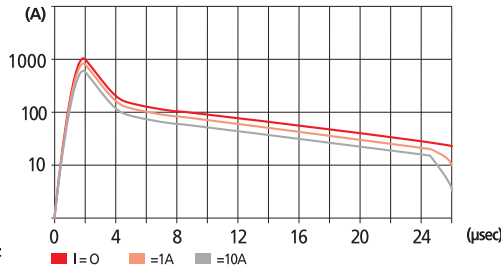
FIN130SP	Nominal Voltage 50/60 Hz	Nominal Voltage	Phase to Ground Test Voltage	Phase to Phase Test Voltage	C1 Rated Capacitance	Rated Resistance
.001.M	600 V <sub>AC</sub>	1000 V <sub>DC</sub>	3200 V <sub>DC</sub>	2400 V <sub>DC</sub>	7 $\mu$ F $\pm$ 10% at 1kHz	3.3M $\Omega$ $\pm$ 20% at 1kHz
Leakage current for phase at 230 V phase to ground 50 Hz / 40°C						< 25mA



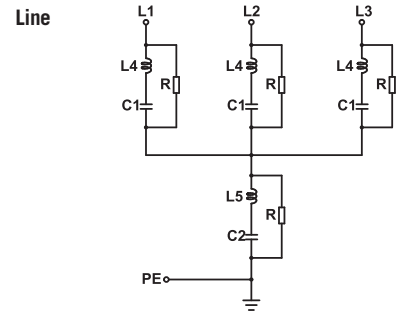
### RESONANCE CIRCUIT RESPONSE



### RESPONSE TO CURRENT PULSE



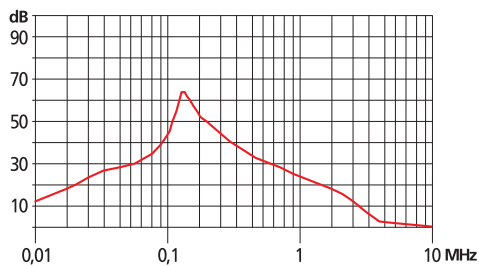
### ELECTRIC DIAGRAM



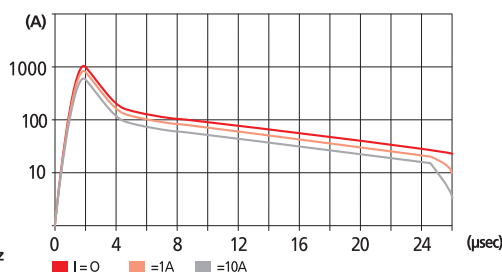
FIN230SP	Nominal Voltage 50/60 Hz	Nominal Voltage	Phase to Ground Test Voltage	Phase to Phase Test Voltage	C1 Rated Capacitance	Rated Resistance
.001.M	600 V <sub>AC</sub>	1000 V <sub>DC</sub>	3200 V <sub>DC</sub>	2400 V <sub>DC</sub>	10 $\mu$ F $\pm$ 10% at 1kHz	3.3M $\Omega$ $\pm$ 20% at 1kHz
Leakage current for phase at 230 V phase to ground 50 Hz / 40°C						< 25mA



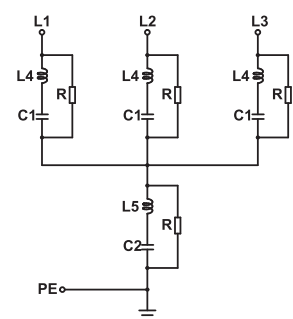
### RESONANCE CIRCUIT RESPONSE



### RESPONSE TO CURRENT PULSE



### ELECTRIC DIAGRAM

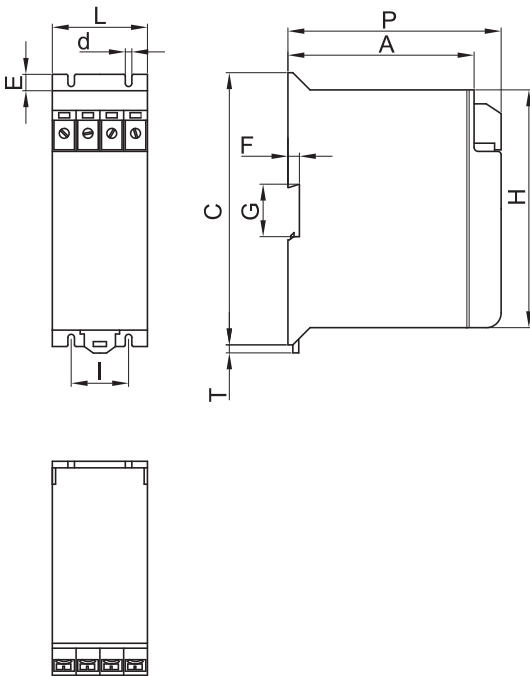


**MECHANICAL DIMENSIONS (mm)**

Model	L	d	E	I	P	A	C	T	G	F	H	Weight Kg	Case
FIN130SP.001.M	59	4.5	10	35	130	112	166	4	37.5	7	146	1.15	1
FIN230SP.001.M	59	4.5	10	35	130	112	166	4	37.5	7	146	1.15	1
FIN730.001.M	59	4.5	10	35	130	112	166	4	37.5	7	146	1	1
FIN730.002.MC	59	4.5	10	35	130	112	166	4	37.5	7	146	1	1
FIN730.001.MLCP	59	4.5	10	35	130	112	166	4	37.5	7	146	1	1
FIN735.001.M	59	4.5	10	35	130	112	166	4	37.5	7	146	1	1
FIN740.068.M	59	4.5	10	35	130	112	166	4	37.5	7	146	1	2

**CONNECTION**

Rigid Cable (mm <sup>2</sup> )	Flexible Cable (mm <sup>2</sup> )	Torque (Nm)
1 - 4	1 - 4	1.8
1 - 4	1 - 4	1.8
1 - 4	1 - 4	1.8
1 - 4	1 - 4	1.8
1 - 4	1 - 4	1.8
1 - 4	1 - 4	1.8

**CASE 1**

**CASE 2**
