PZB300

• Delta EMI suppressor, classes X2 and Y2, metallized paper
• 0.1 and 0.15 µF X2, 2200, 3300 and 4700 pF Y2, 275 VAC, +100 °C

RoHS Compliant

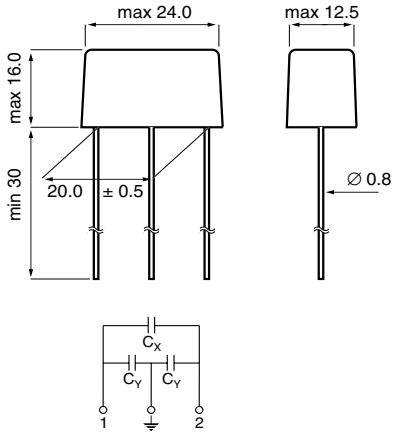
- Class X2 and Y2
- Compact size
- Excellent self-healing properties. Ensures long life even when subjected to frequent overvoltages.
- The impregnated paper ensures excellent stability giving oustanding reliability properties, especially in applications having continuous operation.
- Self-extinguishing encapsulation.
- High dU/dt capability.
- Good resistance to ionisation due to impregnated dielectric material.

TYPICAL APPLICATIONS

Interference suppressors with X2 + 2 x Y2 capacitors in a delta configuration.

CONSTRUCTION

Multi-layer metallized paper. Encapsulated and impregnated in self-extinguishing material meeting the requirements of UL 94V-0.



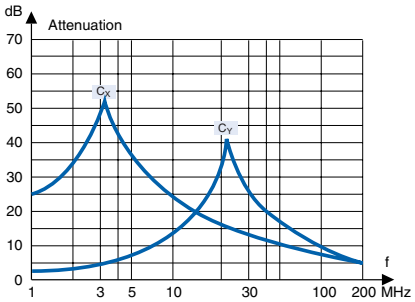
TECHNICAL DATA

Rated voltage	275 VAC 50/60 Hz
Capacitance X value, µF	0.1 and 0.15
Capacitance Y value, pF	2200, 3300 and 4700
Capacitance tolerance	± 20%
Temperature range	–40 to +100°C
Climatic category IEC	40/100/56/B
Approvals	ENEC, UL, CSA
Dissipation factor tanδ	≤ 1.3 % at 1 kHz
Insulation resistance	≥ 12000 MΩ Measured at 500 VDC after 60 s, +23°C
Test voltage between terminals	The 100% screening factory test is carried out at 2150 VDC for X2 capacitors and at 3000 VDC for Y2 capacitors. The voltage level is selected to meet the requirements in applicable equipment standards. All electrical characteristics are checked after the test.

ENVIRONMENTAL TEST DATA

Vibration	IEC 60068-2-6 Test Fc	3 directions at 2 hour each 10 – 500 Hz at 0.75 mm or 98 m/s² (PZB300MC.. mounted on PC-board)	No visible damage No open or short circuit
Bump	IEC 60068-2-29 Test Eb	4000 bumps at 390 m/s²	No visible damage No open or short circuit
Solderability	IEC 60068-2-20 Test Ta	Solder globule method	Wetting time < 1 s
Active flammability	EN/IEC 60384-14:2005		
Passive flammability	EN/IEC 60384-14:2005		
Humidity	IEC 60068-2-3 Test Ca	+40°C and 90 – 95% R.H.	56 days

Suppression vs. frequency



Attenuation, typical values, 0.1 µF + 2 x 2200 pF

ARTICLE TABLE

Capacitance C_X µF	Capacitance C_Y pF	Max dimensions in mm B	H	L	p	Quantity per package R30 pcs	R06 pcs	Weight g	Max dU/dt V/µs C_X	C_Y	Article code
0.10	2200	12.5	16.0	24.0	20.0	150	1000	7.5	600	1000	PZB300MC11R30
0.10	3300	12.5	16.0	24.0	20.0	150	1000	7.5	600	1000	PZB300MC12R30
0.10	4700	12.5	16.0	24.0	20.0	150	1000	7.5	600	1000	PZB300MC13R30
0.15	2200	12.5	16.0	24.0	20.0	150	1000	7.5	600	1000	PZB300MC21R30
0.15	3300	12.5	16.0	24.0	20.0	150	1000	7.5	600	1000	PZB300MC22R30
0.15	4700	12.5	16.0	24.0	20.0	150	1000	7.5	600	1000	PZB300MC23R30

APPROVALS

Certification Body	Specification
ENEC	EN/IEC 60384-14:2005
UL	UL 1283
CSA	C 22.2 No. 8

MARKING

- RIFA
- RIFA article code
- Rated capacitance (X and Y)
- Rated voltage
- X2 and Y2
- SH, for self healing
- Climatic category according to IEC 60068-1, appendix A
- Passive flammability class
- Approval marks
- Circuit diagram
- Manufacturing code (year, month)

ORDERING INFORMATION

The article code for the standard part is given in the article table.
For other options, see page 11.