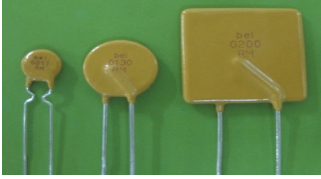


OZRMD0708



Applications

Line Voltage Power Supply, Transformer and Appliances Product

Product Features

Continuous Use at Voltages up to 120VAC/VDC

Operation Current

100mA~3.75A

Maximum Operating Voltage

120VAC/VDC

Maximum Interrupt Voltage

135VAC/DC

Temperature Range

-40°C to 85°C

Agency Recognition

TUV (Std. EN60738-1, Cert. R50131685)

UL Component (Std. UL1434, File E305051)

UL Conditions of Acceptability:

1. These devices have been investigated for use in safety circuits and are suitable as a limiting device.

Product Dimensions (Millimeter)

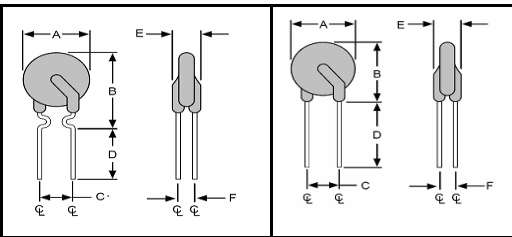


Fig 1.

Lead Size :24AWG
Φ 0.51 mm Diameter

Fig 3.

Lead Size :20AWG
Φ 0.81 mm Diameter

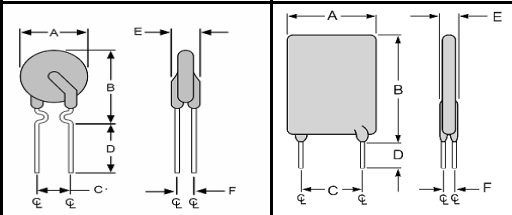


Fig 2.

Lead Size :22AWG
Φ 0.65 mm Diameter

Fig 4.

Lead Size :20AWG
Φ 0.81 mm Diameter

Part Number	Figure	A		B		C		D		E		F	
		Max	Typical	Max	Typical	Min	Max	Typical	Min	Max	Typical	Min	Max
OZRM0010FF	1	7.9	13	5.1	7.6	3.8	2.2						
OZRM0017FF	1	7.9	13	5.1	7.6	3.8	2.2						
OZRM0020FF	2	7.9	13	5.1	7.6	3.8	2.2						
OZRM0025FF	2	7.9	13	5.1	7.6	3.8	2.2						
OZRM0030FF	2	7.9	13	5.1	7.6	3.8	2.2						
OZRM0040FF	2	8.2	14.2	5.1	7.6	3.8	2.2						
OZRM0050FF	2	9.2	14.9	5.1	7.6	3.8	2.2						
OZRM0065FF	2	9.7	14.9	5.1	7.6	3.8	2.2						
OZRM0075FF	2	10.6	15.5	5.1	7.6	3.8	2.2						
OZRM0075AF	4	10.9	17	5.1	7.6	4.1	2.2						
OZRM0090FF	2	11.9	15.9	5.1	7.6	3.8	2.2						
OZRM0100FF	4	11.5	20.1	5.1	7.6	4.1	2.2						
OZRM0110FF	3	13.3	18.3	5.1	7.6	4.1	2.2						
OZRM0125FF	4	14	21.7	5.1	7.6	4.1	2.2						
OZRM0130FF	3	15.5	20.6	5.1	7.6	4.1	2.2						
OZRM0135AF	4	16.3	21.7	5.1	7.6	4.1	2.2						
OZRM0160FF	3	17.5	22.5	5.1	7.6	4.1	2.2						
OZRM0185FF	3	19.9	24.9	5.1	7.6	4.1	2.2						
OZRM0200FF	4	23.5	27.9	10.2	7.6	4.1	2.2						
OZRM0250FF	3	22.5	27.5	10.2	7.6	4.1	2.2						
OZRM0300FF	3	25.5	30	10.2	7.6	4.1	2.2						
OZRM0375FF	3	29.5	34	10.2	7.6	4.1	2.2						

Electrical Characteristic (23°C)

	Part Number (Bulk Package)	Hold Current	Trip Current	Max Time to Trip @ 5xIH	Max Current	Rated Voltage	Typical Power	Resistance Tolerance		
		I _H , A	I _T , A	Seconds	I _{max} , A	V _{max} , Vac/dc	P _d , W	R _{min}	R _{max}	R _{1max}
		Ohms	Ohms	Ohms						
A	OZRM0010FF1E	0.10	0.20	10.0	2	120	0.84	3.00	5.00	7.50
B	OZRM0017FF1E	0.17	0.34	10.0	2	120	0.84	2.00	3.50	7.00
C	OZRM0020FF1E	0.20	0.40	9.0	2	120	1.08	1.83	3.12	4.40
D	OZRM0025FF1E	0.25	0.50	7.5	3	120	1.08	1.25	2.13	3.00
E	OZRM0030FF1E	0.30	0.60	8.5	3	120	1.44	0.88	1.47	2.10
F	OZRM0040FF1E	0.40	0.80	6.5	3	120	1.44	0.55	0.95	1.29
G	OZRM0050FF1E	0.50	1.00	6.0	3	120	1.56	0.50	0.85	1.17
H	OZRM0065FF1E	0.65	1.30	5.7	5	120	1.68	0.31	0.53	0.72
I	OZRM0075FF1E	0.75	1.50	6.3	5	120	1.80	0.25	0.44	0.60
J	OZRM0075AF1E	0.75	1.50	15.0	7.5	120	2.64	0.25	0.39	0.69
K	OZRM0090FF1E	0.90	1.80	7.2	5	120	1.80	0.20	0.31	0.47
L	OZRM0100FF1E	1.00	2.00	15.0	10	120	2.64	0.18	0.27	0.47
M	OZRM0110FF1E	1.10	2.20	8.2	8	120	2.28	0.15	0.28	0.38
N	OZRM0125FF1A	1.25	2.50	20.0	12.5	120	2.88	0.11	0.18	0.33
O	OZRM0135FF1A	1.35	2.70	9.6	10	120	2.64	0.12	0.21	0.30
P	OZRM0135AF1A	1.35	2.70	20.0	13.5	120	3.12	0.11	0.17	0.30
Q	OZRM0160FF1A	1.60	3.20	11.4	12	120	3.12	0.09	0.16	0.22
R	OZRM0185FF1A	1.85	3.70	12.6	12	120	3.36	0.08	0.13	0.19
S	OZRM0200FF1A	2.00	4.20	36.0	20	120	4.32	0.08	0.12	0.21
T	OZRM0250FF1A	2.50	5.00	15.6	15	120	4.44	0.05	0.08	0.13
U	OZRM0300FF1A	3.00	6.00	19.8	17	120	4.56	0.04	0.07	0.10
V	OZRM0375FF1A	3.75	7.50	24.0	20	120	4.80	0.03	0.05	0.08

- I_H Hold current-maximum current at which the device will not trip at 23°C still air.
- I_T Trip current-minimum current at which the device will always trip at 23°C still air.
- I_{max} Maximum fault current device can withstand without damage at rated voltage (V max).
- V_{max} Maximum voltage device can withstand without damage at its rated current.
- P_d Typical power dissipated from device when in tripped state in 23°C still air environment.
- R_{min} Minimum device resistance at 23°C.
- R_{1max} Maximum device resistance at 23°C, 1 hour after tripping.

Physical Specifications:

Lead material:

- OZRM0010FF~OZRM0017FF Matte tin plated copper, 24 AWG.
- OZRM0020FF~OZRM0090FF Matte tin plated copper, 22 AWG.
- OZRM0075FF~OZRM0375FF Matte tin plated copper, 20 AWG.

Soldering characteristics:

MIL-STD-202, Method 208E.

Insulating coating:

Flame retardant epoxy, meets UL-94V-0 requirement.

PTC Marking

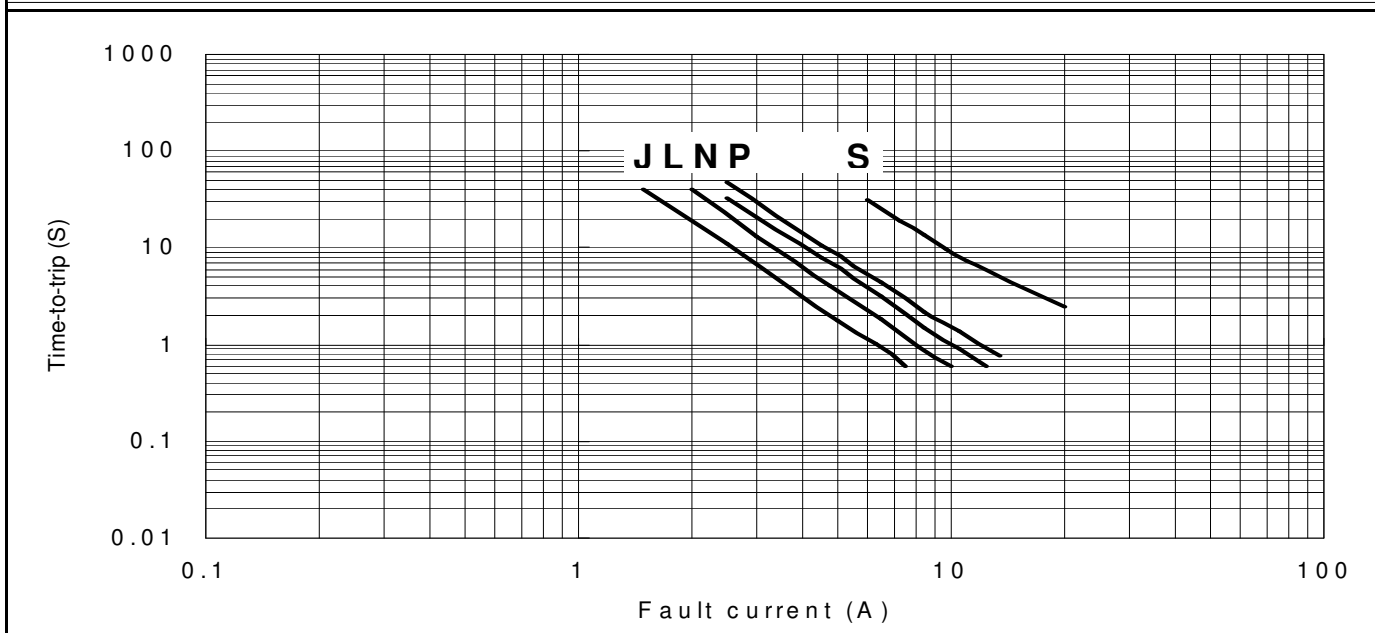
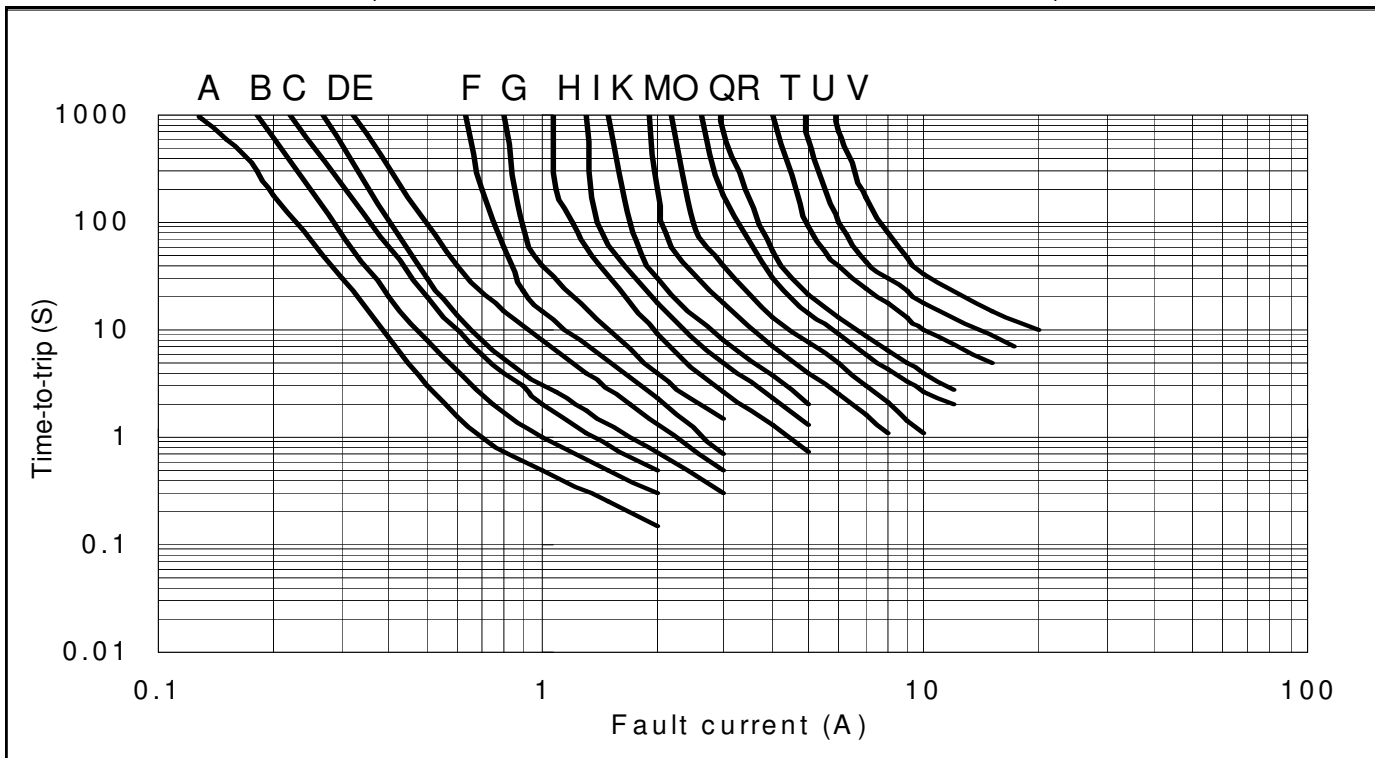
" bel " or " b ". I_H code and " RM ".

Standard Package

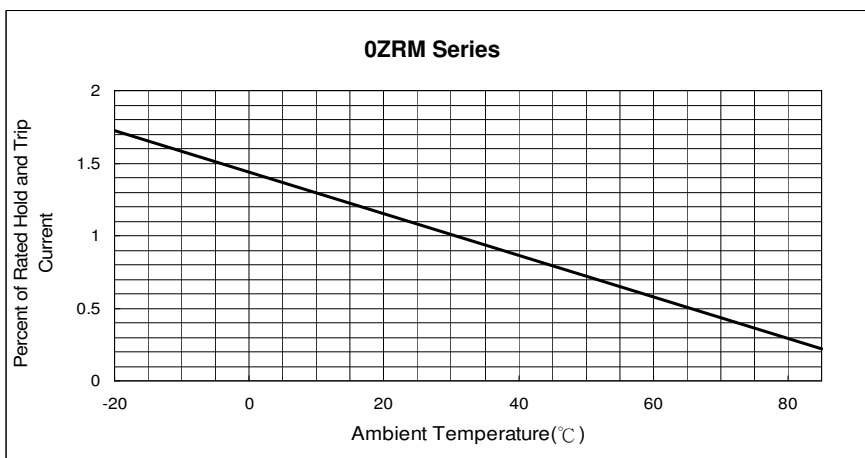
Part Number	Bulk		Reel / Tape	
	Pcs/Box	P/N code	Pcs/Reel	P/N code
OZRM0010FF~OZRM0050FF	3000	1E	2000	2C
OZRM0065FF~OZRM0110FF	3000	1E	1500	2B
OZRM0125FF~OZRM0185FF	1000	1A	n/a	n/a
OZRM0200FF~OZRM0375FF	1000	1A	n/a	n/a

Typical Time-To-Trip at 23 °C

(See Elec.Characteristics Table for P/N - Curve Correlation)



Thermal Derating Curve



Cautionary Notes:

Each product should be carefully evaluated and tested for their suitability of application.

1. Operation beyond the specified maximum rating or improper use may result in damage and possible electrical arcing and/or flame.
2. PPTC device are intended for occasional overcurrent protection. Application for repeated overcurrent condition and/or prolonged trip are not anticipated.
3. Avoid contact of PPTC device with chemical solvent, including some inert material such as silicone based oil, lubricant and etc. Prolonged contact will damage the device performance.
4. Additional protection mechanism are strongly recommended to be used in conjunction with the PPTC device for protection against abnormal or failure conditions.
5. Avoid use of PPTC device in a constrained space such as potting material, housing and containers where have limited space to accommodate device thermal expansion and/or contraction.