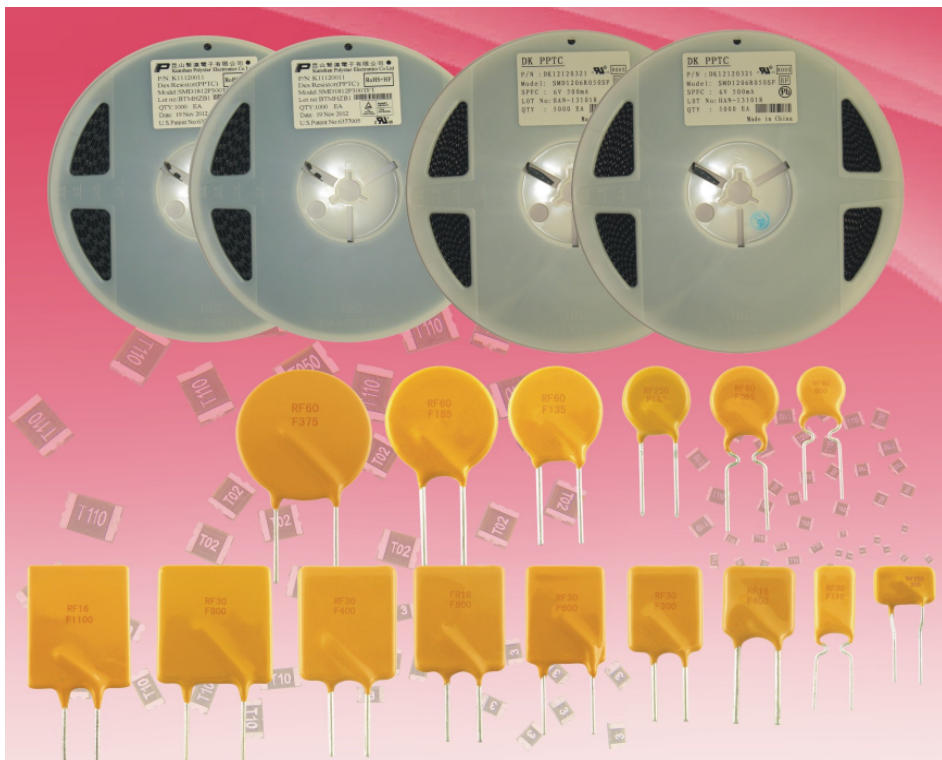


72R HF 系列 PTC产品

72R HF Series PTC Devices



优良品质 · 诚信经营

一起携手 · 共创辉煌

电气特性
Performance Specification

Model	V _{max} (V _{dc})	I _{max} (A)	I _{hold} (A)	I _{trip} (A)	Pd Typ. (w)	Maximum Time To Trip		Resistance		
						Current (A)	Time (Sec)	Ri min (Ω)	Ri max (Ω)	R1 max (Ω)
72R005	72/90	40	0.05	0.10	0.30	0.25	8.0	10.0	25.0	50.0
72R010	72/90	40	0.10	0.20	0.38	0.50	8.0	3.30	7.50	12.5
72R017	72/90	40	0.17	0.34	0.48	0.85	5.0	1.40	3.20	5.50
72R020	72/90	40	0.20	0.40	0.52	1.00	4.5	1.20	2.75	4.40
72R025	72/90	40	0.25	0.50	0.52	1.25	3.6	0.88	1.95	3.00
72R030	72/90	40	0.30	0.60	0.59	1.50	3.0	0.70	1.33	2.10
72R040	72/90	40	0.40	0.80	0.66	2.00	5.0	0.47	0.86	1.50
72R050	72/90	40	0.50	1.00	0.77	2.50	4.5	0.40	0.77	1.20
72R065	72/90	40	0.65	1.30	0.88	3.25	5.3	0.25	0.48	0.72
72R075	72/90	40	0.75	1.50	0.95	3.75	6.3	0.20	0.42	0.63
72R090	72/90	40	0.90	1.80	0.99	4.50	7.2	0.17	0.38	0.55
72R110	72/90	40	1.10	2.20	1.50	5.50	8.2	0.14	0.26	0.39
72R135	72/90	40	1.35	2.70	1.70	6.75	9.6	0.11	0.195	0.31
72R160	72/90	40	1.60	3.20	1.90	8.00	11.4	0.08	0.145	0.22
72R185	72/90	40	1.85	3.70	2.10	9.25	12.6	0.07	0.13	0.195
72R250	72/90	40	2.50	5.00	2.50	12.50	15.6	0.045	0.08	0.13
72R300	72/90	40	3.00	6.00	2.80	15.00	19.8	0.04	0.06	0.10
72R375	72/90	40	3.75	7.50	3.20	18.75	24.0	0.03	0.05	0.08

V_{max} = Maximum operating voltage device can withstand without damage at rated current (I_{max}).

I_{max} = Maximum fault current device can withstand without damage at rated voltage (V_{max}).

I_{hold} = Hold Current. Maximum current device will not trip in 25°C still air.

I_{trip} = Trip Current. Minimum current at which the device will always trip in 25°C still air.

Pd = Power dissipation when device is in the tripped state in 25°C still air environment at rated voltage.

Ri min/max = Minimum/Maximum device resistance prior to tripping at 25°C.

R1max = Maximum device resistance is measured one hour post reflow.




CAUTION: Operation beyond the specified ratings may result in damage and possible arcing and flame.

环境规范
Environmental Specifications

Test	Conditions	Resistance change
Passive aging	+85°C, 1000 hrs.	±5% typical
Humidity aging	+85°C, 85% R.H. , 168 hours	±5% typical
Thermal shock	+85°C to -40°C, 20 times	±33% typical
Resistance to solvent	MIL-STD-202, Method 215	No change
Vibration	MIL-STD-202, Method 201	No change
Ambient operating conditions: -40°C ~+85°C		
Maximum surface temperature of the device in the tripped state is 125°C		

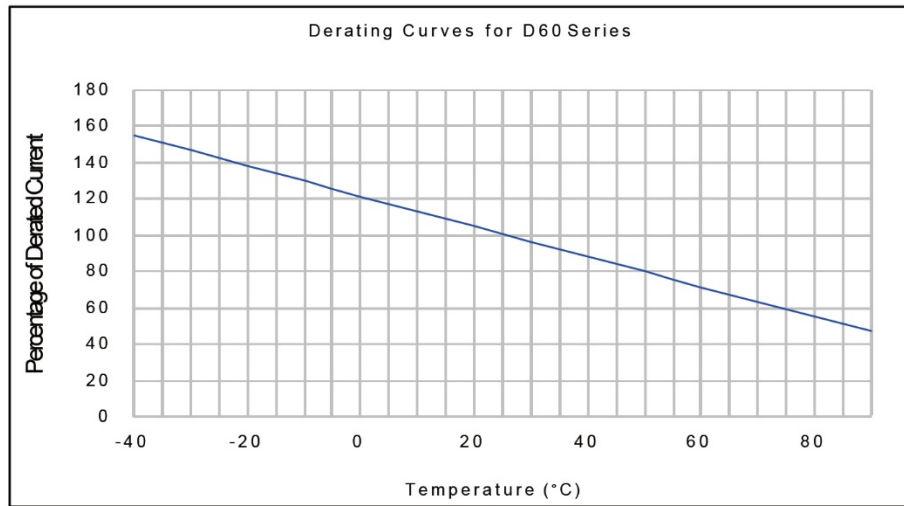
安规认证及环保检测

Agency Approval and Environmental Compliance

Agency	File Number	Regulation	Standard
UL	pending	 	2002/95/EC
TUV	pending		EN14582

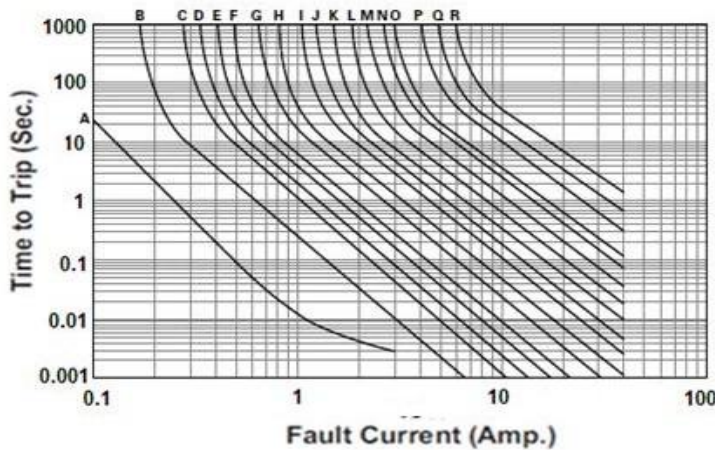
环境温度与工作电流关系特性图

Thermal Derating Curve



在 25°C 跳闸保护时间曲线表

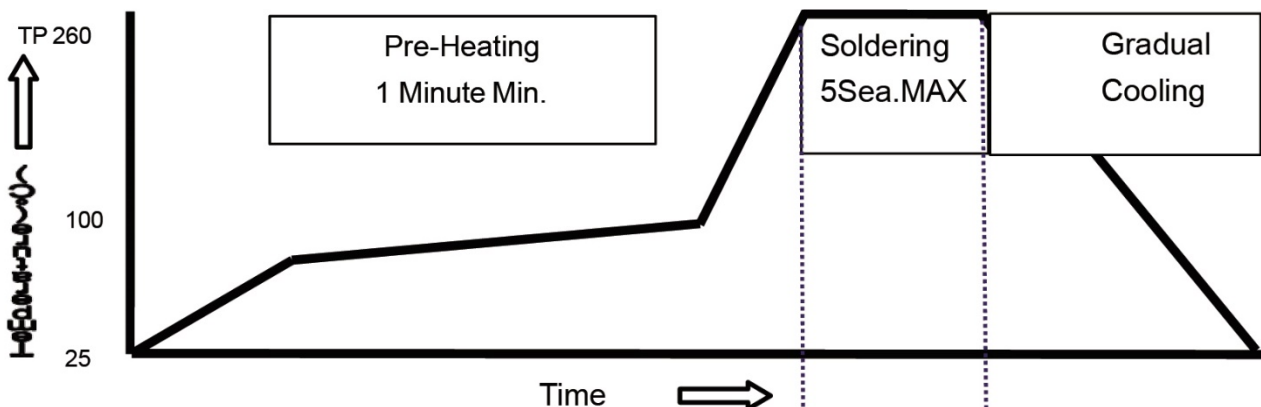
Average Time-Current Curve



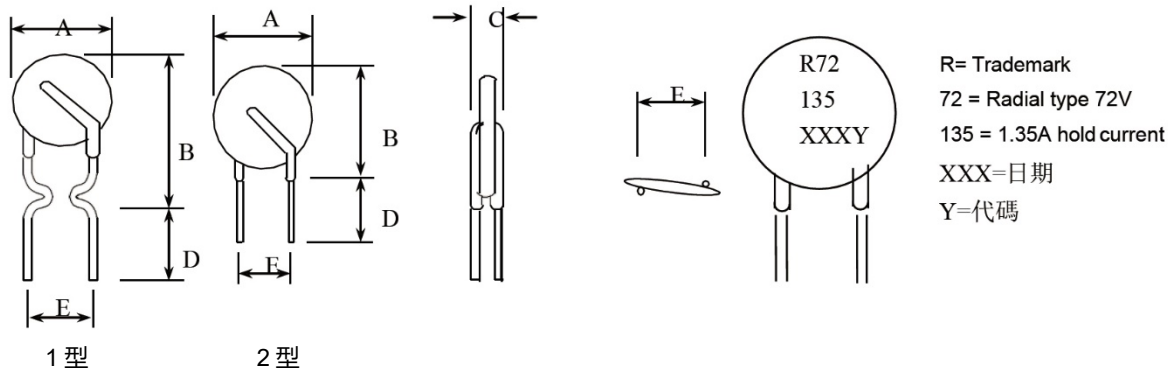
- A=72-005
- B=72-010
- C=72-017
- D=72-020
- E=72-025
- F=72-030
- G=72-040
- H=72-050
- I=72-065
- J=72-075
- K=72-090
- L=72-110
- M=72-135
- N=72-160
- O=72-185
- P=72-250
- Q=72-300
- R=72-375

PPTC 在不同环境温度下的保持电流(I hold)值
I Hold Versus Temperature

Model	Maximum ambient operating temperature (T _{mao}) vs. hold current (I _{hold})								
	-40°C	-20°C	0°C	25°C	40°C	50°C	60°C	70°C	85°C
72R005	0.077	0.069	0.061	0.05	0.044	0.040	0.036	0.032	0.025
72R010	0.18	0.15	0.13	0.10	0.08	0.07	0.06	0.05	0.03
72R017	0.28	0.24	0.20	0.17	0.14	0.12	0.10	0.09	0.06
72R020	0.34	0.29	0.25	0.20	0.16	0.14	0.13	0.10	0.07
72R025	0.42	0.36	0.31	0.25	0.20	0.18	0.16	0.12	0.09
72R030	0.52	0.44	0.38	0.30	0.24	0.22	0.18	0.14	0.10
72R040	0.66	0.57	0.50	0.40	0.32	0.29	0.24	0.20	0.14
72R050	0.83	0.74	0.63	0.50	0.41	0.36	0.30	0.25	0.18
72R065	1.10	0.95	0.82	0.65	0.53	0.47	0.40	0.33	0.24
72R075	1.26	1.11	0.95	0.75	0.61	0.54	0.45	0.39	0.28
72R090	1.52	1.30	1.15	0.90	0.73	0.65	0.55	0.47	0.33
72R110	1.82	1.60	1.35	1.10	0.89	0.79	0.65	0.55	0.40
72R135	2.20	1.91	1.65	1.35	1.09	0.96	0.80	0.68	0.50
72R160	2.60	2.30	1.95	1.60	1.30	1.13	1.00	0.80	0.60
72R185	3.00	2.63	2.30	1.85	1.50	1.33	1.12	0.92	0.67
72R250	4.05	3.58	3.02	2.50	2.02	1.80	1.55	1.30	0.90
72R300	4.82	4.16	3.62	3.00	2.43	2.16	1.85	1.50	1.09
72R375	6.02	5.19	4.50	3.75	3.02	2.68	2.30	1.95	1.39

产品过炉焊接参数
Soldering Parameters


WAVE SOLDERING INFORMATION	
Pre-Heating Zone	Max. ramping rate should not exceed 4°C/Sec.
Soldering Zone	Max. solder temperature should not exceed 260°C
Cooling Zone	Cooling by natural convection in air.
© Specifications are subject to change without notice.	

产品尺寸规格
Physical Dimensions


Model	A Max.	B Max.	C Max.	D Min.	E Typ.	Lead	
						Style	直径(Φ)
72R005	5.7	7.5	3.1	7.6	5.1	2	0.5
72R010	5.7	10.9	3.1	7.6	5.1	1	0.5
72R017	5.8	11.1	3.1	7.6	5.1	1	0.5
72R020	5.9	11.2	3.1	7.6	5.1	1	0.5
72R025	6.4	11.4	3.1	7.6	5.1	1	0.5
72R030	7.6	13.4	3.1	7.6	5.1	1	0.5
72R040	7.7	13.6	3.1	7.6	5.1	1	0.5
72R050	7.9	13.7	3.1	7.6	5.1	1	0.6
72R065	9.7	14.5	3.1	7.6	5.1	1	0.6
72R075	10.7	15.5	3.1	7.6	5.1	1	0.6
72R090	11.7	16.5	3.1	7.6	5.1	1	0.6
72R110	13.0	16.7	3.1	7.6	5.1	2	0.8
72R135	15.7	17.6	3.1	7.6	5.1	2	0.8
72R160	16.7	19.7	3.1	7.6	5.1	2	0.8
72R185	17.8	22.9	3.1	7.6	5.1	2	0.8
72R250	21.8	25.4	3.1	7.6	10.2	2	0.8
72R300	24.9	27.4	3.1	7.6	10.2	2	0.8
72R375	28.5	32.5	3.1	7.6	10.2	2	0.8

PHYSICAL SPECIFICATIONS:

Materials: Leads 72R005~ 040: Tin-platedcopper-cladsteel, 0.205mm²(24AWG) Φ0.50 mm(0.020 in).

72R005~ 090: Tin-platedcopper-cladsteel, 0.205mm²(24AWG) Φ0.60 mm(0.020 in).

72R110~200: Tin-plated copper 0.52mm²(20AWG), Φ0.80 mm(0.032 in).

72R250~375: Tin-plated copper 0.52mm²(20AWG), Φ0.80 mm(0.032 in).

Lead Solderability: MIL-STD-202, Method 208E

Device Labeling: Device is marked with Logo, amperage rating , voltage rating & date code.

包装数量
Packaging Quantity

72	135	U	Model	Reel Q'ty	Bag Q'ty
Radial type	Hold	U= Bulk	72R005~72R375	-	500
72V	Current(A)	packaged			

Tape & Reel packaging per EIA468-B standard.