Shenzhen DXM Technology Co., Ltd.

NTC Thermistor MF72 Datasheet

1.Introduction to NTC Thermistor Inrush Current limiter MF72

The NTC Thermistor Inrush Current limiter is an essential component in protecting electrical circuits from high inrush current. The MF72 series NTC Thermistors for Inrush Current Limiting are the preferred solution for maintaining the integrity of electrical systems, enhancing durability and reliability, which helps prevent damage to sensitive electronics. For detailed information on NTC Thermistors and their role in inrush current limiting, visit NTC Thermistor Inrush Current Limiter - MF72.

For more information about the MF72 NTC Thermistor, explore the technical specifications on our product page to see how it can improve your system's performance and safety.

2.Technical Specifications of MF72 NTC Thermistor

The MF72 series offers a wide range of resistance values and current ratings, making it suitable for various applications. The technical specifications of the MF72 NTC Thermistor for inrush current limiting are as follows:

Resistance at 25°C (R25): Ranges from 0.7Ω to 400Ω
Max Steady State Current: Up to 30A
Dissipation Factor: Varies with the model but offers excellent heat management
Thermal Time Constant: Rapid response to changes in current

To understand the complete range of specifications, visit our comprehensive guide on NTC Thermistors for Inrush Current Limiting.

Thermistor Inrush Current limiter Specification&Part no.

Item	MF72 Part No.	Resistance R 25（Ω）	Max Steady State Current	Approx. Resistance Value at Maximum Current (Ω)	Dissipation Factor (mW/oC)	Thermal Time Constant (sec)	Dimensions (mm)		
							Dmax	Tmax	F±1
1	0.7D20	0.7	11	0.018	24	89	22.5	7	10/7.5
2	0.7D25	0.7	12	0.014	30	120	29	8	10
3	1.3D13	1.3	7	0.062	13	60	15.5	6	7.5
4	1.3D15	1.3	8	0.048	18	68	17.5	6	10/7.5
5	1.3D20	1.3	9	0.037	24	88	22.5	7	10/7.5
6	1.5D13	1.5	7	0.073	13	60	15.5	6	7.5
7	1.5D15	1.5	8	0.052	18	69	17.5	6	10/7.5
8	1.5D25	1.5	10	0.027	30	121	29	8	10
9	MF72-2.5D11	2.5	5	0.095	13	43	13	5.5	7.5 /5
10	MF72-2.5D13	2.5	6	0.088	13	60	15.5	6	7.5
11	3D9	3	4	0.12	11	34	11	5.5	7.5 /5
12	MF72-3D11	3	5	0.1	13	43	13	5.5	7.5 /5
13	MF72-3D13	3	6	0.092	14	60	15.5	6	7.5
14	MF72-3D15	3	7	0.075	18	76	17.5	6	10/7.5
15	MF72-3D20	3	8	0.055	24	88	22.5	7	10/7.5
16	3D25	3	9	0.044	32	124	29	8	10
17	4D9	4	3	0.190	11	35	11	5.5	7.5 /5
18	4D11	4	4	0.150	13	44	13	5.5	7.5 /5
19	4D13	4	5	0.120	15	67	15.5	6	7.5
20	5D5	5	1	0.353	6	20	7.0	5	5 /2.5
21	5D7	5	2	0.283	10	30	9.0	5	5
22	MF72-5D9	5	3	0.21	11	34	11	5.5	7.5 /5
23	MF72-5D11	5	4	0.156	13	45	13	5.5	7.5 /5
24	MF72-5D13	5	5	0.125	15	68	15.5	6	7.5
25	MF72-5D15	5	6	0.112	20	76	17.5	6	10/7.5
26	MF72-5D20	5	7	0.087	23	87	22.5	7	10/7.5
27	MF72-5D25	5	8	0.070	32	125	29	8	10
28	6D9	6	2	0.315	11	34	11	5.5	7.5 /5

Shenzhen DXM Technology Co., Ltd.

NTC Thermistor MF72 Datasheet

Thermistor Inrush Current limiter Specification&Part no.

29	6D11	6	3	0.240	13	45	13	5.5	7.5 /5
30	6D13	6	4	0.170	15	65	15.5	6	7.5
31	6D15	6	5	0.155	20	80	17.5	6	10/7.5
32	6D20	6	6	0.113	25	103	22.5	7	10/7.5
33	7D13	7	4	0.188	15	65	15.5	6	7.5
34	7D15	7	5	0.173	20	80	17.5	6	10/7.5
35	8D7	8	1	0.539	9	28	9.0	5	5
36	MF72-8D9	8	2	0.400	11	32	11	5.5	7.5 /5
37	8D11	8	3	0.255	14	47	13	5.5	7.5 /5
38	8D13	8	4	0.194	15	60	15.5	6	7.5
39	8D15	8	5	0.178	20	80	17.5	6	10/7.5
40	8D20	8	6	0.142	25	105	22.5	7	10/7.5
41	8D25	8	7	0.114	33	125	29	8	10
42	MF72-010D5	10	0.7	0.771	6	20	7.0	5	5 /2.5
43	10D7	10	1	0.616	9	27	9.0	5	5
44	MF72-10D9	10	2	0.458	11	32	11	5.5	7.5 /5
45	MF72-10D11	10	3	0.275	14	47	13	5.5	7.5 /5
46	10D13	10	4	0.206	15	65	15.5	6	7.5
47	MF72-10D15	10	5	0.18	21	85	17.5	6	10/7.5
48	MF72-10D20	10	6	0.162	24	102	22.5	7	10/7.5
49	MF72-10D25	10	7	0.130	32	125	29	8	10
50	12D7	12	1	0.816	9	27	9.0	5	5
51	12D9	12	1	0.652	11	32	11	5.5	7.5 /5
52	12D11	12	2	0.462	14	48	13	5.5	7.5 /5
53	12D13	12	3	0.316	16	65	15.5	6	7.5
54	12D15	12	4	0.250	20	75	17.5	6	10/7.5
55	12D20	12	5	0.195	25	100	22.5	7	10/7.5
56	12D25	12	6	0.156	32	126	29	8	10
57	15D13	15	3	0.335	16	60	15.5	6	7.5
58	15D15	15	4	0.268	20	75	17.5	6	10/7.5
59	16D7	16	0.7	1.003	9	27	9.0	5	5
60	16D9	16	1	0.802	11	31	11	5.5	7.5 /5
61	16D11	16	2	0.47	14	50	13	5.5	7.5 /5
62	16D13	16	3	0.338	16	60	15.5	6	7.5
63	16D15	16	4	0.276	21	70	17.5	6	10/7.5
64	16D20	16	5	0.212	25	100	22.5	7	10/7.5
65	16D25	16	6	0.160	35	126	29	8	10
66	20D9	20	1	0.864	11	30	11	5.5	7.5 /5
67	20D11	20	2	0.512	15	52	13	5.5	7.5 /5
68	20D13	20	3	0.372	16	65	15.5	6	7.5
69	20D15	20	4	0.288	21	86	17.5	6	10/7.5
70	20D20	20	6	0.201	30	98	22.5	7	10
71	20D22	20	7	0.188	30	98	24	7	10
72	22D7	22	0.6	1.108	9	27	9.0	5	5
73	22D9	22	1	0.95	11	30	11	5.5	7.5 /5
74	22D11	22	2	0.563	15	52	13	5.5	7.5 /5
75	30D9	30	1	1.022	11	30	11	5.5	7.5 /5
76	30D11	30	1.5	0.667	15	52	13	5.5	7.5 /5
77	30D13	30	2.5	0.517	16	65	15.5	6	7.5
78	30D15	30	3.5	0.438	18	75	17.5	6	10/7.5
79	33D7	33	0.5	1.485	10	28	9.0	5	5
80	33D9	33	1	1.124	11	30	11	5.5	7.5 /5
81	33D11	33	1.5	0.734	15	52	13	5.5	7.5 /5
82	47D13	47	2	0.81	17	65	15.5	6	7.5
83	47D15	47	3	0.68	21	86	17.5	6	10/7.5
84	50D9	50	1	1.252	11	30	11	5.5	7.5 /5
85	50D11	50	1.5	1.021	15	52	13	5.5	7.5 /5

Shenzhen DXM Technology Co., Ltd.

NTC Thermistor MF72 Datasheet

Thermistor Inrush Current limiter Specification&Part no.

86	60D5	60	0.3	1.878	6	20	7.0	5	5 /2.5
87	60D9	60	0.8	1.502	11	30	11	5.5	7.5 /5
88	60D11	60	1.5	1.215	15	52	13	5.5	7.5 /5
89	80D9	80	0.8	2.01	11	30	11	5.5	7.5 /5
90	80D11	80	1.2	1.658	15	52	13	5.5	7.5 /5
91	120D9	120	0.8	3.015	11	30	11	5.5	7.5 /5
92	120D13	120	1.2	2.124	16	65	15.5	6	7.5
93	120D15	120	1.8	1.652	22	87	17.5	6	10/7.5
94	200D5	200	0.1	18.70	6	18	7.0	5	5 /2.5
95	200D7	200	0.2	11.65	11	28	9.0	5	5
96	200D9	200	0.5	5.007	11	32	11	5.5	7.5 /5
97	400D9	400	0.2	30.30	11	32	11	5.5	7.5 /5

Power NTC Thermistor Inrush Current limiter with increasing max. operating current:

Item	MF72 Part No.	Resistance R 25（Ω）	Max Steady State Current (A)	Approx. Resistance Value at Maximum Current (Ω)	Max Rated Power Pmax. (W)	Dissipation Factor (mW/oC)	Thermal Time Constant (s)	Dimensions (mm)			
								Dmax	Tmax	F±1	Curved Lead Wire
1	1D20	1	16	0.027	5	28 min	110 max	22.5	7	10	S
2	1D25	1	20	0.021	7	30 min	130 max	29	8	10	S
3	1D30	1	30	0.014	8	40 min	190 max	36	8.5	18	S
4	MF72-2.5D15	2.5	9.5	0.044	3.5	22 min	75 max	17.5	6	7.5	17/5
5	5D15	5	8	0.058	3.5	22 min	75 max	17.5	6	7.5	17/5
6	5D20	5	12	0.047	5	28 min	110 max	22.5	7	10	S
7	5D25	5	14	0.047	7	30 min	130 max	29	8	10	S
8	10D15	10	7	0.098	3.5	22 min	75 max	17.5	6	7.5	17/5
9	10D20	10	8	0.085	5	28 min	110 max	22.5	7	10	S
10	10D25	10	10	0.084	7	30 min	130 max	29	8	10	S
11	10D30	10	13	0.056	8	40 min	190 max	36	8.5	18	S

a. S shows straight lead wire;
b. 17/5:17 shows the long bend lead wire; 5 shows the short bend lead wire.

Note：1.Unless particular indication,the allowable tolerance of the R25 Resistance is ±20%
2.Encapsulation mode can be made per customer’s requirement.
3.Wire shape kinked form can be selected.
4.NTC Thermistors for Inrush Current Limiting can be custom-made per customer's requirement.

Item	MF72 Part No.	Resistance R 25（Ω）	Max Steady State Current (A)	Approx. Resistance Value at Maximum Current (Ω)	Dissipation Factor (mW/oC)	Thermal Time Constant (sec)	Dimensions (mm)		
							Dmax	Tmax	F±1
1	5D13	5	5	0.125	15	68	15.5	6	7.5
2	8D15	8	5	0.178	20	80	17.5	6	10/7.5
3	20D20	20	6	0.201	30	98	22.5	7	10

a. S shows straight lead wire;

Note：1.Unless particular indication,the allowable tolerance of the R25 Resistance is ±20%
2.Encapsulation mode can be made per customer’s requirement.
3.Wire shape kinked form can be selected.
4.Can be custom-made per customer's requirement.

3.Conclusion on MF72 NTC Thermistors for Inrush Current Limiting

The MF72 series NTC Thermistors for Inrush Current Limiting are highly effective for limiting inrush currents, ensuring the protection and longevity of electrical equipment. For further technical details and purchasing options, explore more about our Thermistor Inrush Current Limiter on our official website.

For more information, visit MF72 NTC Thermistor for Inrush Current Limiting.