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# PTC THERMISTORS: TYPE PTF

## OVER-CURRENT PROTECTION

### DESCRIPTION:

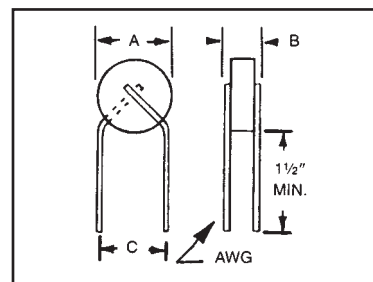
PTC disc thermistor for overcurrent and short-circuit protection



### FEATURES:

- Low cost solid state fuse
- Available in a broad range of resistances, transition temperatures and voltage ratings
- Exhibits large positive increases in resistance with temperature
- Wide range of trip and non-trip currents; from 30mA to 2.3 amps
- Resistance/temperature characteristic is infinitely repeatable and has no hysteresis associated with its action
- Proven quality and reliability over many years of manufacture
- Standard options include protective coating and tape and reeled to EIA RS-468A

### DIMENSIONS:



Operating Voltage	R25°C (±20%)	Type	Minimum Switch Current		Maximum No-Switch Current		"H" Joules/°C	D.C. mW/°C	A (max)		B (max)		C ref.		AWG No.
			0°C	25°C	25°C	55°C			in.	mm.	in.	mm.	in.	mm.	
5	0.5	RL6505-0.5-110-5-PTF	2.32	2.07	1.40	1.02	0.8	18	0.70	17.8	0.16	4.1	0.33	8.4	20
12	1.0	RL5305-1.0-110-12-PTF	1.45	1.29	0.87	0.64	0.6	14	0.60	15.2	0.15	3.8	0.33	8.4	22
12	2.5	RL5305-2.5-110-12-PTF	0.92	0.82	0.55	0.40	0.6	14	0.60	15.2	0.16	4.1	0.33	8.4	20
12	5.0	RL4005-5.0-110-12-PTF	0.55	0.49	0.33	0.24	0.3	10	0.45	11.4	0.15	3.8	0.25	6.4	24
12	10.0	RL3005-10-110-12-PTF	0.32	0.29	0.19	0.14	0.2	7	0.35	8.9	0.15	3.8	0.25	6.4	24
12	25.0	RL3005-25-110-12-PTF	0.20	0.18	0.12	0.09	0.2	7	0.35	8.9	0.15	3.8	0.25	6.4	24
12	1.0	RL5004-1.0-120-12-PTF	1.40	1.25	0.87	0.67	0.4	12.0	0.59	15.0	0.14	3.6	0.25	6.4	24
12	2.5	RL3104-2.5-120-12-PTF	0.65	0.58	0.40	0.31	0.2	6.5	0.41	10.4	0.14	3.6	0.15	3.8	24
12	5.0	RL2204-5.0-120-12-PTF	0.37	0.34	0.23	0.18	0.1	4.3	0.29	7.4	0.14	3.6	0.10	2.5	24
12	10.0	RL1604-10-120-12-PTF	0.22	0.20	0.13	0.10	0.04	2.9	0.23	5.8	0.14	3.6	0.10	2.5	24
12	25.0	RL1004-25-120-12-PTF	0.11	0.09	0.07	0.05	0.02	1.7	0.17	4.3	0.14	3.6	0.07	1.8	24
25	1.5	RL7008-1.5-110-25-PTF	1.34	1.19	0.81	0.59	1.50	18	0.75	19.1	0.18	4.6	0.33	8.4	20
25	3.0	RL5008-3.0-110-25-PTF	0.84	0.74	0.50	0.37	0.80	14	0.55	14.0	0.18	4.6	0.33	8.4	22
25	0.5	RL6904-0.5-120-25-PTF	2.41	2.16	1.49	1.16	0.8	17.8	0.75	19.1	0.14	3.6	0.33	8.4	22
25	1.0	RL4904-1.0-120-25-PTF	1.39	1.25	0.86	0.67	0.4	11.9	0.55	14.0	0.14	3.6	0.33	8.4	22
25	1.5	RL4004-1.5-120-25-PTF	1.00	0.90	0.62	0.48	0.3	9.2	0.46	11.7	0.14	3.6	0.25	6.4	24
25	3.0	RL2804-3.0-120-25-PTF	0.56	0.50	0.34	0.27	0.1	5.7	0.34	8.6	0.14	3.6	0.15	3.8	24
25	5.0	RL2204-5.0-120-25-PTF	0.37	0.34	0.23	0.18	0.1	4.3	0.28	7.1	0.14	3.6	0.15	3.8	24
50	5.0	RL5506-5.0-110-50-PTF	0.65	0.58	0.39	0.29	0.7	14	0.60	15.2	0.16	4.1	0.33	8.4	22
50	10.0	RL4006-10-110-50-PTF	0.39	0.34	0.23	0.17	0.4	10	0.45	11.4	0.17	4.3	0.25	6.4	24
50	25.0	RL4508-25-110-50-PTF	0.27	0.24	0.16	0.12	0.6	12	0.50	12.7	0.18	4.6	0.33	8.4	22
50	50.0	RL4010-50-110-50-PTF	0.19	0.17	0.11	0.08	0.6	12	0.45	11.4	0.20	5.1	0.33	8.4	22
50	100.0	RL3810-100-110-50-PTF	0.13	0.12	0.08	0.06	0.6	12	0.42	10.7	0.20	5.1	0.25	6.4	24
50	200.0	RL3312-200-110-50-PTF	0.08	0.07	0.05	0.04	0.5	9	0.40	10.2	0.23	5.8	0.25	6.4	20



# PTC THERMISTORS: TYPE PTF

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			0°C	25°C	25°C	55°C			in.	mm.	in.	mm.	in.	mm.	
50	1.0	RL7005-1.0-120-50-PTF	1.76	1.58	1.09	0.84	1.1	19.0	0.75	19.1	0.15	3.8	0.33	8.4	22
50	2.5	RL4505-2.5-120-50-PTF	0.87	0.78	0.54	0.42	0.5	11.7	0.50	12.7	0.15	3.8	0.33	8.4	24
50	5.0	RL3205-5.0-120-50-PTF	0.48	0.43	0.30	0.23	0.2	7.1	0.37	9.4	0.15	3.8	0.25	6.4	24
50	10.0	RL2505-10-120-50-PTF	0.30	0.27	0.18	0.14	0.1	5.4	0.30	7.6	0.15	3.8	0.15	3.8	24
50	25.0	RL1605-25-120-50-PTF	0.14	0.13	0.09	0.07	0.1	3.2	0.21	5.3	0.15	3.8	0.15	3.8	24
50	50.0	RL1604-50-120-50-PTF	0.10	0.09	0.06	0.05	0.1	3.2	0.21	5.3	0.14	3.6	0.15	3.8	24
50	100.0	RL1604-100-120-50-PTF	0.07	0.06	0.04	0.03	0.1	3.2	0.21	5.3	0.14	3.6	0.15	3.8	24
50	200.0	RL1604-200-120-50-PTF	0.06	0.05	0.03	0.02	0.1	3.2	0.21	5.3	0.14	3.6	0.15	3.8	24
120	10.0	RL7510-10-110-120-PTF	0.55	0.49	0.33	0.24	2.2	20	0.80	20.3	0.23	5.8	0.33	8.4	24
120	20.0	RL6010-20-110-120-PTF	0.37	0.33	0.22	0.16	1.4	18	0.65	16.5	0.23	5.8	0.33	8.4	20
120	50.0	RL4510-50-110-120-PTF	0.19	0.17	0.11	0.08	0.8	12	0.50	12.7	0.20	5.1	0.33	8.4	20
120	100.0	RL3510-100-110-120-PTF	0.13	0.11	0.08	0.06	0.5	11	0.40	10.2	0.20	5.1	0.25	6.4	22
120	2.5	RL8908-2.5-120-120-PTF	1.32	1.18	0.82	0.63	2.7	26.7	0.94	23.9	0.18	4.6	0.33	8.4	22
120	5.0	RL6308-5.0-120-120-PTF	0.76	0.68	0.47	0.37	1.4	17.8	0.68	17.3	0.18	4.6	0.33	8.4	20
120	10.0	RL4508-10-120-120-PTF	0.44	0.40	0.27	0.21	0.7	12.0	0.50	12.7	0.18	4.6	0.33	8.4	22
120	20.0	RL3008-20-120-120-PTF	0.25	0.23	0.16	0.12	0.4	7.8	0.35	8.9	0.18	4.6	0.25	6.4	24
120	50.0	RL2008-50-120-120-PTF	0.14	0.13	0.09	0.07	0.1	6.0	0.25	6.4	0.18	4.6	0.15	3.8	24
120	100.0	RL1706-100-120-120-PTF	0.09	0.08	0.05	0.04	0.1	4.3	0.23	5.8	0.16	4.1	0.15	3.8	24
240	50.0	RL6315-50-110-240-PTF	0.23	0.21	0.14	0.10	2.3	18	0.65	16.5	0.27	6.9	0.33	8.4	18
240	100.0	RL6315-100-110-240-PTF	0.16	0.15	0.10	0.07	2.3	18	0.65	16.5	0.27	6.9	0.33	8.4	18
240	250.0	RL6315-250-110-240-PTF	0.10	0.09	0.06	0.05	2.3	18	0.65	16.5	0.27	6.9	0.33	8.4	18
240	2.5	RL9912-2.5-120-240-PTF	1.46	1.31	0.90	0.70	4.6	32.6	1.04	26.4	0.22	5.6	0.33	8.4	20
240	5.0	RL8311-5.0-120-240-PTF	0.95	0.85	0.59	0.46	3.5	27.7	0.88	22.4	0.21	5.3	0.33	8.4	20
240	10.0	RL6011-10-120-240-PTF	0.53	0.48	0.33	0.26	1.7	17.6	0.65	16.5	0.21	5.3	0.33	8.4	22
240	20.0	RL4211-20-120-240-PTF	0.31	0.28	0.19	0.15	0.9	12.1	0.47	11.9	0.21	5.3	0.33	8.4	24
240	50.0	RL2611-50-120-240-PTF	0.16	0.14	0.10	0.08	0.2	8.0	0.31	7.9	0.21	5.3	0.25	6.4	24
240	100.0	RL2610-100-120-240-PTF	0.11	0.10	0.07	0.05	0.2	8.0	0.31	7.9	0.20	5.1	0.25	6.4	24
240	250.0	RL2610-250-120-240-PTF	0.07	0.06	0.04	0.03	0.2	8.0	0.31	7.9	0.20	5.1	0.25	6.4	24
480	25.0	RL6017-25-120-480-PTF	0.35	0.32	0.22	0.17	2.4	19.1	0.65	16.5	0.27	6.9	0.33	8.4	22
480	50.0	RL4217-50-120-480-PTF	0.21	0.19	0.13	0.10	1.3	13.3	0.47	11.9	0.27	6.9	0.33	8.4	24
480	100.0	RL3517-100-120-480-PTF	0.13	0.12	0.08	0.06	0.8	10.7	0.41	10.4	0.27	6.9	0.25	6.4	24
480	200.0	RL3517-200-120-480-PTF	0.09	0.08	0.06	0.04	0.8	10.7	0.41	10.4	0.27	6.9	0.25	6.4	24

### OPTIONS:

- Protective coating, replace "PTF" suffix with "PFC"
- Tape and reel, replace "PTF" suffix with "PFR"
- Coated and T&R, replace "PTF" suffix with "PFCR"
- Other resistances
- Other tolerances, other transition temperatures
- Alternate size and configurations
- Other voltage ratings