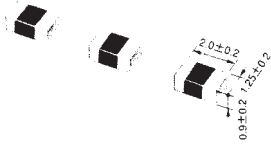


Thermistors - temperature sensing

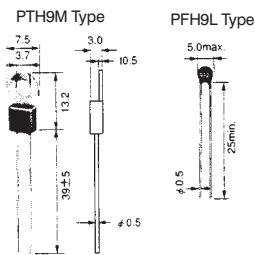
PTH9C32 Series PTC



Order Code	Curie Point (°C)	Resistance Value (Ω) (at 25°C)	Temp. (°C) (at 4.7k Ω)	Max. Volt (VDC)	Max. Current (mA)	Temp. Range (°C)
PTH9C32AR471Q-T	AR(120)		135±10			-20 to +150
PTH9C32BB471Q-T	BB(100)	470±50%	115±10	16	30	-20 to +130
PTH9C32BD471Q-T	BD(80)		95±10			-20 to +110

Applications: Overheat protection for electric circuits

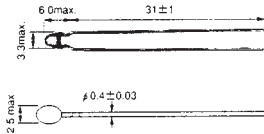
PTH9M/9L Series PTC



Order Code	PTH9M	PTH9L	Curie Point (°C)	Sensing Temp. TS(°C)	Resistance Value(Ω)			Max.Volt (VDC)
					25°C	TS-10(°C)	TS(°C)	
PTH9MO4BH471 (222)TS2F333	PTH9LO4BH471 (222)TS2F330	BH(40)	60	100 max. (330 max.)	50	330max. (1.5K max.)	60	16
PTH9MO4BG471 (222)TS2F333	PTH9LO4BG471 (222)TS2F330	BG(50)	70		60		70	
PTH9MO4BF471 (222)TS2F333	PTH9LO4BF471 (222)TS2F330	BF(60)	80		70		80	
PTH9MO4BE471 (222)TS2F333	PTH9LO4BE471 (222)TS2F330	BE(70)	90		80		90	
PTH9MO4BD471 (222)TS2F333	PTH9LO4BD471 (222)TS2F330	BD(80)	100		90		100	
PTH9MO4BC471 (222)TS2F333	PTH9LO4BC471 (222)TS2F330	BC(90)	110		100		110	
PTH9MO4BB471 (222)TS2F333	PTH9LO4BB471 (222)TS2F330	BB(100)	120	110	120			

Applications: Overheat protection for electric circuits (): The resistance values in () are also available

NTH4G Standard Series NTC

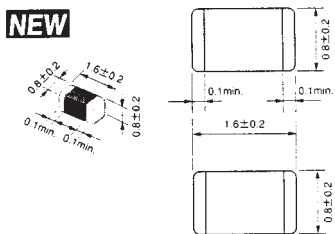


Order Code	Resistance 25°C(kΩ)	B-Constant 25/50°C(K)
NTH4G35A202 □02	2	3500±1%
NTH4G37A502 □02	5	3700
NTH4G39A103 □02	10	3900
NTH4G33B103 □01	10	3380

Order Code	Resistance 25°C(kΩ)	B-Constant 25/50°C(K)
NTH4G40B2O3 □O1	20	4050±1%
NTH4G41A3O3 □O1	30	4100
NTH4G41B5O3 □O1	50	4150
NTH4G42B1O4 □Q1	100	4250

□ Specify tolerance ±1%=F; ±3%=E Thermal line constant < 7 sec in still air
 Rated wattage 21mW
 Thermal dissipation constant 2.1 mW/°C
 Op. Temp Range -40°C to +125°C

Chip NTC Thermistors NTH5G1M/2M Series

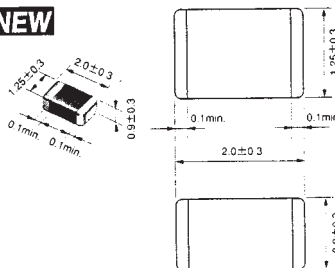


NTH5G1M Series

Order Code	Resistance 25°C(Ω)	B-Constant 25/50°C(K)
NTHSG1M29A221 □O4TH	220	2900
NTH5C1M31A471 □O4TH	470	3100
NTH5G1M31B1O2 □O4TH	1.0k	3150
NTH5G1M39B222 □O4TH	2.2k	3950
NTHSG1M35A472 □O4TH	4.7k	3500

Order Code	Resistance 25°C(kΩ)	B-Constant 25/50°C(K)
NTH5G1M33B1O3 □O4TH	10.0	3380
NTH5G1M39B153 □O4TH	15.0	3950
NTHSG1M39B223 □O4TH	22.0	3950
NTH5G1M40B473 □O4TH	47.0	4050
NTHSG1M42B1O4 □O4TH	100.0	4250

Max. Power =10mW



NTH5G2M Series

Order Code	Resistance 25°C(Ω)	B-Constant 25/50°C(K)
NTH5G2M29A221 □O4TE	220	2900
NTH5G2M29A331 □O4TE	330	2900
NTH5G2M29B471 □O4TE	470	2950
NTH5G2M31B1O2 □O4TE	1.0k	3150
NTH5G2M39B152 □O4TE	1.5k	3950
NTH5G2M39B222 □O4TE	2.2k	3950
NTHSG2M39B332 □O4TE	3.3k	3950

Order Code	Resistance 25°C(kΩ)	B-Constant 25/50°C(K)
NTH5G2M35A472 □O4TE	4.7	3500
NTH5G2M36B1O3 □O4TE	10.0	3650
NTH5G2M39B153 □O4TE	15.0	3950
NTHSG2M39B223 □O4TE	22.0	3950
NTH5G2M40B333 □O4TE	33.0	4050
NTH5G2M40B473 □O4TE	47.0	4050
NTH5G2M42B1O4 □O4TE	100.0	4250

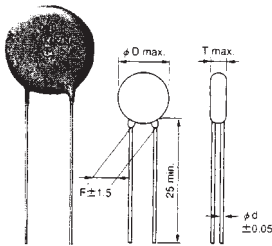
□ Specify tolerance ±5%=J; ±10%=K
 B-constant tolerance: ±3%
 Max. Power =20mW
 Op. Temp Range= -40 to + 185°C

All dimensions in mm

Thermistors - over current sensing protection

Overcurrent Protection PTH8L Series

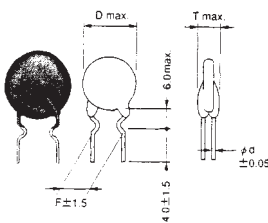
UL recognised type
(File No. E137188)



Part Number	Non Operating Current (mA)	Trip Current (mA)	Resistance Value (Ω)	Max. Volt. (V)	Max. Current (A)	Dimensions(mm)				*Matched Transformer (VA)
						D	T	F	Ød	
PTH631HO1AR4R7M14O	390	900	4.7±20%	140	2.0	19.0	6.0	10.0	0.65	35
PTH631HO1AR5R6M14O	340	780	5.6±20%		2.0	17.0	6.0	10.0	0.65	30
PTH622HO1AR6R8M14O	290	670	6.8±20%		1.0	14.0	6.0	10.0	0.65	25
PTH623HO1AR100M14O	220	510	10±20%		1.0	13.0	6.0	10.0	0.65	20
PTH624HO1AR1SOM14O	170	400	15±20%		1.0	11.6	6.0	6.5	0.65	15
PTH61HO1AR22OM14O	140	330	22±20%		1.0	9.6	6.0	6.5	0.65	10
PTH60HO1AR33OM14O	100	230	33±20%	265	0.5	7.4	6.0	5.0	0.50	5
PTH63HO2AR12OM26S	255	610	12±20%		2.0	19.5	6.5	10.0	0.65	35
PTH62HO2AR180M26S	180	440	18±20%		1.8	15.7	6.5	10.0	0.65	25
PTH623HO2AR270M26S	150	360	27±20%		1.5	14.0	6.5	10.0	0.65	20
PTH61HO2AR390M26S	100	240	39±20%		1.2	10.0	6.5	6.5	0.65	15
PTH60HO2AR560M26S	80	190	56±20%		0.6	8.2	6.5	5.0	0.50	10
PTH60HO2AR820M26S	60	150	82±20%	0.5	8.2	6.5	5.0	0.50	10	
PTH59HO2AR121M26S	35	85	120±20%	0.3	6.5	6.5	3.5	0.50	5	
PTH59HO2AR181M26S	29	70	180±20%	0.3	6.5	6.5	3.5	0.50	3	

Operating Temperature range: -10 to +60°C *Shows typical capacities of the transformer which can be used
Direct mounting in the windings should be avoided because the varnish used in the transformer may cause deterioration of the POSISTOR.

16/30/80V type



1 6V type (max. Voltage 1 6V)

Part Number	Non-Operating Current (at ±60°C)(mA)	Trip Current (at -10°C)(mA)	* max. Current (A)	Resistance Value (Ω) (at +25°C)	Charac. (Curie Point)	Dimensions(mm)			
						D	T	F	Ød
PTH8LO5BA1 R8M1 8550	285	850	2.0	1.8±20%	BA (110°C)	6	4	5	0.6
PTH8LO7BAOR9M1BS8O	405	1200	3.0	0.9±20%		7.4	4	5	0.6
PTH6LO9BAORSM1B5S0	600	1750	5.0	0.5±20%		9.5	4	5	0.6
PTH6L12BAOR3H1B5S0	600	2450	7.0	0.3±25%		12	4	5	0.6
PTH8L14BAOR2H1B7S0	1050	3200	8.0	0.2±25%		15	4	7.5	0.6

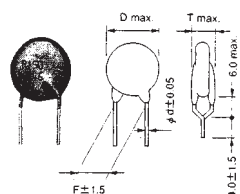
30V type (max. Voltage 30V)

Part Number	Non-Operating Current (at ±60°C)(mA)	Trip Current (at -10°C)(mA)	* max. Current (A)	Resistance Value (Ω) (at +25°C)	Charac. (Curie Point)	Dimensions(mm)			
						D	T	F	Ød
PTH8L18ARR4SH287S0	1000	2720	6	0.45±25%	AR (120°C)	18.0	4.0	7.5	0.6
PTH8L13AROR8H2B75O	680	1900	5.5	0.8±25%		13.5	4.0	7.5	0.6
PTH8L12AR1R2H2BS5O	520	1420	4.3	1.2±25%		12.0	4.0	5.0	0.6
PTH8LO9AR1R8H2BS5O	410	1120	3	1.8±25%		9.5	4.0	5.0	0.6
PTH8LO7AR4R6H2BS5O	250	700	1	4.6±25%		7.4	4.0	5.0	0.6
PTH8LO4AR13OH2BS5O	145	400	0.7	13±25%		5.5	4.0	5.0	0.6

80V type (max. Voltage 80V)

Part Number	Non-Operating Current (at ±60°C)(mA)	Trip Current (at -10°C)(mA)	* max. Current (A)	Resistance Value (Ω) (at +25°C)	Charac. (Curie Point)	Dimensions(mm)			
						D	T	F	Ød
PTH8L18AR2R3H4B75O	450	1250	8.0	2.3±25%	AR (120°C)	18.0	4.5	7.5	0.6
PTH8L13AR3R7H4O7S0	310	660	5.5	3.7±25%		13.5	4.5	7.5	0.6
PTH8L12AR5R6H4B75O	270	760	4.3	5.6±25%		12.0	4.5	7.5	0.6
PTH8LO9AR9R4H4BS5O	190	530	3.0	9.4±25%		9.5	4.5	5.0	0.6
PTH8LO7AR25OH4BS5O	110	300	1.0	25±25%		7.4	4.5	5.0	0.6
PTH8LO5ARS5OH4P5S0	50	135	0.7	55±25%		5.5	4.5	5.0	0.6

265V type



265V type (max. Voltage 265V)

Part Number	Non-Operating Current (at ±60°C)(mA)	Trip Current (at -10°C)(mA)	* max. Current (A)	Resistance Value (Ω) (at +25°C)	Charac. (Curie Point)	Dimensions(mm)			
						D	T	F	Ød
PTH8L18AR6ROH8B79O	300	830	4.1	6.0±25%	AR (120°C)	18.5	6.0	7.5	0.6
PTH8L13AR100H8B79O	200	560	2.2	10±25%		14.0	6.0	7.5	0.6
PTH8L12AR1SOH8B79O	165	460	1.5	15±25%		12.5	6.0	7.5	0.6
PTH8LO9AR25OH8BS9O	118	330	1.0	25±25%		10.0	6.0	5.0	0.6
PTH8LO7AR4SOH8BS9O	80	220	1.0	45±25%		8.0	6.0	5.0	0.6
PTH8LO7AR65OH8BS9O	68	190	1.0	65±25%		8.0	6.0	5.0	0.6
PTH8LO7AR700H8B59O	66	185	0.4	70±25%		6.0	6.0	5.0	0.6
PTH8LO5AR151H8PS9O	28	78	0.2	150±25%		6.0	6.0	5.0	0.6

Operating temperature range: -10 to +60°C
*Shows the maximum current which may be repeatedly introduced into POSISTOR when the circuit runs abnormally