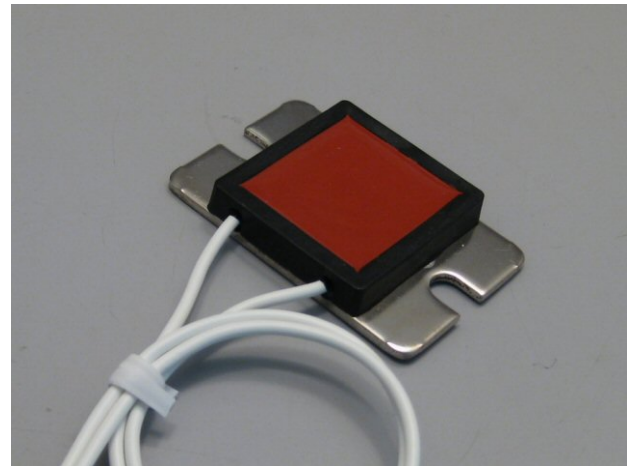


300W
CHASSIS MOUNTING NON-INDUCTIVE
FLAT TYPE HIGH POWER RESISTORS

TCP320



Features and Applications

Flat type, 300W high power resistor. Attaching an air-cooled heat sink or water-cooling necessary.

Rated power is 300W (one element).

Custom resistance and power resistor network available.

Higher density packing, vibration-proof, insulation withstand voltage and perfect heat dissipation possible.

Applications include snubber resistors, surge protection, breeder resistor, filter resistor, dummy load, gate resistor, dumping resistor for power electronics, automotive electronics, pulse generators, high frequency amplifiers, theater audio equipment, etc.

Dimensions

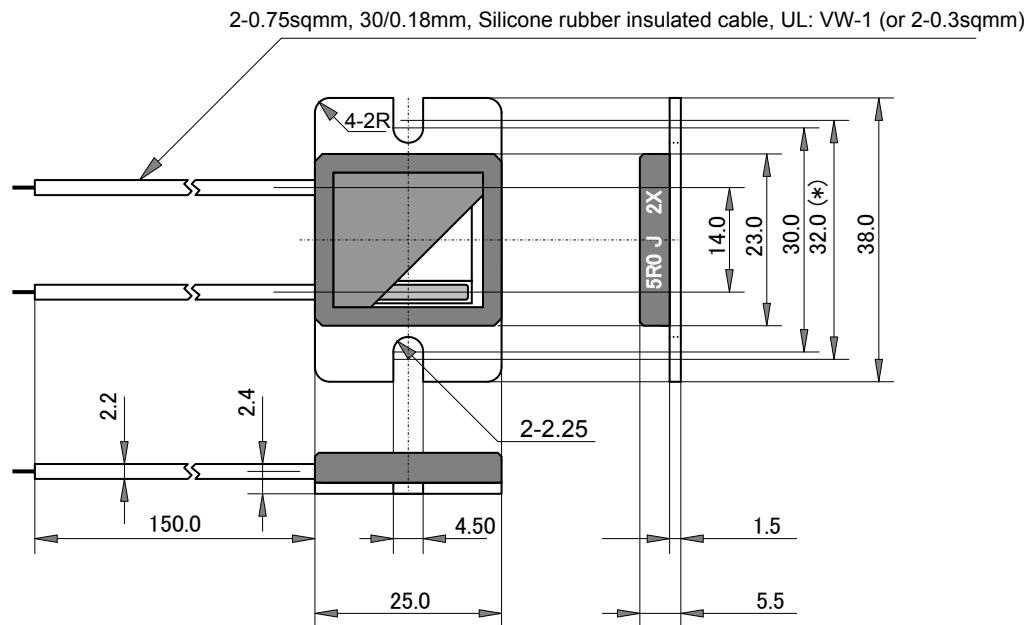


Figure 1. Dimension and Marking (mm)

* M4 for mounting screw.

300W

TCP320

CHASSIS MOUNTING NON-INDUCTIVE FLAT TYPE HIGH POWER RESISTORS

Ordering Information

Type TCP320 -	TCR A	Resistance 10R	Tolerance J	Code TY	Note Please note optional '5kVAC'
TCP320 TCP320-5KV	100ppm	10R E24+ (*)	J (5%)	TY	RoHS tray package

(*) Recommend resistance value, when request for optional resistance please call factory.

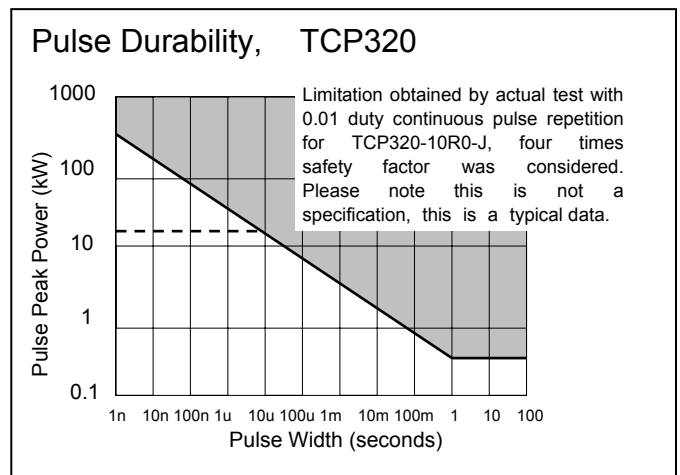
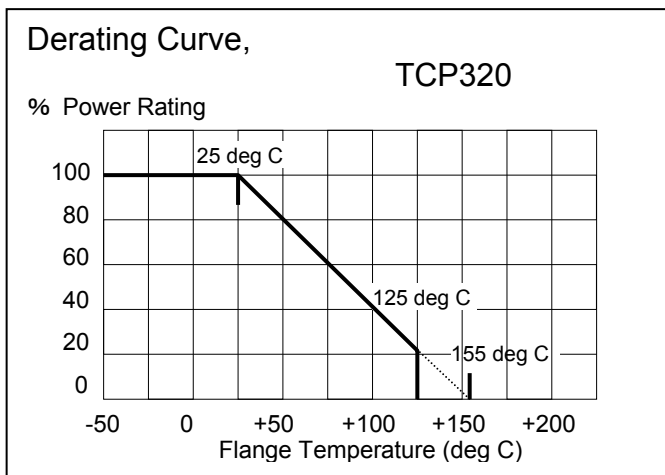
1.0	1.1	1.2	1.3	1.5	1.6	1.8	2.0	2.2	2.4	2.5	2.7	3.0	3.3
3.6	3.9	4.0	4.3	4.7	5.0	5.1	5.6	6.2	6.8	7.5	8.0	8.2	9.1

Specifications and Performances

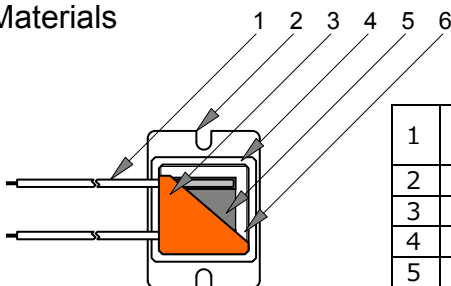
Items	Specifications	Conditions
Rating Power	300 Watts	At flange temperature -55 to +25 deg C
Heat Resistance	0.23 deg C/W	From resistor to flange
Resistance Range	0.1 ohm to 51K ohm	0.1ohm to 0.82 ohm, option
Nominal Resistance	E24+	Additionally, 2.0 and 5.0.
TCR	+/-100 ppm/K (A)	For -55 to +155 deg C, exclude wire leads
Tolerance	+/-5% (J)	
Operation Temp.	-55 to +155 deg C	At resistor element surface
Limiting Voltage	2000V / $\sqrt{P \times R}$	Less than either 2000V or $\sqrt{P \times R}$, between terminals
Withstanding Voltage	2k VAC (5kVAC option)	60 seconds between terminals and flange. Leak current below 0.5mA
Load Life	ΔR +/-1.0 %	Continuous power 1000 hours.
Humidity	ΔR +/-1.0 %	60 deg C, 90 to 95%RH, DC0.1W, 1000hours.
Temperature Cycle	ΔR +/-1.0 %	-55 deg C, 30 min., +155 deg C 30min., 5 cycles. (-40-+125, 1200cycles)
Insulation Resistance	Over 1000 Meg ohm	Between terminals and flange.
Vibration	ΔR +/-0.5 %	Note 2
Flammability	UL94V-0	For resistor body
Weight	20 grams	May be changed by lead length.

Note 1: Torque: Mounting 1.6Nm max, 1.0Nm recommend.

Note 2: IEC60068-2-6, displacement 0.75mm or acceleration 100m/sec², 10Hz-54Hz sweep, 10 cycles X-Y-Z direction.



Materials



1	Terminals	Silicone insulated wires. 2-0.75sqmm, 30/0.18mm, Silicone rubber insulated cable, UL:VW-1 (or 2-0.30sqmm)
2	Flange	Ni plated copper plate.
3	Mold	Silicone rubber insulator
4	Case	PA6 side wall
5	Resistor	Metal film resistor
6	Substrate	Al2O3 alumina substrate