TO-220 Power Resistors

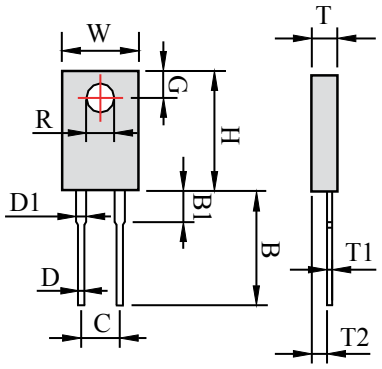
TO-247 Power Resistors - RMG100 Series / 薄膜功率电阻器

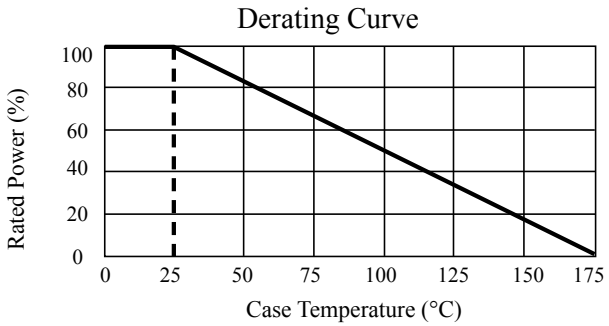
Power Resistor Features

- 100 Watts at 25°C Case Temperature Heat Sink Mounted.
- TO-247 Style Power Package.
- Single M3 Screw Mounting to Heat Sink.
- Molded Case for Protection and Easy to Mount.
- Electrically Isolated Case.
- Non-Inductive Design.

Applications

- Gate Resistors in Power Supplies.
- Snubbers.
- Load and Dumping Resistors in CRT Monitors.
- Terminal Resistance in RF Power Amplifiers.
- Voltage Regulation.
- Low Energy Pulse Loading.
- UPS.





Dimensions (Unit: mm)

Type	W	H	T	T1	T2	B	B1	C	D	D1	G	R
RMG100	15.49 ~ 16.01	20.44 ~ 20.96	4.69 ~ 5.21	0.55 ~ 1.07	2.15 ~ 2.67	13.21 ~ 15.75	2.03 ~ 3.55	9.90 ~ 10.42	1.42 ~ 1.62	3.45 ~ 3.81	5.07 ~ 5.59	3.53 ~ 3.73

Electrical Characteristics Specifications

Resistance Range	Resistance Tolerance	TCR(PPM/°C)
0.1Ω~1Ω	±5% ±10%	-
>1Ω~3Ω	±1%	±300
>3Ω~10Ω	±1% ±5% ±10%	±100 ±200
>10Ω~10KΩ	±1% ±5% ±10%	±50 ±100 ±200

Note:1.Operating Voltage: 350V Max.

2.Dielectric Strength: 1800V AC.

3.Insulation Resistance: 10GΩ min.

4.Working Temperature Range: -65°C to +175°C.

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Environmental Characteristics

Test Item	Specification	Test Method
Temperature Coefficient of Resistance	As spec.	Referenced to 25°C, ΔR taken at +105°C
Short Time Overload	ΔR±0.5%	1.5 times rated power with applied voltage not to exceed 1.5 times maximum continuous operating voltage for 5 seconds.
Dielectric strength	ΔR±0.15%	MIL-STD-202F Method 301(1800V AC, 60s)
Load Life	ΔR±1.0%	MIL-PRF-39009D, 4.8.13 Rated power, 2,000 hours.
Moisture resistance	ΔR±0.5%	-10°C~+65°C, RH>90%, cycle 240 hours.
Thermal Shock	ΔR±0.5%	MIL-STD-202, Method 107G. -65°C~150°C,100 cycle
Terminal Strength	ΔR±0.2%	MIL-STD-202F, Method 211, Cond. A (Pull Test) 2.4N
Vibration, High Frequency	ΔR±0.42%	MIL-STD-202F, Method 204, Cond.D
Solderability	90% min coverage	MIL-STD-202F Method 208H 245°C±5°C, 3±0.5 (sec)

Note:1.Lead Material: Tinned Copper.

2.When in Free Air at 25°C, the RMG100 is Rated for 3.5W.

3.The Case Temperature is to be used for the Definition of the Applied Power Limit.

4.The Case Temperature Measurement Must be Made with a Thermocouple Contacting the Center of the Component Mounted on the Designed Heat Sink.

5.Thermal Grease Should be Applied Properly.

How to Order

RMG	100	J	P	D	1001
❶	❷	❸	❹	❺	❻

❶ Product Type: TO-247 Power Resistors

❷ Power Rating

Code	Power Rating
	100 Watts

❸ Resistance Tolerance

Code	Resistance Tolerance
D	±0.5%
F	±1%
G	±2%
J	±5%
K	±10%

❹ Packaging

Code	Packaging
T	Tube
P	Bulk

❺ TCR

Code	TCR
D	±50PPM/°C
E	±100PPM/°C
F	±200PPM/°C
G	±300PPM/°C
-	No specified

❻ Resistance

Code	Resistance
0R10	0.1Ω
0100	10Ω
4700	470Ω
1001	1000Ω
1002	10000Ω