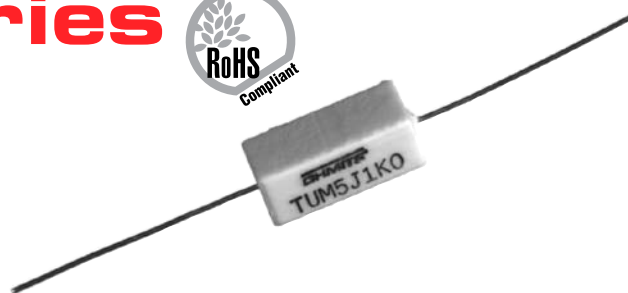


TUM/TUW Series

Ceramic Housed Axial Terminal Power

The TUM/TUW Series resistors are our most economical power resistors. They are recommended for commercial applications where low cost is critical.

They are available in small standard packs for standard values, or bulk packaged for even lower costs.



FEATURES

- Economical Commercial Grade for general purpose use
- Wirewound and Metal Oxide construction
- Wide resistance range
- Flameproof inorganic construction

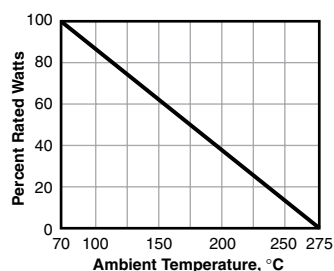
SERIES SPECIFICATIONS

Series	Wattage	Ohms	Voltage	Element
TUW3	3	0.01-39	350	Wirewound
TUW5	5	0.01-47	350	Wirewound
TUW7	7	0.10-680	500	Wirewound
TUW10	10	0.10-990	750	Wirewound
TUW15	15	0.10-1000	1000	Wirewound
TUM3	3	180-33K	350	Metal oxide
TUM5	5	220-50	350	Metal oxide
TUM7	7	910-50K	500	Metal oxide
TUM10	10	1000-50K	750	Metal oxide
TUM15	15	1100-150K	1000	Metal oxide

CHARACTERISTICS

Housing	Ceramic
Core	Fiberglass or metal oxide
Filling	Cement based
Tolerance	5% standard
TCR	0.01-20Ω ±400ppm/°C 20-150KΩ ±350ppm/°C
Dielectric withstanding voltage	1,000VAC
Short time overload	TUW: 10x rated power for 5 sec. TUM: 5x rated power for 5 sec.

Derating Curve



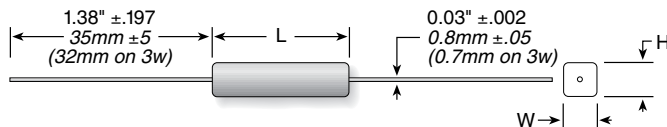
(continued)

TUM/TUW Series

Ceramic Housed Axial Terminal Power

DIMENSIONS

(in./mm)



Series	Wattage	Length (±1mm)	Height (±1mm)	Width (±1mm)
TUW3	3	0.87 / 22	0.31 / 8	0.31 / 8
TUW5	5	0.87 / 22	0.35 / 9	0.39 / 10
TUW7	7	1.48 / 35	0.35 / 9	0.39 / 10
TUW10	10	1.93 / 49	0.35 / 9	0.39 / 10
TUW15	15	1.93 / 49	0.45/11.5	0.49 / 12.5
TUM3	3	0.87 / 22	0.31 / 8	0.31 / 8
TUM5	5	0.87 / 22	0.35 / 9	0.39 / 10
TUM7	7	1.48 / 35	0.35 / 9	0.39 / 10
TUM10	10	1.93 / 49	0.35 / 9	0.39 / 10
TUM15	15	1.93 / 49	0.45/11.5	0.49 / 12.5

ORDERING INFORMATION

TUM3J8R2E			Tolerance J = 5%	E = RoHS compliant
Series	Wattage	Resistance Value		
TUM = Ceramic Housed Metal Oxide	3	Example: R50=0.50Ω		
TUW = Ceramic Housed Wirewound	5	1R0=1Ω		
	7	8R2=8.2Ω		
	10	250=250Ω		
	15	1K0=1,000Ω		
		8K2=8,200Ω		
		10K=10,000Ω		

Standard part numbers for TUW/TUM series

Ohmic value	Part No. Prefix ▶ Suffix ▼	Wattage					Ohmic value	Part No. Prefix ▶ Suffix ▼	Wattage					Ohmic value	Part No. Prefix ▶ Suffix ▼	Wattage											
		TUW3J- 3	TUW5J- 5	TUW7J- 7	TUW10J- 10	TUW15J- 15			TUW3J- 3	TUW5J- 5	TUW7J- 7	TUW10J- 10	TUW15J- 15			TUW3J- 3	TUW5J- 5	TUW7J- 7	TUW10J- 10	TUW15J- 15							
0.01	—R01E	✓	✓				1.0	—1R0E	✓	✓	✓	✓	✓	33	—33RE	✓	✓	✓	✓	✓	680	—680E	✓	✓	✓	✓	✓
0.01	—R01E	✓	✓	✓			1.5	—1R5E	✓	✓	✓	✓	✓	39	—39RE	✓	✓	✓	✓	✓	750	—750E	✓	✓	✓	✓	✓
0.02	—R02E	✓	✓	✓			2.0	—2R0E	✓	✓	✓	✓	✓	43	—43RE	✓	✓	✓	✓	✓	820	—820E	✓	✓	✓	✓	✓
0.04	—R04E	✓	✓	✓			2.7	—2R7E	✓	✓	✓	✓	✓	47	—47RE	✓	✓	✓	✓	✓	1000	—1K0	✓	✓	✓	✓	✓
0.05	—R05E	✓	✓	✓			3.0	—3R0E	✓	✓	✓	✓	✓	56	—56RE	✓	✓	✓	✓	✓	1500	—1K5	✓	✓	✓	✓	✓
0.10	—R10E	✓	✓	✓	✓		3.3	—3R3E	✓	✓	✓	✓	✓	68	—68RE	✓	✓	✓	✓	✓	2000	—2K0	✓	✓	✓	✓	✓
0.15	—R15E	✓	✓	✓	✓	✓	3.9	—3R9E	✓	✓	✓	✓	✓	75	—75RE	✓	✓	✓	✓	✓	2700	—2K7	✓	✓	✓	✓	✓
0.20	—R20E	✓	✓	✓	✓	✓	4.3	—4R3E	✓	✓	✓	✓	✓	82	—82RE	✓	✓	✓	✓	✓	3000	—3K0	✓	✓	✓	✓	✓
0.27	—R27E	✓	✓	✓	✓	✓	4.7	—4R7E	✓	✓	✓	✓	✓	100	—100E	✓	✓	✓	✓	✓	3300	—3K3	✓	✓	✓	✓	✓
0.30	—R30E	✓	✓	✓	✓	✓	5.6	—5R6E	✓	✓	✓	✓	✓	150	—150E	✓	✓	✓	✓	✓	3900	—3K9	✓	✓	✓	✓	✓
0.33	—R33E	✓	✓	✓	✓	✓	6.8	—6R8E	✓	✓	✓	✓	✓	200	—200E	✓	✓	✓	✓	✓	4300	—4K3	✓	✓	✓	✓	✓
0.39	—R39E	✓	✓	✓	✓	✓	7.5	—7R5E	✓	✓	✓	✓	✓	270	—270E	✓	✓	✓	✓	✓	4700	—4K7	✓	✓	✓	✓	✓
0.43	—R43E	✓	✓	✓	✓	✓	8.2	—8R2E	✓	✓	✓	✓	✓	300	—300E	✓	✓	✓	✓	✓	5600	—5K6	✓	✓	✓	✓	✓
0.47	—R47E	✓	✓	✓	✓	✓	10	—10RE	✓	✓	✓	✓	✓	330	—330E	✓	✓	✓	✓	✓	6800	—6K8	✓	✓	✓	✓	✓
0.56	—R56E	✓	✓	✓	✓	✓	15	—15RE	✓	✓	✓	✓	✓	390	—390E	✓	✓	✓	✓	✓	7500	—7K5	✓	✓	✓	✓	✓
0.68	—R68E	✓	✓	✓	✓	✓	20	—20RE	✓	✓	✓	✓	✓	430	—430E	✓	✓	✓	✓	✓	8200	—8K2	✓	✓	✓	✓	✓
0.75	—R75E	✓	✓	✓	✓	✓	27	—27RE	✓	✓	✓	✓	✓	470	—470E	✓	✓	✓	✓	✓	10000	—10K	✓	✓	✓	✓	✓
0.82	—R82E	✓	✓	✓	✓	✓	30	—30RE	✓	✓	✓	✓	✓	560	—560E	✓	✓	✓	✓	✓							

Shaded area: change prefix to TUM