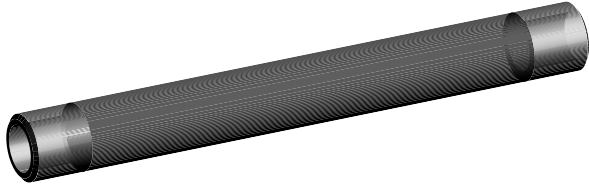


Carbon Film Resistors, Special Purpose High Frequency Load (Tubes)



FEATURES

- High stability and excellent high frequency characteristics
- Particularly suited for high frequency applications involving high power, high accuracy RF measurements
- Carbon film construction

APPLICATIONS

High frequency wattmeters for output measurement in radio, TV and radar transmitters, dielectric heating and similar RF generating equipment. Ideal for use as non-reactive radio frequency terminations. Special high power designs with internal water cooling are available. Contact factory.

STANDARD ELECTRICAL SPECIFICATIONS

GLOBAL MODEL	HISTORICAL MODEL	POWER RATING WATTAGE FREE AIR $P_{25^{\circ}\text{C}}$ W	RESISTANCE TOLERANCE %	LINEARITY TOLERANCE %	RESISTANCE RANGE Ω	TEMPERATURE COEFFICIENT ppm/ $^{\circ}\text{C}$
SPW236	SPW-236	120	$\pm 2, \pm 5$	± 10	50 ohm standard. Other values available on special order.	± 200 average ± 250 maximum
SPW227	SPW-227	55	$\pm 2, \pm 5$	± 10		
SPW210	SPW-210	40	$\pm 2, \pm 5$	± 10		
SPW214	SPW-214	10	$\pm 2, \pm 5$	± 10		
SPW212	SPW-212	2	$\pm 2, \pm 5$	± 10		

Cooling:

Approximate increase in wattage when forced air cooling is employed is 3 times wattages shown and for liquid cooling (with heat exchanger) is 60 times wattages shown. The limiting factor insofar as the resistor is concerned is the film temperature. This should not exceed $+200^{\circ}\text{C}$ and for maximum stability should not exceed $+150^{\circ}\text{C}$.

MECHANICAL SPECIFICATIONS

Identification:	Type designation resistance value, tolerance and code date of manufacture are printed on each unit.
Terminations:	All types electroplated copper except SPW-212. The SPW-212 has silver coated termination bands.

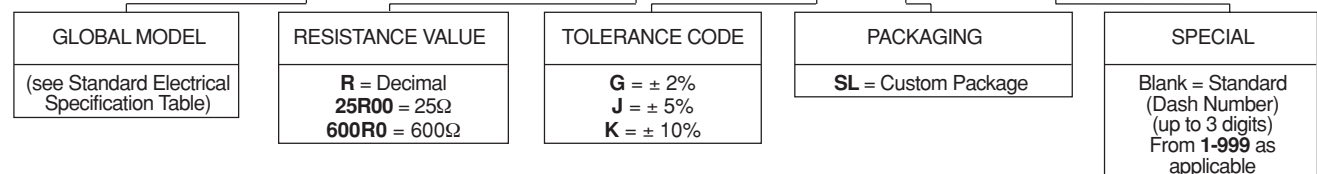
MARKING

- DALE
- Model
- Value
- Tolerance
- Date code

GLOBAL PART NUMBER INFORMATION

New Global Part Numbering: SPW21050R00JSL (preferred part numbering format)

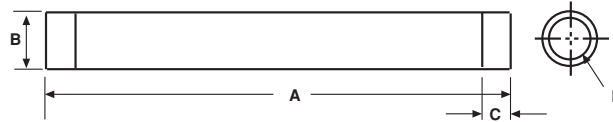
S P W 2 1 0 5 0 R 0 0 J S L [] [] []



Historical Part Number: SPW-210505% (will continue to be accepted)



DIMENSIONS in inches [millimeters]

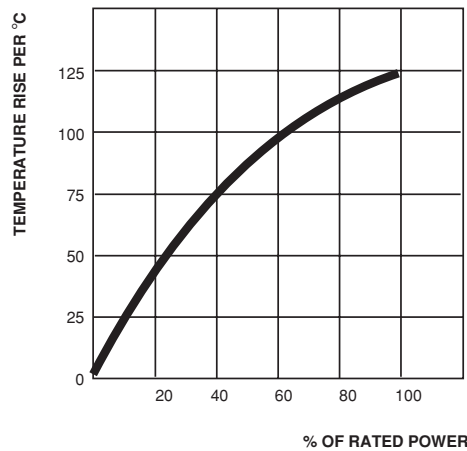


GLOBAL MODEL	A	B	C (o.d.)	D (i.d.)
SPW236	18.0 ± 0.062 [457.20 ± 1.57]	1.75 ± 0.025 [44.45 ± 0.64]	1.0 ± 0.063 [25.40 ± 1.60]	1.25 ± 0.025 [31.75 ± 0.64]
SPW227	12.0 ± 0.062 [304.80 ± 1.57]	1.125 ± 0.025 [28.58 ± 0.64]	0.500 ± 0.032 [12.70 ± 0.81]	0.875 ± 0.020 [22.23 ± 0.51]
SPW210	12.0 ± 0.062 [304.80 ± 1.57]	0.875 ± 0.010 [22.23 ± 0.25]	0.625 ± 0.032 [15.88 ± 0.81]	0.625 ± 0.020 [15.88 ± 0.51]
SPW214	5.0 ± 0.032 [127.0 ± 0.81]	0.562 ± 0.006 [14.27 ± 0.81]	0.500 ± 0.032 [12.70 ± 0.81]	0.375 ± 0.013 [9.53 ± 0.33]
SPW212*	2.0 ± 0.062 [50.80 ± 1.57]	0.250 ± 0.006 [6.35 ± 0.15]	0.250 ± 0.032 [6.35 ± 0.81]	Solid Rod

* Representative types only. Consult factory for special requirements.

Note: 1. C dimension may be varied on special order.

2. Wattage ratings do not allow for mounting hardware.



LOAD TEMPERATURE RISE
[Operation in Free Air]



Disclaimer

All product specifications and data are subject to change without notice.

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