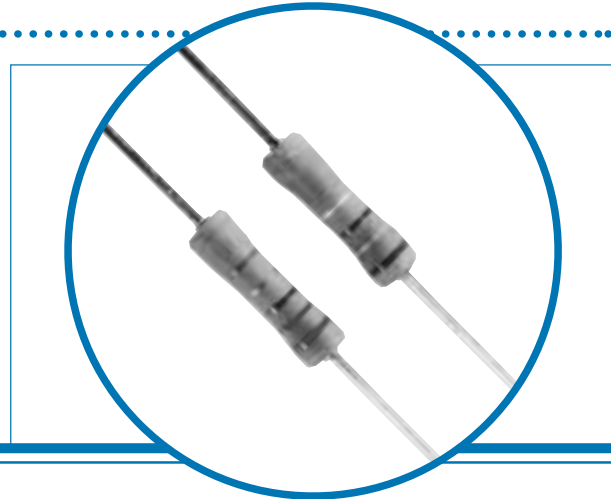


# General Purpose Wirewound Resistors

## SPP Series

- **0R1 to 2K4 ohms**
- **Positive high TC's upon request**
- **Weldable and solderable magnetic leads**
- **Lower ranges available - contact factory**



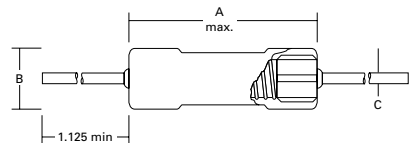
## Electrical Data

Type		SPP-1	SPP-2	SPP-3
Resistance range	ohms	0R1 - 1K2*	0R1 - 2K4	0R1 - 2K4
Standard Tolerance	±%	5, 10	5, 10	5, 10
Power Rating	watts	1 @ 85°C	2 @ 85°C	3 @ 85°C
		0.75 @ 105°C	1 @ 140°C	2 @ 145°C
		0.5 @ 125°C	-	1 @ 190°C
		Derating to 0 @ 160°C	-	-
Load Life Stability	watts	1 @ 85°C ± 10%	2 @ 85°C ± 10%	3 @ 85°C ± 10%
Max. Continuous Working Voltage		√PR		
Min. Insulation Resistance - Dry		10,000 megohm		
Min. Insulation Resistance - Wet		100 megohm		
Min. Dielectric Withstanding Voltage		600 volts RMS		
Current Noise		Negligible		
Temperature Rise at Rated Load, 25°C Ambient		Approx. 150°C	Approx. 200°C	Approx. 225°C

Note: Unless specified otherwise standard test centres are 1<sup>3</sup>/<sub>4</sub> inches.

## Physical Data

Dimensions (inches)			
Type	A max	B max	C±0.002
SPP-1	0.400	0.148	0.032
SPP-2	0.570	0.170	0.032
SPP-3	0.570	0.170	0.032



## Fuse/Pulse Applications

SPP resistors normally fuse in less than one minute with five to ten times rated wattage depending on the range. By modifying the windings, using a different wire size or type, they can be made to fuse much faster.

On the other hand, by using larger wire diameters and higher melt temperature alloys they can handle from five to fifty times overloads of film resistors depending on the range.

## General Note

Welwyn Components reserves the right to make changes in product specification without notice or liability. All information is subject to Welwyn's own data and is considered accurate at time of going to print.

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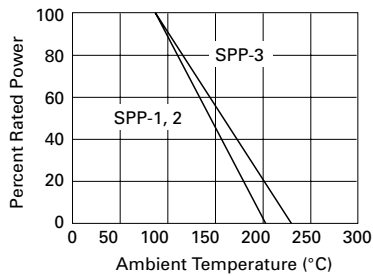
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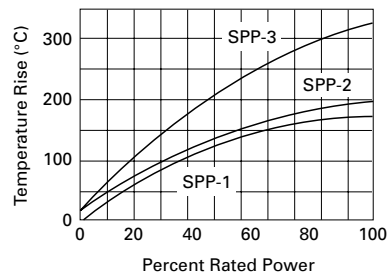
## Performance Data

	Maximum Limits
Temperature Coefficient	SPP-1 $\pm 600/^{\circ}\text{C}$ 0.10 $\Omega$ -0.91 $\Omega$ $\pm 300/^{\circ}\text{C}$ 1.0 $\Omega$ -1200 $\Omega$
	SPP-2 $\pm 600/^{\circ}\text{C}$ 0.10 $\Omega$ -0.91 $\Omega$ $\pm 300/^{\circ}\text{C}$ 1.0 $\Omega$ -2400 $\Omega$
	SPP-3 $\pm 600/^{\circ}\text{C}$ 0.10 $\Omega$ -0.91 $\Omega$ $\pm 600/^{\circ}\text{C}$ 1.0 $\Omega$ -2400 $\Omega$
Thermal Shock	$\pm 5\%$
Low Shock	$\pm 5\%$
Short Time Overload	$\pm 5\%$
Commercial Short Time Overload	$\pm 5\%$
Resistance to Solder Immersion	$\pm 3\%$
Solderability	95% minimum coverage
Moisture Resistance	$\pm 5\%$
Life Test	$\pm 5\%$
Test Method	EIA Specification RS-344

### Power Derating:



### Temperature Rise:



## Ordering Procedure

Example: SPP1 at 100 ohms and 5% tolerance tape packed on a reel –

