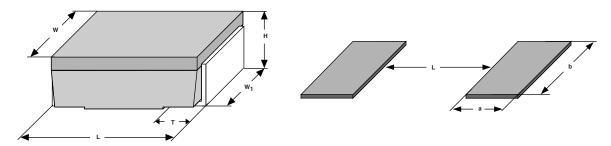


### **DIMENSIONS** in inches (millimeters)

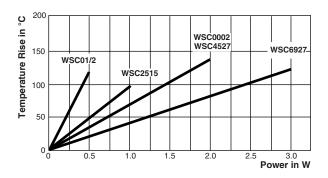


GLOBAL	DIMENSIONS				SOLDER PAD DIMENSIONS			
MODEL	L	Н	Т	W	W <sub>1</sub>	а	b	L
WSC01/2	$0.200 \pm 0.020$ (5.08 ± 0.508)	0.096 ± 0.015 (2.44 ± 0.381)	0.040 ± 0.010 (1.02 ± 0.254)	0.125 ± 0.005 (3.18 ± 0.127)	0.050 ± 0.010 (1.27 ± 0.254)	0.085 (2.16)	0.070 (1.78)	0.080 (2.03)
WSC2515	$0.250 \pm 0.020$ (6.35 ± 0.508)	0.110 ± 0.015 (2.79 ± 0.381)	0.045 ± 0.010 (1.14 ± 0.254)	0.150 ± 0.005 (3.81 ± 0.127)	0.098 ± 0.005 (2.49 ± 0.127)	0.090 (2.29)	0.115 (2.92)	0.120 (3.05)
WSC0002	$0.455 \pm 0.020$ (11.56 ± 0.508)	0.167 ± 0.010 (4.24 ± 0.254)	0.100 ± 0.010 (2.54 ± 0.254)	0.275 ± 0.005 (6.98 ± 0.127)	0.215 ± 0.005 (5.46 ± 0.127)	0.155 (3.94)	0.230 (5.84)	0.205 (5.21)
WSC4527	0.455 ± 0.020 (11.56 ± 0.508)	0.167 ± 0.010 (4.24 ± 0.254)	0.100 ± 0.010 (2.54 ± 0.254)	0.275 ± 0.005 (6.98 ± 0.127)	0.215 ± 0.005 (5.46 ± 0.127)	0.155 (3.94)	0.230 (5.84)	0.205 (5.21)
WSC6927	$0.690 \pm 0.032$ (17.53 ± 0.813)	0.280 ± 0.015 (7.11 ± 0.381)	0.100 ± 0.010 (2.54 ± 0.254)	0.275 ± 0.005 (6.98 ± 0.127)	0.215 ± 0.015 (5.46 ± 0.381)	0.155 (3.94)	0.235 (5.97)	0.470 (11.94)

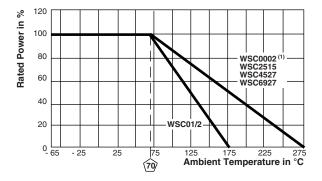
#### Notes

- 3D models available: www.vishav.com/doc?30328
- Surface mount solder profile recommendations: www.vishay.com/doc?31052
- Refer to WSC, WSN conversion guide for detailed construction drawings: <a href="www.vishav.com/doc?49616">www.vishav.com/doc?49616</a>

### **TEMPERATURE RISE**



## **DERATING**

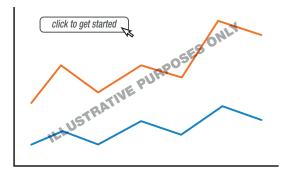


#### Note

(1) As of 1/1/2010, WSC0002 will be molded with thermoplastic and have the higher 275 °C temperature derating



#### **PULSE CAPABILITY**



www.vishay.com/resistors/SMD-wirewound-pulse-capability-calculator/

#### Note

Pulse capability increases based on the amount of wire for the resistance value and construction. The WSC0002 has greater pulse capability
than WSC4527 due to differences in internal construction. The non-inductive WSN has greater pulse capability for the same size WSC
because the second layer of wire increases the wire mass available to withstand pulse energy without exceeding temperature limits.
 Follow pulse graphic link for more information regarding capability

PERFORMANCE					
TEST	CONDITIONS OF TEST	TEST LIMITS			
Thermal shock	-55 °C to +150 °C, 1000 cycles, 15 min at each extreme	± 0.5 % + 0.05 Ω			
Short time overload	5 x rated power for 5 s	± 0.2 % + 0.05 Ω			
Low temperature storage	-65 °C for 24 h	± 0.2 % + 0.05 Ω			
High temperature exposure	1000 h at + 275 °C (+175 °C for WSC01/2)	± 0.5 % + 0.05 Ω			
Bias humidity	+85 °C, 85 % RH, 10 % bias, 1000 h	± 0.2 % + 0.05 Ω			
Mechanical shock	100 g's for 6 ms, 5 pulses	± 0.1 % + 0.05 Ω			
Vibration	Frequency varied 10 Hz to 500 Hz in 1 min, 3 directions, 9 h	± 0.1 % + 0.05 Ω			
Load life	1000 h at rated power, +70 °C, 1.5 h "ON", 0.5 h "OFF"	± 1.0 % + 0.05 Ω			
Resistance to solder heat	+260 °C solder, 10 s to 12 s dwell, 25 mm/s emergence	± 0.5 % + 0.05 Ω			

PACKAGING						
MODEL	REEL					
MODEL	TAPE WIDTH	DIAMETER	PIECES/REEL	CODE		
WSC01/2	12 mm/embossed plastic	330 mm/13"	2000	EA/TA		
WSC2515	16 mm/embossed plastic	330 mm/13"	2000	EA/TA		
WSC0002, WSC4527	24 mm/embossed plastic	330 mm/13"	1200	EA/TA		
WSC6927	32 mm/embossed plastic	330 mm/13"	725	EA/TA		

#### Notes

- Embossed carrier tape per EIA-481
- Additional packaging details at <u>www.vishay.com/doc?20051</u>



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# **Mouser Electronics**

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# Vishay:

WSC4527400R0FEI	B WSC000241R00JTA	WSC00026R800FTA	WSC25152R200FEB	WSC2515R3300FEB
WSC2515R8200FEB	WSC2515R4700FEB	WSC251522R00FEB	WSC25152R500FEB	WSC2515120R0FEB
WSC2515180R0FEB	WSC25153R300FEB	WSC2515R3300FEK	WSC0002R3300FTB	WSC0002R5600FTB
WSC0002R3000FTB	WSC251550R00FEA	WSC25153R300FEA	WSC000233R00FEB	WSC45272R700FEB
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WSC251512R00FTA	WSC2515R3010FTA	WSC2515R3010FTB	WSC2515R5000FTB	WSC2515R3300FEA
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