SR series

High Voltage Surge Resistor

Surge Resistors are plated with Carbon film or Metal Glazed film on ceramic rod and then is coated with Silicone paint. Excellent anti-surge characteristic and Suitable to pulse circuit. (Power type resistors)

Feature

• Excellent anti-surge characteristic

• Highly stable against environmental conditions and overload

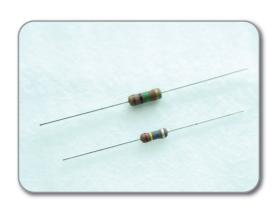
• Suitable to pulse circuits

• Excellent mechanical and thermal shock at a high temperature

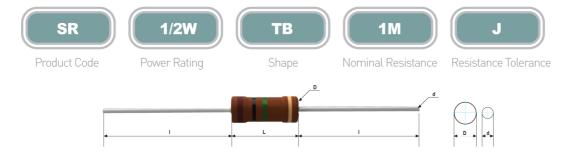
• Miniature size: (SRS 1/2W, 1W, 2W, 3W) result in 50% space saving

Coating Color: SiliconSR (Standard): BrownSRS (Mini): BrownMaking: Color Coding

• Available Type: TC, TB, TR, TT, M-F, R-F (Please refer to 'Reference 1. TYPE')



Description



Dimension

Туре	Dimension (mm)				
	L	D	I	d	
SR 1/4W	6.0±0.5	2.4±0.2	26.0±1.0	0.58±0.05	
SRS 1/2W	6.0±0.5	2.4±0.2	26.0±1.0	0.58±0.05	
SR 1/2W	9.0±1.0	3.2±0.2	25.0±1.0	0.70±0.05	
SRS 1W	9.0±1.0	3.2±0.2	25.0±1.0	0.70±0.05	
SR 1W	11.0±1.0	4.0±0.5	30.0±1.0	0.70±0.05	
SRS 2W	11.0±1.0	4.0±0.5	30.0±1.0	0.70±0.05	
SR 2W	15.0±1.0	5.5±0.5	28.0±1.0	0.80±0.05	
SRS 3W	15.0±1.0	5.5±0.5	28.0±1.0	0.80±0.05	

Rating

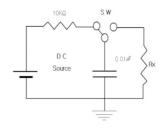
Туре	Power Rating(W)	Max Working- Voltage(V)	Max Overload Voltage(V)	Dielectric Withstanding Voltage(V)	Operating Temp.(°C)	Resistance Range(Ω)	Resistance Tolerance (%)
SR 1/4W	1/4	500	1,000	500		CC Type 47≤R < 47K MG Type 47K≤R < 100M	F (±1%) G (±2%) J (±5%) K (±10%) L (±15%)
SRS 1/2W	1/2	700	1,000	600			
SR 1/2W	1/2	700	1,000	600			
SRS 1W	1	1,000	1,500	600			
SR 1W	1	1,000	1,500	600	-55 ~ +155		
SRS 2W	2	1,200	1,500	600			
SR 2W	2	1,200	1,500	600			
SRS 3W	3	1,200	1,500	600			

^{*} Glossary of Terms : CC (Carbon Composition)-Carbon film application MG (Metal Glaze)-Metal Glaze Film application

Performance

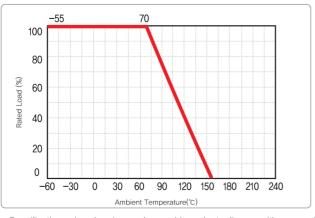
Test Items	Performance Requirements	Test Methods		
Resistance	With specified tolerance	Measure resistance at 25℃		
Temperature Coefficient Resistance	47≤R < 47K : ±1,000PPM/℃ 47K≤R < 100M : ±200PPM/℃	+25℃ / +125℃		
Short Time Over Load	±1%	Rated voltage x 2.5 for 5sec Max overload voltage		
Resistance Against Soldering Test	±1%	260±3℃, 2~2.5mm, 5±1sec measure resistance After 1hr at room temp		
Load Life in Temperature	±5%	40±2℃, 90~95% RH, 1.5hr ON/0.5hr OFF, 120hr		
Load Life in Moisture	±5%	70±2℃, 1.5hr ON/0.5hr OFF, 120hr Refer to		
Surge	±10%	Refer to *TEST circuit, 2.5 sec On, 2.5 sec OFF 10 cycle		

TEST Circuit

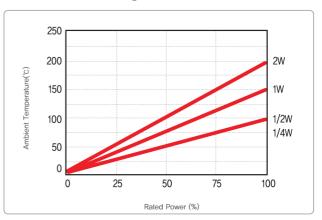


Watt	Resistance(Ω)	Capacity	Voltage	Watt	Resistance(Ω)	Capacity	Voltage
1/4	R < 4K7	1nF	2KV	1/2	100K≤R<470K	10nF	6KV
	4K7≤R < 100K	1nF	3KV	1/2	470K≤R	10nF	7KV
	100K≤R<470K	1nF	5KV	1	R < 470K	10nF	7KV
	470K≤R	1nF	7KV		470K≤R	10nF	10KV
1/2	R < 4K7	1nF	5KV	2	47≤R < 100M	10nF	10KV
	4K7≤R < 100K	1nF	6KV				

Derating Curve



Surface Temperature Rise



^{*}Specifications given herein are changeable under to discuss with user and maybe changed at anytime without prior notice.