Radial Leads/SkyCap®/SR Series

GENERAL INFORMATION

AVX SR Series

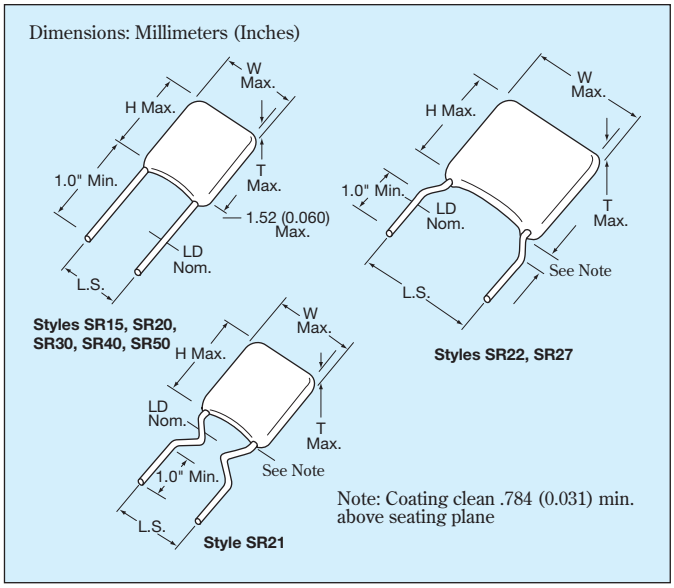
Conformally Coated Radial Leaded MLC

Temperature Coefficients: C0G (NP0), X7R, Z5U

200, 100, 50 Volts (300V, 400V & 500V also available)

Case Material: Epoxy

Lead Material: RoHS Compliant, 100% Tin



Drawings are for illustrative purposes only.
Actual lead form shape could vary within stated tolerances based on body size.

HOW TO ORDER

SR21	5	E	104	M	A	R	TR1

AVX Style
SR15
SR20
SR21
SR22
SR27
SR30
SR40
SR50

Voltage
5 = 50V
1 = 100V
2 = 200V
9 = 300V
8 = 400V
7 = 500V

Temperature Coefficient
A = C0G (NP0)
C = X7R
E = Z5U

Capacitance
First two digits are the significant figures of capacitance. Third digit indicates the additional number of zeros. For example, order 100,000 pF as 104. (For values below 10pF use "R" in place of decimal point, e.g., 1R4 = 1.4pF.)

Capacitance Tolerance

C0G (NP0):	X7R:
C = ±.25pF	J = ±5%
D = ±.5pF	K = ±10%
F = ±1% (>50pF only)	M = ±20%
G = ±2% (>25pF only)	Z5U:
J = ±5%	M = ±20%
K = ±10%	Z = +80% -20%

Failure Rate
A = Not Applicable

Leads
R = RoHS Long Lead 1.0" minimum

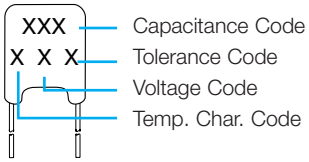
Packaging
Blank = Bulk Packaging
T = Trimmed Leads .230"± .030" Bulk packaging
TR1 = Tape and Reel Packaging
AP1 = Ammopack Packaging

See packaging specification page 33-34.

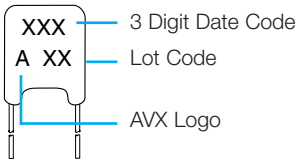
RoHS COMPLIANT

MARKING

FRONT



BACK



PACKAGING REQUIREMENTS

	Quantity per Bag
SR15, 20, 21, 22, 27, 30	1000 Pieces
SR40, 50	500 Pieces

Note: SR15, SR20, SR21, SR30, and SR40 available on tape and reel per EIA specifications RS-468. See Pages 33 and 34.

Radial Leads/SkyCap®/SR Series

C0G (NP0) Dielectric

SIZE AND CAPACITANCE SPECIFICATIONS

EIA Characteristic

Dimensions: Millimeters (Inches)

AVX Style	SR15	SR20	SR21	SR22	SR27	SR30	SR40	SR50
AVX "Insertable"	SR07	SR29	SR59	N/A	N/A	SR65	SR75	N/A
Width (W)	3.81 (.150)	5.08 (.200)	5.08 (.200)	5.08 (.200)	6.604 (.260)	7.62 (.300)	10.16 (.400)	12.70 (.500)
Height (H)	3.81 (.150)	5.08 (.200)	5.08 (.200)	5.08 (.200)	6.35 (.250)	7.62 (.300)	10.16 (.400)	12.70 (.500)
Thickness (T)	2.54 (.100)	3.175 (.125)	3.175 (.125)	3.175 (.125)	4.06 (.160)	3.81 (.150)	3.81 (.150)	5.08 (.200)
Lead Spacing (L.S.)	2.54 (.100)	2.54 (.100)	5.08 (.200)	6.35 (.250)	7.62 (.300)	5.08 (.200)	5.08 (.200)	10.16 (.400)
Lead Diameter (L.D.)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.635 (.025)

Cap. in.* pF	Industry Preferred Values in Blue	SR15 WVDC 200	SR15 WVDC 100	SR15 WVDC 50	SR20 WVDC 200	SR20 WVDC 100	SR20 WVDC 50	SR21 WVDC 200	SR21 WVDC 100	SR21 WVDC 50	SR22 WVDC 200	SR22 WVDC 100	SR22 WVDC 50	SR27 WVDC 200	SR27 WVDC 100	SR27 WVDC 50	SR30 WVDC 100	SR30 WVDC 50	SR40 WVDC 100	SR40 WVDC 50	SR50 WVDC 100	SR50 WVDC 50
1.0-9.9	SR151A1R0DAR																					
10	**SR151A100KAR**																					
15	SR-----A150KAR																					
22	SR-----A220KAR																					
33	SR-----A330KAR																					
39	SR-----A390KAR																					
47	SR-----A470KAR																					
68	SR-----A680KAR																					
100	**SR151A101KAR**																					
150	SR-----A151KAR																					
220	SR-----A221KAR																					
330	SR-----A331KAR																					
390	SR-----A391KAR																					
470	SR-----A471KAR																					
680	SR-----A681KAR																					
1000	**SR211A102KAR**																					
1500	SR-----A152KAR																					
2200	SR-----A222KAR																					
3900	SR-----A392KAR																					
4700	SR-----A472KAR																					
6800	SR-----A682KAR																					
8200	SR-----A822KAR																					
10,000	**SR305A103KAR**																					
15,000	SR-----A153KAR																					
22,000	SR-----A223KAR																					
33,000	SR-----A333KAR																					
39,000	SR-----A393KAR																					
47,000	SR-----A473KAR																					
68,000	SR-----A683KAR																					
100,000	SR-----A104KAR																					

For other styles, voltages, tolerances and lead lengths see Part No. Codes or contact factory.

***Other capacitance values available upon special request.**

= Industry preferred values

= SR20 only

Capacitance ranges available for SR12 and SR07 same as SR15
SR62 and SR59 same as SR21
SR64 and SR65 same as SR30
SR75 same as SR40
SR13 same as SR21

NOTE: For others voltages, tolerances, electrical specifications and NPO typical characteristics, see the AVX Multilayer Ceramic Leaded Capacitors Catalog.

Radial Leads/SkyCap®/SR Series

X7R Dielectric

SIZE AND CAPACITANCE SPECIFICATIONS

EIA Characteristic

Dimensions: Millimeters (Inches)

AVX Style	SR15	SR20	SR21	SR22	SR27	SR30	SR40	SR50
AVX "Insertable"	SR07	SR29	SR59	N/A	N/A	SR65	SR75	N/A
Width (W)	3.81 (.150)	5.08 (.200)	5.08 (.200)	5.08 (.200)	6.604 (.260)	7.62 (.300)	10.16 (.400)	12.70 (.500)
Height (H)	3.81 (.150)	5.08 (.200)	5.08 (.200)	5.08 (.200)	6.35 (.250)	7.62 (.300)	10.16 (.400)	12.70 (.500)
Thickness (T)	2.54 (.100)	3.175 (.125)	3.175 (.125)	3.175 (.125)	4.06 (.160)	3.81 (.150)	3.81 (.150)	5.08 (.200)
Lead Spacing (L.S.)	2.54 (.100)	2.54 (.100)	5.08 (.200)	6.35 (.250)	7.62 (.300)	5.08 (.200)	5.08 (.200)	10.16 (.400)
Lead Diameter (L.D.)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.635 (.025)

Cap. in.* pF	Industry Preferred Values in Blue	WVDC 200	100	50	200	100	50	200	100	50	100	50	100	50	200	100	50	200	100	50	200	100	50
470	SR_____C471KAR																						
1000	**SR155C102KAR**																						
1500	SR_____C152KAR																						
2200	SR_____C222KAR																						
3300	SR_____C332KAR																						
4700	SR_____C472KAR																						
6800	SR_____C682KAR																						
10,000	**SR215C103KAR**																						
15,000	SR_____C153KAR																						
22,000	SR_____C223KAR																						
33,000	SR_____C333KAR																						
47,000	SR_____C473KAR																						
68,000	SR_____C683KAR																						
100,000	**SR215C104KAR**																						
150,000	SR_____C154KAR																						
220,000	**SR215C224KAR**																						
330,000	SR_____C334KAR																						
390,000	SR_____C394KAR																						
470,000	**SR305C474KAR**																						
1.0 uF	**SR305C105KAR**																						
2.2 uF	SR405C225KAR																						
2.7 uF	SR505C275KAR																						
4.7 uF	SR505C475KAR																						
10.0 uF	SR655C106KAR																						

For other styles, voltages, tolerances and lead lengths see Part No. Codes or contact factory.

= Industry preferred values

= Extended range

= Extended range with 0.150" thickness maximum

Radial Leads/SkyCap®/SR Series

Z5U Dielectric

SIZE AND CAPACITANCE SPECIFICATIONS

EIA Characteristic

Dimensions: Millimeters (Inches)

AVX Style	SR15	SR20	SR21	SR22	SR27	SR30	SR40	SR50
AVX "Insertable"	SR07	SR29	SR59	N/A	N/A	SR65	SR75	N/A
Width (W)	3.81 (.150)	5.08 (.200)	5.08 (.200)	5.08 (.200)	6.604 (.260)	7.62 (.300)	10.16 (.400)	12.70 (.500)
Height (H)	3.81 (.150)	5.08 (.200)	5.08 (.200)	5.08 (.200)	6.35 (.250)	7.62 (.300)	10.16 (.400)	12.70 (.500)
Thickness (T)	2.54 (.100)	3.175 (.125)	3.175 (.125)	3.175 (.125)	4.06 (.160)	3.81 (.150)	3.81 (.150)	5.08 (.200)
Lead Spacing (L.S.)	2.54 (.100)	2.54 (.100)	5.08 (.200)	6.35 (.250)	7.62 (.300)	5.08 (.200)	5.08 (.200)	10.16 (.400)
Lead Diameter (L.D.)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.508 (.020)	.635 (.025)

Cap. in.* pF	Industry Preferred Values in Blue	WVDC 100	WVDC 50	WVDC 100	WVDC 50	WVDC 100	WVDC 50	WVDC 100	WVDC 50	WVDC 100	WVDC 50	WVDC 100	WVDC 50	WVDC 100	WVDC 50	WVDC 100	WVDC 50
10,000	**SR155E103ZAR**																
47,000	SR_____E473ZAR																
100,000	**SR215E104ZAR**																
150,000	SR_____E154ZAR																
220,000	**SR215E224ZAR**																
330,000	**SR215E334ZAR**																
470,000	**SR215E474ZAR**																
680,000	SR_____E684ZAR																
1.0 µF	**SR_____105ZAR**																
1.5 µF	SR30E155ZAR																
2.2 µF	SR30E225ZAR																
3.3 µF	SR30E335ZAR																
4.7 µF	SR30E475ZAR																

For other styles, voltages, tolerances and lead lengths see Part No. Codes or contact factory.

***Other capacitance values available upon special request.**

= Industry preferred values

= SR20 only

Capacitance ranges available for SR12 and SR07 same as SR15
SR62 and SR59 same as SR21
SR64 and SR65 same as SR30
SR75 same as SR40
SR13 same as SR21

NOTE: For others voltages, tolerances, electrical specifications and NPO typical characteristics, see the AVX Multilayer Ceramic Leaded Capacitors Catalog.

AVX 500 VOLT SKYCAPS**

STYLE*	MAXIMUM CAPACITANCE VALUE C0G (NP0)	X7R
SR29	900 pF	.015 µF
SR20	1800 pF	.033 µF
SR28 SR59	900 pF	.015 µF
SR13 SR21	1800 pF	.033 µF
SR30 SR61 SR65	7200 pF	.12 µF
SR40 SR75	.015 µF	.27 µF
SR22	1800 pF	.033 µF
SR27	1800 pF	.033 µF
SR76	.015 µF	.27 µF
SR50	.036 µF	.59 µF

*Consult pages 27 and 28 for style sizes.

**Voltage rating based on DWV of 150% of rated voltage.