FPCAP Functional Polymer Aluminum Solid Electrolytic Capacitors

SS & SA & SB series

Large Capacitance | Low ESR | φ6.3
SMD | Lead-free | RoHS Compliance

UPGRADE

Features

By using Functional Polymer cathode, Frequency & Temp. characteristics are greatly improved.

- Low ESR at a high frequency range.
- High ripple current capability.
- Long life and high reliability.

Applications

- Switching Power Supply and DC/DC Converter.
- Back up Power Supplies of CPU(VRM etc.)
- Miniature high Power Supply.

Environmental Correspondence

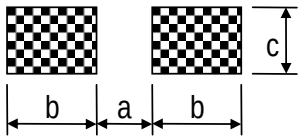
Corresponding to Lead-free, RoHS compliance and Halogen-free.

- The Lead-free of terminal plating (Sn)

Specifications

Items		Characteristic
		SS, SA, SB
Operating temp. range		-55 to +105°C
Rated voltage range		2.5 to 35V·DC
Capacitance range		10 to 560μF
Capacitance tolerance		±20% (M)
Endurance	Test condition	105°C, rated voltage 2000Hrs.
	Capacitance	Within ±20% of initial value before test
	Leakage current	Not to exceed the initial specified value
	ESR	Not to exceed 150% of initial specified value
	tan δ	Not to exceed 150% of initial specified value
Failure Rate		0.5% / 1000Hrs. Max (60%CL)

Recommended land pattern



[Unit: mm]

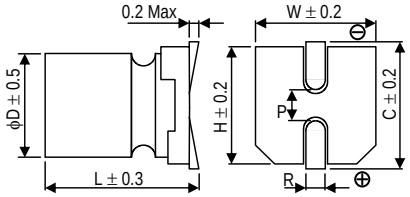
φD	a	b	c
6.3	2.1	3.5	1.6

Size (ESR) List

[φD×L (mΩ)]

R.V. (S.V.) [V] / Cap. [μF]	2.5 (2.8)			4.0 (4.6)		6.3 (7.2)			10 (11.5)	16 (18.4)		25 (28.7)	35 (40.2)
	SS	SA	SB	SA	SB	SS	SA	SB	SA	SS	SA	SS	SS
10												6.3×5.7 (60)	6.3×5.7 (60)
22												6.3×5.7 (40)	
27												6.3×5.7 (40)	
47												6.3×5.7 (30)	
56												6.3×5.7 (30)	
68												6.3×5.7 (30)	
100						6.3×5.7 (25)				6.3×5.7 (24)	6.3×7.7 (24)		
120									6.3×5.7 (18)				
180											6.3×5.7 (22)		
220						6.3×5.7 (25)	6.3×5.7 (15)	6.3×5.7 (12)					
270							6.3×5.7 (14)						
330		6.3×5.7 (14)		6.3×5.7 (14)	6.3×5.7 (11)	6.3×5.7 (25)	6.3×5.7 (14)						
390		6.3×5.7 (14)	6.3×5.7 (10)	6.3×5.7 (14)									
470		6.3×5.7 (13)											
560	6.3×5.7 (25)	6.3×5.7 (13)	6.3×5.7 (10)										

Dimensions



[Unit: mm]

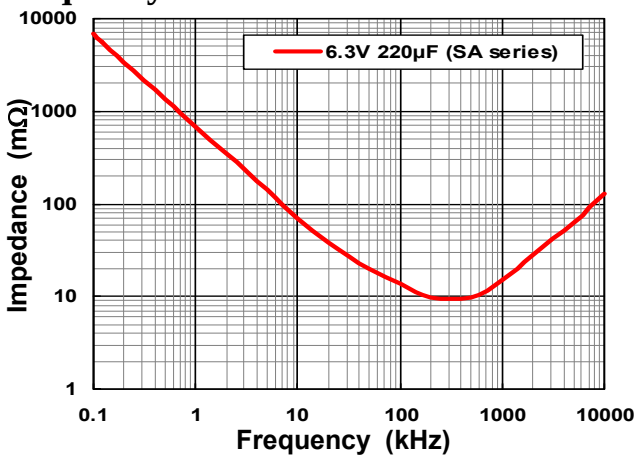
φD×L	W	H	C	R	P
6.3×5.7	6.5	6.5	7.2	0.5 to 0.9	2.1
6.3×7.7	6.5	6.5	7.2	0.5 to 0.9	2.1

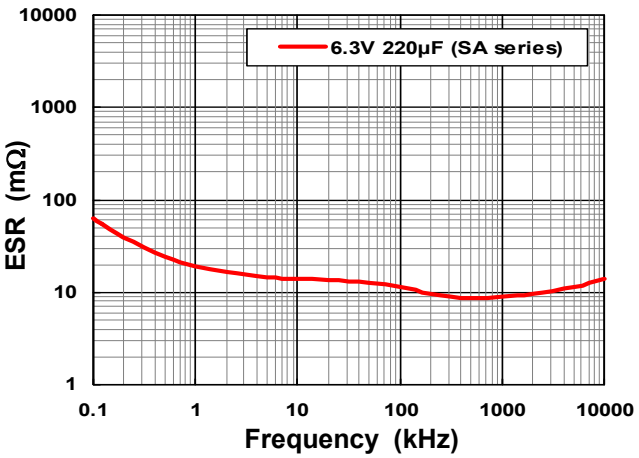
●Part number & Specifications

Rated Voltage (V)	Rated Capacitance (μF, 120Hz)	Part Number		Leakage Current* (μA, 2 min)	tanδ (120Hz)	ESR (mΩ, 100kHz)	Rated Ripple Current (mA, r.m.s.)	Case Size φD×L(mm)
		NICHICON	FPCAP					
2.5	330	RSA0E331MCN1GS	FP-2R5ME331M-SAR	700	0.12	14	3160	6.3 × 5.7
	390	RSA0E391MCN1GS	FP-2R5ME391M-SAR	700	0.12	14	3160	6.3 × 5.7
	390	RSB0E391MCN1GS	FP-2R5ME391M-SBR	700	0.12	10	3650	6.3 × 5.7
	470	RSA0E471MCN1GS	FP-2R5ME471M-SAR	700	0.12	13	3600	6.3 × 5.7
	560	RSS0E561MCN1GS	FP-2R5ME561M-SSR	700	0.12	25	2500	6.3 × 5.7
	560	RSA0E561MCN1GS	FP-2R5ME561M-SAR	700	0.12	13	3600	6.3 × 5.7
	560	RSB0E561MCN1GS	FP-2R5ME561M-SBR	700	0.12	10	3800	6.3 × 5.7
4.0	330	RSA0G331MCN1GS	FP-4R0ME331M-SAR	700	0.12	14	3160	6.3 × 5.7
	330	RSB0G331MCN1GS	FP-4R0ME331M-SBR	700	0.12	11	3700	6.3 × 5.7
	390	RSA0G391MCN1GS	FP-4R0ME391M-SAR	700	0.12	14	3160	6.3 × 5.7
6.3	100	RSS0J101MCN1GS	FP-6R3ME101M-SSR	700	0.12	25	2500	6.3 × 5.7
	220	RSS0J221MCN1GS	FP-6R3ME221M-SSR	700	0.12	25	2500	6.3 × 5.7
	220	RSA0J221MCN1GS	FP-6R3ME221M-SAR	700	0.12	15	3160	6.3 × 5.7
	220	RSB0J221MCN1GS	FP-6R3ME221M-SBR	700	0.12	12	3500	6.3 × 5.7
	270	RSA0J271MCN1GS	FP-6R3ME271M-SAR	700	0.12	14	3160	6.3 × 5.7
	330	RSS0J331MCN1GS	FP-6R3ME331M-SSR	700	0.12	25	2500	6.3 × 5.7
	330	RSA0J331MCN1GS	FP-6R3ME331M-SAR	700	0.12	14	3160	6.3 × 5.7
10	120	RSA1A121MCN1GS	FP-010ME121M-SAR	700	0.12	18	2900	6.3 × 5.7
16	100	RSS1C101MCN1GS	FP-016ME101M-SSR	700	0.12	24	2490	6.3 × 5.7
	100	RSA1C101MCN1GS	FP-016ME101M-SAR	700	0.12	24	2700	6.3 × 7.7
	180	RSA1C181MCN1GS	FP-016ME181M-SAR	576	0.12	22	3300	6.3 × 5.7
25	10	RSS1E100MCN1GS	FP-025ME100M-SSR	100	0.12	60	1700	6.3 × 5.7
	22	RSS1E220MCN1GS	FP-025ME220M-SSR	110	0.12	40	2100	6.3 × 5.7
	27	RSS1E270MCN1GS	FP-025ME270M-SSR	135	0.12	40	2600	6.3 × 5.7
	47	RSS1E470MCN1GS	FP-025ME470M-SSR	235	0.12	30	2800	6.3 × 5.7
	56	RSS1E560MCN1GS	FP-025ME560M-SSR	280	0.12	30	2800	6.3 × 5.7
	68	RSS1E680MCN1GS	FP-025ME680M-SSR	340	0.12	30	2800	6.3 × 5.7
35	10	RSS1V100MCN1GS	FP-035ME100M-SSR	100	0.12	60	1700	6.3 × 5.7

* In case of some doubt about measured values, measure after applying rated voltage for 120 minutes at 105°C.

●Frequency Characteristics





●Part Number (EX) 6.3V, 220μF, SA series

Nichicon P/N

R	SA	0J	221	M	CN	1	GS
Type	Series Name	Rated Voltage	Rated Capacitance	Capacitance Tolerance	Configuration	Control Code	Taping Code

FPCAP P/N

FP	—	6R3	ME	221	M	—	SA	R	
Commodity Mark		Rated Voltage	Classification	Rated Capacitance	Capacitance Tolerance		Series Name	Taping Code	Control Code