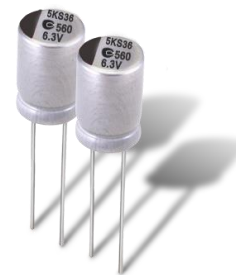


AP-CON Aluminum Solid Electrolytic Capacitor



AR5K Series Long Life

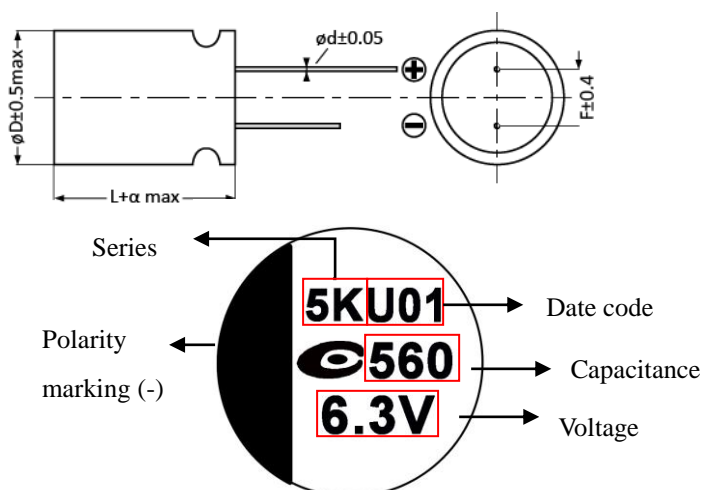
- Rated voltage: 2.5~25Vdc
- Endurance 5000hrs at 105°C
- Suitable for DC-DC converters, voltage regulators and decoupling applications
- RoHS Compliant



Specification

Category Temperature Range	-55 to 105°C	Rated Voltage Range	2.5 to 25Vdc
Rated Capacitance Range	10 to 1000 (µF)	Capacitance Tolerance	±20% (M)
Surge Voltage	Rated voltage X 1.15 (at 105°C)	Dissipation Factor	0.1 max. (at 20°C 120Hz)
Leakage Current	Shall not exceed values shown in standard ratings. (at 20°C after 2 mins.)		
Endurance	105°C, 5000hrs, rated voltage applied		
	Appearance	No significant damage	
	Capacitance Change	≤ ±20% of the initial value	
	DF(tanδ)	≤ 150% of the initial specified value	
	ESR	≤ 150% of the initial specified value	
	Leakage current	≤ The initial specified value	
Damp Heat (Steady State)	60°C, 90 to 95% RH, 1000hrs, no voltage applied		
	Appearance	No significant damage	
	Capacitance Change	≤ ±20% of the initial value	
	DF(tanδ)	≤ 150% of the initial specified value	
	ESR	≤ 150% of the initial specified value	
	Leakage current	≤ The initial specified value	
Surge Voltage	1,000 cycles and each one includes charge with surge voltage specified at 105°C for 0.5min through a protective resistor (R=1kΩ) and discharge for 5.5min.		
	Appearance	No significant damage	
	Capacitance Change	≤ ±20% of the initial value	
	DF(tanδ)	≤ 150% of the initial specified value	
	ESR	≤ 150% of the initial specified value	
	Leakage current	≤ The initial specified value	

Dimensions and Marking



SIZE Code	$\phi D \pm 0.5 \text{ max}$	L	α	$\phi d \pm 0.05$	$F \pm 0.4$
04X5	4.0	5.0	1.0	0.45	1.5
05X8	5.0	8.0	1.0	0.50	2.0
06X5	6.3	5.0	1.0	0.45	2.5
06X8	6.3	8.0	1.0	0.60	2.5
08X8	8.0	8.0	1.0	0.60	3.5
08A2	8.0	11.5	1.5	0.60	3.5
10A2	10.0	11.5	1.5	0.60	5.0

AR5K Series Long Life

Standard Ratings

WV/Vdc (SV)	Cap (μF)	Size Code	Leakage Current (μA)	ESR (mΩmax/20%, 100k to 300kHz)	Rated Ripple Current (mArms/ 105°C /100kHz)	Part No.
2.5 (2.9)	390	05X8	500	7	4,180	2R5AR5K391M05X8C
	560	05X8	500	7	4,180	2R5AR5K561M05X8C
	560	06X8	500	7	5,000	2R5AR5K561M06X8C
	820	06X8	500	7	5,000	2R5AR5K821M06X8C
	820	08X8	500	7	6,100	2R5AR5K821M08X8C
	1000	08X8	500	7	6,100	2R5AR5K102M08X8C
3 (3.4)	820	06X8	500	7	5,000	3R0AR5K821M06X8C
4 (4.6)	560	06X8	500	7	5,000	4R0AR5K561M06X8C
6.3 (7.2)	100	06X5	126	35	2,100	6R3AR5K101M06X5C
	470	06X8	592	8	4,700	6R3AR5K471M06X8C
	470	08X8	592	8	5,700	6R3AR5K471M08X8C
	560	06X8	705	8	4,700	6R3AR5K561M06X8C
	560	08X8	705	8	5,700	6R3AR5K561M08X8C
	820	06X8	1,033	8	4,700	6R3AR5K821M06X8C
	820	08X8	1,033	8	5,700	6R3AR5K821M08X8C
10 (11.5)	10	04X5	300	80	700	100AR5K100M04X5C
16 (18.4)	100	06X5	320	24	2,490	160AR5K101M06X5C
	100	06X8	320	25	2,820	160AR5K101M06X8C
	270	06X8	864	10	5,000	160AR5K271M06X8C
	270	08X8	864	10	5,000	160AR5K271M08X8C
	270	08A2	864	10	5,230	160AR5K271M08A2C
	330	08X8	1,056	10	5,000	160AR5K331M08X8C
	470	08A2	1,505	10	5,230	160AR5K471M08A2C
	1000	10A2	3,200	12	5,400	160AR5K102M10A2C
	25 (28.8)	56	06X5	280	30	2,800
82		06X8	410	28	2,780	250AR5K820M06X8C
100		08A2	500	22	3,600	250AR5K101M08A2C