

AVQC Series AEC-Q200

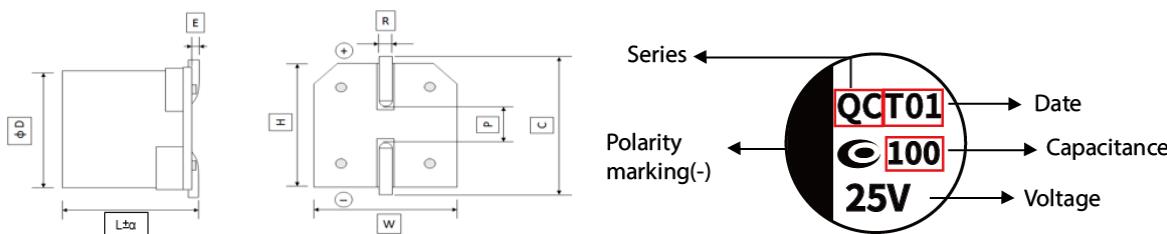
- Standard SMD type
- Rated Voltage: 16~80V
- Endurance 4000hr at 125°C
- High reliability and high voltage are realized by hybrid electrolyte
- For high temperature and high reliability applications
- RoHS Compliant
- AEC-Q200 compliant



Specification

Category	Temperature Range	-55~+125°C	Rated Voltage Range	16 to 80Vdc														
Rated Capacitance Range	10 to 820 (μ F)		Capacitance Tolerance	$\pm 20\%$ (M)														
Surge Voltage		Rated voltage X 1.25	Dissipation Factor (at 20°C 120Hz)	Rated Voltage (V) 16 25 35 50 63 80 tan δ(max) 0.16 0.14 0.12 0.1 0.08 0.08														
Leakage Current	Shall not exceed values shown in standard ratings (at 20°C after 2 mins.)																	
Endurance	125°C, 4000hr, apply the rated ripple current without exceeding the rated voltage																	
	Appearance	No significant damage																
	Capacitance Change	$\leq \pm 30\%$ of the initial value																
	DF(tanδ)	$\leq 200\%$ of the initial specified value																
	ESR	$\leq 200\%$ of the initial specified value																
	Leakage current	\leq The initial specified value																
Damp Heat (Steady State)	85°C, 85 to 90% RH, 2000hr, voltage applied																	
	Appearance	No significant damage																
	Capacitance Change	$\leq \pm 20\%$ of the initial value																
	DF(tanδ)	$\leq 200\%$ of the initial specified value																
	ESR	$\leq 200\%$ of the initial specified value																
	Leakage current	\leq The initial specified value																
Surge Voltage	1,000 cycles and each one includes charge with surge voltage specified at 125°C for 0.5min through a protective resistor (R=1kΩ) and discharge for 5.5min.																	
	Appearance	No significant damage																
	Capacitance Change	$\leq \pm 20\%$ of the initial value																
	DF(tanδ)	$\leq 150\%$ of the initial specified value																
	ESR	$\leq 150\%$ of the initial specified value																
	Leakage current	\leq The initial specified value																

Dimensions and Marking



Size code	$\Psi D \pm 0.5 \text{max}$ (mm)	L (mm)	α (mm)	E (mm)	$W \pm 0.2$ (mm)	$H \pm 0.2$ (mm)	$C \pm 0.2$ (mm)	R (mm)	$P \pm 0.2$ (mm)
0606	6.3	5.8	± 0.2	0.00~0.30	6.6	6.6	7.3	0.5~0.8	2.1
0608	6.3	7.5	± 0.5	0.00~0.30	6.6	6.6	7.3	0.5~0.8	2.1
0810	8.0	9.7	± 0.3	0.00~0.30	8.3	8.3	9.0	0.8~1.1	2.9
1010	10.0	10.2	± 0.3	0.00~0.30	10.3	10.3	11.0	0.8~1.1	4.6
1012	10.0	12.3	± 0.2	0.00~0.30	10.3	10.3	11.0	0.8~1.1	4.6
1016	10.0	16.5	± 0.3	0.00~0.20	10.3	10.3	11.0	0.8~1.1	4.6

Ask factory for the current technical specifications before purchase and/or use

Should a safety concern arise regarding this product, please be sure to contact us immediately.

CAT AVQC 2024 V4

AVQC Series AEC-Q200

Standard Ratings

WV/Vdc (SV)	Cap (μ F)	Size Code	Leakage Current (μ A)	$\tan\delta$	ESR (m Ω max/20%, 100k to 300kHz)	Rated Ripple Current (mArms/ 125°C /100kHz)	Part No.
16 (20)	820	1010	131.2	0.16	18	2,800	160AVQC821M1010
	47	0606	11.8	0.14	50	900	250AVQC470M0606
	56	0606	14	0.14	50	900	250AVQC560M0606
	68	0606	17	0.14	50	1,100	250AVQC680M0606
	100	0606	25	0.14	50	1,300	250AVQC101M0606
	100	0608	25	0.14	30	1,400	250AVQC101M0608
	150	0608	37.5	0.14	30	1,800	250AVQC151M0608
	220	0810	55	0.14	27	2,900	250AVQC221M0810
	270	0810	67.5	0.14	27	2,900	250AVQC271M0810
	330	1010	82.5	0.14	20	3,500	250AVQC331M1010
25 (31.3)	470	1010	117.5	0.14	20	3,500	250AVQC471M1010
	470	1012	117.5	0.14	14	3,500	250AVQC471M1012
	27	0606	9.5	0.12	60	900	350AVQC270M0606
	47	0606	16.5	0.12	60	900	350AVQC470M0606
	47	0608	16.5	0.12	35	1,400	350AVQC470M0608
	68	0608	23.8	0.12	35	1,400	350AVQC680M0608
	100	0608	35	0.12	35	1,700	350AVQC101M0608
	100	0810	35	0.12	27	1,900	350AVQC101M0810
	150	0810	52.5	0.12	27	2,900	350AVQC151M0810
	180	0810	63	0.12	27	2,900	350AVQC181M0810
35 (43.8)	220	1010	77	0.12	20	2,800	350AVQC221M1010
	270	1010	94.5	0.12	20	3,500	350AVQC271M1010
	330	1010	115.5	0.12	20	3,500	350AVQC331M1010
	330	1012	115.5	0.12	14	3,500	350AVQC331M1012
	470	1012	164.5	0.12	14	3,500	350AVQC471M1012
	470	1016	164.5	0.12	11	4,000	350AVQC471M1016
	22	0606	11	0.1	80	750	500AVQC220M0606
	33	0608	16.5	0.1	40	1,100	500AVQC330M0608
	47	0810	23.5	0.1	30	1,250	500AVQC470M0810
	68	0810	34	0.1	30	2,700	500AVQC680M0810
50 (62.5)	100	1010	50	0.1	23	2,900	500AVQC101M1010
	120	1010	60	0.1	25	2,900	500AVQC121M1010
	150	1012	75	0.1	17	2,000	500AVQC151M1012
	180	1012	90	0.1	17	3,200	500AVQC181M1012
	220	1016	110	0.1	13	3,700	500AVQC221M1016
	10	0606	6.3	0.08	120	700	630AVQC100M0606
	22	0608	13.9	0.08	80	900	630AVQC220M0608
	33	0810	20.8	0.08	40	1,100	630AVQC330M0810
	47	0810	29.6	0.08	32	2,400	630AVQC470M0810

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AP-CON HYBRID ALUMINUM ELECTROLYTIC CAPACITOR

56	1010	35.3	0.08	30	2,800	630AVQC560M1010
68	1010	42.8	0.08	30	2,800	630AVQC680M1010
82	1010	51.7	0.08	30	2,800	630AVQC820M1010
100	1010	63	0.08	30	2,800	630AVQC101M1010
120	1012	75.6	0.08	19	3,000	630AVQC121M1012
150	1016	94.5	0.08	15	3,500	630AVQC151M1016
80 (100)	22	0810	17.6	0.08	45	1,050
	47	1010	37.6	0.08	33	1,360
	56	1010	44.8	0.08	33	1,360
						800AVQC560M1010

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