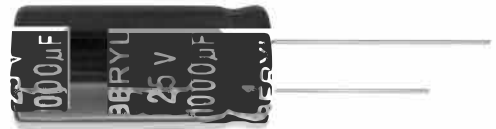


RG Series

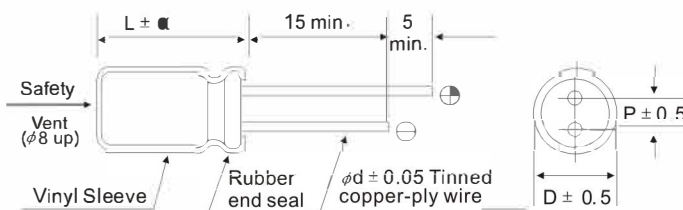
- Very low impedance and long life
- Endurance with ripple current: 4,000 to 10,000 hours at 105°C
- RoHS Compliant



规格表 SPECIFICATIONS

项目 Items	特性参数 Characteristics										
使用温度范围 Category Temperature Range	-55~+105°C										
额定工作电压范围 Rated Voltage Range	6.3~100V										
静电容量允许偏差 Capacitance Tolerance	±20% (M) (at 20°C, 120Hz)										
漏电流 Leakage Current	I ≤ 0.01CV or 3µA, which is greater after application of rated Voltage for 2 minutes. 施加额定工作电压2分钟后读数,二者取大值 I:漏电流 (µA)、C: 静电容量 (µF)、额定电压 (V)										
损耗角正切值 tan δ Dissipation Factor	Rated voltage(V)	6.3	10	16	25	35	50	63	80	100	(at 20°C, 120Hz)
	tan δ (Max.)	0.22	0.19	0.16	0.14	0.12	0.10	0.09	0.09	0.08	
标称容量超过1000µF,则每增加1000µF,损耗角正切值增加0.02 When nominal capacitance exceeds 1000 µF, add 0.02 to the value above for each 1000 µF increase. (at 20°C, 120Hz)											
低温特性 Low temperature Characteristics (Max. Impedance Ratio)	电容器低温的阻抗比值, 不应超过下表所列出的值 Impedance ratio values must not exceed values listed in below table.										
	Rated voltage(V)	6.3	10	16	25	35	50	80	100	(at 120Hz)	
	Z(-25°C)/Z(+20°C)	4	3	2	2	2	2	2	2		
Z(-55°C)/Z(+20°C)	8	6	4	3	3	3	3	3			
耐久性 Endurance	施加额定工作电压和额定纹波电流经下表规定时间, 恢复到20°C后, 产品性能应满足以下要求 The following specifications shall be satisfied when the capacitors are restored to 20°C after application of rated voltage with rated ripple current for the specified period of time.										
	Time	6.3 ~ 10V	Φ5、Φ6.3:4000hours		Φ8、Φ10:6000hours	Φ13 ~ Φ18:8000hours					
		16 ~ 100V	Φ5、Φ6.3:6000hours		Φ8、Φ10:7000hours	Φ13 ~ Φ18:10000hours					
	Capacitance change	≤ ±25% of the initial value									
	D.F. (tan δ)	≤ 200% of the specified value									
Leakage current	≤ The specified value										
高温储存特性 Shelf Life	105°C放置1000小时, 恢复到20°C后, 产品性能应满足以下要求 The following specifications shall be satisfied when the capacitors are restored to 20°C after exposing them for 1000 hours at 105°C without voltage applied.										
	Capacitance change	≤ ±25% of the initial value									
	D.F. (tan δ)	≤ 200% of the specified value									
	Leakage current	≤ The specified value									

外形图 DIMENSIONS (mm)



ΦD	5	6.3	8	10	13	16	18
P	2.0	2.5	3.5	5.0	5.0	7.5	7.5
Φd	0.5	0.5	0.5	0.6	0.6	0.8	0.8

•	(L < 20) 1.5
•	(L ≥ 20) 2.0

纹波电流修正系数 RATED RIPPLE CURRENT COEFFICIENT

- 频率系数 Frequency Coefficient

Capacitance(µF)	Frequency(Hz)			
	120	1k	10k	100k
22 ~ 180	0.40	0.75	0.90	1.00
220 ~ 560	0.50	0.85	0.94	1.00
680 ~ 1,800	0.60	0.87	0.95	1.00
2,200 ~ 3,900	0.75	0.90	0.95	1.00
4,700 ~ 18000	0.85	0.95	0.98	1.00

**RG Series**

■ 尺寸与最大纹波电流一览表 STANDARD RATINGS

Case size ΦD×L (mm)	WV(V)	6.3(0J)			10(1V)			16(1C)					
		Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)	Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)	Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)
			20°C	-10°C			20°C	-10°C			20°C	-10°C	
5×11		150	0.58	2.3	212	100	0.58	2.3	212	56	0.58	2.3	212
6.3×11		330	0.22	0.87	345	220	0.22	0.87	245	120	0.22	0.87	345
8×12		680	0.13	0.52	644	470	0.13	0.52	644	330	0.13	0.52	644
8×16		1,000	0.087	0.35	846	680	0.087	0.35	846	470	0.087	0.35	846
8×20		1,200	0.069	0.27	1,054	1,000	0.069	0.27	1,054	680	0.069	0.27	1,054
10×13		820	0.08	0.32	868	680	0.08	0.32	868	470	0.08	0.32	868
10×16		1,200	0.06	0.24	1,215	1,000	0.06	0.24	1,215	680	0.06	0.24	1,215
10×20		1,500	0.046	0.18	1,406	1,200	0.046	0.18	1,406	1,000	0.046	0.18	1,406
10×25		2,200	0.042	0.17	1,658	1,500	0.042	0.17	1,658	1,200	0.042	0.17	1,658
10×30		2,700	0.031	0.12	1,908	2,200	0.031	0.12	1,916	1,500	0.031	0.12	1,908
13×15		1,800	0.049	0.16	1,459	1,500	0.049	0.16	1,459	1,000	0.049	0.16	1,450
13×20		3,300	0.035	0.12	1,946	2,200	0.035	0.12	1,908	1,500	0.035	0.12	1,916
13×25		3,900	0.027	0.089	2,235	3,300	0.027	0.089	2,235	2,200	0.027	0.089	2,235
13×30		4,700	0.024	0.078	2,654	3,900	0.024	0.078	2,654	2,700	0.024	0.078	2,534
13×35		5,600	0.02	0.065	2,887	4,700	0.02	0.065	2,887	3,300	0.02	0.065	2,887
13×40		6,800	0.017	0.056	3,354	5,600	0.017	0.056	3,354	3,900	0.017	0.056	3,354
16×15		2,700	0.042	0.12	1,916	2,200	0.042	0.12	1,946	1,500	0.042	0.12	1,946
16×21		5,600	0.027	0.078	2,534	3,900	0.027	0.078	2,534	2,700	0.027	0.078	2,354
16×26		6,800	0.021	0.06	2,938	5,600	0.021	0.06	2,938	3,900	0.021	0.06	2,938
16×32		8,200	0.017	0.05	3,458	6,800	0.017	0.05	3,146	4,700	0.017	0.05	3,146
16×36		10,000	0.015	0.044	3,618	8,200	0.015	0.044	3,618	5,600	0.015	0.044	3,618
16×40		12,000	0.013	0.038	4,178	10,000	0.013	0.038	4,085	6,800	0.013	0.038	4,085
18×15		3,900	0.043	0.11	2,216	2,700	0.043	0.11	2,216	2,200	0.043	0.11	2,216
18×21		6,800	0.026	0.067	2,867	5,600	0.026	0.067	2,867	3,900	0.026	0.067	2,867
18×26		10,000	0.019	0.049	3,146	6,800	0.019	0.049	3,458	4,700	0.019	0.049	3,458
18×32		12,000	0.015	0.04	4,082	8,200	0.015	0.04	4,178	5,600	0.015	0.04	4,178
18×36		15,000	0.014	0.038	4,225	10,000	0.014	0.038	4,225	8,200	0.014	0.038	4,225
18×40		18,000	0.012	0.032	4,287	12,000	0.012	0.032	4,287	10,000	0.012	0.032	4,287

Case size ΦD×L (mm)	WV(V)	25(1E)			35(1V)			50(1H)					
		Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)	Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)	Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)
			20°C	-10°C			20°C	-10°C			20°C	-10°C	
5×11									0.47	5.50	22.00	19	
5×11									1	4.00	16.00	35	
5×11									2.2	2.50	10.00	46	
5×11					4.7	2.8	11.2	48	3.3	2.20	8.80	54	
5×11					6.8	2.5	10	55	4.7	1.90	7.60	89	
5×11					10	2.0	8	72	10	1.50	6.00	104	
5×11		47	0.58	2.3	212	33	0.58	2.3	212	22	0.70	2.80	185
6.3×11		100	0.22	0.87	348	56	0.22	0.87	348	56	0.30	1.20	298
8×12		220	0.13	0.52	648	150	0.13	0.52	648	100	0.17	0.68	557
8×15		330	0.087	0.35	847	220	0.087	0.35	847	120	0.12	0.48	734
8×20									100	0.28	0.48	823	
8×20		470	0.069	0.27	1,054	270	0.069	0.27	1,054	150	0.25	0.36	912
8×30									220	0.22	0.25	1,056	
8×35									330	0.22	0.17	1,444	
10×13		330	0.08	0.32	868	220	0.08	0.32	868	150	0.12	0.48	764
10×16		470	0.06	0.24	1,214	330	0.06	0.24	1,214	220	0.08	0.34	1,056
10×20		680	0.046	0.18	1,405	470	0.046	0.18	1,405	270	0.06	0.24	1,224
10×25		820	0.042	0.17	1,654	560	0.042	0.18	1,654	330	0.06	0.22	1,444
10×30		1,000	0.03	0.1	1,918	680	0.03	0.1	1,918	470	0.05	0.17	1,666
13×15		680	0.049	0.16	1,458	470	0.049	0.16	1,458	270	0.06	0.20	1,264
13×20		1,000	0.035	0.12	1,904	680	0.035	0.12	1,904	470	0.05	0.15	1,694
13×25		1,500	0.027	0.089	2,239	1,000	0.027	0.089	2,239	560	0.03	0.11	1,956
13×30		1,800	0.024	0.078	2,654	1,200	0.024	0.078	2,654	680	0.03	0.10	2,315
13×35		2,200	0.02	0.065	2,889	1,500	0.02	0.065	2,889	820	0.03	0.08	2,516
13×40		2,700	0.017	0.056	3,354	1,800	0.017	0.056	3,354	1,000	0.02	0.07	2,928
16×15		1,000	0.042	0.12	1,948	680	0.042	0.12	1,948	470	0.06	0.17	1,698
16×21		1,800	0.027	0.078	2,536	1,200	0.027	0.078	2,536	820	0.03	0.10	2,215
16×25		2,700	0.021	0.06	2,934	1,800	0.021	0.06	2,934	1,000	0.03	0.08	2,556
16×32		3,300	0.017	0.05	3,456	2,200	0.017	0.05	3,145	1,200	0.02	0.07	3,015
16×36		3,900	0.015	0.044	3,614	2,700	0.015	0.044	3,614	1,500	0.02	0.06	3,156
16×40		4,700	0.013	0.038	4,089	3,300	0.013	0.038	4,089	1,800	0.02	0.05	3,715
18×15		1,200	0.043	0.11	2,215	1,000	0.043	0.11	2,215	560	0.05	0.15	1,935
18×21		2,200	0.026	0.067	2,868	1,800	0.026	0.067	2,868	1,000	0.04	0.10	2,495
18×26		3,300	0.019	0.049	3,145	2,200	0.019	0.049	3,456	1,500	0.04	0.07	2,746
18×32		3,900	0.015	0.04	4,178	2,700	0.015	0.04	4,178	1,800	0.03	0.06	3,654
18×36		4,700	0.014	0.038	4,225	3,300	0.014	0.038	4,225	2,200	0.03	0.05	3,689
18×40		5,600	0.012	0.032	4,289	3,900	0.012	0.032	4,289	2,700	0.03	0.04	3,806

RG Series

**RG Series**

■ 尺寸与最大纹波电流一览表 STANDARD RATINGS

Case size ΦD×L (mm)	WV(V)	63(1J)			80(1K)			100(2A)					
		Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)	Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)	Capacitance (μF)	Impedance (Ω max.)100kHz		Rated ripple current (mAr ms) (at 105°C 100kHz)
			20°C	-10°C			20°C	-10°C			20°C	-10°C	
5×11	15	0.98	6.0	180	10	1.80	6.6	145	6.8	2.0	8.0	92	
6.3×11	33	0.85	1.6	312	33	0.57	2.3	243	10	3.5	6	207	
8×12	56	0.42	0.98	496	56	0.36	1.4	427	22	2.8	5.2	268	
8×16	82	0.32	0.94	658	68	0.25	1	525	39	0.25	5.1	357	
8×20	150	0.26	0.68	930	100	0.21	0.85	680	56	0.35	4.3	568	
10×13	82	0.21	0.75	630	82	0.25	0.96	624	47	0.2	3.4	488	
10×16	120	0.15	0.58	765	100	0.21	0.87	685	68	0.15	3.2	609	
10×20	220	0.096	0.38	1100	120	0.19	0.73	780	82	0.1	2.7	780	
10×25	270	0.081	0.31	1350	150	0.12	0.52	905	100	0.82	2.5	975	
10×30	180	0.11	0.42	965	180	0.13	0.43	975	100	0.75	2.13	1,012	
10×60									820	0.05	0.11	2,907	
13×20	330	0.08	0.31	1135	220	0.11	0.47	1,102	150	0.08	1.95	1,103	
13×25	470	0.051	0.2	1630	330	0.06	0.23	1,520	220	0.05	1.56	954	
13×30	560	0.038	0.14	2000	390	0.051	0.21	1,650	270	0.043	1.34	1,506	
13×35	680	0.033	0.11	2340	470	0.043	0.17	1,807	330	0.04	1.1	1,856	
13×40	820	0.027	0.09	2700	560	0.036	0.15	1,800	390	0.04	0.95	1,908	
16×21	470	0.052	0.21	1570	330	0.058	0.21	1,650	220	0.05	1.73	1,254	
16×25	680	0.045	0.15	2010	470	0.055	0.19	1,709	330	0.045	1.21	1,603	
16×32	820	0.032	0.096	2110	680	0.033	0.12	1,950	470	0.033	1.025	2,156	
16×35	1,000	0.028	0.093	2305	820	0.029	0.1	2,100	560	0.029	0.95	2,204	
16×40	1,200	0.024	0.088	2500	1,000	0.027	0.09	2,205	680	0.027	0.72	2,306	
18×21	680	0.045	0.16	2107	470	0.068	0.26	1,640	330	0.045	0.98	1,509	
18×25	1,000	0.034	0.12	2200	680	0.054	0.21	2,100	470	0.038	0.73	2,204	
18×32	1,200	0.029	0.09	2560	820	0.042	0.14	2,200	560	0.031	0.7	2,307	
18×36	1,500	0.025	0.083	2620	1,000	0.027	0.084	2,560	680	0.027	0.62	2,602	
18×40	1,800	0.022	0.074	2710	1,200	0.026	0.077	2,508	820	0.026	0.53	2,909	