ELNA

Miniature Aluminum Electrolytic Capacitors RJF series

Code in front of series have been extracted from product code, which describes the segment of products, such as type and features.

- Extra low impedance capacitor.
- Environmental : GREEN CAP™ , RoHS compliance.

Low impedance

RJF ⇦ RJB

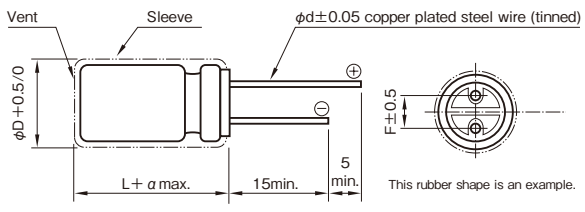
Marking color : White print on a black sleeve

Specifications

Item	Performance
Category temperature range (℃)	−40 to +105
Tolerance at rated capacitance (%)	±20 (20℃,120Hz)
Leakage current (μA) (max.)	0.01CV or 3 whichever is larger (after 2 minutes) C : Rated capacitance (μF) ; V : Rated voltage (V) (20℃)
Tangent of loss angle (tanδ)	Rated voltage (V): 6.3 / 10 / 16 / 25 / 35 / 50 tanδ (max.): 0.22 / 0.19 / 0.16 / 0.14 / 0.12 / 0.10 0.02 is added to every 1000μF increase over 1000μF. (20℃,120Hz)
Characteristics at high and low temperature	Rated voltage (V): 6.3 / 10 / 16 / 25 / 35 / 50 Impedance ratio (max.) Z−25℃/Z+20℃: 2 / 2 / 2 / 2 / 2 / 2 Impedance ratio (max.) Z−40℃/Z+20℃: 3 / 3 / 3 / 3 / 3 / 3 (120Hz)
Endurance (105℃) (Applied ripple current)	Test time: φ10 : 3000 hours; φ12.5 to φ18 : 5000 hours Leakage current: The initial specified value or less Percentage of capacitance change: Within ±25% of initial value Tangent of the loss angle: 200% or less of the initial specified value
Shelf life (105℃)	Test time: 1000 hours Leakage current: The initial specified value or less Percentage of capacitance change: Within ±25% of initial value Tangent of the loss angle: 200% or less of the initial specified value Voltage application treatment : According to JIS C5101-4 4.1
Applicable standards	JIS C5101 - 1,- 4 (IEC 60384 - 1,- 4)

Outline Drawing

Unit : mm



φD	10	12.5	16
F	5.0	5.0	7.5
φd	0.6	0.6	0.8
α	2.0	2.0	2.0

Coefficient of Frequency for Rated Ripple Current

Rated capacitance (μF) \ Frequency (Hz)	120	1k	10k	100k
150	0.40	0.75	0.90	1
220 to 330	0.50	0.85	0.94	1
470 to 1800	0.60	0.87	0.95	1
2200 to 3900	0.75	0.90	0.95	1
4700 to 6800	0.85	0.95	0.98	1

Product code system : 10V1000μF (*For general product)

RS*	RJF	102	M	1L	F16	300	T
Category code	Series code	capacitance code	Cap tol. code	Voltage code	Size code	Lead-forming and packing code	Additional code

・For details, refer to the various "Product Code System" pages.
・Lead forming and packing code “300” : lead wire is long type and standard packing.
For standard packing, please refer to the "PACKING" page.

NOTE : Design, Specifications are subject to change without notice.
It is recommended that you shall obtain technical specifications from ELNA to ensure that the component is suitable for your use.

Code in front of series have been extracted from product code, which describes the segment of products, such as type and features.

Standard Ratings

Rated voltage (V) / Item / Rated capacitance (μF)	6.3 (1J)					10 (1L)					16 (1E)				
	Case φDxL (mm)	Size code	Impedance (Ω max.)		Rated ripple current	Case φDxL (mm)	Size code	Impedance (Ω max.)		Rated ripple current	Case φDxL (mm)	Size code	Impedance (Ω max.)		Rated ripple current
			20℃	− 10℃	(mArms)			20℃	− 10℃	(mArms)			20℃	− 10℃	(mArms)
560	—	—	—	—	—	—	—	—	—	—	10 × 16	F16	0.028	0.10	1760
680	—	—	—	—	—	10 × 12.5	F12	0.039	0.14	1330	—	—	—	—	—
1000	10 × 12.5	F12	0.039	0.14	1330	10 × 16	F16	0.028	0.10	1760	10 × 20	F20	0.020	0.060	1960
1200	10 × 16	F16	0.028	0.10	1760	10 × 20	F20	0.020	0.060	1960	10 × 25	F25	0.018	0.054	2250
1500	10 × 20	F20	0.020	0.060	1960	10 × 25	F25	0.018	0.054	2250	12.5 × 20	G20	0.017	0.043	2480
2200	10 × 25	F25	0.018	0.054	2250	12.5 × 20	G20	0.017	0.043	2480	12.5 × 25	G25	0.015	0.038	2900
2700	—	—	—	—	—	—	—	—	—	—	16 × 20	J20	0.015	0.038	3250
3300	12.5 × 20	G20	0.017	0.043	2480	12.5 × 25	G25	0.015	0.038	2900	16 × 25	J25	0.013	0.035	3630
3900	12.5 × 25	G25	0.015	0.038	2900	16 × 20	J20	0.015	0.038	3250	16 × 25	J25	0.013	0.035	3630
4700	12.5 × 30	G30	0.013	0.033	3450	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—
5600	16 × 20	J20	0.015	0.038	3570	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—
6800	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—	—	—	—	—	—

Rated voltage (V) / Item / Rated capacitance (μF)	25 (1T)					35 (1G)					50 (1U)				
	Case φD × L (mm)	Size code	Impedance (Ω max.)		Rated ripple current	Case φD × L (mm)	Size code	Impedance (Ω max.)		Rated ripple current	Case φD × L (mm)	Size code	Impedance (Ω max.)		Rated ripple current
			20℃	− 10℃	(mArms)			20℃	− 10℃	(mArms)			20℃	− 10℃	(mArms)
150	—	—	—	—	—	—	—	—	—	—	10 × 12.5	F12	0.061	0.18	979
220	—	—	—	—	—	10 × 12.5	F12	0.039	0.14	1330	10 × 16	F16	0.042	0.12	1370
270	—	—	—	—	—	—	—	—	—	—	10 × 20	F20	0.030	0.090	1580
330	10 × 12.5	F12	0.039	0.14	1330	10 × 16	F16	0.028	0.10	1760	10 × 25	F25	0.028	0.085	1870
470	10 × 16	F16	0.028	0.10	1760	10 × 20	F20	0.020	0.060	1960	12.5 × 20	G20	0.027	0.068	2050
560	—	—	—	—	—	10 × 25	F25	0.018	0.054	2250	12.5 × 25	G25	0.023	0.059	2410
680	10 × 20	F20	0.020	0.060	1960	12.5 × 20	G20	0.017	0.043	2480	16 × 20	J20	0.023	0.059	2730
820	10 × 25	F25	0.018	0.054	2250	—	—	—	—	—	16 × 20	J20	0.023	0.059	2730
1000	12.5 × 20	G20	0.017	0.043	2480	12.5 × 25	G25	0.015	0.038	2900	16 × 25	J25	0.021	0.056	3010
1200	—	—	—	—	—	16 × 20	J20	0.015	0.038	3250	—	—	—	—	—
1500	12.5 × 25	G25	0.015	0.038	2900	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—
1800	16 × 20	J20	0.015	0.038	3250	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—
2200	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—	—	—	—	—	—
2700	16 × 25	J25	0.013	0.035	3630	—	—	—	—	—	—	—	—	—	—

(Note) Rated ripple current : 105℃ , 100kHz ; Impedance : 100kHz