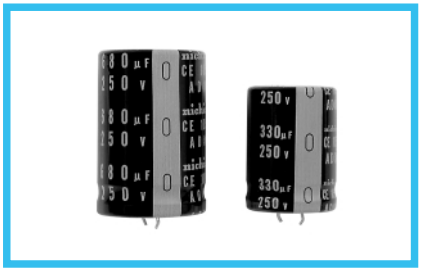
ALUMINUM ELECTROLYTIC CAPACITORS

nichicon

AD series

Snap-in Terminal Type, 105°C Withstanding Overvoltage series



- Withstanding 3000 hours application of rated ripple current at 105°C.
- Suited for 100V/200V switch-over use in switching power supplies.
- Withstanding overvoltage and suited for IEC-60950 application.
- Compliant to the RoHS directive (2002/95/EC).

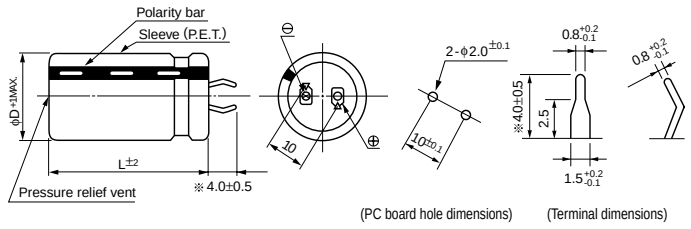
AD ← Withstandard overvoltage GU

Products which are scheduled to be discontinued.
Not recommended for new designs

■Specifications

Item	Performance Characteristics
Category Temperature Range	– 40 to +105°C
Rated Voltage Range	250V
Rated Capacitance Range	82 to 1200μF
Capacitance Tolerance	±20% at 120Hz, 20°C
Leakage Current	$I \leq 3\sqrt{CV}$ (μA) (After 5 minutes' application of rated voltage) [C : Rated Capacitance (μF) V : Voltage (V)]
Tangent of loss angle (tan δ)	0.15MAX. 120Hz,20°C
Stability at Low Temperature	Rated voltage(V): 250 — Impedance ratio ZT/Z20 (MAX.): Z – 25°C/Z+20°C: 3; Z – 40°C/Z+20°C: 12 — Measurement frequency:120Hz
Endurance	The specifications listed at right shall be met when the capacitors are restored to 20°C after D.C. bias plus rated ripple current is applied for 3000 hours at 105°C, the peak voltage shall not exceed the rated voltage. — Capacitance change: Within ±20% of the initial capacitance value; tan δ: 200% or less than the initial spesified value; Leakage current: Less than or equal to the initial specified value
Shelf Life	After storing the capacitors under no load at 105°C for 1000 hours and then performing voltage treatment based on JIS C 5101-4 clause 4.1 at 20°C, they shall meet the requirements listed at right. — Capacitance change: Within ±15% of the initial capacitance value; tan δ: 150% or less than the initial spesified value; Leakage current: Less than or equal to the initial specified value
Withstand excess voltage	Not defective after 7 hours continuous charges of 360VDC at 70°C atmosphere.
Marking	Printed with white color letter on black sleeve.

■Drawing



※ The other terminal is also available upon request.
Please refer page 265 for schematic of dimensions.

Type numbering system (Example : 250V 560μF)

1	2	3	4	5	6	7	8	9	10	11	12
L	A	D	2	E	5	6	1	M	E	L	A

Case dia. code

ϕD	Code
20	Y
22	Z
25	A
30	B
35	C

Configuration
Capacitance tolerance (±20%)
Rated capacitance (560μF)
Rated voltage (250V)
Series name
Type

■Dimensions

Cap.(μF) \ V(Code) / Code / ϕD		250V (2E)									
		20		22		25		30		35	
82	820	20×20	0.42								
100	101	20×25	0.53	22×20	0.53						
120	121	20×25	0.65	22×25	0.65	25×20	0.65				
150	151	20×30	0.79	22×25	0.79	25×25	0.79				
180	181	20×35	0.90	22×25	0.90	25×25	0.90	30×20	0.90		
220	221	20×40	1.00	22×30	1.00	25×25	1.00	30×25	1.00		
270	271	20×45	1.15	22×35	1.15	25×30	1.15	30×25	1.15	35×20	1.15
330	331	20×50	1.30	22×40	1.30	25×35	1.30	30×25	1.30	35×25	1.30
390	391			22×45	1.49	25×40	1.49	30×30	1.49	35×25	1.49
470	471					25×45	1.65	30×35	1.65	35×25	1.65
560	561					25×50	1.80	30×40	1.80	35×30	1.80
680	681							30×45	2.00	35×35	2.00
820	821							30×50	2.30	35×40	2.30
1000	102									35×45	2.47
1200	122									35×50	2.60
										Case size ϕD×L (mm)	Rated ripple

●Frequency coefficient of rated ripple current

Frequency (Hz)	50	60	120	300	1k	10k	50k or more
Coefficient	0.81	0.85	1.00	1.17	1.32	1.45	1.50

Rated ripple current (Arms) at 105°C 120Hz

Minimum order quantity : 50pcs.

CAT.8100Y