

## *Data Sheet*

Customer: \_\_\_\_\_

Product: Aluminum Electrolytic Capacitors – EHU Series

Size : 22x25mm ~ 40x50mm

Issued Date: 15-Apr.-2016

Edition: Ver. 1

### Record of change

Date	Ver.	Description	Page
15-Apr-2016	1		
01-Aug-2019	2	80V 2200uF Size Update	2

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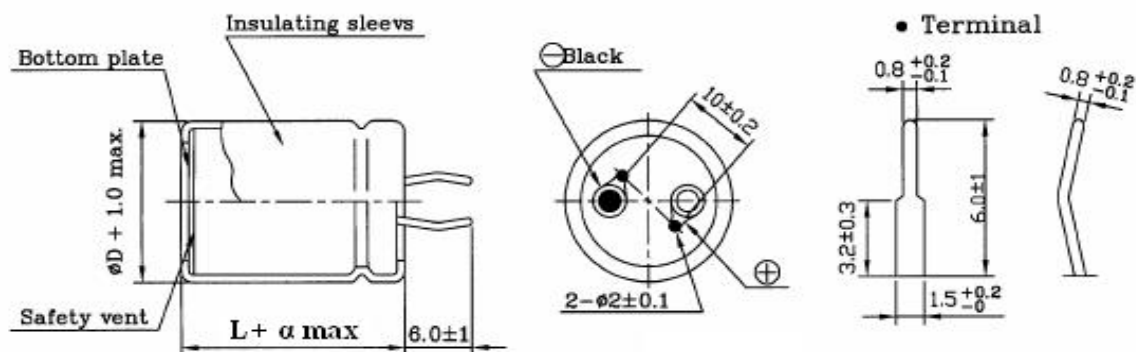
Prepared by	Checked by	Approved by	Accepted by (customer)
15-Apr-2016	15-Apr-2016	15-Apr-2016	
<i>Andy Hsu</i>	<i>Hwa Wu</i>	<i>Hwa Wu</i>	

- 105°C 3000 hours assured load life.
- Directly mountable on printed circuit board without holders.
- Rohs compliant
- Aluminum case designed explosion-proof vent.

**Characteristics**

<b>Voltage Range</b>	16 ~ 100V	160 ~ 450V						
<b>Capacitance Range</b>	470 ~ 68000uF	47 ~ 2200uF						
<b>Temperature Range</b>	-40 ~ +105°C	-25 ~ +105°C						
<b>Capacitance Tolerance</b>	±20% at 120Hz, 20°C ( 10% Tol. is available upon request)							
<b>Leakage Current</b>	$I = 3\sqrt{CV}$ (uA) max C: Capacitance, V:W.V. (After 5 minutes)							
<b>Dissipation Factor (tanδ) ( at 20°C, 120Hz )</b>	Less than the value under table (%)							
	uF \\\ W.V.	16	25 ~ 35	50 ~ 63	80 ~ 100	160 ~ 250	315 ~ 450	
	47 ~ 390	-	-	-	15	15	20	
	470 ~ 3900		20	20	20	15	20	
	4700~8200	35	30	30	25			
	10000~22000	40	35	30				
	27000~47000	45	40	35				
<b>Stability at Low Temperature</b>	Impedance ration at 120Hz between the -25°C or -40°C value and 20°C value shall not exceed :							
	Rated Voltage (V)	16	25~100	160~250	315~450			
	Z-25°C/Z 20°C	5	4	4	8			
	Z-40°C/Z 20°C	20	20	-	-			
<b>Load Life</b>	The following specifications shall satisfied when the capacitors are restored to 20°C after rated working voltage applied for 3,000 hours at max. operating temperature with the rated ripple current.							
	Capacitance change	≤±20% of the initial value.						
	Dissipation factor	≤±200% of the initial specified value						
	Leakage current	≤The initial specified value.						
<b>Shelf Life</b>	After storage for 1000 hours at 105°C with no voltage applied, the capacitor shall meet the specified limit in load life. Pre-treatment for measurement shall be conducted after application of DC working voltage for 30 minutes.							

**Diagram of Dimensions: unit(mm)**



**Multiplier for Ripple Current VS Frequency**

Cap.(uF) \\\ (Hz)	50(60)	120	1K	10K	50K - 100K
10 < Cap. ≤ 100	0.8	1	1.36	1.48	1.53
100 < Cap. ≤ 1000	0.8	1	1.25	1.35	1.38
1000 < Cap.	0.8	1	1.17	1.25	1.28

Dia	22 ~ 25	30 ~ 40
$\alpha$	2	3



**Standard Products Table**

W.V.	100								160							
Dimension	A		B		C		D		A		B		C		D	
Cap. (uF)	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC
470	22x25	0.92							22x35	1.40	25x30	1.40	35x20	1.15		
560	22x25	1.10							22x40	1.50	25x30	1.50	30x25	1.50		
680	22x30	1.22	25x25	1.22					22x45	1.70	25x35	1.70	30x30	1.70		
820	22x30	1.40	25x25	1.40					22x45	2.00	25x35	2.00	30x30	2.00	35x25	2.00
1000	22x35	1.70	25x30	1.70			35x20	1.20	22x50	2.20	25x40	2.20	30x30	2.20	35x25	2.20
1200	22x40	1.80	25x35	1.80	30x25	1.80			25x45	2.49	30x35	2.49	35x30	2.49		
1500	22x45	2.10	25x40	2.10	30x30	2.10	35x25	2.10	30x40	2.84	35x30	2.84				
1800	25x45	2.30	30x35	2.30	35x30	2.30			30x45	3.32	35x35	3.00				
2200	25x50	2.60	30x40	2.60	35x30	2.60			35x45	3.50						
2700	30x45	2.90	35x35	2.90					35x50	4.00						
3300	30x50	3.20	35x40	3.20												
3900	35x45	3.60														
4700	35x50	3.80	40x40	3.60												
5600	40x45	4.20														
6800	40x50	4.57														

W.V.	200								250							
Dimension	A		B		C		D		A		B		C		D	
Cap. (uF)	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC
220	22x25	1.05			30x20	0.87			22x30	1.10	25x25	1.10	35x20	0.87		
270	22x30	1.10	25x25	1.10					22x35	1.18	25x30	1.18	30x25	1.18		
330	22x30	1.25	25x25	1.25	35x20	1.10			22x40	1.30	25x35	1.30	30x25	1.20		
390	22x30	1.35	25x25	1.35	30x25	1.30			22x45	1.49	25x35	1.49	30x30	1.49		
470	22x35	1.50	25x30	1.50	30x25	1.50			22x50	1.65	25x40	1.65	30x30	1.65	35x25	1.65
560	22x40	1.67	25x30	1.67	30x25	1.67			25x45	1.80	30x35	1.80	35x25	1.80		
680	22x45	1.78	25x35	1.78	30x30	1.78	35x25	1.78	25x50	2.00	30x40	2.00	35x30	2.00		
820	22x50	2.04	25x45	2.04	30x30	2.04	35x25	2.04	30x45	2.30	35x35	2.30				
1000	25x50	2.30	30x35	2.30	35x30	2.30			30x50	2.47	35x40	2.47				
1200	30x40	2.65	35x30	2.65					35x45	2.60						
1500	30x50	3.08	35x40	3.08					35x50	3.00						
1800	35x45	3.48														
2200	35x50	3.78														

W.V.	350								385							
Dimension	A		B		C		D		A		B		C		D	
Cap. (uF)	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC
68									22x30	0.56	25x25	0.56				
82									22x35	0.64	25x25	0.64				
100	22x25	0.52	25x20	0.52					22x35	0.69	25x30	0.69	35x20	0.47		
120	22x30	0.62	25x25	0.62					22x35	0.75	25x30	0.75				
150	22x35	0.74							22x50	0.82	25x40	0.82	30x30	0.82		
180	22x40	0.81	25x30	0.77	30x25	0.80			25x45	0.95	30x35	0.95	35x25	0.95		
220	22x45	0.94	25x35	0.91					25x50	1.10	30x40	1.10	35x30	1.10		
270	22x50	1.09	25x40	1.06	30x30	1.05	35x25	1.08	30x45	1.20	35x35	1.20				
330	25x45	1.24	30x35	1.24	35x30	1.33			30x50	1.35	35x40	1.35				
390	30x40	1.42	35x30	1.39					35x45	1.55						
470	30x45	1.56	35x35	1.53					35x50	1.75						

**Standard Products Table**

W.V.	400								450							
Dimension	A		B		C		D		A		B		C		D	
Cap. (uF)	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC	Size	RC
47	22x25	0.43	25x20	0.25					22x25	0.35						
56	22x25	0.51							22x25	0.40						
68	22x25	0.56	25x25	0.56	30x20	0.35			22x25	0.52						
82	22x30	0.64	25x25	0.64					22x30	0.64	25x25	0.64				
100	22x30	0.70	25x25	0.70	35x20	0.47			22x35	0.69	25x30	0.69	30x25	0.69		
120	22x35	0.75	25x30	0.75	30x25	0.75			22x40	0.80	25x30	0.80	30x25	0.80		
150	22x40	0.88	25x30	0.88	30x25	0.88			22x45	0.88	25x35	0.88	30x30	0.88		
180	22x45	0.98	25x35	0.98	30x30	0.98	35x25	0.98	22x50	1.00	25x40	1.00	30x30	1.00		
220	22x50	1.10	25x40	1.10	30x30	1.10	35x25	1.10	22x50	1.00	25x45	1.12	30x35	1.12	35x30	1.12
270	22x50	1.19	25x45	1.20	30x35	1.20	35x35	1.20	30x40	1.28	35x35	1.28				
330	25x50	1.44	30x40	1.44	35x30	1.44			30x50	1.45	35x40	1.45				
390	30x45	1.60	35x35	1.60					35x40	1.50						
470	30x50	1.90	35x40	1.90	35x45	2.10			35x50	1.85						
560	35x45	2.12							35x55	2.15						
680	35x55	2.35							35x60	2.30	40x40	2.30				
820	35x55	2.50														
1000	35x65	2.65														

Unit : (mm)

Ripple Current (A, rms) at 105°C 120Hz

**Part Numbering Designation**

<b><u>EHU</u></b>	<b><u>101</u></b>	<b><u>M</u></b>	<b><u>2G</u></b>	<b><u>B</u></b>	<b><u>A</u></b>
SERIES	CAPACITANCE	TOL.	W.V.	PACKAGE	SIZE
	IN 3DIGITS	M= ± 20%	16= 16V	B= Bulk	A= A Size
	101= 100uF	K= ± 10%	25= 25V		B= B Size
	102= 1000uF		35= 35V		C= C Size
	103= 10,000uF		50= 50V		D=D Size
			63= 63V		
			80= 80V		
			2A= 100V		
			2C= 160V		
			2D= 200V		
			2E= 250V		
			2V= 350V		
			2T= 385V		
			2G= 400V		
			2W= 450V		