



Product specification

Draft

■ Specification

1. Primary specification

Part number	Capacitance(F)	Max. ESR (mΩ), DC	Max. Current(A) Non-repeated	Leakage Current(mA) (CELL Leakage+ Circuit Leakage)
VEM60R506QG	50	35	100	31.5

2. Power & Energy

Part number	Usable Specific Power, P_d (W/kg)	Impedance Match Specific Power, P_{max} (W/kg)	Energy Density (Wh/kg)	Max. Stored Energy (Wh)
VEM60R506QG	-	-	-	25

3. Standard & Reliability

Rated Voltage	48V	
Max. Voltage	60V	
Capacitance Tolerance	-10% / +30%	
Operating temperature range	-20 ~ 65°C	
Storage temperature range	-20 ~ 70°C	
Endurance Life (65°C)	1,000 Hours	
	Capacitance change	≤ 30% of initial Value
	ESR change	≤ 2 times of specified value
Projected Life time (25°C)	10 Years at rated voltage	
	Capacitance change	≤ 30% of initial Value
	ESR change	≤ 2 times of specified value
Projected Cycle time (25°C)	500,000 Cycles	
	Capacitance change	≤ 30% of initial Value
	ESR change	≤ 2 times of specified value
Shelf Life (25°C)	3 Years stored uncharged state (ΔC : ≤ 10% of initial value / ΔESR : ≤ 50% of specified value)	

4. Monitoring

Part number	Balancing
VEM60R506QG	Passive



Product specification

Draft

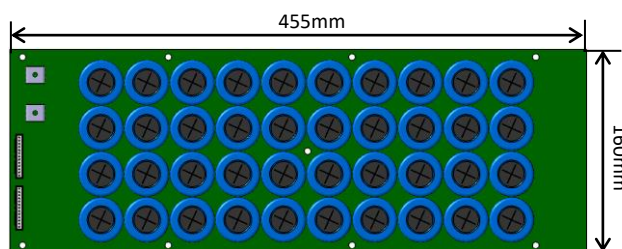
Safety & Physical Protection

Part number	Power Terminals	Recommended Torque Terminal	Shock & vibration Protection
VEM60R506QG	(+) M5, (-) M5 Thread	6Nm	According to customer specification

Dimension in mm (not to scale)

Geomatic properties

Part number	Dimension (mm)			Max. Weight (kg)
	Length	Width	Height	
VEM60R506QG	465 ± 0.5	175 ± 0.5	95 ± 5.0	8.5

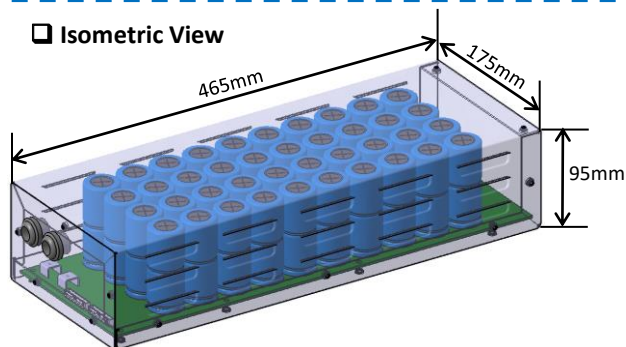


Cell : EDLC 500F 3582

Cell Module 구성 : 20S 2P

Cell Module Size : (L) 455 x (W) 160 (mm)

Isometric View

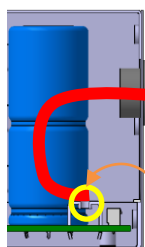


Module Size : (L) 465 x (W) 175 x (H) 95 (mm)

재질 : EGI

Module 상세 내용

Cable 체결구조



Cable Grand

엔더슨 커넥터 체결

M5 Screw 체결

120A 엔더슨 커넥터

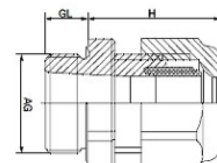


Cable Grand 사양

Model No.	Thread (AG)	Cable Ø (mm)	H (mm)	GL (mm)	Wrench (mm)
BC-PG1L-G	Pg7	3-6.5	21	15	15
BC-PG8L-G	Pg8	4-8	21	15	18
BC-PG11L-G	Pg11	5-10	25	15	21
BC-PG13L-G	Pg13.5	6-12	27	15	24
BC-PG16L-G	Pg16	10-14	28	15	26
BC-PG21L-G	Pg21	13-18	31	15	32
BC-PG25L-G	Pg25	16-25	39	18	40
BC-PG36L-G	Pg36	22-32	48	18	50
BC-PG42L-G	Pg42	32-38	49	18	60
BC-PG48L-G	Pg48	37-44	49	18	65

사양

- 정격 허용 전류 : 120A
- 사용 전압 : DC 직류
- 적용가능 전선 규격 : 5~4 AWG (14mm²~21mm²)
- 재질 : PC (UL94-V0 등급)
- 사용온도 : -20°C ~ +100 °C

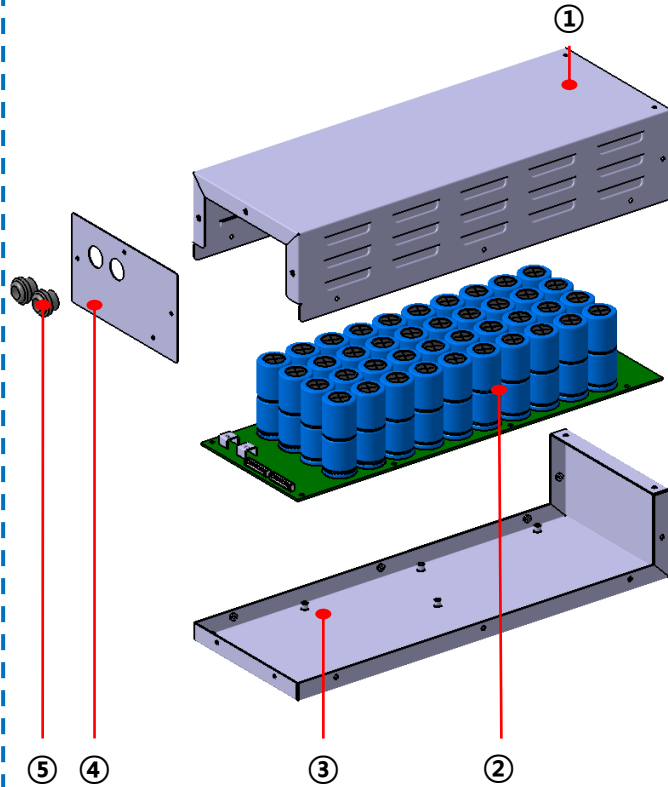




Product specification

Draft

❑ Exploded View



BOM (Bill Of Material)

Item	Part	Description	Material	Quantity
1	Tray Top	175 x 464.2 x 99mm	EGI 1.0T	1
2	Cell Module	160 x 455 x 2.4mm (PCB)	PCB	1
		Cell 3582 (3V 500F)	Cell	40
3	Tray Bottom	172.8 x 464.2 x 98.2mm	EGI 1.6T	1
4	Tray Side	175 x 99 x 0.8mm	EGI 1.0T	1
5	Cable Gland	PG16	PA [NYLON], 기성품	2
6	Connector	120A, Anderson	PC	2