

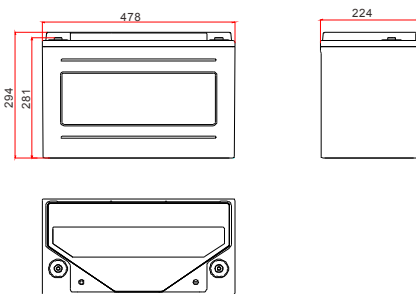
12 EBTC 200

EBT-C - Solar

12 EBTC 200



Dimension



Feature

- Design life 20 years
- Combine the advantage of lead acid battery and supercapacitor
- Ideal for PSOC cycle application
- High power, rapid charge/discharge
- Reduce sulfation of negative plate, excellent recharge acceptance performance
- Waterproof, anti-salt treatment, shockproof module installation design
- Comply with IEC60896, IEC61427 etc. standard

Application

- Home energy storage system
- Smart power grids and microgrid system
- Distributed energy storage system
- Hybrid energy storage system such as solar and wind
- Solar power generation grid/off-grid energy storage system
- Emergency lighting system
- Generator and battery hybrid energy system
- Other standby, cycling system

Parameter

Nominal Voltage	12V
Capacity	200Ah (100hr to 1.85V/cell @25°C)
	165Ah (10hr to 1.80V/cell @25°C)
Typical Weight	79.5kg
Internal Resistance	Approx 3.83mΩ
Short-Circuit Current	3274A
Self Discharge	Residual capacity is above 90% after 90 days storage(25°C)
Temperature Ranges	Operation(recommended): 15°C~25°C
	Operation(maximum): -20°C~50°C
Max. charging current	49.5A
Max. constant charging current	33A
Charge Voltage	Floating: 2.25V/cell(25°C)
	Equalizing/Cycle: 2.30V/cell(25°C)
Terminal	M8 embedded copper
Terminal Hardware Torque	>10N.m

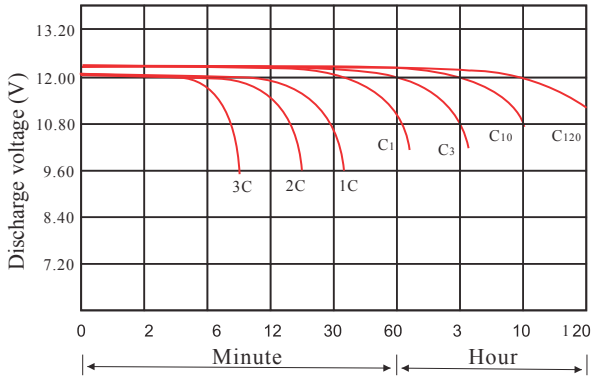
Constant Current Discharge Characteristics Units: Amperes(25°C)

End voltage per cell	60min	3hour	5hour	8hour	10hour	24hour	48hour	72hour	120hour
1.75V	94.25	43.33	30.08	21.08	16.90	7.83	4.04	2.77	1.76
1.80V	88.25	42.00	29.42	20.67	16.50	7.70	3.95	2.71	1.72
1.83V	82.67	40.67	28.67	20.33	16.18	7.53	3.87	2.65	1.68
1.85V	79.67	39.83	28.42	20.08	16.02	7.44	3.85	2.63	1.67
1.88V	76.33	39.00	28.08	19.83	15.94	7.38	3.82	2.61	1.66
1.90V	70.75	37.33	27.33	19.33	15.54	7.28	3.72	2.54	1.62

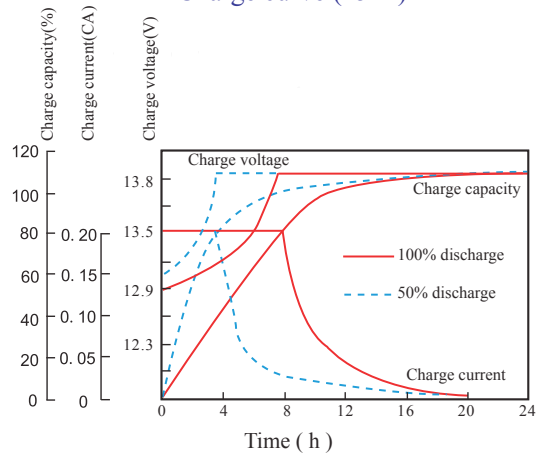
Discharge Data with Constant Power Units: Watts per cell(25°C)

End voltage per cell	15min	30min	1hour	2hour	3hour	4hour	5hour	6hour	8hour	10hour
1.75V	480.7	343.3	188.8	111.6	85.8	68.7	58.4	51.5	40.3	34.3
1.80V	473.7	338.3	186.1	110.0	84.6	67.7	57.5	50.8	39.8	33.8
1.83V	464.3	331.7	182.4	107.8	82.9	66.3	56.4	49.8	39.0	33.2
1.85V	455.0	325.0	178.8	105.6	81.3	65.0	55.3	48.8	38.2	32.5
1.88V	443.3	316.7	174.2	102.9	79.2	63.3	53.8	47.5	37.2	31.7

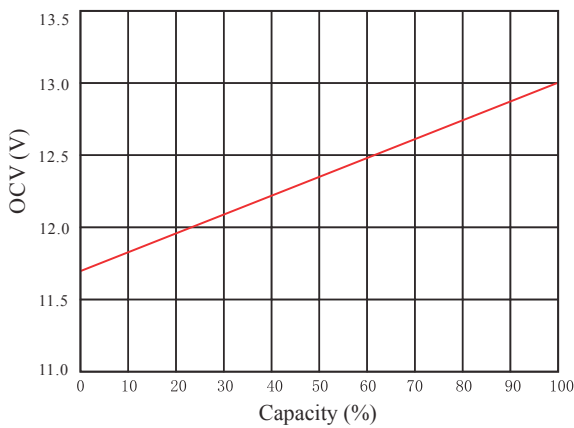
Discharge curve at different rate (25°C)



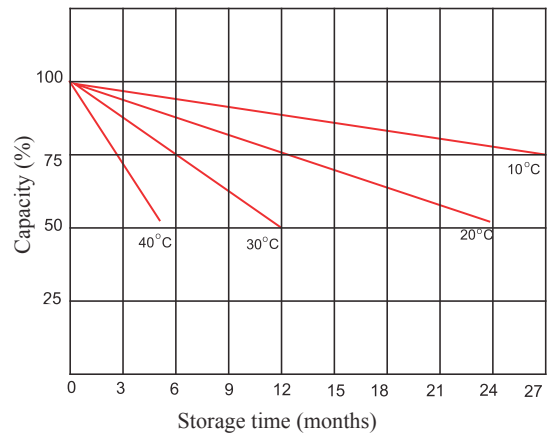
Charge curve (25°C)



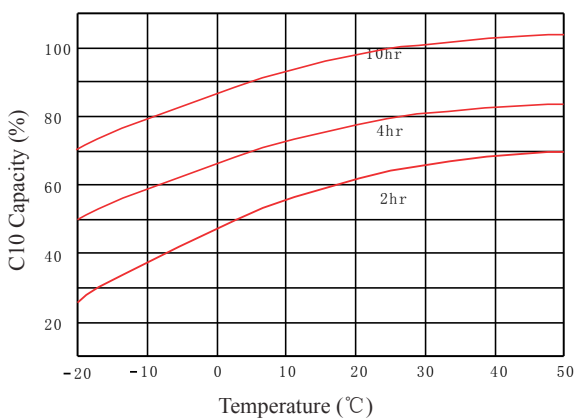
Capacity vs OCV curve



Residue capacity vs storage time



Capacity vs temperature curve



Cycle life vs DOD curve

