



Unit shown with optional 46E LCD C.A.P. System

Engine Starting Battery Charger

The La Marche A46/A46F battery charger is specially designed for maintaining and recharging starting batteries of engine generator sets. The controlled magnetic amplifier technology provides the highest reliability that is necessary for the continued operation of the emergency standby equipment and eliminates most starting problems by maintaining batteries at a proper charge, ensuring optimum performance and maximum life.

These chargers can also be customized to meet the American Bureau of Shipping (ABS) and United States Coast Guard (USCG) standards for applications such as offshore and on board vessels.

Standard Features

- Magnetic Amplifier Circuitry
- Automatic DC Voltage Regulation
- Automatic AC Input Voltage Compensation +/- 10%
- Automatic Surge Suppression
- Analog DC Ammeter & DC Voltmeter
- DC Current Limiting Circuitry
- AC Input and DC Output Fusing
- AC Power Failure Relay with (1) set of Form "C" Contacts
- Float/Equalize Mode Switching
- Charger design prevents battery from discharging if AC line fails
- AC to DC Isolation
- Model A46F is filtered for Valve-Regulated batteries
- UL 1564 Listed and C-UL Listed
- 10-Year Limited Warranty

A46 & A46F Models

Case Specifications

Model Number All Models Available As A46F	DC Output			AC Input Current Draw* at 100% Load (Amps)			A46 Case No.	A46 Shipping Weight (Approximate)		A46F Case No.	A46F Shipping Weight (Approximate)		
	Amps	Volts	Fuse Size	A 120	D 208	B 240		lbs	kgs		lbs	kgs	
12VDC 6L, 9 or 10NC	A46-6-12V	6	12V	15A	1.5	0.9	0.8	1	28	12.7	2	39	17.8
	A46-10-12V	10	12V	20A	2.5	1.4	1.3	1	30	13.6	2	41	18.7
	A46-20-12V	20	12V	35A	5	2.9	2.5	2	56	25.4	7	68	31.0
	A46-30-12V	30	12V	50A	7.5	4.3	3.8	2	66	29.9	3	91	41.4
24VDC 12L, 19 or 20NC	A46-6-24V	6	24V	15A	3	1.7	1.5	1	38	17.2	7	50	22.8
	A46-10-24V	10	24V	20A	5	2.9	2.5	2	62	28.1	7	74	33.7
	A46-20-24V	20	24V	35A	10	5.8	5	2	73	33.1	7	85	38.7
	A46-30-24V	30	24V	50A	15	8.7	7.5	7	108	49.0	3	127	57.8
32VDC 16L	A46-6-32V	6	32V	15A	4	2.3	2	2	58	26.3	7	70	31.9
	A46-10-32V	10	32V	20A	6.7	3.9	3.3	2	68	30.8	7	80	36.4
	A46-20-32V	20	32V	35A	14	7.7	6.7	2	74	33.6	3	92	41.9
	A46-30-32V	30	32V	50A	21	12	10	7	112	50.8	3	131	59.6
36VDC 18L	A46-6-36V	6	36V	15A	4.5	2.7	2.4	2	58	26.3	7	70	31.9
	A46-10-36V	10	36V	20A	7.5	4.2	3.9	2	68	30.9	7	80	36.4
	A46-20-36V	20	36V	35A	15	8.7	7.5	7	74	33.6	3	92	41.9
	A46-30-36V	30	36V	50A	22.5	12.9	11.4	7	112	50.8	3	131	59.6

Case No.	Overall Dimensions Width x Depth x Height
1	10" x 8" x 16" 264 x 200 x 413mm
2	13" x 10" x 17" 326 x 254 x 435mm
3	15" x 11" x 24" 391 x 279 x 603
7	14" x 11" x 20" 362 x 270 x 505

Note: All above models designed for optimal performance at 60Hz. They will operate at 50Hz with reduced performance. Consult factory for units designed specifically at 50Hz. Must specify only one battery type and number of cells. Please consult factory for other available cell ranges if desired range not shown. *AC Current Draws based @ 100% load using standard battery cells of 6L(12V), 12L(24V) and 16L(32V), 18L(36V) Maximum Current Draw is typically 140% of ratings shown.

Options

Circuit Breakers

- **011** AC Breaker Single Pole (120VAC only)
- **012** DC Breaker Single Pole
- **016** AC Breaker Two Pole
- **017** DC Breaker Two Pole

Choose options from Discrete or Combination Accessory Packages (C.A.P.)

Discrete

(Choose one or more of the options in this category)

- **055** Float Light
- **056** Equalize Light
- **060** AC Pilot Light
- **04J** Multi-Mode Equalize Timer & Lights Adjustable from 1-144hrs in (5) selectable modes; Standard, 7-day, 14-day, 30-day and Equalize after Low DC Voltage includes Float and Equalize Lights (055 and 056).

Combination Accessory Packages (C.A.P.)

- **16E** Digital C.A.P. System (Meets NFPA 110) Features a selectable LED display along with the AC Pilot Light, Equalize Timer and many more features (Refer to the Digital C.A.P. System data sheet for complete details).
- **16J** Digital C.A.P. System (Meets NFPA 110) Includes all the features of 16E package (above) plus Ground Detection Alarm (Refer to the Digital C.A.P. System data sheet for complete details).
- **46E** LCD C.A.P. Systems (Meets NFPA 110) Features Selectable Display, Multi-Mode Equalize Timer, Equalize Light, Float Light and many more features (Refer to the LCD C.A.P. System data sheet for complete details).
- **46J** LCD C.A.P. Systems (Meets NFPA 110) Includes all the features of 46E package (above) plus Ground Detection Alarm (Refer to the LCD C.A.P. System data sheet for complete details).

- **204** C.A.P. System (Meets NFPA 110) Includes (1) set of form "C" contacts for AC Power Failure, Low DC Voltage, High DC Voltage, and Low DC Current.
- **03M** Low/High DC Voltage Alarm & Lights with (1) set of Form "C" contacts each for Low Voltage & High Voltage w/LED's.

ABS/USCG (U.S. Coast Guard)

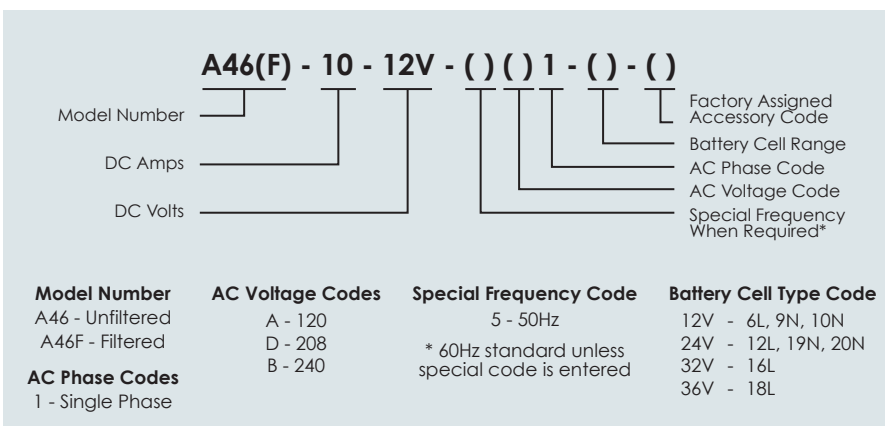
- **10B** U.S.C.G. Accessories, includes a drip shield, on/off switch & water tight connectors.
- **38G** ABS (American Bureau of Shipping) Type Approval with option 060, 16E or 16J.
- **38J** ABS & U.S.C.G. Accessories with option 060, 16E or 16J.

Internal Charge Dividers

(consult factory may increase case size)

- **100** To charge 2 batteries w/negative common.
- **10U** To charge 2 batteries w/positive common.
- **101** To charge 3 batteries w/negative common.
- **10V** To charge 3 batteries w/positive common.

Model Number Nomenclature



Environmental:

Operating Temperature:
0 to 50° C (32 to 122° F)

Storage Temperature:
-40 to 85° C (-40 to 185° F)

Relative Humidity:
0 to 95% non-condensing

- NEMA 1 enclosure ANSI 61 gray baked enamel paint