

- 3-step charge control with current detection
- Universal input voltage (90-264 VAC)
- Wake up and low current start-up of deeply discharged batteries
- Error indication for reverse polarity, short circuit, charging of lower voltage batt., safety timer run-out
- Exchangeable AC and DC plugs
- Order plugs and mains cord separately
- ECO-design compliance: DoE and CEC
- Approvals:
 - Medically certified
 - Safety: EN 60601-1 ed. 3.1
 - EMC: EN 60601-1-2 ed. 4
 - UL approved

For updates: see www.mascot.no



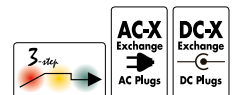
TECHNICAL SPECIFICATIONS

GENERAL INPUT/OUTPUT

Input voltage:	90-264 VAC, 47 – 63Hz
Switch frequency:	56 kHz
Leakage current from batt. with mains switched off:	<0,3mA @ nom. batt. volt.
Temp. range:	
• Operating:	-25°C ± 40°C
• Storage:	-25°C ± 85°C
Input terminal:	2-pin IEC 60320 conn. C8
Output terminals:	DC conn., batt. clips, push on term. or open ends
IP-code:	41
Dim. (L×W×H):	108,5 × 49 × 29 mm
Weight:	150g

SAFETY PROTECTION EMC

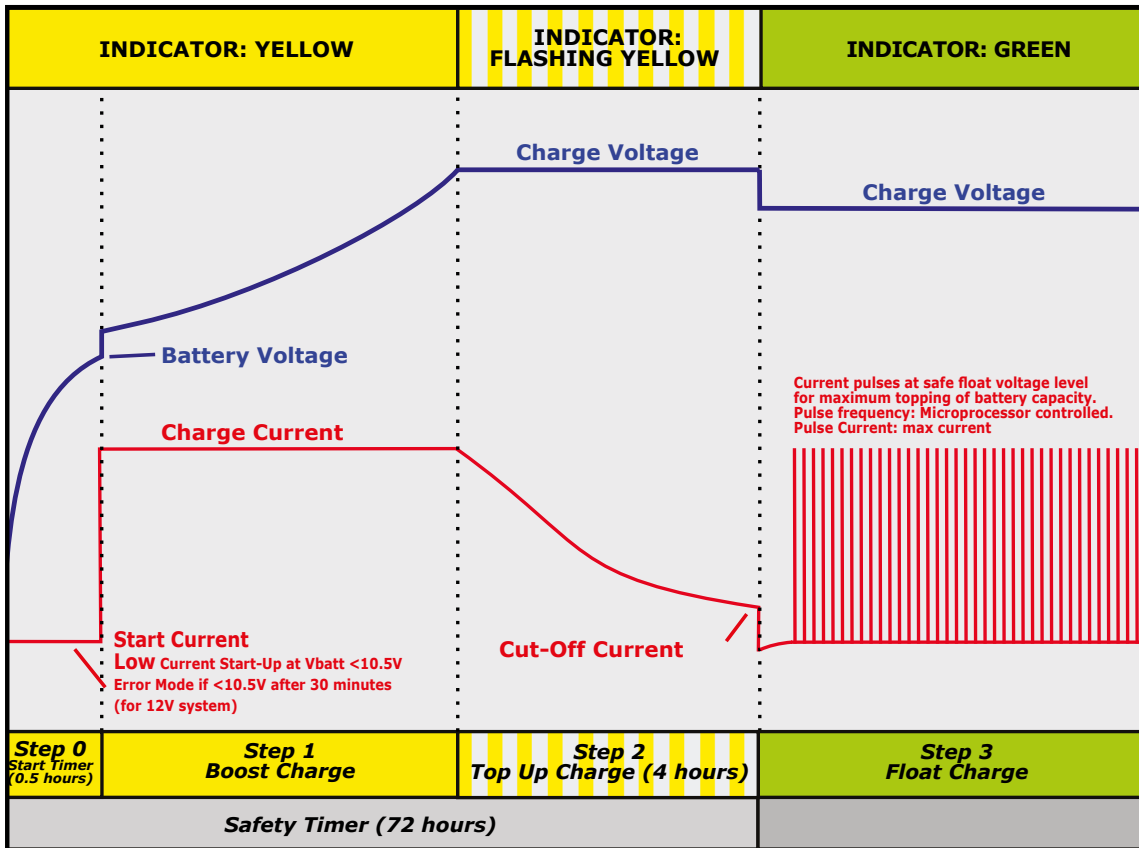
Protection:	Against reversed polarity and short circuit
Insulation:	Class II
Insulation voltage:	Primary-secondary 4000VAC-5700VDC
Electrical safety std:	EN/IEC 60335-2-29, EN 60601-1-11, EN/IEC/ANSI 60601-1
EMC standards	
• Medical:	EN 60601-1-2
• Emission:	EN 55014-1, EN 61000-6-3
• Immunity:	EN 55014-2, EN 61000-6-1



VERSIONS

	Step 0 < 30 min	Step 0 > 30 min	Step 1	Step 2	Step 3	Float charge	Rec. batt. capacity
	(Yellow)	(Red=error)	(Yellow)	(Flash Yellow)	(Green)		
6V	100mA ± 0.25mA (batt volt< 5V)	0A/0V	1.5A ± 5% (batt volt > 5V) (until Vbat = 7.35V)	7.35V ± 0.1V (until I charge <0.4A or >4hr) tapering charge current	6.85V ± 0.1V (until I charge > 1.5A) supply current up to max 1.5A for possible parallel load	Pulsing current at safe float volt. level for max topp. of batt.	7.5-75Ah
12V	100mA ± 0.25mA (batt volt< 10.5V)	0A/0V	1A ± 5% (batt volt >10.5V) (til Vbat = 14.7V)	14.7V ± 0.1V (until I charge <0.25A or >4hr) tapering charge current	13.7V ± 0.2V (until I charge > 1A) supply current up to max. 1A for possible parallel load		5-50Ah
24V	100mA ± 0.25mA (batt volt< 21V)	0A/0V	0.56A ± 5% (batt volt< 21V) (until Vbat = 29.4V)	29.4V ± 0.1V (until I charge <0.15A or >4hr) tapering charge current	27.4V ± 0.2V (until I charge > 0.56A) supply current up to max 0.56A for possible parallel load		2.8-28Ah
48V	100mA ± 0.25mA (batt volt< 42V)	0A/0V	0.3A ± 5% (batt volt > 42V) (until Vbat = 58.8V)	58.8V ± 0.3V (until I charge <0.1A or >4hr) tapering charge current	54.8V ± 0.3V (until I charge > 0.3A) supply current up to max 0.3A for possible parallel load		1.5-15Ah

Charging characteristics and LED indication *



* an animated video of this charging progress is available on our website

BATTERY NOT CONNECTED INDICATIONS

Battery not connected is indicated by FLASHING GREEN. In this mode charger will apply short pulses attempting to wake up deeply discharged batteries.

ERROR INDICATIONS

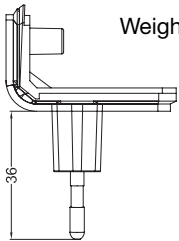
- 2 red blinks: Battery is connected to charger with wrong polarity!
- 3 red blinks: Charger output is shorted. Check output cable connection!
- 4 red blinks: Battery voltage is low. Check battery status or voltage.
- 5 red blinks: Safety timer has run out. Check battery status or capacity.
- LED off: Battery voltage is too high. Check battery voltage.



Exchangeable AC plugs

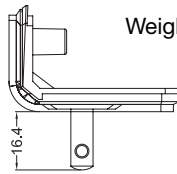
EU plug adapter

Part no. 127000
Weight: 20,9 g



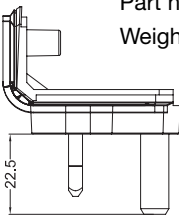
US plug adapter

Part no. 127100
Weight: 13,4 g



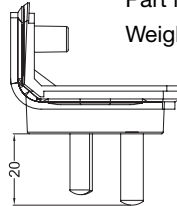
UK plug adapter

Part no. 127200
Weight: 29,2 g



AUS plug adapter

Part no. 127300
Weight: 21,4 g



2-pin IEC 60320 C7 mains cord
1800 mm
EU part no. 131306, UK part no. 131148,
US part no. 131368, AU part no. 013108

