

Model No.: RT02D-240020(24V2A)

# SPECIFICATION FOR APPROVAL

CUSTOMER	:		
TYPE: Intel	lligent 3-Phase C	harger	
PART NO.:	RT02D-240020	(24V2A)	
REVISION:	A.0		
FILE No. :			
DATE :	2011.9.1		

APPROVAL				
SIGNATURE	CHECKED BY	APPROVED BY		

Remark: 1). Please approve and sign back to Ritar Power.

2). If there is no signing back, this Approval will be regarded as being approved automatically once the first P.O. of the model specified in the sheet is issued.

SUPPLIER			
Prepared By	Checked By	Approved By	

ADD: Fuqiao Industrial Area(No.2 Area North), Qiaotou Village, Fuyong Town, Bao an Area, SHENZHEN, CHINA

Shenzhen Rbd Power Co.,Ltd

website:www.rbdpower.com



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TEL: (0755) 29912756 FAX: (0755) 29912756

# 1. Input Data:

- 1.1 Input Voltage & Frequency: Input Voltage 100-240VAC, Frequency 47Hz~63Hz;
- 1.2 Efficiency: More than 75% ( load current of charger is 2.0A );
- **1.3 Input current:** below 1.5A, when battery runs normal work;
- 1.4 Input Surge Current: When Voltage is 240VAC, Input Surge current is less than 50A;

# 2. Output Data:

2.1 Output Charging Voltage:

Maximum charging voltage: DC 29.6±0.4V, float charging voltage DC27.6±0.4V

2.2 Output Charging Current (limited current):

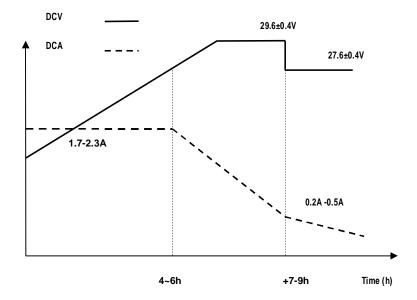
Rating charging current is DC2.0A , in range DC 1.7A---2.3A;

2.3 LED Display:

LED:

Red: Charging Green: Charged

**2.4 Output Charging Characteristic:** Relation between output voltage, current and time is as following chart:



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**Note**: this chart is for 12V16AH battery, 2pcs use, for other24V battery, the charging time should be adjusted accordingly.

- 2.5 Short Circuit Protection: This charger wouldn't be damaged in any time of short circuit.
- 2.6 Stability of Circuit: within the input voltage range, the charger will keep a stable performance whilst under any load;
- **2.7 Caution:** Should be reverse polarity protected i.e the charger or battery will not be damaged if the +ve and -ve wires are connected reversely to the battery terminals.

### 3. Mechanism Characteristic:

#### 3.1 Materials used in construction

Case: PC black, with brochure and label

Input Plug: Euro power cord plug EU01, 0.75\*2 AC cable, length 1.2m;

Output cable: 0.5mm2x2C 1.2m DC Connector: 3 pin Aviation

Dimensions: L 117.5mm W 60mm H 37mm



### 3.3 Dropping Test

Charger dropped from 1.0m height to a 10mm pine board, repeat it for 4times with charger each side; Result: no crack / break, no parts become flexible or not fastened; all related data remains correct. With the height of 1.0m, charger fall off to 10mm pine board, 4 times/ each face;



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#### 3.4 Vibration Test:

The charger was placed upon a Vibration desk:

Frequency: 5-55Hz Range:±1.5mm Acceleration: 20m/s

Direction: X/Y/Z 3 directions Test Time: 15S respectively

Result: no any damage/degeneration, all related data remains correct.

### 3.5 High Voltage characteristics:

A high voltage of 2,000 VAC between input and output terminal , current leak is lower than 10 mA , continue 60 seconds; 1 second for production line.

### 4.0 ENVIRONMENTAL CONDITIIONS

### 4.1 Operating

The power supply shall be capable of operating continuously in any mode without performance deterioration in the following environmental conditions.

- 4.1.1 Ambient Temperature: 0-40□
- 4.1.2 Relative Humidity: 20% ~ 90%
- 4.1.3 Vibration: 1.0mm, 10 –25Hz, 15 minutes per cycle for each axis (X, Y, Z)