

# 客户承认书

## SPECIFICATION FOR APPROVAL

CUSTOMER/客户: \_\_\_\_\_

CUSTOMER P.N./客户物料号: \_\_\_\_\_

MODEL NO./产品型号:     CYL75W-21A003-T0    

SAMPLE DATE/送样日期:     2010-11-2    

CUSTOMER AUTHORIZED SIGNATURE / 客户承认签核		

Please return to us one copy of "SPECIFICATION FOR APPROVAL" with you approved signature./客户确认签字盖章后请回传一份承认书给我司, 谢谢.

拟 制:	审 核:	批 准:
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**E. C. LIST/变更履历表**

Rev. 版本	Description of Change/变更内容描述		Changed Date/日期	ECN No.
	Before/变更前	After/变更后		
A0	Original Release (初次发行)		2010-11-2	---

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## 1. SCOPE

The document detail the electrical, mechanical and environmental specifications of a LED POWER for street lighting, the power supply provide 75 W continuous output power.

资料详细描述了一款 75W(连续输出功率)LED 路灯电源的电气特性, 结构特性及使用环境等要求.

The power supply shall meet the **RoHS** requirement.

此款电源符合 **RoHS** 环保要求.

## 2. Input Characteristics/输入特性

### 2.1 Input Voltage & Frequency/输入电压与频率

The range of input voltage is from 90Vac to 264Vac single phase.

输入电压范围: 从 90Vac 到 264Vac, 单相输入.

	Minimum/最小	Nominal/额定值	Maximum/最大
Input Voltage/输入电压	90Vac	100Vac~240Vac	264Vac
Input Frequency/输入频率	63Hz	60Hz/50Hz	47Hz

### 2.2 Input AC Current/AC 输入电流

1.2 Amax. @ 100-240Vac input & Full load/满载

### 2.3 Inrush Current (cold start)/浪涌电流(冷启动)

100Amax. @ 264Vac input

### 2.4 Power Factor/功率因数

0.95 min@ Nominal input & Full load/额定输入 & 满载

### 2.5 Efficiency / 转换效率

90% min. @ at input 220Vac & Full load

## 3. Output Characteristics/输出特性

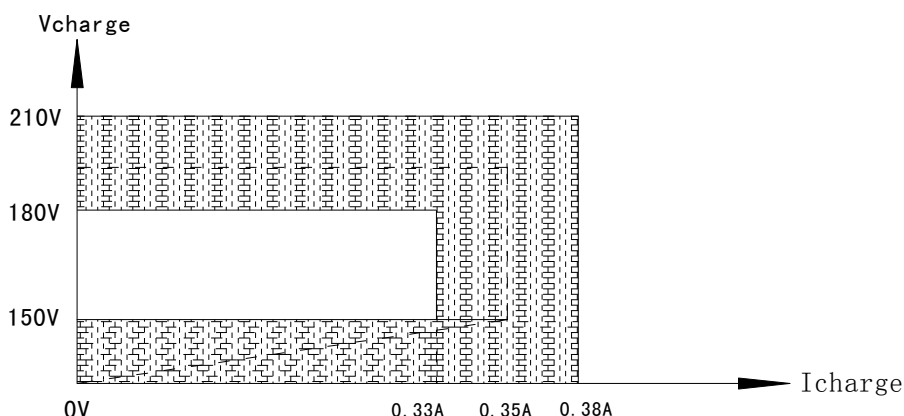
### 3.1 Static Output Characteristics <Vo & R+N>/静态输出

Rated Current 输出电流	Output Voltage 输出电压	R+N 纹波与噪声	Remark 备注
350 mA	180V - 210V	4.2Vp-p	220Vac

Ripple & Noise: Measurement is done by 20MHz bandwidth oscilloscope and the output paralleled a 0.1uF ceramic capacitor and a 47uF electrolysis capacitor. (test under the condition of rated input and rated output)

纹波与噪声: 量测时示波器选用 20MHz 带宽限制, 输出端要并联一颗 0.1uF 的陶瓷电容和一颗 47uF 的电解电容. (在额定输入及输出的条件下检测)

### 3.2 Voltage/Current Curve / 恒压/恒流控制曲线



### 3.3 Turn - on Delay Time/开机延迟时间

0.5 S max. @ 220 Vac input & Full load/满载

### 3.4 Rise Time/上升时间

30mS max. @ Full load/满载

### 3.5 Fall Time/下降时间

30mS max. @ Full load/满载

## 4. Protection Requirements/保护要求

### 4.1 Over Current Protection/ 过流保护

The output shall hiccup when the over currents applied to the output rail, and shall be self-recovery when the fault condition is removed.

当输出过电流时, 产品会进入打嗝形式的保护状态, 当过流情况解除后, 产品将会自动恢复正常。

### 4.2 Short Circuit Protection/ 短路保护

The input power shall decrease when the output rail short, the power supply shall no damage, and shall be self-recovery when the fault condition is removed.

当输出短路时, 产品输入功率降低且不会损伤, 当短路情况解除后, 产品将会自动恢复正常。

### 4.3 Over Voltage Protection/ 过压保护

When the output voltage is over 270V the product is protected, will shut down output, the product from damage, the product need to restart the power when the fault condition is removed.

当输出电压超过 270V ( $V_o \times 130\%$ ) 时产品进入保护状态, 将关闭输出, 产品不受损伤, 当过压情况解除后产品需断电重新启动。

### 4.4 Over Temperature Protection/ 过温保护

When the temperature exceeds about 125 °C of the Transformer of product, the product into the over-temperature protection of the state, will shut down output, the product from damage, when the temperature dropped to normal, the product need to restart the power.

当产品变压器温度超过 125°C 左右时, 产品进入过温保护状态, 将关闭输出, 产品不受损伤, 当温度下降正常后, 产品需断电重新启动。

## 5.Environment Requirements / 环境要求

### 5.1 Operating Temperature and Relative Humidity / 操作温/湿度要求

-30°C to +60°C

10%RH to 100%RH

### 5.2 Storage Temperature and Relative Humidity / 存储温/湿度要求

-40°C to +80°C

5%RH to 100%RH non-condensing

### 5.3 Vibration/振动

The LED power supply toward the direction of three mutually perpendicular (X, Y, Z) vibration, 12 minutes in each direction, 36 minutes; by sine wave frequency 300 times per minute to 1200 times of 3 minutes per week, full amplitude 2mm; test is completed without electricity, security, ill-structured.

将 LED 电源朝三个相互垂直的方向 (X, Y, Z) 振动, 每个方向 12 分钟, 共 36 分钟; 依正弦波频率每分钟 300 次至 1200 次, 每周期 3 分钟, 全振幅 2mm; 试验完成后无电性, 安全, 结构不良。

## 6.Reliability Requirements / 可靠性要求

### 6.1 Burn-in/ 老化实验

The power supply shall under go a minimum of 4 Hours burn-in test at 50°C ± 2°C under full load condition

产品至少要在 50°C ± 2°C 的环境及满载条件下老化 4 小时。

### 6.2 MTBF Qualification/平均间隔故障时间估算

The MTBF shall be at least 50,000hours at 40°C, Full load and nominal input condition  
平均间隔故障时间: 至少 50, 000 小时, 40°C 环境及额定输入与满载条件下。

## 7.EMI/EMS Standards / EMI/EMS 标准

### 7.1 EMI Standards / EMI 标准

Standard	Test Item	Remark
EN55015	Disturbance voltages at mains terminals	Accord
	Radiated disturbance in frequency range 9KHz to 30MHz	Accord
	Radiated disturbance in frequency range 30MHz to 300MHz	Accord
EN 61000-3-2	Harmonic current emissions(Class C)	Accord
EN 61000-3-3	Voltage fluctuations & flicker	Accord

**7.2 EMS Standards / EMS 标准**

Standard	Test Item	Remark
EN 61000-4-2	ELECTROSTATIC DISCHARGE IMMUNITY TEST ESD :8kV air discharge, 4kV contact discharge	Criterion B
EN 61000-4-3	Radiated, radio frequency, electromagnetic field immunity RS: 80M-1000M 3V/m	Criterion A
EN 61000-4-4	Electrical fast transient / burst immunity EFT: ±1KV 5KHz	Criterion B
EN 61000-4-5	Surge immunity: line to line 2kV, line to earth 4kV	Criterion C
EN 61000-4-6	Immunity to conducted disturbances, induced by radio-frequency fields CS: 0.15M-80M 3Vr.m.s	Criterion A
EN 61000-4-8	Testing and measurement techniques — Power frequency magnetic field immunity test	Criterion A
EN61000-4-11	Voltage dips, short interruptions and voltage variations immunity	Criterion A

**8.Safety Standards / 安全标准****8.1 Dielectric Strength(Hi-pot) / 介电强度(耐压)**

Primary to Secondary: 3000Vac 10mA Max / 1 mins

初级对次级: 3000Vac /10mA Max / 1 分钟

Primary to Earth: 3000Vac 10mA Max / 10 mins

初级对地: 3000Vac /10mA Max / 1 分钟

**8.2 Leakage Current / 泄漏电流**

0.5mA max. at 264Vac / 50Hz

**8.3 Insulation Resistance / 绝缘阻抗**

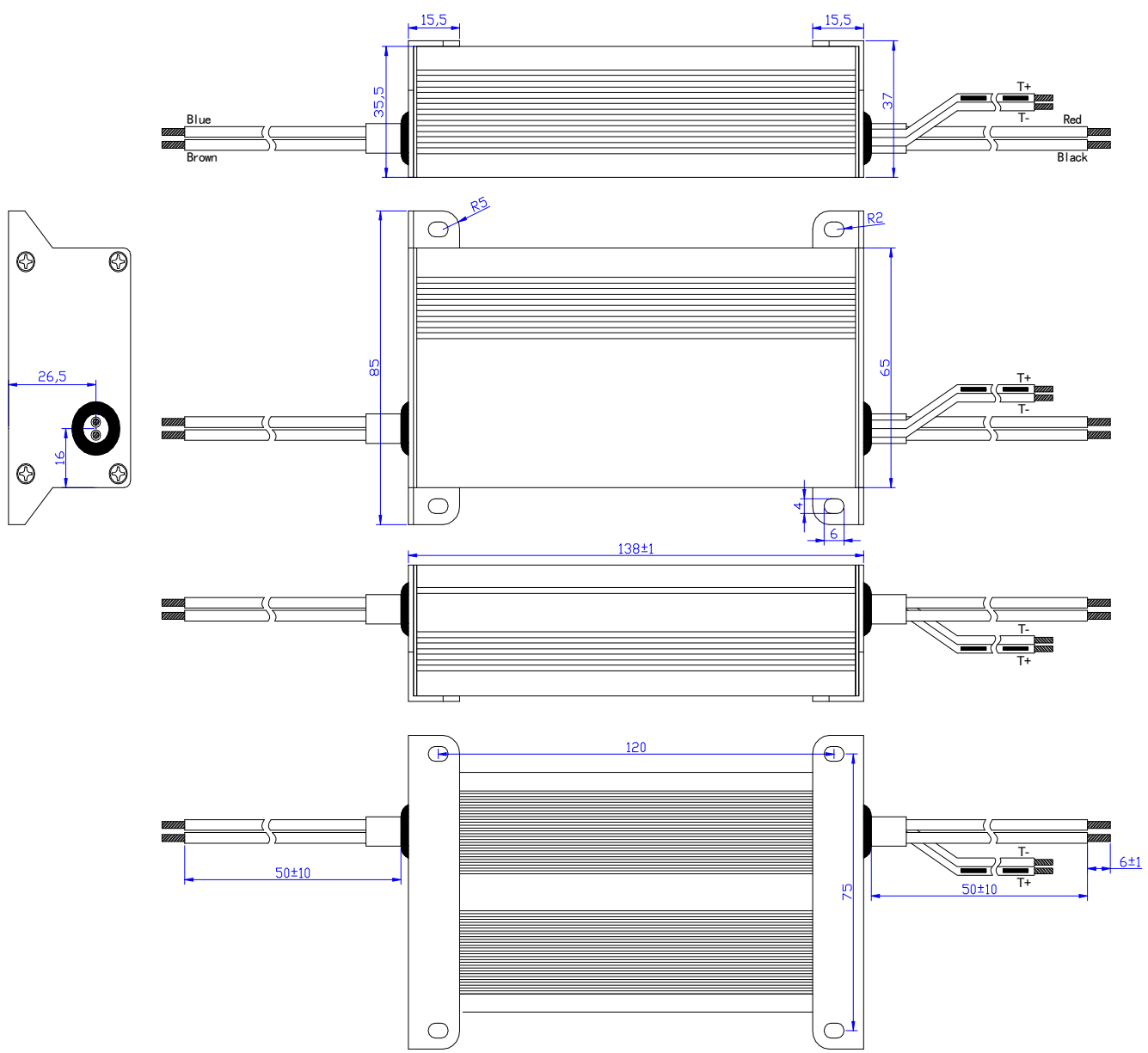
50MΩ min. at primary to secondary add 500Vdc test voltage

在初级与次级间加 500Vdc 进行测试, 最小阻抗 50 MΩ。

**8.4 Regulatory Standards / 安规标准**

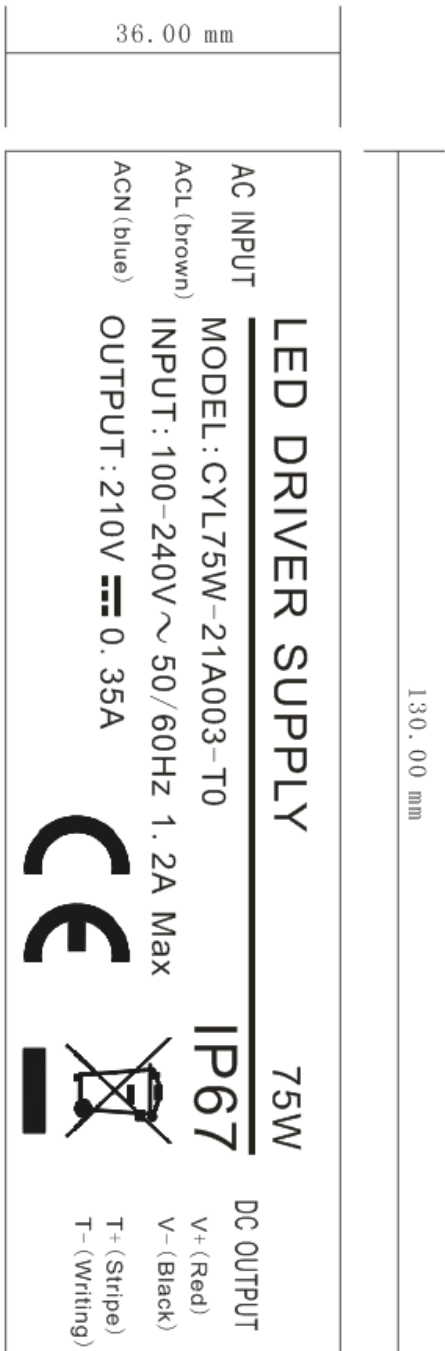
Type/安规	Country/国家	Standard/标准	State/状态
CE	Europe	IEC62384-2006 EN61347-1:2001 IEC61347-2-13	Meet

### 9. Installation dimensions / 安装尺寸





10. Label Drawing / 铭牌示意图



备注:

- 1、白底黑字
- 2、耐高温105度以上, 防水
- 3、100#肖银龙+光膜
- 4、外观要求: 无脏污、无变形、无皱纹、无破损、无划痕等, 印字清晰;
- 5、要求: 背面带平整、无翘角, 且粘在外壳上烤110°C/3H, 铭牌仍平整
- 6、后粘再在外壳上, 无翘角;