



特点 Features

- 采用SMD LED（贴片型 LED 灯珠），具有高亮度、低能耗、长寿命以及响应速度快；
- 高亮型号多采用铜支架或陶瓷基板封装，提升热传导效率，降低结温，延长使用寿命（典型寿命 50000 小时以上）；
- 采用PC 材料兼具高强度和高韧性，抗冲击性能突出，即使在低温环境下也不易开裂；
- 长期暴露在紫外线环境中不易黄变；
- It adopts SMD LED (surface mount LED beads), featuring high brightness, low energy consumption, long lifespan and fast response speed;
- High-gloss models are mostly encapsulated with copper brackets or ceramic substrates to enhance heat conduction efficiency, reduce junction temperature, and extend service life (with a typical lifespan of over 50,000 hours);
- Made of PC material, it features both high strength and high toughness, with outstanding impact resistance. Even in low-temperature environments, it is not prone to cracking;
- It is not prone to yellowing when exposed to ultraviolet rays for a long time.



选型说明 Model Designation

CML 70 - R /    /  -  L02 -

① ② ③ ④ ⑤ ⑥ ⑦ ⑧ ⑨ ⑩ ⑪

| 序号<br>Serial number | 项目<br>Item                   | 代号<br>Code | 说明<br>Description                           |
|---------------------|------------------------------|------------|---------------------------------------------|
| ①                   | 系列号<br>Serial number         | CML        | 微小型单色塔灯 Miniature monochromatic tower light |
| ②                   | 外形尺寸<br>Overall dimension    | 70         | 70 size class; body diameter73mm            |
| ③                   | 颜色<br>Color                  | R          | 红                                           |
|                     |                              | Y          | 黄                                           |
|                     |                              | G          | 绿                                           |
|                     |                              | B          | 蓝                                           |
|                     |                              | W          | 白                                           |
| ④                   | 发声形式<br>Form of vocalization | 无 None     | 不发声 No sound                                |
|                     |                              | A          | 滴声间断 Intermittent drip                      |
|                     |                              | C          | 警音 Police siren sound                       |
| ⑤                   | 发光形式<br>Luminescence type    | T          | 常亮 Steady on                                |
|                     |                              | W          | 闪亮 Sparkle                                  |
| ⑥                   | 电压<br>Voltage                | J          | AC/DC12V                                    |
|                     |                              | B          | AC/DC24V                                    |
|                     |                              | M          | AC220V                                      |
| ⑦                   | 需求功能<br>Required functions   | 无 None     | 常规型 Regular type                            |
|                     |                              | F          | IP65防水型 IP65 waterproof type                |
|                     |                              | K          | 抗干扰型 Anti-interference type                 |
| ⑧                   | 安装底座款式<br>Installation base  | 无 None     | 固定螺丝安装 Fixed screw installation             |
|                     |                              | F          | 磁铁固定 Magnet fixation                        |

|   |                         |        |                                                                            |
|---|-------------------------|--------|----------------------------------------------------------------------------|
| ⑨ | 电线长度<br>Wire length     | L02    | 电线长度 0.2m Length of the wire is 0.2m                                       |
|   |                         | L1~L5  | L1表示1米线 (线长不无限L5) L1 means 1 meter line (line length is not limited to L5) |
| ⑩ | 连接形式<br>Connection form | 无 None | 引线式自由出线端 Lead type free outlet end                                         |
|   |                         | M□□□□  | M型接插件 M□□□□ M-type connector M□□□□                                         |
|   |                         | D□□□□  | DT型接插件 D□□□□ DT-type connector D□□□□                                       |
|   |                         | A□□□□  | AMP型接插件 A□□□□ AMP-type connector A□□□□                                     |
|   |                         | S□□□□  | SM型接插件 S□□□□ SM-type connector S□□□□                                       |
| ⑪ | 电线材质<br>Wire material   | 无 None | PVC                                                                        |
|   |                         | U      | PUR护套线 Sheathed wire                                                       |
|   |                         | VP     | PVC屏蔽护套线 Shield sheathed wire                                              |
|   |                         | UP     | PUR屏蔽护套线 Shield sheathed wire                                              |

### 额定值 Ratings

| 型号 Model             | CML70    |          |          | CML70-C  |          |           |
|----------------------|----------|----------|----------|----------|----------|-----------|
| 工作电压 Working voltage | DC12V    | DC24V    | AC220V   | DC12V    | DC24V    | AC220V    |
| 工作电流 Working current | Max:43mA | Max:91mA | Max:76mA | Max:50mA | Max:97mA | Max:160mA |
| 功率 Power (W)         | 0.6      | 2.2      | 1.0      | 0.6      | 2.4      | 2.7       |

### 特性 Characteristics

| 型号 Model                             |                     | CML70           | CML70-C |
|--------------------------------------|---------------------|-----------------|---------|
| 声音大小 Volume of sound (Max.dB)        |                     | /               | 90      |
| 闪亮频率 Shining frequency               |                     | 55~65 次 /min 60 |         |
| 外形尺寸<br>Outline dimensions           | 平面直径 Plane diameter | 73              |         |
|                                      | 高度 Height           | 44              |         |
| 材质<br>Material                       | 灯罩 Lampshade        | PC（聚碳酸酯）        |         |
|                                      | 底座 Base             | ABS             |         |
| 电源线规格 Power cord specification       |                     | UL1007          |         |
| 安装螺钉 Install screws                  |                     | 不锈钢             |         |
| 使用环境温度 Operating ambient temperature |                     | -30℃~-50℃       |         |
| 空气相对湿度 Relative humidity of air      |                     | ≤85%            |         |
| 单光防护等级 Single light protection grade |                     | IP43            |         |
| 海拔高度 Altitude                        |                     | ≤2000M          |         |

### 国际认证规格 International Certification Specifications

| 认证规格<br>Certification specifications | 规格<br>Specifications | 文件No.<br>Document                                         |
|--------------------------------------|----------------------|-----------------------------------------------------------|
| CE                                   | EN 61058             | 请咨询昌得代表处<br>Please consult the CNTD Representative Office |

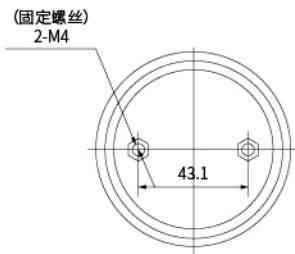
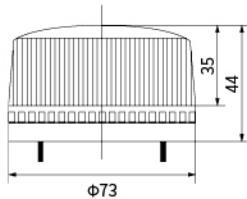
### 灯珠规格 Light bead specifications

| 颜色<br>Color | 电压<br>Voltage |
|-------------|---------------|
| 红 Red       | 1.8V~2.2V     |
| 黄 Yellow    | 1.8V~2.2V     |
| 绿 Green     | 2.8V~3.4V     |
| 蓝 Blue      | 2.8V~3.4V     |
| 白 White     | 2.8V~3.4V     |

外观和尺寸 Appearance and Dimension

CML70-□

微小型单色塔灯  
螺丝固定  
Miniature  
monochromatic  
tower light  
Screw fixation



常用型号 Common Model

| 产品型号<br>Product model | 发声形式<br>Form of vocalization | 发光形式<br>Luminescence type | 电压<br>Voltage | 安装底座款式<br>Installation base | 电线长度<br>Wire length |
|-----------------------|------------------------------|---------------------------|---------------|-----------------------------|---------------------|
| CML70-R/WB-L02        | /                            | 闪亮<br>Sparkle             | AC/DC24V      | 螺丝固定<br>Screw fixation      | 0.2m                |
| CML70-R/WM-L02        | /                            |                           | AC220V        |                             |                     |
| CML70-R/AWB-L02       | 滴声间断<br>Intermittent drip    |                           | AC/DC24V      |                             |                     |
| CML70-R/AWM-L02       |                              |                           | AC220V        |                             |                     |

Sound follows the selected code: omitted = no sound; A = intermittent beep; C = police siren.  
Common models above are references. Specify other configurations or magnetic mounting separately.

安全使用和注意事项 Safety Instructions and Precautions

- 1.在安装、配线、操作本产品前必须先切断电源。
  - 2.检查产品是否符合选型要求。
  - 3.应在额定电压下使用。
  - 4.防止垃圾、导电粉末、导电液体等杂质进入产品内部。
  - 5.安装固定结实。
  - 6.注意保护导线不要受到外力冲击或者磨损，以免造成漏电或者开路等不良。
- 1.Before installing, wiring, or operating this product, the power supply must be cut off first.
  - 2.Check whether the product meets the requirements of the selected model.
  - 3.It should be used at the rated voltage.
  - 4.Prevent impurities such as garbage, conductive powder, and conductive liquid from entering the interior of the product.
  - 5.Ensure the installation is fixed firmly.
  - 6.Pay attention to protecting the wires from external impact or wear and tear to avoid potential defects such as electric leakage or open circuit.

检修与维护 Maintenance and Overhaul

- 1.检修与维护本产品适应断开电源，以免出现安全事故。
  - 2.对于复杂的故障或不熟悉的电子产品，建议寻求专业维修人员或厂家售后的帮助。未经专业培训，勿尝试拆解高压、高精度部件，以免造成人身伤害或设备进一步损坏。
- 1.When maintaining or overhauling this product, the power supply should be disconnected to avoid safety accidents.
  - 2.For complex faults or unfamiliar electronic products, it is recommended to seek help from professional maintenance personnel or the manufacturer's after-sales service. Do not attempt to disassemble high-voltage or high-precision components without professional training, as this may cause personal injury or further equipment damage.

## 使用注意事项 Using Precautions

本公司产品是作为工业产品而设计生产，严格遵守工业产品标准。我司明确声明，除非经过特殊设计并得到我司明确书面确认，我司产品不适用于以下应用场合：

- 要求极高可靠性的应用场合，包括核能、燃气、电力等要求长期稳定运行的系统。
- 要求极高安全性的应用场合，涉及人身安全与财产的情况。
- 苛刻条件、严酷环境的应用场合，包括室外、存在化学污染、电磁、振动或冲击影响的环境。
- 有火灾或爆炸风险的应用场合，包括存在易燃易爆性气体、强酸强碱化学品等物质的环境。
- 涉及军工用途、航天航空项目的应用场合。

The company's products are designed and produced as industrial products, in strict compliance with industrial product standards. We expressly declare that, unless specifically designed and expressly confirmed by us in writing, our products are not intended for the following applications:

- Applications that require high reliability, including nuclear, gas, electric and other systems that require long-term stable operation.
- Applications requiring very high security, situations involving personal safety and property.
- Applications in harsh conditions, harsh environments, including outdoor, chemical contamination, electromagnetic, vibration or shock effects.
- Applications where there is a risk of fire or explosion, including environments where flammable and explosive gases, strong acids and alkali chemicals are present.
- Applications involving military use and aerospace projects.