

# **SPECIFICATION**

| Product Name: | Sensor DIM LED Driver |  |
|---------------|-----------------------|--|
| Model No.:    | MLC65C-P8             |  |

Issue Date: April 18, 2019

| CUSTOMER | APPROVED |  |
|----------|----------|--|
|          |          |  |
|          |          |  |

| PRODUCT<br>DIRECTOR<br>APPROVED | SALES<br>CHECKED | R&D<br>CHECKED | PREPARED |
|---------------------------------|------------------|----------------|----------|
| 3PU.G.                          | -6×6             | 多多             | 智克       |



### 1. Features



- Integrated motion sensor & power supply, convenient installation and simple wiring
- · Sensor parameters can be adjusted by DIP SWITCH
- · Multi-current optional by DIP switch
- With MINI sensor head, suitable for more fixture installation

### 2. Parameter

|              | Operating Voltage               | 198-264V AC, 50Hz                           |
|--------------|---------------------------------|---|
|              | Input Current                   | ≤0.36A (230VAC@reload)                      |
| Input        | Rated Voltage                   | 220-240V AC, 50Hz                           |
| iliput       | PF                              | ≥0.90 (230V full load)                      |
|              | Stand-by Power                  | ≤1W   |
|              | Working efficiency              | 87% Max. (230V Max load)                    |
|              | Working Mode                    | Constant current                            |
|              | Type of Load                    | LED   |
|              | No-load output voltage          | 60V DC Max                                  |
| Output       | Flicker standard                | Flicker                                     |
|              | Output voltage range            | 35-52V DC                                   |
|              | Output current                  | 600mA/650mA/900mA/1050mA                    |
|              | Current accuracy                | ±5%   |
|              | Operating Frequency             | 5.8 GHz ±75 MHz,ISM Band.                   |
|              | Transmitting power              | 0.5mW Max.                                  |
|              | Hold time                       | 5S/90S/ 5min/ 25min                         |
|              | Stand-by DIM Level              | 10%/ 25%                                    |
| Sensor       | Stand-by Period                 | 1S/ 5min/ 25min/ +∞                         |
| Parameters   | Detection Area                  | 25%/ 50%/ 75%/100%                          |
|              | Daylight Sensor                 | 50Lux/Disable                               |
|              | Detecting Radius                | 6-8m (mounting height 3m) (see note2)       |
|              | Mounting Height                 | 6m Max.                                     |
|              | Detecting Angle                 | 150° (Wall mounted), 360° (Ceiling mounted) |
| Abnormal     | No load protection              | Yes   |
| Protection   | Output short circuit protection | Yes   |
| Requirements | Output short circuit protection |   |
| Operating    | Operating Temperature           | -25℃+50℃                                    |
| Environment  | Maximum shell temperature       | 85℃   |

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Add: 2<sup>nd</sup> and 3<sup>rd</sup> floor, NO.3 Building, 380 Xiangshan Avenue, Luotian, Yanluo, Baoan, Shenzhen, 518127,China Tel: +86 (0)755-2305 7253 Fax: +86 (0)755-2786 3012 Website: www.merrytek.com

Version: A0



|             | (Tc)   |   |
|-------------|--|---|
|             | Storage Temperature&Humidity                     | -40℃+80℃(Humidity: 85% Non-condensing)              |
|             | Safety standards                                 | EN61347-1, EN61347-2-13                             |
| Certificate | EMC standards                                    | EN55015, EN61547, EN61000-3-2, EN61000-3-3          |
| Standards   | Environment Requirement                          | Compliant to RoHS                                   |
|             | Certificate                                      | CE SAA (Pendy)                                      |
|             |  | 3750Vac 5mA 60S (input "L N" to output "LED+ LED-") |
|             | Insulation Resistance                            | 1500Vac 5mA 60S (input "L N" vs PE ")               |
|             | 500Vac 5mA 60S (input PE to output "LED+ LED-,") |   |
|             | Input/ Output (terminal/lead) Specifications     | Wire diameter of shrapnel terminal: 0.75-1.5mm²     |
|             | IP Rating  | IP20  |
|             | Protection Class                                 | Class I   |
|             | Installation                                     | Built-in installation                               |
|             | Dimension  | Main Part: 212L*42W*30H mm                          |
|             | Dimension  | Sensor Head: 57.5L*26W*16H mm                       |
|             | Net Weight                                       | 311.3g  |
|             | Package  | PE bag+Clapboard + Carton(K=K)                      |
|             | Lifetime   | 30,000h @Ta 230V full load                          |

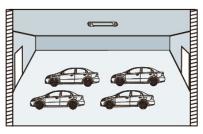
Sensor DIM LED Driver

### Note

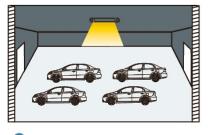
- 1. "N/A" means not available.
- 2. Detection area is effected on volume of motion object and motion speed. The detection area is tested by a 165cm height person and walking speed is 0.5m/s.

### 2. Function

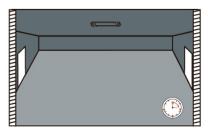
1) On/OFF Function(Stand-by period set at '1S')



With sufficient ambient light, the light will not be switched on even if with motion signal.



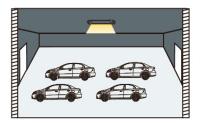
With insufficient ambient light, the sensor switches on the light when motion is detected.



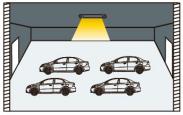
After elapse of hold time, the sensor switches off the light when no motion is detected.



### 2) 2-step dimming function(stand-by period set at"+∞")

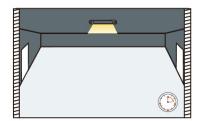


1 If there is no motion detected, the light will be remained at a low light level all the time.



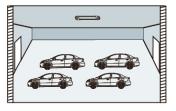
Sensor DIM LED Driver

When motion is detected, the sensor will switch on the light to 100% brighteness

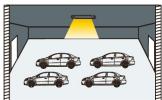


After elapse of hold time, the sensor dims the light at the present low light level if no motion is detected.

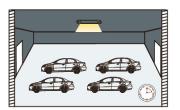
### 3) 3-step dimming function(Stand-by period set at '5min/25min')



 With sufficient ambient light, the light will not be switched on even if with motion signal.



With insufficient ambient light, the sensor switches on the light when motion is detected.

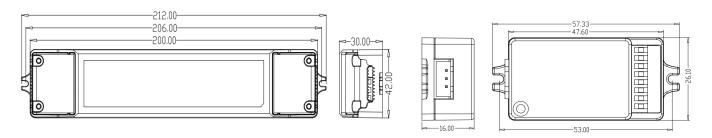


After elapse of hold time, the sensor dims the light at a low light level if no new motion is detected.



After elapse of standby period, the sensor switches off the light if no motion is detected in the detection zone.

# 4. Dimension (mm)



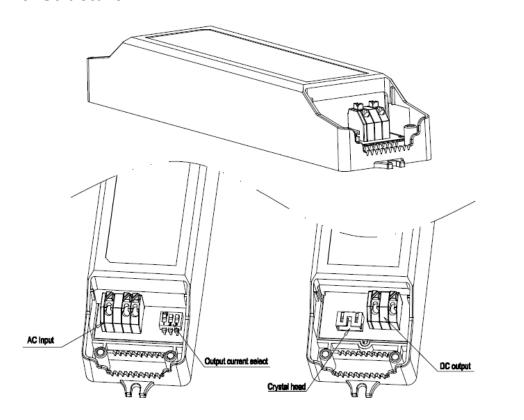
### 5. Wiring

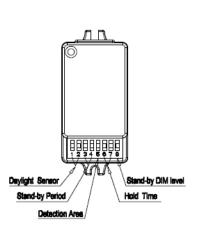


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### 6. Structure

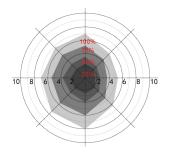




### 7. Detection Pattern

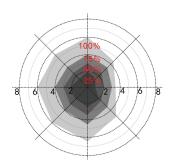
1. Ceiling mounting

Ceiling mounted height: 3m Sensitivity: 100%/75%/50%/25%



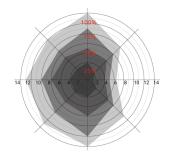
Normal moving (Speed:1m/s)

Ceiling mounted height: 6m(\*) Sensitivity: 100%/75%/50%/25%

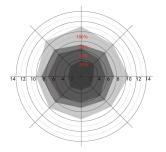


Normal moving (Speed:1m/s)





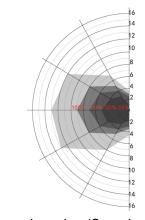
Slow moving (Speed 0.3m/s)



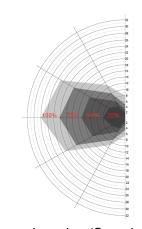
Slow moving (Speed: 0.3m/s)

### 3. Wall mounting

Walling mounted height: 2m Sensitivity: 100%/75%/50%/25%



Normal moving (Speed: 1m/s)



Normal moving (Speed: 0.3m/s)

# 8. DIP Switch Setting

### 1) Output current

|     | 1  | 2  | 3  |           |
|-----|----|----|----|-----------|
| I   | ON | ON | ON | 1050 (mA) |
| II  | ON | ON | -  | 900 (mA)  |
| III | ON | -  | -  | 650 (mA)  |
| IV  | -  | -  | -  | 600 (mA)  |



### 2) Sensitivity

|     | 1  | 2  |      |
|-----|----|----|------|
| I   | ON | ON | 100% |
| II  | ON | -  | 75%  |
| III | -  | ON | 50%  |
| IV  | -  | -  | 25%  |

### 3) Hold Time

|     | 3  | 4  |       |
|-----|----|----|-------|
| I   | ON | ON | 5S    |
| II  | ON | -  | 90S   |
| III | -  | ON | 5Min  |
| IV  | -  | -  | 25Min |

### 4) Daylight Sensor

|    | 5  |         |
|----|----|---------|
| I  | ON | 50Lux   |
| II | -  | Disable |

### 5) Stand-by Period

|     | 6  | 7  |       |
|-----|----|----|-------|
| I   | ON | ON | 18    |
| II  | ON | -  | 5Min  |
| III | -  | ON | 25Min |
| IV  | -  | -  | +∞    |

### 6) Stand-by DIM Level

|    | 8  |     |
|----|----|-----|
| I  | ON | 10% |
| II | _  | 25% |

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# 9. Initialization

After power on, the sensor automatically turns on light at 100% brightness. After 10sec, it turns off the light. During the initialization, the sensor is not able to detect movement.

### 10. Factory Setting

Detection Area: 100%, Hold Time: 5S, Daylight Sensor: Disable, Stand-by DIM Level:10%, Stand-by Period:1S

# 11. Application Notice

Be sure to power off before adjusting DIP switch setting.

# 12. Version Change

| Version | Date            | Description          |
|---------|-----------------|----------------------|
| Α0      | April 18 , 2019 | Released new product |
|         |                 |                      |