

Project		Catalog #		Type	
Prepared by		Notes		Date	



## Greengate

### Photodiode Sensor

A Greengate Lighting Control System accessory which allows control of lighting levels based on how much natural light is present

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#### Product Features



#### Top Product Features

- Selectable dimming rate for three or eight seconds providing a fast response or stable signal
- Adjustable light levels from 7-140 FC on the Photodiode Sensor allows for flexibility in work area illumination
- Continuous dimming permits implementation of a lumen maintenance strategy
- Flat Fresnel lens provides a narrow cone of response
- Combine with occupancy sensors for added savings

 additional product diagrams

## Order Information

This is an accessory for the Greengate ControlKeeper Lighting Control Systems. It is not an integral part of the system. There is no factory assembly needed.

### Catalog Number

Domestic Preferences <sup>(1)</sup>	Catalog Number	Orientation	Field of View	Technology	Mounting	Input	Output
<b>[Blank]</b> = Standard <b>BAA</b> = Buy American Act	DLC-PD-DIM	Downward	60°	Photodiode	Ceiling 8-15 ft	12 VDC	0-9 VDC
<b>Notes</b> (1) Only product configurations with this designated prefix are built to be compliant with the Buy American Act of 1933 (BAA). Please refer to <a href="#">DOMESTIC PREFERENCES</a> website for more information. Components shipped separately may be separately analyzed under domestic preference requirements.							

## Product Specifications

### Key Features

- The Photodiode Sensor measures the actual amount of illumination within a work area or monitored zone. It compares the light level to a preset footcandle (FC) calibration and sends a voltage signal to a dimming ballast to either increase or decrease the lighting in fluorescent lamps. This ensures that there is a constant level of illumination within the controlled area. A potentiometer adjustment on the Photodiode Sensor is calibrated to preset the light level.

### Mechanical

**Size:** 1.23"L x 2"D. Lens = 1.29"D

#### Environment:

- Operating temperature:** -13°F to 140°F (-25°C to 60°C)
- Relative humidity operating:** less than 95%, non-condensing
- For indoor use only

**Mounting:** The sensor mounts through a 3/8" hole in the ceiling tile and is secured with double-sided adhesive foam (provided)

**Housing:** GE Cyclocac T ABS stabilized housing meets UL 94HB flame-retardant requirements

**Sensor Type:** Blue-enhanced photodiode

**Sensor Range:** 60 degree field of view at ranges 0 to 500 foot-candles

### Electrical

**Input Voltage:** 10 VDC from electronic dimming ballast only

**Output Voltage:** 1 VDC when ambient light is brightest and 10 VDC in darkest. Up to 50 ballasts may be connected to one Photodiode sensor

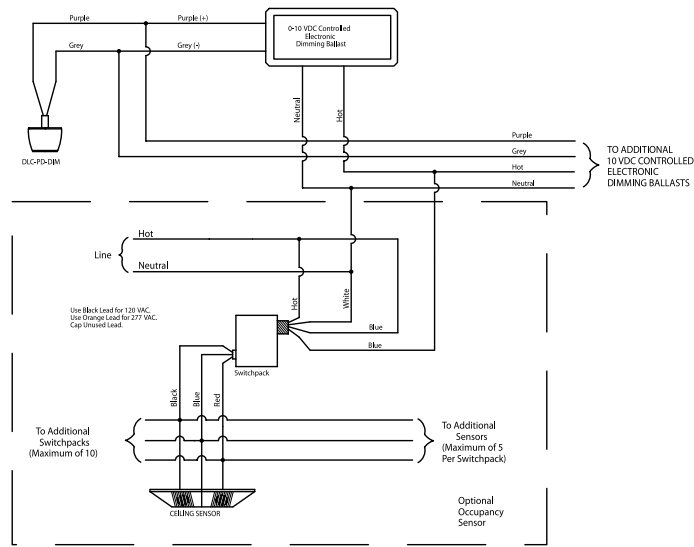
**Wiring:** Photodiode Sensors are provided with insulated pigtails. Sensors and ballasts are interconnected by 18 AWG Class 2 wiring per NEC 725. Use UL-recognized Teflon-insulated wire approved for plenum areas per NEC 725-2(b) where required

### Warranty

Consult website for warranty information

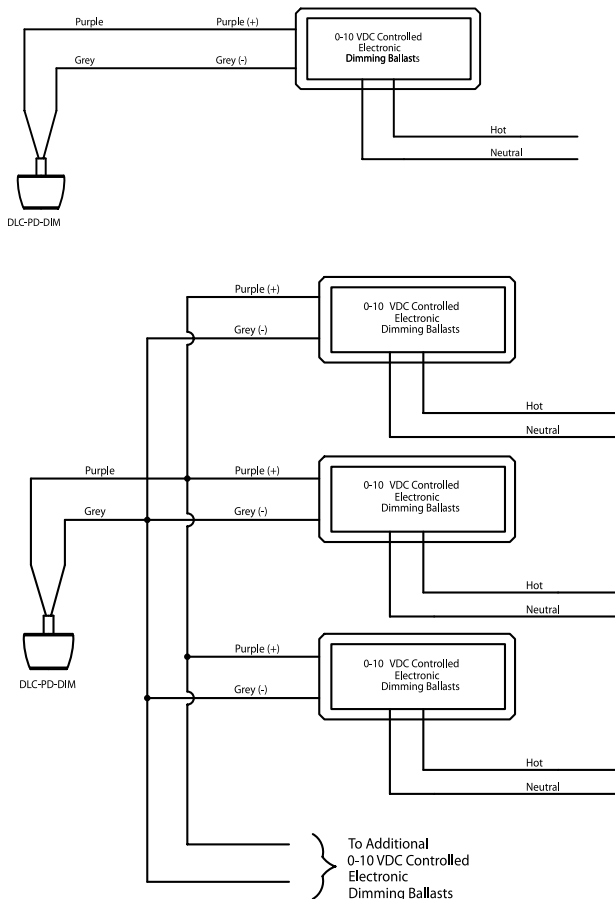
## Wiring Diagrams

### Continuous Dimming with Occupancy and Full lights-OFF with Occupancy



### Continuous Dimming with Occupancy and Full lights-OFF Without Occupancy

## Photodiode Controlling 0-10 VDC Dimming Ballast



- Control Systems
  - Greengate