

# SmartShift®-Ready PLC Hybrid



## Wireless control with Lightcloud Blue



PROJECT:

DATE:

TYPE:

PREPARED BY:



### KEY FEATURES

- **Omnidirectional** light distribution
- **Plug-and-play** on existing magnetic CFL ballasts or can be wired directly to line voltage without need for an external driver or ballast
- **Direct connect** to the Lightcloud Blue mobile app via Bluetooth; no Gateway or Hub required
- **Use mobile device** to configure features for On/Off Control, Dim Level, Color Temperature, Schedules, Scenes, SmartShift and more
- **Tunable White 2700-6500K** with smooth transition between color temperatures

### PERFORMANCE

Catalog Number	Wattage Equivalency	Input Wattage	Lumens	Input Voltage	Beam Angle	Input Voltage	Color Temperature	CRI	L70 Lifespan
PLC-9-O-HYB/LCB	26W Fluorescent	9.5W	1,200 lm	120-277V	360°	120-277V	Tunable 2700-6500K	≥80	50,000 Hrs

### TECHNICAL SPECIFICATIONS

#### FEATURES

##### Tunable White

Adjust the color temperature from 2700K to 6500K via the Lightcloud Blue Remote or the mobile app

##### Direct Connect

Use the Lightcloud Blue mobile app to connect to your device(s) in minutes via Bluetooth® Mesh; no Gateway or Hub required.

##### Mobile App Control

Use the Lightcloud Blue mobile app to configure features for On/Off Control, Dim Level, Color Temperature, Schedules, Scenes, SmartShift and more.

##### SmartShift Circadian Lighting

Automatically tunes the color and intensity of lights throughout the day, mimicking the sun's natural pattern.

##### Scalable

Devices within 60 feet of each other can communicate within the Bluetooth Mesh network to manage a maximum of up to tens of thousands of devices per account.

#### LIGHTCLOUD BLUE

##### Lightcloud Blue

Lightcloud Blue is a Bluetooth Mesh wireless lighting control system that allows you to control RAB's various compatible devices. With RAB's patented Rapid Provisioning technology, devices can be quickly and easily commissioned for residential and large commercial applications using the Lightcloud Blue mobile app. Each device in a system can communicate with any other device, eliminating the need for a Gateway or Hub and maximizing the control system's reach.

DLC system - N1XMLOEATBA (Interior); NHCZ2BIA17L (Exterior)  
Learn more at [www.lightcloud.com](http://www.lightcloud.com)

##### Gateway Required No

##### Communication Protocol Bluetooth Mesh

##### Range

Indoor: Up to 60 feet between standard building materials. Building materials such as brick, concrete, and steel construction may require additional Lightcloud Blue devices to extend around an obstruction; Up to 200 feet clear line of sight.

Outdoor: Up to 60 feet clear line of sight; Up to 18 feet around corners

## TECHNICAL SPECIFICATIONS

### LIGHTCLOUD BLUE FEATURES (CONT)

#### Spacing Criteria

Lightcloud Blue devices should be placed within the specified range to communicate within the Bluetooth Mesh network.

#### Factory Reset

Method 1: Delete from App

Open the app and access the device settings for the paired device. Be sure that the device is online and select 'Delete'. The device will flash on/off 5 times and return to full brightness.

Method 2: Manual

Power the device off and on 5x consecutively. Do not allow less than 4s to elapse from switching off to on. Do not allow more than 2s to elapse from switching on to off. The device will flash 3x, then reset to 100% brightness at default CCT.

Method 3: Rapid Reset Tool

The Rapid Reset process must be done by a professional electrician qualified by RAB. Reach out to your RAB sales manager to request a Rapid Reset Tool. The tool simply needs to be placed directly on the small Lightcloud Blue logo on the device for 2s or until the lamp/luminaire flashes 3x, then resets to 100% brightness at the default CCT.

### CONSTRUCTION

**Product Type** Compact

**Shape** PLC

**Endcap Material** Copper

**Enclosure Material** Polycarbonate

**Finish** White

### INSTALLATION

**Installation Method** UL Type A+B, Hybrid

**Installation Orientation** Universal

**Base Type** G24d

### ELECTRICAL

#### Dimmable

Yes via the Lightcloud Blue mobile app and devices

This lamp will not operate properly when connected to a standard (*incandescent*) dimmer or dimming control

**Driver** Constant Current, 50/60 Hz

**Input Voltage** 120-277V

**Operating Frequency** 50/60 Hz

**Operating Temperature** -4°F to 113°F (-20°C to 45°C)

**THD** 0.2

**Power Factor** 0.9

**Flicker** 0.5

### LED CHARACTERISTICS

**Beam Angle** 360°

#### Color Temperature

Default: 3000K

Adjustable using the Lightcloud Blue mobile app, Tunable White 2700 - 6500K

**Color Accuracy (CRI)** ≥80

#### R9 Value

High color performance with R9 greater than 0

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High color performance with R9 greater than 0

#### Color Consistency

<6-Step MacAdam Ellipse binning to achieve consistent fixture-to-fixture color

#### Color Stability

LED color temperature is warrantied to shift no more than 200K in color temperature over a 5-year period

#### Color Uniformity

RAB's range of Correlated Color Temperature follows the guidelines of the American National Standard for Specifications for the Chromaticity of Solid State Lighting (SSL) Products, ANSI C78.377-2017.

### COMPLIANCE

#### Listings

UL Listed, UL Classified

#### Environment

Suitable for use indoors in dry and damp environments.

#### Fixture Rating

Suitable for use in enclosed fixtures

**California Title 20 Compliant** No

**California Title 24 JA8 Compliant** No

#### California Energy Commission (CEC) Status

Lawful for Sales in California

#### NSF Listed

Meets NSF/ANSI standards for use in Food Zone (*non-contact*), Splash, and Non-Food Zones. Tube guard required in open fixtures.

#### RoHS

Mercury and UV free. RoHS-compliant components

#### FCC

Complies with Part 15 of the FCC Rules

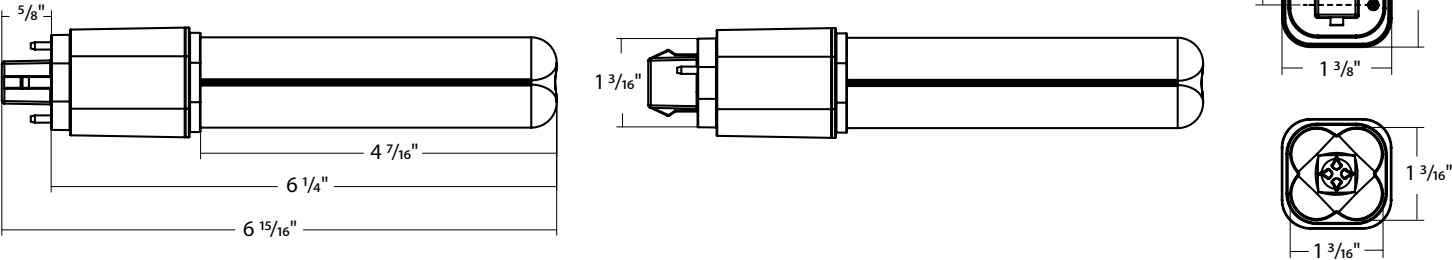
### OTHER

#### Warranty

RAB warrants that our LED products will be free from defects in materials and workmanship for a period of five (5) years from the date of delivery to the end user, including coverage of light output, color stability, driver performance and fixture finish. RAB's warranty is subject to all terms and conditions found at [rablighting.com/warranty](http://rablighting.com/warranty).

DIMENSIONS

PLC-9-O-HYB/LCB  
Weight: 0.24 lbs



ORDERING INFO

Catalog Number	Certification Model Number	UPC	Case Pack
PLC-9-O-HYB/LCB	PLC-9-O-HYB/LCB	192552000000	12

ORDERING MATRIX

Family	Wattage	Orientation	CRI/Color Temp	Installation Type	Base	Control
PLC	9	O		HYB		
	9 9.5W	O Omnidirectional	Blank 80 CRI, Tunable White 2700-6500K	HYB Hybrid	Blank G24d	/LCB Lightcloud Blue

## Ballast Compatibility List

Ballast Brand Manufacturer	Part Number	Number of Lamps	Lamp Connection	C-Compatible		N/A-Not applicable	
				N Lamp		N-1 Lamp	
		1/2/3/4	Parallel/Series	120V	277V	120V	277V
Philips Advance	H-1Q26-TP-BLS	1	N/A	C	N/A	N/A	N/A
	HP28P	1	N/A	C	N/A	N/A	N/A
	HP22627P	2	Parallel	N/A	C	N/A	N/A
Robertson	O1527P	2	Series	C	N/A	C	N/A

## Emergency Ballast List

Brand	Model	Output
Philips Bodine	850	AC
	LP600	AC
	ELI-S-20	AC
Iota	I-320	AC
	I-42-EM-R-J	AC
	ISL-540	AC
	ISL-54	AC
	ISL-320	AC
Exitronix	XEB-7-B-LM	AC

Brand	Model	Output
Westgate	BAL500	AC
Keystone	KT-EMRG-800-TS	AC
	KT-EMRG-1400-SL	DC
	KT-EMRG-1300-SL	AC
Espan	VEM500DV(L)	AC
	VEM700DV(L)	AC
Tam-lite	BAL1400LPACTD	AC
	BAL500LPACTD	AC

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