# SWISH2X2-29N/D10/LCBS/MVS





Project:	Туре:
Prepared By:	Date:

Driver Info		LED Info	
Type	Constant Current	Watts	29W
120V	0.24A	Color Temp	4000K (Neutral)
208V	0.14A	Color Accuracy	85 CRI
240V	0.12A	L70 Lifespan	100,000 Hours
277V	0.11A	Lumens	4,039 lm
Input Watts	s 29.9W	Efficacy	135.1 lm/W

# **Technical Specifications**

### Compliance

# UL Listed:

Suitable for damp locations

#### IESNA LM-79 &lm-80 Testing:

RAB LED luminaires and LED components have been tested by an independent laboratory in accordance with IESNAIm-79 and Im-80

### **Trade Agreements Act Compliant:**

This product is a product of Cambodia and a "designated country" end product that complies with the Trade Agreements Act

# DLC Listed:

This product is listed by Design Lights Consortium (DLC) as an ultra-efficient premium product that qualifies for the highest tier of rebates from DLC Member Utilities. Designed to meet DLC 5.1 requirements.

DLC Product Code: PC4KH4TS

### **Electrical**

#### Driver:

Class 2, Constant Current, 120-277V, 50/60Hz, 120V: 0.24A, 208V: 0.14A, 240V: 0.12A, 277V: 0.11A

### **Dimming Driver:**

Driver includes dimming control wiring for 0-10V dimming systems. Requires separate 0-10V DC dimming circuit. Dims down to 10%.

#### THD:

6.54% at 120V, 5.25% at 277V

#### **Power Factor:**

99.5% at 120V, 95.4% at 277V

#### **Smart Sensing:**

Programmable occupancy sensor for multi-level lighting control. Includes manual override from a light switch.

#### **Surge Protection:**

2.5kV

### Construction

### **Cold Weather Starting:**

The minimum starting temperature is -20°C (-4°F)

### **Ambient Temperature:**

Suitable for use in up to 40°C (104°F)

#### IC Rated:

Suitable for direct contact with insulation

### Housing:

Die-formed, 20-gauge, cold-rolled steel

### Mounting:

Integral T-grid clips make installation easy and secure

### Reflector:

High-reflectance, powder-coated finish, optimized for uniform light distribution

#### Lens:

Snap-in, frosted polycarbonate lens

#### Finish:

Formulated for high durability and long-lasting color

#### **Green Technology:**

Mercury and UV free. RoHS-compliant components.

#### **LED Characteristics**

#### LEDs:

Long-life, high-efficacy, surface-mount LEDs

### **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.



## **Technical Specifications (continued)**

#### Performance

### Lifespan:

100,000-Hour LED lifespan based on IES LM-80 results and TM-21 calculations

### **Sensor Specifications**

#### Capacitance Load:

400VA at 120VAC, 800VA at 230VAC, 1000VA at 277VAC

#### Operating Temperature:

-20°C to +60°C (-4°F to +140°F)

### Relay:

Zero-cross relay

### Maximum Mounting Height:

16.4 feet

#### **Customizable Detection Area:**

10, 50, 75 or 100%

### Time Delay:

5s, 30s, 1min, 5min, 10min, 20min, 30min

#### **Cut Off Period:**

0s, 10s, 1min, 5min, 10min, 30min, 1hr, Bi-Level

#### **Cut-Off Dimming level:**

10, 20, 30, 50%

#### **Cut-Off Power:**

Less than 1W

## **Daylight Threshold:**

About .2-5 fc for disabled

#### **Sensor Principle:**

High Frequency

### Microwave Frequency:

5.8GHz +/- 75MHz

### Microwave Power:

<0.2mW

### Max Detection Range:

26 ft diameter at 16 ft mounting height

### **Detection Angle:**

About 30 to 150 degrees

### Remote Control Accessory:

Adjust settings using remote control (catalog# MVSREM). Only available with 0-10V dimming driver options. Remote control available here.

### Lightcloud

### **Lightcloud Blue Sensor Installed:**

Occupancy, vacancy, and closed loop daylight harvesting in one versatile sensor. In addition control any fixture in your Lightcloud Blue integrated/embedded networked lighting luminaire-level control system. LLLC - capable of switching, 0-10V dimming, power/energy monitoring. Can also be used to extend the range of the Lightcloud Blue utilizing a "BLE Mesh" network communication protocols. The Lightcloud Blue sensor can be attached to the fixture provided an unobstructed view of the coverage area is available. DLC system - N1XMLOEATBA

#### 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.

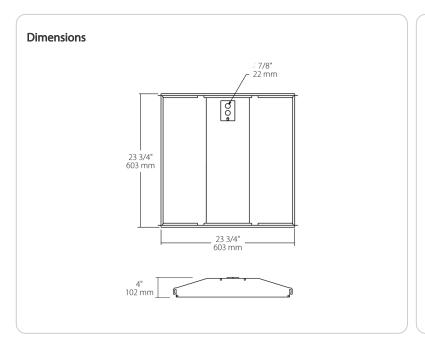
#### Patents:

This design is protected by patents pending in US, Canada, China, Taiwan and Mexico

### **Buy American Act Compliance:**

RAB values USA manufacturing! Upon request, RAB may be able to manufacture this product to be compliant with the Buy American Act (BAA). Please contact customer service to request a quote for the product to be made BAA compliant.





### **Features**

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, Schedules, Scenes, and more.

Meets Luminaire Level Lighting Control (LLLC) requirements

Integrated passive infrared or microwave sensor for added savings

Use mobile device to configure sensor settings for sensitivity, timeout and actions.

Emergency battery backup options available

Ordering Matrix							
Family	Size	Wattage	Color Temp	Driver	Options	Chicago Penum	
SWISH	2X2 -	- 29	N	/D10	/LCBS/MVS		
	2X4 = 2' x 4' 2X2 = 2' x 2'	19 = 19W (2x2) 29 = 29W (2x2) 39 = 39W (2x4) 49 = 49W (2x4)	Blank = 5000K Cool N = 4000K Neutral YN = 3500K Warm Neutral Y = 3000K Warm	/D10 = 0-10V Dimming	/E2 = Battery Backup /LC = Lightcloud® Controller /LCB = Lightcloud® Blue Enabled /LCBS = Lightcloud® Blue Enabled w/ PIR Sensor /MVS = Microwave Occupancy Sensor /LC/E2 = Lightcloud® Controller w/ Battery Backup /LCB/E2 = Lightcloud® Blue Enabled and Battery Backup /LCBS/E2 = Lightcloud® Blue Enabled w/ PIR Sensor and Battery Backup /LCBS/MVS = Lightcloud® Blue Enabled w/ MVS Sensor /LCBS/MVS/E2 = Lightcloud® Blue Enabled w/ MVS Sensor and Battery Backup /MVS/E2 = Microwave Occupancy Sensor w/ Battery Backup Blank = No Option	Blank = Standard /CP = Chicago Plenum	