

NLCSPEJ

3.5mm Jack Sensor

Product Description

The NLCSPEJ is a low-voltage Bluetooth wireless PIR/Daylight sensor with a 3.5mm Jack/AUX connector, designed for the NICOR NLC System, perfect for Luminaire Level Lighting Controls (LLCs). Constructed from high-rated fire retardant material, this sensor offers easy installation and use, with a plug-n-play system for fixtures with a 12V output 3.5mm jack sensor socket ready. Providing 360° coverage at heights from 20ft to 40ft, it offers long-term flexibility, better occupant experience, and cost efficiency compared to non-controlled fixtures, making it ideal for warehouses, garages, gymnasiums, and other industrial spaces.

Setup and commissioning requires the NICOR NLC mobile app (Android/iPhone).

Construction

- Made of fire retardant plastic (UL 94-5VA)
- Built-in analog PIR sensor

Network Technology

- Utilizes Bluetooth Low-Energy (BLE) technology for a mesh network configuration.
- Managed through the NICOR NLC App, compatible with iOS and Android smartphones.
- Bluetooth signals can reach up to 100ft without obstruction, ensuring reliable connectivity.
- BLE 4.2 MESH IEEE 802.15.1

Electrical

- Input voltage of 12V
- Operating temperature rating of -22°F to 131°F (-30°C to 55C)

Mounting and installation

- Plug-n-play compatibility with all fixtures featuring a 3.5mm Jack Sensor socket
- Interchangeable lenses available in 90°, 77°, and 103° beam distribution
- Ideal for high bay and high-mounted fixtures ranging from 20 to 40 feet in height
- Must only be used for dim-to-off or 0-10V fixture; do not use a control/bluetooth relay

Listings

- cULus Listed LED Controller
- DLC NLC5 listed
- IP65 rated
- UL1376 Cyber Security Certification
- RoHS compliant

Warranty

- 5-year limited system warranty standard
- Warranty does not cover product failure due to an overvoltage event (power surge)

Project

Catalog

Type

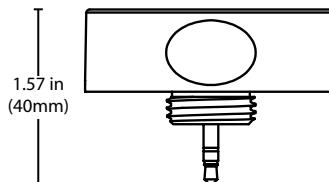
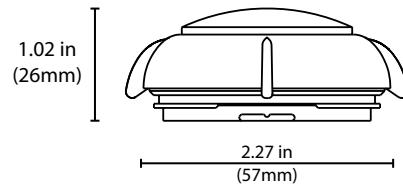
Date



without Lens



-LHW (with 90° Lens)



Product Information

Input Voltage (V):	12V DC
Input Power(W):	0.6W
Input Current (A):	50mA Max
Output Voltage (V):	10V DC
Output Power (W):	0.1W
Output Current (A):	10mA Max
Dimming:	Class 2, 0-10V
Wireless Protocol	Bluetooth 4.2
Wireless Frequency (GHz)	2.4 GHz
Wireless Range (Open Air)	100ft Max

Ordering Information

Example: NLCSPEJ1WH-LHW

Series	Product	Sensor Type	Mounting Type	Connector Type	Version	Finish	Lens
NLC	S (Sensor)	P (PIR)	E (External Mount)	J (3.5mm Jack)	1	WH (White)	_Blank (without lens) -LHW (90° lens)

Specifications and dimensions subject to change without notice. Please refer to the website for the most up-to-date information.

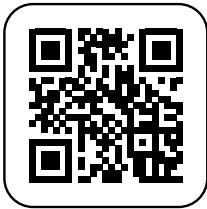
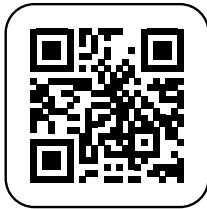
Performance Data

Default Factory Settings

Motion Mode	Occupancy
Motion sensor	ON
Photo sensor	OFF
Hold time	20 min
Standby time	1 min
Dim level	50%
Sensitivity	100%
High Trim	100%

Note: Photo Sensor's default ON mode will be minimum of 50 fc and maximum of 150 fc.

Download the NICOR NLC App



Scan QR code or click on buttons to download the NICOR NLC App. NICOR NLC App will need access to network and Bluetooth. Accept prompt to allow access to photos for QR codes to be automatically saved in your album.

For more information check our [NICOR NLC Commissioning Guide.](#) (<https://nicorlighting.com/NLC/NLC%20Commissioning%20Guide.pdf>)

Optic Accessories*

*accessories sold separately

77° High Mount, Narrow Lens

NLCLHN1WH

103° Medium Mount, Wide Lens

NLCLMW1WH

Attachment Accessories*

Low Voltage 3.5mm Jack Socket

H12VSOCKET

3.5mm Jack Adaptor; 90°-180° Adjustable Arm

H12VADJARM1WH

HBC Adaptor: 3-pin to 3.5mm

HBCSOCKETADAPT1

Switch Accessories*

3-Button Wireless Dimming Switch

NLCW31WH

5-Button Wireless with Scene Selection Switch

NLCW51WH

NLC Switch Wall Plate

NLCWP1WH

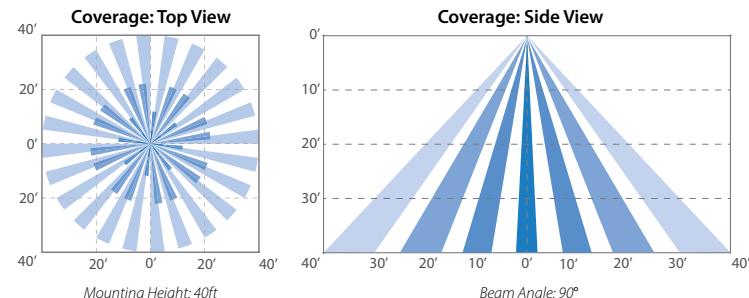
Other Accessories*

USB Gateway for Energy Monitoring

NLCE1

-LHW - High Mount, Wide Lens

Mounting Height: **20ft to 40ft**



NICOR NLC SYSTEM CAPACITY

Luminaires	Up to 100 lights can be paired per zone.
Luminaire/Group	NLC enabled light can be added up to 20 groups per zone.
Scene	Single light / one bluetooth node can be set up to 32 scenes. Up to 127 scenes in total can be set per zone. Only 3 scenes can be loaded into 5-button switch (NLCW51WH)
Schedule	Up to 32 schedules can be set per zone.
Switch	Up to 10 switches can be set per zone.
Zones	Unlimited number of zones can be added to the app.
Data Persistence	All settings (sensor, group, scene, parameters and switch) are saved on individual luminaire controllers so the system can run without network connection or after a power outage.
Max Distance:	Maximum of 100ft distance between NLC Bluetooth nodes without obstruction.

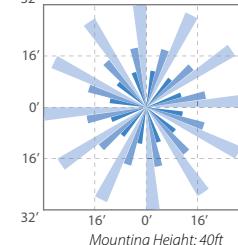
Note:

If a enabled luminaire or Bluetooth node or group or switch exceeds its maximum capacity, the App will automatically delete the first fixture / Bluetooth device you paired or added.

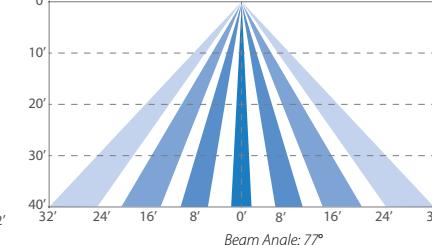
NLCLHN1WH - High Mount, Narrow Lens

Mounting Height: **20ft to 40ft**

Coverage: Top View



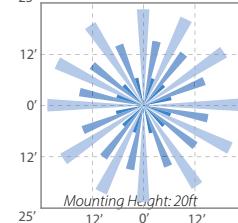
Coverage: Side View



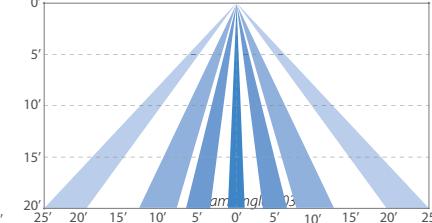
NLCLMW1WH - Medium Mount, Wide Lens

Mounting Height: **8ft to 20ft**

Coverage: Top View



Coverage: Side View



This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

—Reorient or relocate the receiving antenna.

—Increase the separation between the equipment and receiver.

—Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.

—Consult the dealer or an experienced radio/TV technician for help.

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