

PW-301 Passive Infrared Wall Switch Occupancy Sensor

High sensitivity and dense coverage for exceptional performance

Defaults to Manual-ON operation for maximum energy savings

Color-matched lens and low profile for appealing design



Optional neutral connection with break off tab to expose neutral terminals

120/277 VAC and 347 VAC models

Allows multi-way control from one of up to four control locations

PROJECT

LOCATION/TYPE

Product Overview

Description

The PW-301 passive infrared (PIR) wall switch sensor can turn lights OFF and ON based on occupancy. It is characterized by high sensitivity to small and large movements, appealing aesthetics, and a variety of features.

Operation

The PW-301 replaces existing wall switches and installs in a single gang junction box with or without either neutral wiring. Factory default operation is for Manual-ON, so that users turn lights on only when needed. It uses advanced PIR technology to detect occupancy and keep lighting ON when it is needed. Once the space is vacated and the time delay elapses, lights automatically turn OFF. DIP switch settings allow for a variety of control options such as Auto-ON operation, walk-through and test modes. Multiple sensors may be used for control of one or more loads from up to four locations.

Optional Neutral Connection

The PW-301 sensor uses a patent pending Neutral Sense Technology. Any PW-301 sensor can be used for a two-wire or three wire application, either to work with existing wiring, or to meet local or national code requirements. An easy-to-break plastic tab covers neutral screw terminals. Once the sensor is connected to neutral it complies with all codes that restrict current leakage to ground.

Applications

The PW-301 sensor is great for retrofit projects and well suited for small, enclosed spaces with clear line of sight of the occupant. Common applications include small offices, small conference rooms and lunch/break rooms.

Features

- Complies with 2011 NEC requirements
- Zero-crossing for long relay life
- Vandal resistant lens combines precise coverage with durability
- Selectable walk-through mode turns lights off three minutes after the room is initially occupied if no motion is detected after the first 30 seconds
- Test mode allows quick and easy adjustments
- Selectable audible and/or visual alerts for impending shutoff
- LED indicates occupancy detection
- In automatic mode, sensor returns automatically to Auto-ON after lights are turned off manually; ideal for presentations
- Optional light level sensing with simple setup
- Service mode allows sensor to operate as a service switch in the unlikely event of a failure
- Sensor coverage tested to NEMA Guide Publication WD 7-2000
- Compatible with decorator wall plates

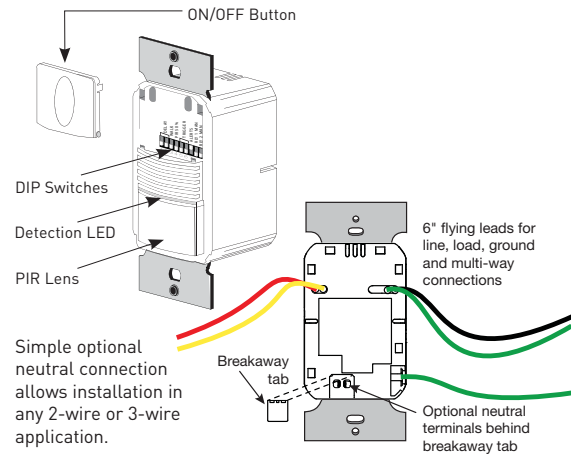


Specifications

- PW-301: 120/277VAC; 50/60Hz, 1/6 hp @ 120VAC, 0-1000W ballast, LED, and tungsten @ 277VAC, 0-1200W ballast and LED
- PW-301-347: 347VAC; 50/60Hz, 1/6 hp; 0-1500W ballast and LED
- Time delays: 5, 10, 15, 20, 25 or 30 minutes, walk-through, test-mode
- Coverage: Major motion 35' x 30' Minor motion 20' x 15'
- Sensitivity adjustment: PIR (high/low)
- Dimensions (L x W x D):
 - PW-301: 4.1" x 1.58" x 1.39" (104.6mm x 40.3mm x 35.5mm)
 - PW-301-347: 4.5" x 1.58" x 1.39" (114.36mm x 40.3mm x 35.5mm)
- UL and cUL listed
- Five year warranty

Controls & Settings

Product Controls & Neutral Option



DIP Switch Settings

Time Delay	1	2	3
Test/20 min	↓	↓	↓
5 minutes	↓	↓	↑
10 minutes	↓	↓	↑
15 minutes	↑	↑	↑
20 minutes	↑	↑	↑
25 minutes	↑	↑	↑
30 minutes	↑	↑	↑
Service	↑	↑	↑

Walk-Through	4
Enabled	↑
Disabled	↓

Service bypasses occupancy & light level functions. Control the load manually using ON/OFF button.

PIR Sensitivity	5
Low, 50%	↑
High	↓

Visible Alert	6
Enabled	↑
Disabled	↓

Audible Alert	7
Enabled	↑
Disabled	↓

Relay 1 Mode	8
Manual On	↑
Auto On	↓

PW-302 ONLY

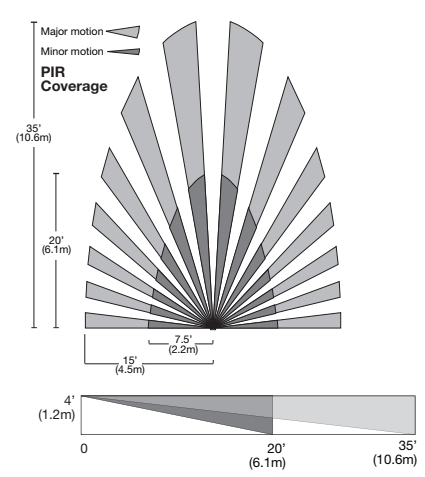
Relay 2 Mode	9
Manual On	↑
Auto On	↓

Factory Settings:
 ▲ All models
 ▲ PW-301 series
 ▲ PW-302 series

↑=ON ↓=OFF

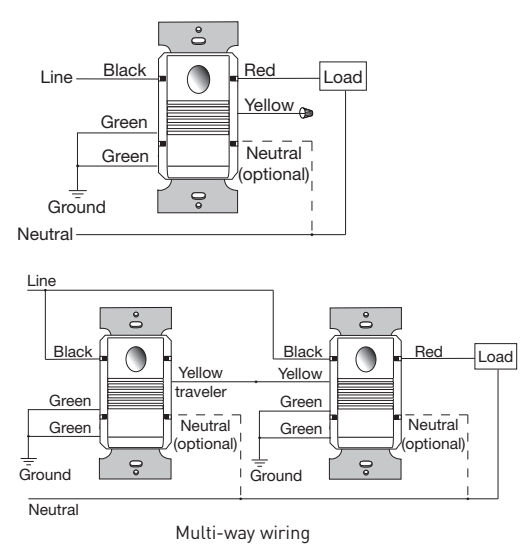
Coverage & Wiring

Coverage Pattern



For best performance, WattStopper recommends using this sensor in spaces no larger than 15' x 12'.

Wiring Diagrams



Ordering Information

Catalog No.	Color	Voltage	Load Rating
<input type="checkbox"/> PW-301-W	White	120VAC; 50/60Hz or 277VAC; 50/60Hz	@ 120VAC, 0-1000W ballast, LED, tungsten, 1/6 hp or @ 277VAC 0-1200W ballast, LED, 1/6 hp
<input type="checkbox"/> PW-301-LA	Lt. Almond		
<input type="checkbox"/> PW-301-I	Ivory		
<input type="checkbox"/> PW-301-G	Grey		
<input type="checkbox"/> PW-301-B	Black		
<input type="checkbox"/> PW-301-R	Red		
<input type="checkbox"/> PW-301-347-W	White	347VAC; 50/60Hz	0-1500W ballast & LED, 1/6 hp
<input type="checkbox"/> PW-301-347-LA	Lt. Almond		
<input type="checkbox"/> PW-301-347-I	Ivory		
<input type="checkbox"/> PW-301-347-G	Grey		
<input type="checkbox"/> PW-301-347-B	Black		
<input type="checkbox"/> PW-301-347-R	Red		

Order wall plate separately.