

CATALOG #: \_\_\_\_\_

Type: \_\_\_\_\_

PROJECT: \_\_\_\_\_

## FEATURES

- Wide distribution optics are ideal for parking garage applications
- Fully gasketed fixture resists dust, bugs, and moisture
- Latches ensure a tight seal and provide easy access to electrical components
- Optional tamper-resistant latches available
- Standard stainless steel latches protect the fixture from corrosion in harsh environments
- NSF/ANSI Standard 2–Splash Zone certified
- IP65, IP66, and IP67 certified
- Closed-cell polyurethane gasket poured and formed in place to ensure tight seal—does not absorb water or promote fungal growth
- Made Right Here® in the USA

## SPECIFICATIONS

- ENCLOSURE** – Outer housing consists of 5VA (f1) fiberglass, rated for flame and weather resistance.
- INTERNAL HOUSING** – .050" aluminum.
- LATCHING** – Stainless steel latches. Injection-molded polycarbonate latches available (not recommended for use in harsh environments, such as a car wash).
- REFLECTOR** – 95% reflective highly specular aluminum.
- SHIELDING** – Frosted or clear, impact-resistant acrylic.
- ELECTRICAL** – High quality mid-power LED board. L70 >50,000 hours. -20°C to 40°C maximum ambient operating temperature. -40°C minimum operating temperature with LA40 option.
- MOUNTING** – Surface or suspended. Stainless steel ceiling mount brackets included.
- LISTINGS** –
  - cETLus conforms to UL STD 1598 and UL STD 8750. Certified to CAN/CSA STD C22.2 No. 250.0. Suitable for dry or damp locations.
  - DesignLights Consortium qualified product. Not all versions of this product may be DLC qualified, see the DLC Qualified Products List at [www.designlights.org/QPL](http://www.designlights.org/QPL).
  - cETLus listing as suitable for wet locations when specified with watertight hub, STOW or SOOW cord, or mini-male receptacle option.
  - NSF/ANSI Standard 2–Splash Zone certified, IP65, IP66, and IP67 certified, and rated for NEMA 4X.
- WARRANTY** – 5-year limited warranty, see [hew.com/warranty](http://hew.com/warranty).

## ORDERING EXAMPLE: 97 - 4 - L95/840 - FR - OPTIONS - DRV - UNV

### ORDERING INFO

SERIES	LENGTH	LUMENS <sup>[1]</sup>	CRI	CCT	SHIELDING	
97	2 2'	2'	8 80	30 3000K	FR Frosted, impact-resistant acrylic	
	4 4'	L25 2500lm		35 3500K	A Clear, impact-resistant acrylic with frosted ends	
		L37 3700lm		40 4000K		
	4'	L45 4500lm		50 5000K		
		L50 5000lm				
		L79 7900lm				
		L95 9500lm				

### OPTIONS <sup>[2]</sup>

EM/10W	10-watt emergency battery <sup>[4]</sup>
EM/18WC	18-watt emergency, low temperature battery <sup>[5]</sup>
LA40	-40°C minimum operating temperature
(L__)	Additional lower lumen packages available Example: 6,100 lumens = 97-4-L79/840-FR-(L61) <sup>[6]</sup>
WET/1	(1) 1/2" watertight hub <sup>[7]</sup>
WET/2	(2) 1/2" watertight hubs <sup>[8]</sup>
SSCMB	Stainless steel chain mounting brackets <sup>[9]</sup>
PCL	Injection-molded polycarbonate latches. <sup>[10]</sup>
TP	Tamper-resistant screws <sup>[11]</sup>

### OCCUPANCY SENSORS <sup>[12]</sup>

OCCWS HB350W-L3W-____	High Bay passive infrared 360° lens <sup>[13]</sup>
OCCWS FSP-321B-L_-120-480	Factory-installed occupancy and daylight control, 120V–480V <sup>[14]</sup>

### CONTROL <sup>[3]</sup>

CONTROL	VOLTAGE
DRV Non-dimming driver	120 120V
DIM Dimming driver	277 277V
	UNV 120-277V <sup>[15]</sup>

### ACCESSORIES

TPTG TOOL Tamper-resistant tool for tri-groove screws. <sup>[16]</sup>

### NOTES

- Lumen output based on 4000 CCT and FR shielding. Actual lumens may vary +/-5%. See page 2 for FIXTURE PERFORMANCE DATA.
- Stainless steel latches required for applications with harsh chemicals. See page 3 for CORD OPTIONS.
- See page 2 for ADDITIONAL CONTROL OPTIONS.
- 4' only. 25°C maximum ambient operating temperature at or below L79.
- 4' only. Rated for -20°C to 25°C ambient temperature.
- Specify in increments of 100 nominal lumens. Option must be specified with next higher lumen package.
- Factory-installed in end of housing.
- Factory-installed in ends of housing. Not available with occupancy sensor option.

<sup>9</sup> 2 per fixture.

<sup>10</sup> Not recommended for use in harsh environments, such as a car wash.

<sup>11</sup> This option requires a tamper-resistant tool, see Accessories.

<sup>12</sup> IP65 certified when specified with occupancy sensor.

<sup>13</sup> Factory-installed; must specify 120 or 277V.

<sup>14</sup> Must specify lens, L2 or L3. See page 3 for OCCUPANCY SENSOR DETAILS.

<sup>15</sup> Not available with EM batteries.

<sup>16</sup> Tamper-resistant tool must be ordered separately. Please specify quantity required per project.



# 97 LED Enclosed & Gasketed Industrial/Garage Lighter

## FIXTURE PERFORMANCE DATA

	LED PACKAGE	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
2'	L25	2559	18.3	139.8
	L37	3756	27.2	138.0
	L45	4554	30.8	147.5
4'	L50	5118	34.7	147.1
	L79	7920	57.3	138.1
	L95	9590	64.7	148.1

- Photometrics tested in accordance with IESNA LM-79. Results shown are based on 25°C ambient temperature.
- Wattage shown is average for 120V through 277V input.
- Results based on 4000K, 80 CRI, actual lumens may vary +/-5%
- Use multiplier tables to calculate additional options.

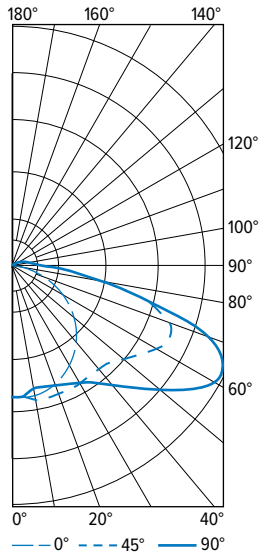
## MULTIPLIER TABLES

COLOR TEMPERATURE	
CCT	CONVERSION FACTOR
2700K	0.94
3000K	0.96
3500K	0.97
4000K	1.00
5000K	1.03

LENS	CONVERSION FACTOR
A	1.00
FR	0.98

## PHOTOMETRY

97-4-L95/840-FR-DRV-UNV Total Luminaire Output: 9590 lumens; 64.8 Watts | Efficacy: 148 lm/W | 86.8 CRI; 4166K CCT



VERTICAL ANGLE	HORIZONTAL ANGLE			ZONAL LUMENS
	0°	45°	90°	
0	1545	1545	1545	
5	1570	1599	1458	149
15	1528	1609	1501	442
25	1427	1608	1553	717
35	1285	1595	1680	970
45	1088	1629	2050	1243
55	844	1853	2546	1582
65	565	2070	2778	1795
75	307	1660	1823	1408
85	109	716	689	665
90	70	460	411	
95	51	314	281	285
105	36	185	172	154
115	22	117	134	95
125	11	65	95	52
135	0	30	54	22
145	0	12	28	8
155	0	0	10	2
165	0	0	0	0
175	0	0	0	0
180	0	0	0	0

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	1308	14
0 - 40	2278	24	
0 - 60	5103	53	
0 - 90	8971	94	
90 - 120	534	6	
90 - 150	617	6	
90 - 180	619	7	
0 - 180	9590	100	

## ADDITIONAL CONTROL OPTIONS

Note: Lumen restrictions apply, consult product builder at [hew.com/product-builder](http://hew.com/product-builder).

CATALOG NUMBER	DESCRIPTION
DRV	Driver prewired for non-dimming applications
DIM	Dimming driver prewired for 0-10V low voltage applications
DIM1	1% dimming driver prewired for 0-10V low voltage applications
DIM LINE	Line voltage dimming driver (TRIAC and ELV compatible, 120V only)
DIM TRC	Line voltage dimming driver (TRIAC compatible, 120V or 277V only)
SD40	40% step-dimming driver
SD50	50% step-dimming driver
DALI	DALI dimming driver
LTE LINE	Lutron Hi-lume 1% 2-wire dimming driver forward phase line voltage controls (120V only)
LDE1	Lutron Hi-lume 1% EcoSystem dimming LED driver
LDE5	Lutron 5-Series 5% EcoSystem dimming LED driver
ELDO SOLOB	EldoLED Solodrive, 0.1% dimming driver for 0-10V controls
ELDO SOLOB DALI	EldoLED Solodrive, 0.1% dimming driver for DALI controls
ELDO ECO1	EldoLED Ecodrive, 1% dimming driver for 0-10V controls
ELDO ECO1 DALI	EldoLED Ecodrive, 1% dimming driver for DALI controls

# 97 LED Enclosed & Gasketed Industrial/Garage Lighter

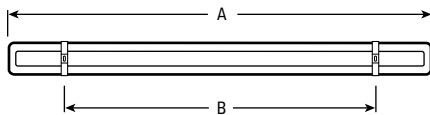
## CORD OPTIONS

EXAMPLE: 5WMRC6		
NUMBER OF CONDUCTORS	POWER CONNECTION – NON-DIMMING	CORD LENGTH
3 3-wire	WMR Mini-male receptacle only	-
	WC STOW cord	6 6'
4 4-wire	WMRC Mini-male receptacle with STOW cord	20 20'
POWER CONNECTION – DIMMING		
5 5-wire	WMR Mini-male receptacle only	-
	WC SOOW cord	6 6'
6 6-wire	WMRC Mini-male receptacle with SOOW cord	20 20'

Wet location cord sets are yellow.

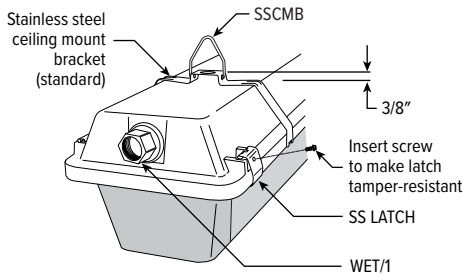
## FIXTURE DETAILS

### BACKVIEW



NOMINAL LENGTH	OVERALL LENGTH (A)	MOUNTING DISTANCE (B)
2'	27-5/8"	12" - 17" OC
4'	51-7/8"	30" - 42" OC
8'	100-1/4"	48" - 80" OC

## MOUNTING DETAILS



## OCCUPANCY SENSOR DETAILS

### ORDERING EXAMPLE: OCCWS FSP-321B-L\_-120-480

#### FEATURES

- Fully adjustable high and low dimmed light levels.
- Designed for LED fixtures; rated for extreme temperatures and up to 200,000 on/off cycles.
- Hold-off setpoint with automatic calibration option for convenience and added energy savings.
- Adjustable via sensor configuration app.
- IP66 rated with choice of lenses for wet and outdoor locations, and mounting heights from 8' to 20'.
- Adjustable time delay and cutoff delay.
- Factory set to 10% dimming at 5 minutes, cutoff at 1 hour.
- Multi-level control based on motion and/or daylight contribution.
- Universal voltage for 120V – 480V.

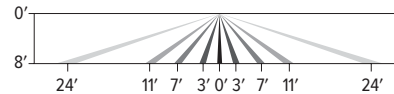
#### SENSOR CONFIGURATION APP

Initial setup and subsequent sensor adjustments are made using the iOS or Android Sensor Configuration App. This app enables adjustment of parameters including high and low modes, sensitivity, time delay, cut off and more. The smartphone app is also used to initiate automatic calibration of the FSP-3x1B ambient light level setpoint. The setpoint is used to hold the controlled lighting off or at low level when there is sufficient daylight. The wireless tool stores an unlimited number of sensor parameter profiles to speed configuration of multiple sensors.

Visit [www.wattstopper.com](http://www.wattstopper.com) for more information.

#### LENS COVERAGE PATTERNS

##### L2 Coverage at 8' mounting height: ø48'



##### L3 Coverage at 20' mounting height: ø40'

