

## CEILING MOUNTED LIGHTING

### FORM AND FUNCTION

- Sleek, low profile housing
- Economy performance
- Engineered for optimum thermal management
- Low depreciation rate
- Reduces energy consumption and costs up to 65%
- Optical system designed for Parking Structures

### CONSTRUCTION

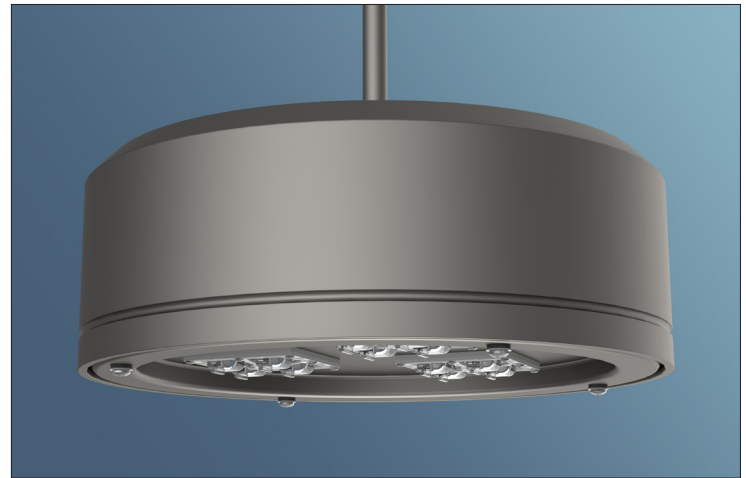
- Spun Aluminum
- Corrosion resistant external hardware
- One-piece silicone gasket ensures IP65 seal for electronics compartment
- Two-piece silicone Micro Optic system ensures IP67 level seal around each PCB

### FINISH

- 5 mils electrostatic powder coat.
- NLS' standard high-quality finishes prevent corrosion protects against extreme environmental conditions

### WARRANTY

Five-year limited warranty for drivers and LEDs.



### LISTINGS

- Certified to UL 1598
- CSA C22.2 No. 250.0
- IP65 / IP67 Rated



### LED WATTAGE CHART

	48L	64L
700 milliamps	104w	136w
1050 milliamps	156w	205w

Project Name:

Type:

Cat#	Light Dist.	# of LEDs	Milliamps	Kelvin	Volts	Mounting	Color	Options
Value Series Round 1 (VSR-1)	Type 2 (T2)	48 (48L)	700 (7)	2700K, 70 CRI (27K7) <sup>①</sup>	120-277 (UNV)	Pendant Mount 12" Length (PM12)	Bronze Textured (BRZ)	Marine Grade Finish (MGF)
	Type 3 (T3)	64 (64L)	1050 (1)	2700K, 80 CRI (27K8) <sup>①</sup>	347-480 (HV)	Pendant Mount 24" Length (PM24)	White Textured (WHT)	FSP-211 with Motion Sensor (FSP-8) <sup>②</sup> 8'+ Below (FSP-20) <sup>②</sup> 9'-20' Heights
	Type 4 (T4)			3000K, 70 CRI (30K7) <sup>②</sup>		Pendant Mount 36" Length (PM36)	Smooth White Gloss (SWT)	Emergency Battery Back-Up (EB)
	Type 5 (T5)			3000K, 80 CRI (30K8) <sup>① ②</sup>		Pendant Mount Custom Length (PMX) <sup>③</sup>	Silver (SVR)	Dual Feed Load Control Bypass Relay (LCBR) <sup>④</sup>
					3500K, 80 CRI (35K8)			Black Textured (BLK)
				4000K, 70 CRI (40K7)			Smooth Black Gloss (SBK)	
				4000K, 80 CRI (40K8) <sup>①</sup>			Graphite Textured (GPH)	
				5000K, 70 CRI (50K7)			Grey Textured (GRY)	
				5000K, 80 CRI (50K8) <sup>①</sup>			Custom (CS)	

#### Notes:

- ① Consult Factory for Lead Time. Consult Factory for 90 CRI Requests.
- ② Universal Voltage 120-277
- ③ Between 12"-36" Consult Factory
- ④ 3000K or lower must be selected to meet International Dark Sky Association certification
- ⑤ Consult Factory

## ELECTRICAL

- 120-277 Volts (UNV) or 347-480 Volts (HV)
- 0-10V dimming driver
- Driver power factor at maximum load is  $\geq .95$ , THD maximum load is 15%
- Led Drivers Ambient Temp. Min (degC) is -40c and Ambient Temp. Max (degC) ranges from 50c to 55c and in some cases, even higher. Consult factory for revalidation by providing fixture catalog string before quoting and specifying it.
- All internal wiring UL certified for 600 VAC and 105°C
- All drivers, controls, and sensors housed in enclosed IP-65 compartment
- CRI 70, 80 or 90
- Color temperatures: 2700K, 3000K, 3500K, 4000K, 5000K
- Surge Protection: 20KA supplies as standard.

## OPTIONS

- **MARINE GRADE FINISH (MGF)** A multi-step process creating protective finishing coat against harsh environments.
  - Chemically washed in a 5 stage cleaning system.
  - Pre-baked
  - Powder coated 3-5 mils of Zinc Rich Super Durable Polyester Primer.
  - Oven Baked.
  - Finished Powder Coating of Super Durable Polyester Powder Coat 3-5 mil thickness.
- **EMERGENCY BATTERY BACK-UP (EB)**
  - 100-277 VAC $\pm$  10%, 50/60 Hz Input Voltage
  - 43mA Max. Input Current
  - 2.82W Max. Input Power
  - 24-48 Hours Recharge Time
  - Battery Type NiCd 9.6VDC or LiFePO4 9.6VDC
  - 90 Minutes Min. Illumination Time
  - 20W Total Max. LED Powered
  - Class 2 Output Classification

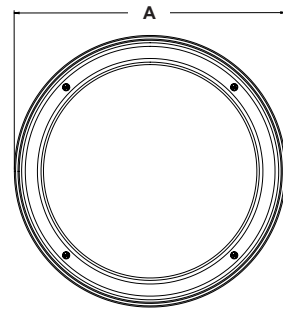
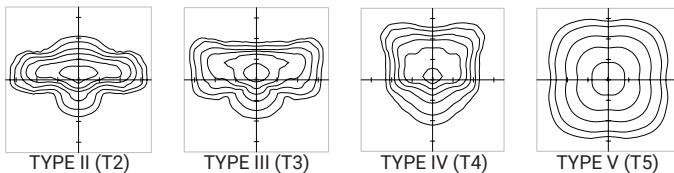
## CONTROLS

- **FSP-211 (FSP-X)** Passive infrared (PIR) sensor providing multi-level control based on motion/daylight contribution.
  - All control parameters adjustable via wireless configuration remote storing and transmitting sensor profiles.
  - FSP-8 mounting heights 8 feet and below.
  - FSP-20 mounting heights 9' feet to 20'.
  - Includes 5 dimming event cycles, 0-10V dimming with motion sensing, re-programmable in the field.
  - FSIR-100 commissioning remote is required to change sensor settings. Please contact factory for ordering.

## OPTICS

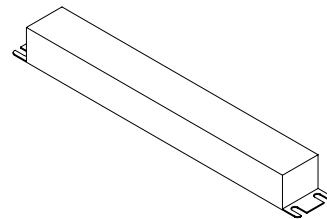
Silicone optics high photo-thermal stability and light output provides higher powered LEDs with minimized lumen depreciation LED life. UV and thermal stability with scratch resistance increases exterior application durability.

- IES Types

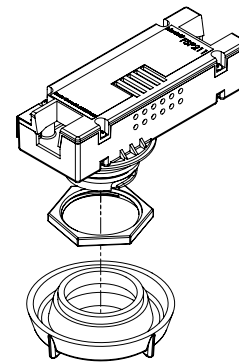


DIMENSION	VSR-1
A	17 in.
B	6.83 in.
C	6 in.
Weight	20lbs

## EMERGENCY BATTERY BACK-UP (EB)

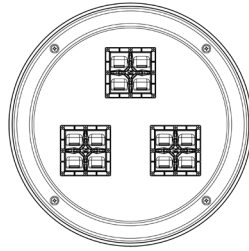


## FSP-211

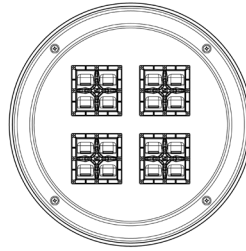


The information and specifications on this document are subject to change without any notification. All values are design, nominal, or typical or prorated values when measured under internal and external laboratory conditions.

## OPTICAL CONFIGURATIONS



VSR-1 / 48L



VSR-1 / 64L

LUMENS									
PART NUMBER	T2 LUMENS	T2 LM/W	T3 LUMENS	T3 LM/W	T4 LUMENS	T4 LM/W	T5 LUMENS	T5 LM/W	WATTS
VSR-1-48L-7-30K7	11844	114	11544	111	11565	111	12068	116	104
VSR-1-48L-7-40K7	12744	123	12421	119	12444	120	12985	125	104
VSR-1-48L-7-50K7	13028	125	12698	122	12722	122	13275	128	104
VSR-1-48L-1-30K7	16318	105	15912	102	15769	101	16455	105	156
VSR-1-48L-1-40K7	17558	113	17121	110	16968	109	17705	113	156
VSR-1-48L-1-50K7	17950	115	17503	112	17346	111	18100	116	156
VSR-1-64L-7-30K7	15488	114	15096	111	15124	111	15781	116	136
VSR-1-64L-7-40K7	16665	123	16243	119	16273	120	16981	125	136
VSR-1-64L-7-50K7	17037	125	16606	122	16636	122	17359	128	136
VSR-1-64L-1-30K7	21443	105	20910	102	20722	101	21623	105	205
VSR-1-64L-1-40K7	23073	113	22499	110	22297	109	23267	113	205
VSR-1-64L-1-50K7	23588	115	23001	112	22795	111	23785	116	205

EMERGENCY OPERATION LUMENS									
PART NUMBER	T2 LUMENS	T2 LM/W	T3 LUMENS	T3 LM/W	T4 LUMENS	T4 LM/W	T5 LUMENS	T5 LM/W	WATTS
VSR-X-16L-35-30K7	2231	119	2188	116	2154	115	2255	120	18
VSR-X-16L-35-40K7	2305	128	2247	125	2227	124	2324	129	18
VSR-X-16L-35-50K7	2356	131	2297	128	2277	127	2376	132	18

EPA	SGL 12"	SGL 24"	SGL 36"
VSR-1-PM	1.08	1.15	1.22

LUMEN MAINTENANCE DATA							
Ambient Temperature	Drive Current	L90 Hours*	L70 Hours**	30,000 Hours*	50,000 Hours*	60,000 Hours*	100,000 Hours**
25°C	Up to 700mA	58,000	173,000	95.7%	91.6%	89.6%	82.1%
	1050mA	38,000	96,000	93.0%	85.4%	81.8%	68.8%

\*Reported extrapolations per IESNA TM-21      \*\*Projected extrapolations per IESNA TM-21

## MOUNTING OPTIONS

### PENDANT MOUNT (PMX)

Available lengths:

- 12" length (PM12)
- 24" Length (PM24)
- 36" Length (PM36)
- Custom Length (PMX)

*\*Consult factory for custom lengths*

