



FLF2

FLF3

FLF4

FLF5



Class 1 Division 2



Compliance

UL 844 Hazardous Locations
Class I Division 2 Groups A, B, C, D
Class I Zone 2 Group IIC
UL 924 Emergency Lighting
CSA C22.2 No. 141-15, Ed.5
CSA C22.2 No. 137:2018 Ed.2

IP66
IK10
ETL
ABS
II 2 G Ex eb mb IIC T6... T4 Gb
II 2 D Ex tb IIIC T80°C... T120°C Db
Ex eb mb IIC T6...T4 Gcb
Ex tb IIIC T80°C... T120°C Db

Key Features

FEATURES: Linear (Rugged)
Sleek Design
High Im/W
Side ports for Daisy Chain
3 Mounting Styles

OPTIONS: 5 Lengths
40°, 60°, 90° or 120°
Emergency Back-Up

Applications

Oil and Gas

Petroleum production and refining
Petroleum loading, storage, transportation and retail
Confined spaces with vapor accumulation
LNG and LPG handling
Oil tankers and shipping vessels
Fuel system testing facilities

Power Plants

Coal-fired power plants, including coal handling and storage areas
Gas-fired power plants with fuel storage
Nuclear power facilities in hazardous auxiliary areas
Biomass or waste-to-energy plants with combustible dust risks

Industrial

Industrial storage facilities
Paper mills, sawmills and lumber yards
Loading dock platforms
Manufacturing plants for heavy industrial goods
Warehouses handling flammable materials

Waste Treatment

Wastewater treatment plants
Pumping stations
Solid waste processing and incineration facilities
Sewage treatment with methane gas risks
Hazardous waste recycling centers

Mining

Operations and service areas
Underground mining tunnels with gas accumulation

Chemical Industry

Chemical production, processing and storage facilities
Solvent handling and mixing areas
Chemical research labs with flammable substances

Ocean, Marine and Aerospace

Offshore platform operation facilities and structures
Marine and saltwater environments
Aerospace clean rooms and production areas
Ocean vessel operations
Shipyards and dry docks
Aircraft hangars with fuel vapors

Metal Treatment

Paint facilities
Steel and aluminum factories
Metal smelting, foundry and fabrication
Welding and cutting areas with gas risks

Military and Defense

Ammunition storage and handling
Fuel depots and refueling stations
Explosives manufacturing
Vehicle maintenance bays in hazardous zones

Food, Alcohol and Agriculture Industry

Flour and fine particle production and storage
Food and distilling production
Grain storage elevators and silos
Breweries and fermentation tanks
Feed mills with dust risks
Fertilizer production and storage

Pharmaceutical Industry

Drug manufacturing and solvent handling
Clean rooms with volatile compounds
Pill coating and drying areas
Research and development labs

Other high humidity, high dust, high temperature and vapor locations

Specifications

Wattage	20W	30W	20W	30W	40W	50W	20W	30W	40W	50W	60W	70W
Body	FLF1		FLF2				FLF3					

OPTICAL

Lumen Output	2400 lm	4200 lm	2400 lm	4200 lm	5600 lm	7000 lm	2400 lm	4200 lm	5600 lm	7000 lm	8400 lm	9800 lm
Lumens Per Watt	140 lm/w											
Color Temperature: CCT	Standard: 5000K Options: 2700K - 6500K											
CRI (Color Rendering Index)	>70											
Beam Angle	120° Standard 40°, 60°, 90°option											
Dimming	0-10V dimming											

ENVIRONMENTAL

Ambient Operating Temperature	T5: -40°C to +40°C (-40°F to +104°F) T4:-40°C to +55°C (-40°F to +131°F)
Temperature Code	T5: (+40°C), T4: (+55°C)

MECHANICAL

Mounting	Pole, Hook, Wall
Warranty	5 Year Standard Warranty

ELECTRICAL

Lifespan	L70> 150,000 Operational Hours @ 55°C
Input Voltage	100-277VAC
Input Frequency	50/60Hz

Wattage	20W	30W	40W	50W	60W	70W	80W	20W	30W	40W	50W	60W	70W	80W	90W	100W
Body	FLF4							FLF5								
OPTICAL																
Lumen Output	2400 lm	4200 lm	5600 lm	7000 lm	8400 lm	9800 lm	11200 lm	2400 lm	4200 lm	5600 lm	7000 lm	8400 lm	9800 lm	11200 lm	12600 lm	14000 lm
Lumens Per Watt	140 lm/w															
Color Temperature: CCT	5000K (standard), 2700-6500K optional															
CRI (Color Rendering Index)	>70															
Beam Angle	120° Standard 40°, 60°, 90°option															
Dimming	0-10V dimming															
ENVIRONMENTAL																
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Ordering Logic

ORDER EXAMPLE: HLL L EX 50W FLF2 D 50 D120

(1) Product	(2) Product Category	(3) Wattage	(4) Dimension
HLL L	EX - Explosion Proof	20W (2,800 lm) 30W (4,200 lm) 40W (5,600 lm) 50W (7,000 lm) 60W (8,400 lm) 70W (9,800 lm) 80W (11,200 lm) 90W (12,600 lm) 100W (14,000 lm)	FLF1 (20/30W) FLF2 (20/30/40/50W) FLF3 (20/30/40/50/60/60/70W) FLF4 (20/30/40/50/60/60/70/80W) FLF5 (20/30/40/50/60/60/70/80/90/100W)
(5) Dimming	(6) Kelvin	(7) Beam Angle	(8) Option
D - Dimmable	30 - 3000 K	D40 - 40°	Blank - Without Emergency Function (S)
N - Non-Dimmable	40 - 4000 K	D60 - 60°	EM - Emergency Back Up
	50 - 5000 K (S)	D90 - 90°	
		D120 - 120° (S)	

(S) Standard

Accessories



EX-Flexible Conduit 700mm 3/4NPT



EX-Threaded Pipe



Pole Mounting



EX-Flexible Conduit 700mm 1/2NPT



EX-Bent Threaded Pipe

Wall Mounting Bracket



EX-Junction Box



EX-Chain

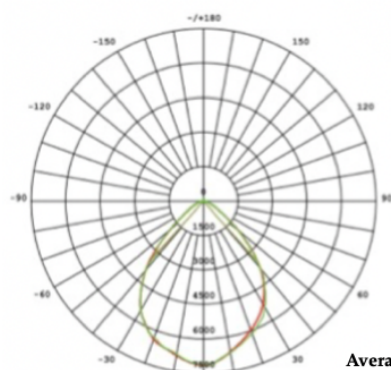


EX-Lifting Hook

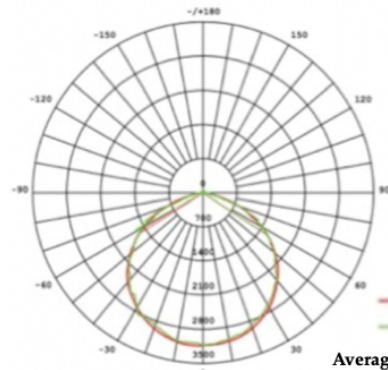


EX-Junction Box Side Hole

Photometric



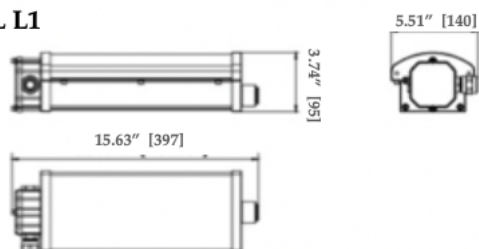
90 Degree
UNIT:cd
V 0.0DEG PLAN.83.5
H 0.0DEG PLAN.82.7
Average Beam Angle (50%):83.1 DEG



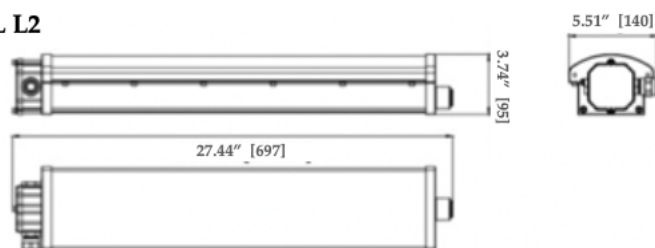
120 Degree
UNIT:cd
V 0.0DEG PLAN.114.3
H 0.0DEG PLAN.117.7
Average Beam Angle (50%):116.0 DEG

Product Dimensions

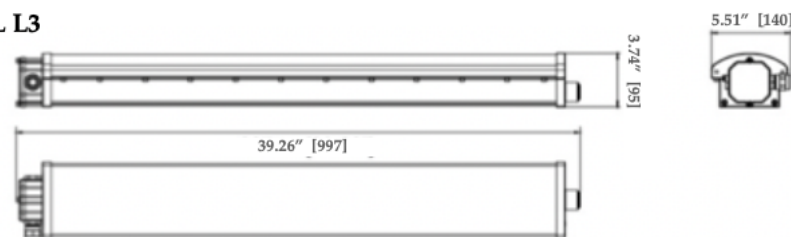
HLL L1



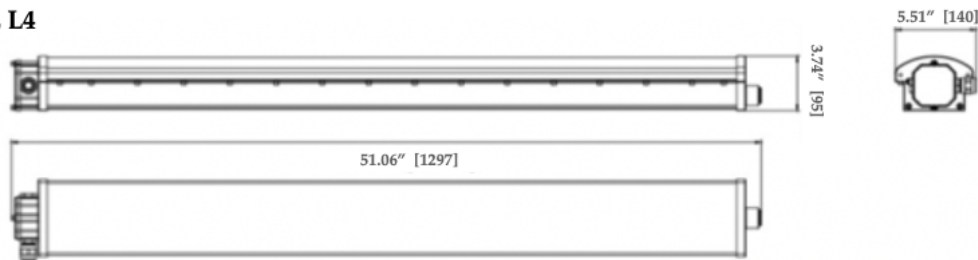
HLL L2



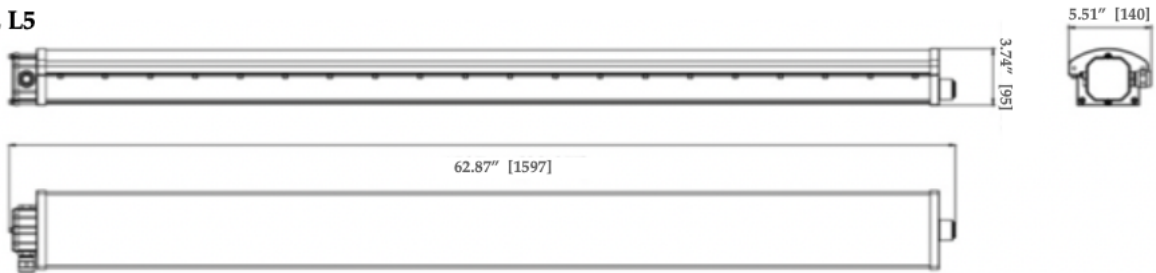
HLL L3



HLL L4



HLL L5



Packaging Information

	FLF1	FLF2	FLF3	FLF4	FLF5
Pieces	1	1	1	1	1
Fixture Dimensions	15.63" x 5.51" x 3.74" (397mm x 140mm x 95mm)	27.44" x 5.51" x 3.74" (697mm x 140mm x 95mm)	39.26" x 5.51" x 3.74" (697mm x 140mm x 95mm)	51.06" x 5.51" x 3.74" (1297mm x 140mm x 95mm)	62.87" x 5.51" x 3.74" (1597mm x 140mm x 95mm)
Package Dimensions		27.95" x 8.26" x 5.91" (710mm x 210mm x 150mm)		52.36" x 7.36" x 5.94" (1330mm x 187mm x 151mm)	63.38" x 8.27" x 5.91" (1610mm x 210mm x 150mm)
Net Fixture Weight		9.04 lb 4.1 kg		15.94 lb 7.23 kg	
Gross Weight		12.78 lb 5.8 kg		17.70 lb 8.03 kg	

Mounting Methods

Option 1: Pole Mountin



Accessory



Pole

Option 2: Hook Mounting

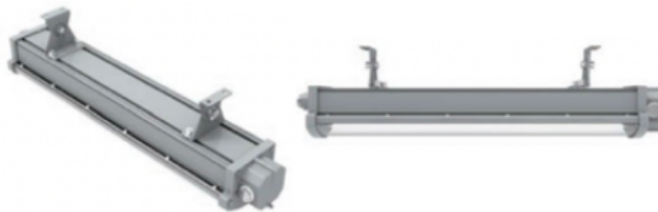


Accessory



EX-Chain

Option 3: Wall Mounting



Accessory

Wall Mounting Bracket