Proteus - XPL1B

Hazardous Location (C1D2) LED Linear Luminaire

Project

Catalog

Type

Date

Product Description

The Proteus hazardous location LED luminaire is designed for installations where moisture, dirt, corrosion, vibration and extreme ambient conditions exist. For use in applications where flammable gas or vapor are present under abnormal conditions, and in areas where combustible dust, fibers and flyings are normally present and as defined by the NEC. Proteus is available in 2 sizes; 2'/40W and 4'/80W. Proteus series is ideal for retrofit of legacy H.I.D. and fluorescent system; providing energy and maintenance savings resulting in favorable simple payback.

Certifications

- Class I Division 2, Group A, B, C, D
- Class II Division 1, Group E,F, G
- Class II Division 2, Group F, G
- Class III
- UL 844 Hazardous Location
- UL 1598 Wet Location
- UL 1598A Marine
- UL 8750 LED Safety
- IP 66 Rated
- DLC certified* (5000K only)
- CSA C22.2 No. 137-M1981
- IECEx Ex nR II C T6 Gc
- Meets FCC Part 15, Subpart B, Class B standards for conducted and radiated emissions

Construction

- Heavy duty die-cast copper-free aluminum housing
- Stainless steel hardware
- 3/4" NPT threaded conduit wire access ports
- Weight - 2': 11.0 lbs; 4': 15.2 lbs.
- RoHS Compliant
- Captive bolts on power supply cover

Optical System

- Anodized aluminum reflector assembly with polycarbonate lens
- Diffused polycarbonate lens optional**
- CCT: 5000K, 4000K, or 3000K**
- CRI: 70+

Electrical

- Input voltage of 100-240/277VAC
- Input frequency of 50/60Hz
- Power Factor of ≥.95
- THD <20%
- 10kA surge protector
- Reported L70 hours >50,000

Environmental

- Ambient Operating Temperature -40°F (-40°C) ~ 122°F (50°C)
  - C1D2 T3C at 122°F (50°C)
  - C2D1 T4A at 122°F (50°C)
- Ambient Operating Humidity of 10%~90% RH

Finish

- RAL 7037 (Dusty Gray) polyester powder coat

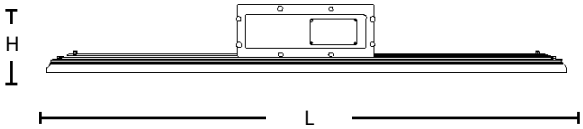
Installation

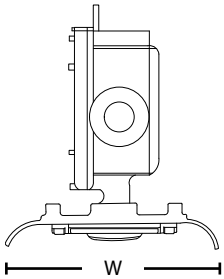
- Prewired with 2' flying leads
- Allows wiring without opening power supply cover
- Integrated 3/4" NPT threaded hub for pendant mount
- Universal trunnion bracket available, with legacy bolt patern (drill rigs)
- Pipe mount kit available
- For installations where power surge may be possible, NICOR recommends installing additional surge protection at the electrical distribution panel

Warranty

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

**Consult factory for lead time.





40W

Fixture Length (L)	23.6 in (600mm)
Fixture Width (W)	5 in (127 mm)
Fixture Height (H)	6.6 in (192 mm)

80W

Fixture Length (L)	47.2 in (1200mm)
Fixture Width (W)	5 in (127 mm)
Fixture Height (H)	6.6 in (192 mm)

NEMA 3 NEMA 4x

DLC PREMIUM LISTED * c UL us LISTED MARINE c UL us LISTED 5Y 5 YEAR WARRANTY

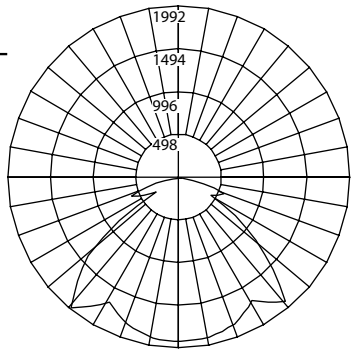
*DLC Certification for 5000k only

NICOR® HAZOC

Photometric Data

XPL1B 40W 5000K

Input Voltage (VAC)	120-277
System Level Power (W)	40.9
120V Current (A)	0.341
277V Current (A)	0.148
Delivered Lumens (Lm)	5533
System Efficacy (Lm/W)	135.3
Correlated Color Temp (K)	5167
Color Rendering Index (CRI)	72
Power Factor	0.95
THD	<20%
Beam Angle	105.9°
Spacing Criteria	1.46



Intensity Summary (Candle Power)

Angle	Along	Across
0	1914	1914
5	1906	1914
15	1860	1872
25	1743	1771
35	1779	1602
45	1519	1396
55	775	1039
65	472	698
75	276	319
85	0	29
90	0	5

CCT Data Multiplier

XPL1B040U30GR	0.930
XPL1B040U40GR	0.952

Cone of Light Tabulation

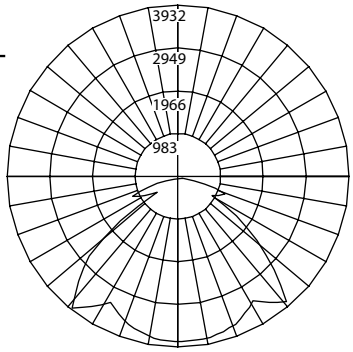
Mounted height (Feet)	Footcandles Beam Center	Diameter (Feet)
4	119.7	10.1
6	53.2	12.7
8	29.9	15.2
10	19.2	17.7
12	13.3	20.3
14	9.8	23.0
16	7.5	25.0

Zonal Lumen Summary

Zone	Lumens	% of Luminaire
0-30	1527	27.6%
0-40	2567	46.4%
0-60	4631	83.7%
0-90	5533	100.0%
90-180	0	0.0%
0-180	5533	100.0%

XPL1B 80W 5000K

Input Voltage (VAC)	120-277
System Level Power (W)	80.3
120V Current (A)	0.661
277V Current (A)	0.286
Delivered Lumens (Lm)	11548
System Efficacy (Lm/W)	143.8
Correlated Color Temp (K)	5116
Color Rendering Index (CRI)	72
Power Factor	0.95
THD	<20%
Beam Angle	111.5°
Spacing Criteria	1.30



Intensity Summary (Candle Power)

Angle	Along	Across
0	3806	3806
5	3784	3799
15	3679	3702
25	3443	2485
35	3096	3146
45	2944	2691
55	1968	2096
65	905	1266
75	444	528
85	0	35
90	0	7

CCT Data Multiplier

XPL1B080U30GR	0.930
XPL1B040U40GR	0.952

Cone of Light Tabulation

Mounted height (Feet)	Footcandles Beam Center	Diameter (Feet)
4	237.9	11.7
6	105.8	17.5
8	59.5	23.3
10	38.1	29.2
12	26.4	35.0
14	19.4	40.8
16	14.9	46.6

Zonal Lumen Summary

Zone	Lumens	% of Luminaire
0-30	3164	27.4%
0-40	5220	45.2%
0-60	9619	83.3%
0-90	11548	100.0%
90-180	0	0.0%
0-180	11548	100.0%

Fixture tested per LM-79-08. Photometric data is of the performance of a representative fixture. Results may vary in the field.

Performance Data

Model Number	Lumens	Watts	Lumens/Watt
XPL1B040U30GR	5146	41	125.8
XPL1B040U40GR	5267	41	128.8
XPL1B040U50GR	5533	41	135.3
XPL1B080U30GR	10740	80	133.7
XPL1B080U40GR	10994	80	136.9
XPL1B080U50GR	11548	80	143.8

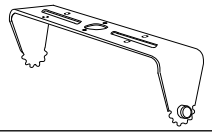
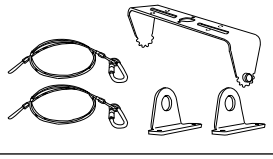
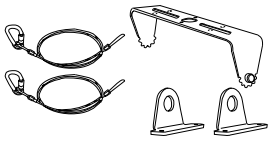
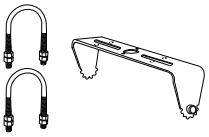
Ordering Information									*Example: XPL1B080U50GRT*
Series	**Version**	**Class/DIV**	**Wattage**	**Voltage**	**CCTs**	**Finish**	**Beam Angle**	**Lens**	**Mounting**
XPL	**1** (Version 1)	☐ **B** (C1D2)	☐ **040** (40W)	☐ **U** (100-277V)	☐ **50** (5000 K)	☐ **GR** (Gray)	__ (120°)	☐ __ (Clear)	☐ __ (3/4" Pendant)
			☐ **080** (80W)		☐ **40** (4000 K)			☐ **D** (Diffused)	☐ **T** (Trunnion Mount, factory installed)
					☐ **30** (3000 K)*				

**Consult factory for lead time.*

Specifications and dimensions subject to change without notice.

Accessories

Accessories sold sepearately

Trunnion Mount Bracket	XPL1BRACKET	
C1D2 Heavy Duty Drill Rig Kit	XPL1BRIGKIT-HD	
C1D2 Standard Single Point Retention Kit	XPL1BRETENTIONKIT	
C1D2 Standard Drill Rig Kit	XPL1BRIGKIT-STD	
Pipe Mount Kit (2.0" Diameter)	XPL1PIPEMOUNT20	
3' Heavy Duty DS Safety Cable	XP1DSCABLE-3	
3' Standard Safety Cable	XP1SAFETYCABLE-3