# Dialight



Vigilant® LED High Bay -  UL
for Indoor and Outdoor Industrial Applications

## Case Study: Rockline Case Study (Manufacturing)
Dialight's LED High Bay Lighting Fixtures
See full case study at www.dialight.com

## About Dialight

Dialight (LSE: DIA.L) is leading the energy efficient LED lighting revolution around the world for industrial and hazardous areas as well as transportation and infrastructure applications. For 40 years it has been committed to the development of LED lighting solutions that enable organizations to vastly reduce energy use and maintenance needs, improve safety, ease disposal and reduce $CO_2$ emissions.

## History at a Glance

1938 - Dialight founded in Brooklyn, NY

1971 - LED Circuit Board Indicator

1994 - LED Transit Vehicle Signals

1995 - LED Traffic Signals

2000 - FAA certified LED Obstruction Lights

2007 - LED Lighting for Hazardous Locations

2009 - LED High Bay Fixtures

2012 - Full performance 10-year warranty

2013 - Controls for LED Lighting
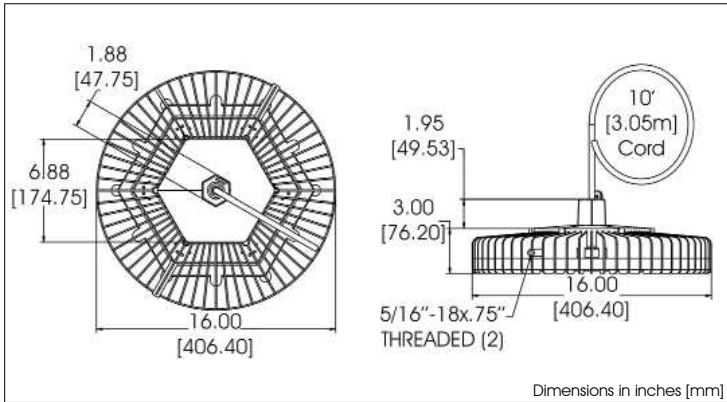
2014   125lm / W High Bay

## Typical Applications

• Oil, Gas & Petrochemical

• Power Generation

• Mining

• Chemical

• Pharmaceutical

• Water & Sewage

• Food & Beverage

• Manufacturing

• Warehousing

• Cold Storage

Complete your own Return on Investment calculation at: www.dialight.com/tcoCalculator/Vigilant_HighBay

Patent pending

# Vigilant® LED High Bay - UL

1.88 [47.75]
6.88 [174.75]
16.00 [406.40]
5/16"-18x.75" THREADED (2)
1.95 [49.53]
3.00 [76.20]
16.00 [406.40]
10' [3.05m] Cord

Dimensions in inches [mm]

## Certifications & Ratings
- UL 1598/A
- CSA 22 #250
- CE
- NEMA 4X
- IP66 / 67
- Dark Sky Compliant

## Features & Benefits
- 10 year full performance warranty
- L70 rated for >100,000 hours @ 25°C ambient
- 125 LPW
- Dual Mounting option available
- Significantly reduced glare
- Instant on/off
- Maintenance free
- Mercury free
- No UV or IR
- Resistant to shock and vibration

## Application:
At 125 lumens per Watt, Dialight's new ultra-efficient industrial LED High Bay revolutionizes the world of LED lighting and is by far the most innovative LED fixture available today. With a market-leading 10 year full performance warranty, the new 26,500 lumen high bay utilizes cutting-edge optical and electrical design to provide for significantly reduced glare and superior light distribution.

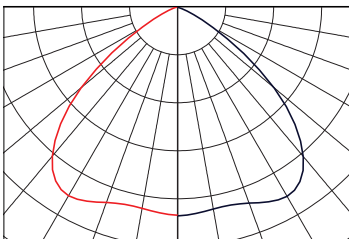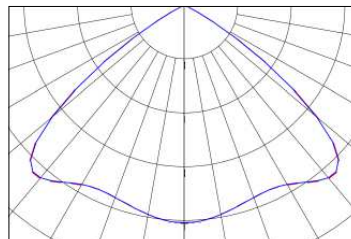| Mechanical Information | |
| --- | --- |
| Fixture Weight: | 18 lbs (8.16kg) |
| Shipping Weight: | 24 lbs (10.8kg) |
| Mounting: | (1) 3/4" NPT - top (2) 5/16"-18 x .75" UNC - side |
| Entries: | 10' (3.05m) STOOW Power Cord |
| **Electrical specifications** | |
| Operating Voltage: 110 – 277V AC: 100 – 277V AC: | 25,750 & 26,500lm models 18,000, 14,000 & 11,000lm models |
| Power Consumption: | See table |
| Operating Temp: | -40°F to +149°F (-40°C to +65°C) |
| Harmonics: | IEC 61000-3-2 |
| Noise requirement / EMC: | FCC Title 47, Subpart B, Section 15, class A device. RF Immunity; 10V/m, 80MHz-1GHz |
| Transient protection: | Protection devices capable of handling up to 6kV. Tested for 6kV/2 ohm combination wave, as per IEEE C62.41, line-line and line-ground |
| THD: | <20% |
| Power Factor: | > 0.9 |
| **Construction** | |
| Housing: | Copper free aluminum |
| Finish: | Superior dual coat finish Sealed polyester topcoat Chemical-resistant epoxy prime |
| Lens: | Tempered glass |
| **Photometric Information** | |
| CRI: | 75 |
| CCT: | 5000K (cool white) 4000K (neutral white) |
| IES Files: | available at www.dialight.com |

All values typical unless otherwise stated
All lumen values are typical (tolerance +/- 10%)
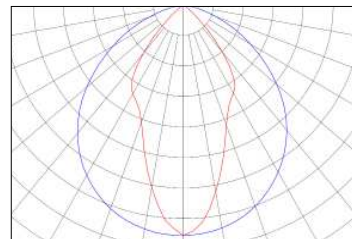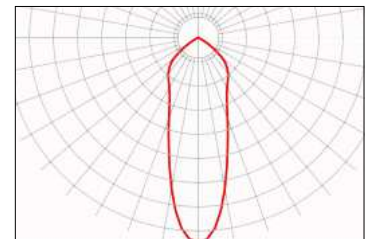
## Light Distribution Pattern
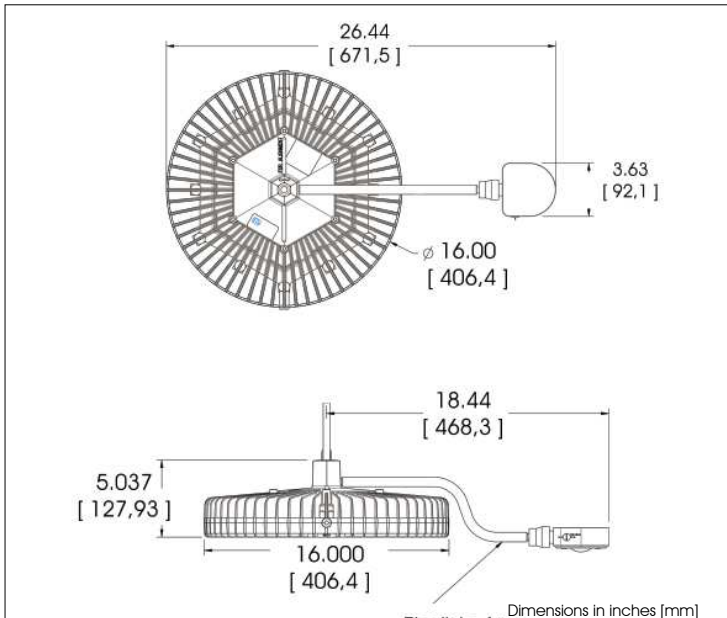
Medium pattern

Wide pattern

Aisle pattern

Narrow pattern

# Vigilant® LED High Bay - UL
## Occupancy Sensor Models

Dimensions in inches [mm]

Mechanical, Electrical and Photometric information is the same as on page 3 except where detail is provided

| | |
|---|---|
| **Fixture Weight:** | 20 lbs (13.34kg) |
| **Container Weight:** | 27 lbs (9.62kg) |
| **Sensor Mounting:** | Attached to the base of the neck using a semi-rigid flexible conduit |
| **Occupancy Sensor:** | Wet location wattstopper |
| **Sensor Timing:** | 30 seconds to 20 minutes |
| **Sensor Lens Options:** | Comes complete with interchangeable lenses for multiple mounting heights and sensor patterns |
| **Operating Temperature:** | -40°F to +149°F (-40°C to +65°C) |
| **Rating:** | IP65 |

### Features & Benefits
- No additional electrical connections required for installation
- Flexible conduit permitting the positioning of the occupancy sensor for optimal coverage
- Interchangeable sensor lens for high bay, low bay, or aisle application

## Variable Dimming Models
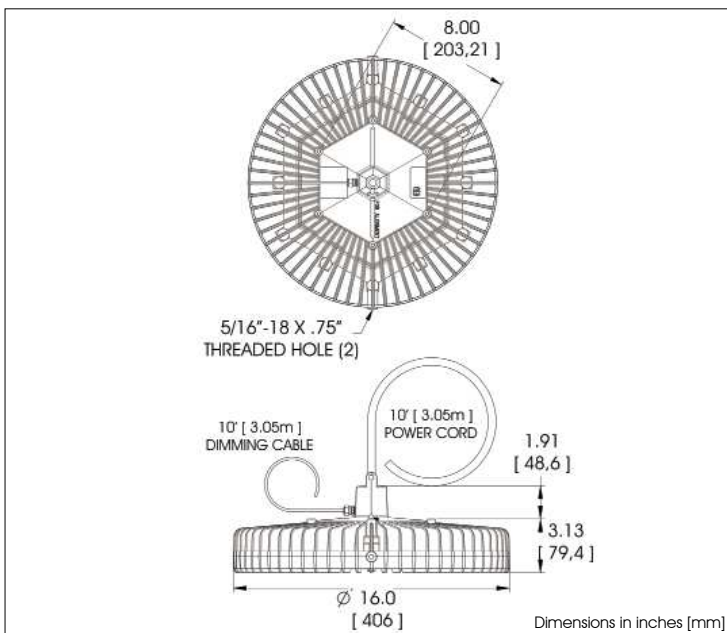
Dimensions in inches [mm]

Mechanical, Electrical and Photometric information is the same as on page 3 except where detail is provided

| | |
|---|---|
| **Variable Dimming Cable:** | Two conductor cable |
| **Power Cable:** | Three conductor cable |
| **Dimming Cable Position:** | Side of the neck through a cable gland |
| **Variable Dimming Control:** | 0-10V DC |
| **Dimming Range:** | 10V DC = 100% light output<br>0V DC = 30% light output |

### Features & Benefits
- 10' plenum rated dimming control cable pre-installed
- Dimming cabling independent of fixture wiring
- Multiple High Bays can be connected to the same dimmer

# Vigilant® LED High Bay - UL - Ordering Information

| Part number [1][2][4] | Fixture Lumens | Wattage | Lumens per Watt | Wet Locations | Voltage | CCT | Lens | Optical Pattern | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | | Medium | Wide | Aisle | Narrow |
| Standard Models | | | | | | | | | | | |
| HEGMC4PN-SNG | 26,500 | 212 | 125 | IP66 | 110 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4PN-SNG | 26,500 | 212 | 125 | IP66 | 110 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGEC4PN-SNG | 25,750 | 204 | 125 | IP66 | 110 - 277V AC | 5000K (cool white) | Tempered glass | | | • | |
| HEGNC4PN-SNG | 26,500 | 212 | 125 | IP66 | 110 -277V AC | 5000K (cool white) | Tempered glass | | | | • |
| HEGMC4KN-SNG | 18,000 | 144 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4KN-SNG | 18,000 | 144 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGEC4KN-SNG | 18,000 | 144 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | | • | |
| HEGNC4KN-SNG | 18,000 | 144 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | | | • |
| HEGMC4GN-SNG | 14,000 | 112 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4GN-SNG | 14,000 | 112 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGEC4GN-SNG | 14,000 | 112 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | | • | |
| HEGNC4GN-SNG | 14,000 | 112 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | | | • |
| HEGMC4DN-SNG | 11,000 | 88 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4DN-SNG | 11,000 | 88 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGEC4DN-SNG | 11,000 | 88 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | | • | |
| HEGNC4DN-SNG | 11,000 | 88 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | | | • |
| Occupancy Sensor Models | | | | | | | | | | | |
| HEGMC1PM-SNG | 26,500 | 212 | 125 | IP65 | 110 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC1PM-SNG | 26,500 | 212 | 125 | IP65 | 110 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC1KM-SNG | 18,000 | 144 | 125 | IP65 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC1KM-SNG | 18,000 | 144 | 125 | IP65 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC1GM-SNG | 14,000 | 112 | 125 | IP65 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC1GM-SNG | 14,000 | 112 | 125 | IP65 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC1DM-SNG | 11,000 | 88 | 125 | IP65 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC1DM-SNG | 11,000 | 88 | 125 | IP65 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| Variable Dimming Models | | | | | | | | | | | |
| HEGMC4PD-SNG | 26,500 | 212 | 125 | IP66 | 110 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4PD-SNG | 26,500 | 212 | 125 | IP66 | 110 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC4KD-SNG | 18,000 | 144 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4KD-SNG | 18,000 | 144 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC4GD-SNG | 14,000 | 112 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4GD-SNG | 14,000 | 112 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC4DD-SNG | 11,000 | 88 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4DD-SNG | 11,000 | 88 | 125 | IP66 | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| Powerwash Models | | | | | | | | | | | |
| HEGMC4PN-SPG | 26,500 | 212 | 125 | 1000 PSI | 110 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4PN-SPG | 26,500 | 212 | 125 | 1000 PSI | 110 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC4KN-SPG | 18,000 | 144 | 125 | 1000 PSI | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4KN-SPG | 18,000 | 144 | 125 | 1000 PSI | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC4GN-SPG | 14,000 | 112 | 125 | 1000 PSI | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4GN-SPG | 14,000 | 112 | 125 | 1000 PSI | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |
| HEGMC4DN-SPG | 11,000 | 88 | 125 | 1000 PSI | 100 - 277V AC | 5000K (cool white) | Tempered glass | • | | | |
| HEGRC4DN-SPG | 11,000 | 88 | 125 | 1000 PSI | 100 - 277V AC | 5000K (cool white) | Tempered glass | | • | | |

[1] All models shown in the table are cool white, for models in Neutral White, 4000K CCT, replace the 5th character with a **N**. Ex: HEGM**C**4PN-SNG becomes HEGM**N**4PN-SNG. Deduct 5% from lumen values when specifying neutral.

[2] For models needing a safety bracket, replace the 10th character with a **S**. Example HEGMC4PN-S**N**G becomes HEGMC4PN-S**S**G.

[3] All models show in the above table come with an internal fuse. For models needing an external fuse, replace the 10th character with a **F**. Ex: HEGMC4PN-S**N**G becomes HEGMC4PN-S**F**G. (Fixture will be listed damp location only with internal fuse)

[3] For models needing both safety bracket & fuse, replace the 10th character with a **G**. Ex: HEGMC4PN-S**N**G becomes HEGMC4PN-S**G**G.

[4] Part numbers with occupancy sensor that will be installed with hook or loop (HBXH or HBXL) accessories will require a counter balance installed prior to shipment. Replace the 10th character with a **C**. Ex: HEGMC4PN-SNG becomes HEGMC4PN-SCG.

[4] Part numbers listed in the tables above come with a glass lens. For models needing a polycarbonate dome lens, replace the 3rd character with a **L** Ex: HE**G**MC4PN-SNG becomes HE**L**MC4PN-SNG (deduct ~11% from lumens). For models needing a polycarbonate flat lens, replace the 3rd character with a **2** Ex: HE**G**MC4PN-SNG becomes HE**2**MC4PN-SNG (deduct ~3% from lumens). For models needing a acrylic lens, replace the 3rd character with a **1**, Ex: HE**G**MC4PN-SNG becomes HE**1**MC4PN-SNG (deduct ~3% from lumens). Dome & acrylic lens not available on power wash models, please use glass or flat polycarbonate.

For Dialight's complete list of DLC qualified products, please click this link: www.dialight.com/DLC

# Vigilant® LED High Bay - UL - Options and Accessories

| | Part Number | Description | KIT includes |
|---|---|---|---|
| | | **Safety cable** | |
| | FLX1HBXSS | 304 Stainless steel forward throw bracket | Stainless steel forward throw bracket and stainless steel mounting hardware |
| | HBXDUALBRCKT | Dual bracket | Junction box |
| | HBXW2 | Swivel bracket and cable gland | Swivel bracket, bracket hardware, cable gland (1/2"), reducer (3/4" to 1/2") |
| | HBXW3 | Swivel bracket | Swivel bracket<br>Bracket to fixture hardware |
| | HBXCU | Ceiling mount | Swivel hanger cover<br>3" Conduit nipple |
| | HBXCG | Cable gland | Cable gland (1/2")<br>Reducer (3/4" to 1/2") |
| | HBXL | Loop<br>(Consult factory when using with occupancy sensor models) | Hanger loop<br>(Ge loopm353) |
| | HBXH | Hook<br>(Consult factory when using with occupancy sensor models) | Hanger hook<br>(Ge hookm353) |
| | HBXCAB48 | 48" Long stainless steel safety rope | 3/32" Diameter stainless rope<br>With locking spring clip |
| | HBXTH347480[1] | Top hat with 347-480v isolated<br>Step down transformer, ip 66 rated<br>(Consult factory when using with hook or loop) | Top and bottom clam shell, conduit nipple 6' STOOW cable, 347-480v step down transformer, fuse holder, 2 fuses |
| | HBXLENGC | Tempered glass | Lens, replacement clips, screws, gasket |
| | HBXLENAC | Acrylic lens, clear | |
| | HBXLENAD | Acrylic lens, diffused | |
| | LBXLENP | Replacement dome lens | |
| | HBXREF22 | 22" Acrylic reflector (must be ordered with high Bay, not a retrofit option) | Reflector, brackets, screws |
| | HBXDC | 21° slope dust cover | Dust cover, clamp, spacer |
| | HBXDC45 | 45° slope dust cover | |
| | HBXDC60 | 60° slope dust cover | |
| | HBXW3-SSL-316 | 316 Stainless steel swivel bracket | Stainless steel swivel bracket and Stainless steel mounting hardware |
| | HBXW3-SSL-304 | 304 Stainless steel swivel bracket | |

[6]Top hat cannot be used with a mounting bracket

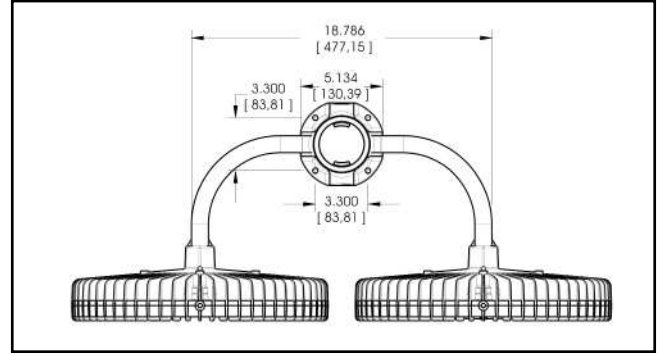# Vigilant® LED High Bay - UL - Options and Accessories Drawings
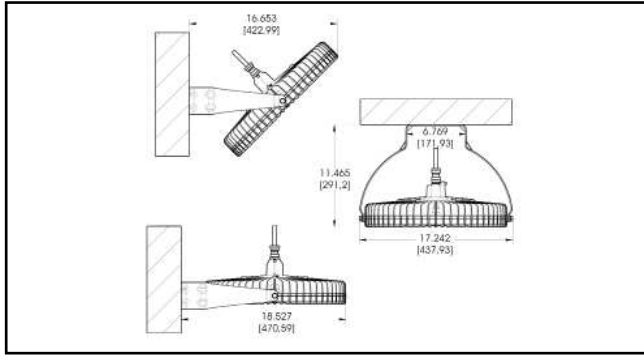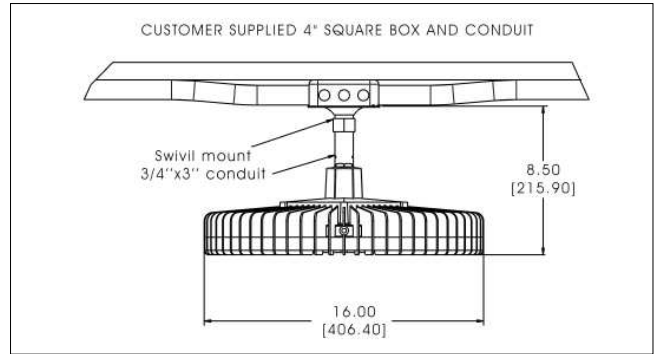
## HBXW2 - Swivel Bracket and Cable Gland
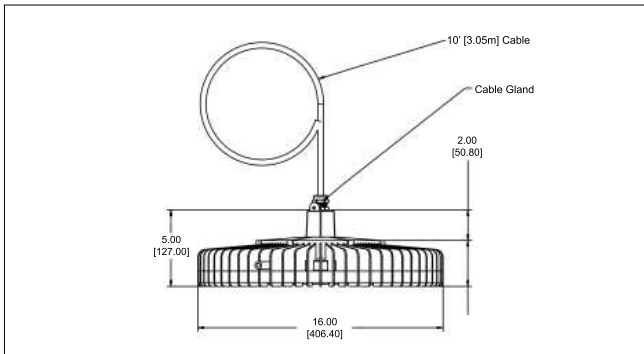


## HBXDUALBRCKT - Dual Bracket



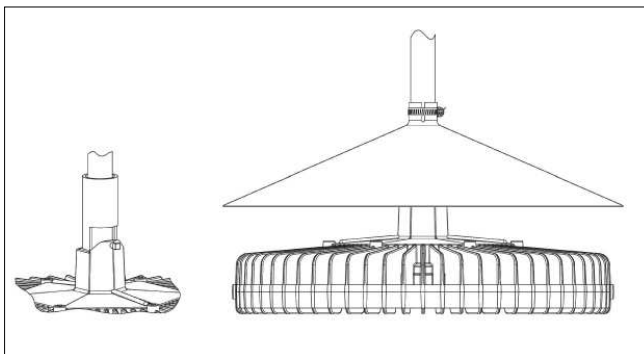## HBXCG - Cable Gland



## HBXCU - Ceiling Mount



## HBXTH347480 - Top Hat (fixture sold separately)



## HEGMxxxx-SGG - Safety Bracket and Fuse Options



## HBXDC - Dust Cover
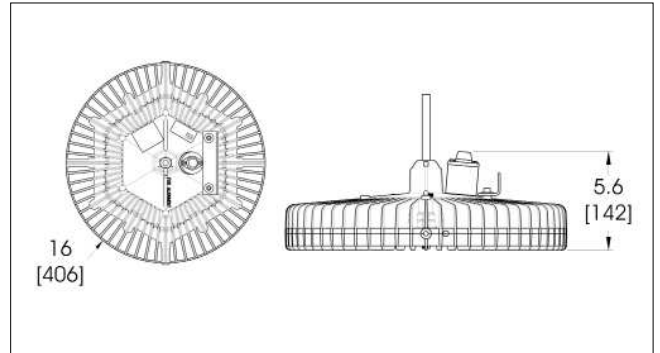


## 22" Acrylic Reflector - Consult factory

MDEXHB125X001_K

# Vigilant® LED High Bay -  UL
## for Indoor and Outdoor Industrial Applications