



KILLARK[®]

LED TECHNOLOGY for Harsh and Hazardous Environments

KILLARK CERTIFIED LED

LUMINAIRE FOR HAZARDOUS LOCATIONS WHEN COMPLETELY ASSEMBLED WITH LISTED CERTIFIED LUMINAIRE FITTINGS FOR HAZARDOUS LOCATIONS. USE PLUMB GALLERT HOUSING SURFACE FOR HAZARDOUS LOCATIONS. ALSO LISTED CERTIFIED AS LUMINAIRE FITTING FOR HAZARDOUS LOCATIONS. ALSO LISTED CERTIFIED AS MUSIC. MAINTAIN THE LUMINAIRE OUTSIDE THE GAIT WATER. MAINTAIN THE LUMINAIRE OUTSIDE THE GAIT WATER.

CAUTION: TO PREVENT CORROSION OF HAZARDOUS ATMOSPHERES, DISCONNECT THIS FIXTURE FROM SUPPLYING POWER BEFORE OPENING. KEEP ASSEMBLY TIGHTLY CLOSED WHILE CIRCUITS ARE ALIVE.

WARNING: TO PREVENT RISK OF FIRE OR EXPLOSION DO NOT INSTALL WHERE THE RATED OPERATING TEMPERATURE EXCEEDS LOCATION TEMPERATURE OF HAZARDOUS ATMOSPHERES.

VM4L12030

AMBIENT TEMP °C	CLASS I (V, 2, 3, E, C, D)	CLASS II (V, 2, 3, E, C, D)	TEMP °C MIN
40	T4A	T3C	75
65	T4	T3C	90

120-277 NEMA 4X
FOR INSTALLATION INSTRUCTIONS SEE FORM K1378

120 PRESENT VOL TO CIRCUIT 1.0
060 AMP 0611

NEW!
HIGH
WATTAGE



HSI = GREEN
HUBBELL SUSTAINABILITY INITIATIVE



Hubbell is committed to be a recognized leader in conserving natural resources to sustain our environment.



LED TECHNOLOGY

KILLARK® is pleased to announce HIGH WATTAGE LED sources in its time-tested industrial grade luminaires for harsh and hazardous locations. Market demand for this labor and energy saving clean white light is growing exponentially. Killark is there with high wattage fixtures for harsh (wet, corrosive and NEMA 4X locations) plus hazardous duty including Class I Division 2; Class II Divisions 1 & 2. With the new offering, users can replace mid-size HID's at greater mounting heights.

What Makes this Product GREEN?

- Saves Significant Maintenance Labor Time and \$ (fewer trips for relamping)

	Hours Life ①	No. Trips
Killark LED	55,000	1.0
150HPS	24,000	2.3
175MH	10,000	5.5
150/175MHP	15,000	3.7
84CFL (2 x 42W)	10,000	5.5
300 Incan.	1,000	55.0

- Lower facility carbon footprint (emissions) by reducing electrician maintenance trips to fixture
 - Service Trucks: direct diesel or gas emissions
 - Forklifts, Sissor-lifts, or Cherry Pickers: use utility electricity to charge batteries, or gas
- High Color Rendering (5000°Kelvin - CCT; 70 CRI) for better visibility can reduce the number of fixtures needed.
- The US DOE recognizes "Spectrally Enhanced Lighting", particularly at low light levels, as a method to maintain visual effectiveness using fewer watts, e.g. vs HPS (2100°Kelvin - CCT; 21CRI) ②.
- Killark LED luminaires use RoHS compliant materials to minimize environmental contamination

① At 40°C Ambient Minimum LED Life to 70% of initial lumen output; HID, CFL, Incandescent from mfg. catalog data

② For more information go to http://www1.eere.energy.gov/buildings/spectrally_enhanced.html

INDEX

VM4L Series - High Wattage 120 W Luminaires

Introduction.....	1
Catalog Logic.....	2
Ordering Information.....	3,4
Components/Electrical Ratings/Temperature Data.....	5,6
Dimensions.....	6,7
Photometrics.....	8

Key Features and Benefits

- L70 55,000 hours life at 40°C (5+ years to 70% of initial output) equals Minimal Maintenance.
- LM79-08 Certified Photometrics Tested (NIST Recognized Lab)
- LM80-08 Lumen Maintenance Measurement
- Solder-LESS LED Board Connections - Vibration Resistant
- Dual Drivers - Redundant Systems - Half of fixture can be turned off for greater energy savings
- Less than 130 Watts of Power
- Instant on - including after power interruption
- "World Voltage" 120-277VAC 50/60Hz
- Crisp white light - 5000°K (CCT);70 CRI
- Wide variety of optics, including Globes, all glass Refractors, Reflectors, Enclosed Reflectors
- Optional Mounting arrangements, including Pendant, Wall, Ceiling, Stanchion and others
- Copper-Free Aluminum Construction with electrostatically applied epoxy/polyester powder paint, plus Stainless Steel External Hardware for Corrosion Resistance
- Traditional Industrial Appearance and Optical Performance
- Patented Swing-Barrel Nut labor saving mounting system
- Polycarbonate 12" spintop suitable for Food Areas, Class II "G"



NEW OPTIC

For 45 Watt LED Luminaires

MBL Compact



VM1L Reduced Profile



EML Explosion Proof



See Pg. 9 or www.hubbell.com for complete information.



KILLARK®



LED Technology



Class I, Div. 2, Groups A,B,C,D
Class I, Zone 2, Groups IIC, IIB, IIA
Class II, Div. 1 & 2, Groups E,F,G
Class III
Suitable for wet locations
NEMA 3, 4X
IP66

US Certified - File LR11713

FEATURES-SPECIFICATIONS

CERTILITE^V LED

Applications

CERTILITE^V VM4L LED fixtures are designed for installations where moisture, dirt, dust, corrosion and vibration may be present, or NEMA 3 and 4X areas where wind, water, snow or high ambients can be expected. They can be used in locations made hazardous by the presence of flammable vapors or gases or combustible dusts as defined by the NEC.

Typical applications include manufacturing plants, and certain chemical and petrochemical processing facilities, sewage treatment plants, off-shore and dockside installations, garages and storage facilities.

Compliances

- UL-8750 for LED lighting
- UL-844 Standard for lighting fixtures for hazardous locations, Class I, Division 2; Class II, Divisions 1 and 2; Class III
- CSA C22.2 no. 137-M1981 electric luminaires for use in hazardous locations
- Enclosed and gasketed
- NEMA 3, 4X
- IP66

Materials

- Ballast tank, splice box and cast guards corrosion resistant copper-free aluminum alloy
- Baked powder epoxy/polyester finish, electrostatically applied for complete, uniform corrosion protection
- All external hardware - stainless steel
- Reflectors - Polyester reinforced fiberglass or aluminum

LED Luminaire Features and Standards

- Traditional Industrial Appearance, Suitability, and Photometric Performance
- Wide variety of optics including globes, globes with reflectors, all-glass refractors, and spin-top refractors

- Swing-Barrel Nut patented tank mounting system
- Optional Mounting arrangements including Pendant, Wall, Ceiling, Stanchion and others
- VM4L LED Housings can be retrofitted to existing VM splice boxes; upgrade from HID sources
- Crisp White Light for Excellent Color Rendering - Chromaticity 5000°K (CCT); 70 CRI
- Energy Savings - less than 130 Watts of Power
- Long Life - 50,000 - 55,000 maintenance free hours to 70% initial lumens
- Ambient suitability -40°C to 55°C
- Instant on - including after power interruption
- "World Voltage" 120-277VAC 50/60Hz
- Solder-LESS LED Board Connections – Vibration Resistant
- Dual Drivers - Redundant Systems (built-in backup), or for additional energy savings half of fixture can be turned off
- LM80-08* Measurement of lumen maintenance for LED light sources
- LM79-08* Certified "Absolute" Photometry, including Chromaticity Color for Solid State Lighting
- L70 Values - Industry Nomenclature for Hours of use to 70% of Initial Lumens


* LM-xx are Illumination Engineering Society Standards designed to promote uniformity in testing procedures among test labs and manufacturers. For more information go to www.ies.org

Swing-Barrel Nut




Photo controls - Class I Div. 2 / N4X areas

Available as Field or Factory Installed to save energy when light not required.



"EZ" Mount Adapter

For easy fixture relocation or repair due to impact damage.



New Non-Glass Polycarbonate 12" Spin-Top Type V Refractor

Class II Group G Suitability @ 40°C



NEW!
NON-GLASS
FOOD SUITABILITY





CertiLite®V LED Catalog Number Logic

Class I, Div. 2, Groups A,B,C,D
Class I, Zone 2, Groups IIC,IIB,IIA
Class II, Div. 1 & 2, Groups E,F,G
Class III
Suitable for wet locations
NEMA 3, 4X
IP66

Certified - File LR11713

VM4L 120 30 0 0 00

Housing Series — 7-3/4" thread w/driver and LED's

Lamp Wattage — 120—approx. VA (wattage) of driver and LED's

Voltage — 30—120-277VAC 50/60 Hz

Mounting Type

A—Pendant
X—Ceiling
B—Wall Bracket
C—Cone Top
E—EZ Mount Adapter^①
D—Stanchion 25°
S—Stanchion Straight 90°
N—None (mount ordered separately)^②

Entry (Mounts available)

2—3/4" NPT (A,B,C,X)
3—1" NPT (A,B,C,X)
4—1 1/4" NPT (D,S)
5—1 1/2" NPT (D,S)
6—3/4" NPT 5-Hub (X)
7—1" NPT 5-Hub (X)
8—M20 4-Hub (X)
9—M25 5-Hub (X)
Z—EZ Mount Adapter^①
N—None (mount ordered separately)^②

* Non-glass Food Processing Suitability

0

Guard

G—Guard (Globes & Glass refractors)
N—No Guard

Optic

GL—Globe
R1—Type I Refractor (all glass)
R3—Type III Refractor (all glass)
R5—Type V Refractor (all glass)
ER—Enclosed Reflector
EP—Polycarbonate Shielded Enclosed Reflector*
P5—12" Polycarbonate Spin-Top*
S2—Type II 12" Spin-Top Glass Refractor
S5—Type V 12" Spin-Top Glass Refractor
FG—Silicone Coated Globe
TG—Teflon[®] ③ Coated Globe
T1—Teflon[®] Coated Type I Refractor (all glass)
T3—Teflon[®] Coated Type III Refractor (all glass)
T5—Teflon[®] Coated Type V Refractor (all glass)
T2—Teflon[®] Coated Type II 12" Spin-Top Refractor
TV—Teflon[®] Coated Type V 12" Spin-Top Refractor

Options/Accessories

F—Single Fuse^⑤
FF—Double Fuse^⑤
TBX—Terminal Blocks
X= Variations (May be alphanumeric to indicate terminals)
P1—Photocell 120V^⑥ Factory Installed
P2—Photocell 208-277V^⑥ Factory Installed
QD—QD Wired at Ballast^⑦
CP—Component Pack (Tank w/mount, optic, guard - LED's included in tank)
AN—Assembled (Tank w/mount, optic, guard- LED's included in tank)

Accessories — See ④ below

- ① Completes as "EZ", conduit mounting boxes ordered separately - See catalog grids.
- ② Completes as NN-Mount ordered separately
- ③ Teflon[®] is a registered trademark of DuPont, Inc.
- ④ Accessories - Shown for ordering convenience (shipped separately).
S VMPSD40 Fiberglass White Reflector
A VMPA40 Fiberglass ANGLE White Reflector
D HRD400 Deep White Reflector
Z HRD400ALZ Deep Alzak Reflector
- ⑤ Fusing not for Canadian installations.
- ⑥ Photo cells for Class I, Div. 2 only.
- ⑦ QD = Quick Disconnect. Allows easy tank removal for maintenance. Electrician simply unplugs tank from mount for fixture relocation or repair due to impact damage.





PENDANT
Globe/Guard



CEILING
Poly Food Optic



WALL
Refractor/Guard



CONE
Poly Spin-Top

ORDERING INFORMATION

VM4L SERIES PENDANT WITH OPTIC AND GUARD ①

Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	3/4"	120-277VAC	VM4L12030A2GLG	VM4L12030A2R5G	VM4L12030A2S5G	VM4L12030A2P5G	VM4L12030A2ERN	VM4L12030A2EPN

VM4L SERIES CEILING WITH OPTIC AND GUARD ①

Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	3/4"	120-277VAC	VM4L12030X2GLG	VM4L12030X2R5G	VM4L12030X2S5G	VM4L12030X2P5G	VM4L12030X2ERN	VM4L12030X2EPN

VM4L SERIES WALL WITH OPTIC AND GUARD ①

Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	3/4"	120-277VAC	VM4L12030B2GLG	VM4L12030B2R5G	VM4L12030B2S5G	VM4L12030B2P5G	VM4L12030B2ERN	—

VM4L SERIES CONE WITH OPTIC AND GUARD ①

Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	3/4"	120-277VAC	VM4L12030C2GLG	VM4L12030C2R5G	VM4L12030C2S5G	VM4L12030C2P5G	VM4L12030C2ERN	VM4L12030C2EPN

① Catalog numbers shown are with Guard (except ER/EP); to omit guard change ending G to N; e.g. VM4L12030A2GLN

② Catalog numbers shown are with 3/4" conduit openings; change "2" to "3" for 1" e.g. VM1L4530A3GLG

③ 120VAC through 277VAC 50/60Hz





25° Stanchion
Enclosed Reflector



Straight Stanchion
Globe/Guard



EZ Adapter
Glass Spin-Top

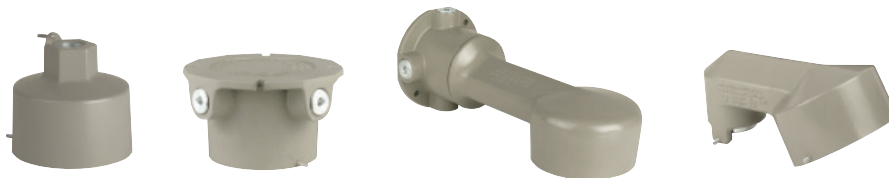
ORDERING INFORMATION

VM4L SERIES 25° STANCHION WITH OPTIC AND GUARD ①								
Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	1-1/2"	120-277VAC	VM4L12030D5GLG	VM4L12030D5R5G	VM4L12030D5S5G	VM4L12030D5P5G	VM4L12030D5ERN	—

VM4L SERIES STRAIGHT STANCHION WITH OPTIC AND GUARD ①								
Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	1-1/2"	120-277VAC	VM4L12030S5GLG	VM4L12030S5R5G	VM4L12030S5S5G	VM4L12030S5P5G	VM4L12030S5ERN	—

VM4L SERIES EZ ADAPTER WITH OPTIC AND GUARD ①								
Watts	Hub Size②	Voltage③	Globe & Guard	Type V Glass Refractor & Guard	12" Spin-Top Type V Glass Refractor & Guard	12" Spin Top Type V Polycarbonate Refractor & Guard	Enclosed Reflector	Polycarbonate Shielded Enclosed Reflector
120	④	120-277VAC	VM4L12030EZGLG	VM4L12030EZR5G	VM4L12030EZS5G	VM4L12030EZP5G	VM4L12030EZERN	VM4L12030EZEPN

- ① Catalog numbers shown are with Guard (except ER/EP); to omit guard change ending G to N; e.g. VM4L12030D5GLN
- ② Catalog numbers shown are with 1-1/2" conduit openings; change "5" to "4" for 1-1.4"; e.g. VM4L12030D4GLG
- ③ 120VAC through 277VAC 50/60Hz
- ④ VMEZA tank adapters UL "classified" as an assembly for use between VM tanks and EZ mounts. Order EZ mounts separately (see below).



Pendant

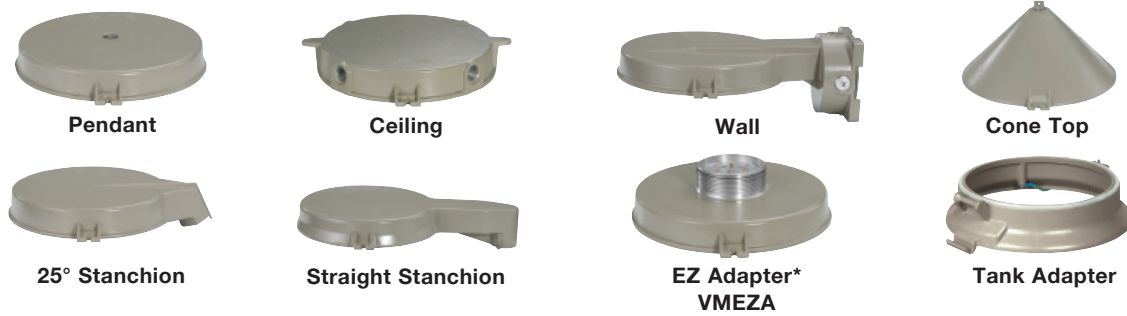
Ceiling

Wall Bracket

25° Stanchion

MOUNTING BOXES FOR EZ ADAPTER				
CATALOG NUMBER				HUB SIZE
PENDANT	CEILING	BRACKET	STANCHION	
EZA2	EZX2	EZB2	—	3/4"
EZA3	EZX3	EZB3	—	1"
—	—	—	EZD4A*	1-1/4"/1-1/2"*

*1-1/2" furnished with 1-1/2"-1-1/4" reducer and extension.



CERTILITE® VM MOUNTING SPLICE BOXES							
CATALOG NUMBER							
HUB SIZE	PENDANT	CEILING 4 HUB	CEILING 5 HUB	WALL	CONE TOP	25 DEGREE STANCHION	90 DEGREE STANCHION
3/4"	VMA2B	VMX2B	VMX6B	VMB2B	VMC2B	—	—
1"	VMA3B	VMX3B	VMX7B	VMB3B	VMC3B	—	—
1-1/4"	—	—	—	—	—	VMD4B	VMS4B
1-1/2"	—	—	—	—	—	VMD5B	VMS5B
M-20	—	VMX8B**	VMX9B	—	—	—	—

*VMEZA is used between a ballast tank and an EZ mount-ordered separately. See catalog grids.

**VMX8B furnished with 3 non-metallic plugs.

VM4L LED OPTICS AND ACCESSORIES		
DESCRIPTION	OPTIC (LOGIC)	GUARD ⑦
Globe (glass)	VMG25 (GL)	VMAG25S
Reflector (all glass) Type I	VMR251 (R1)	VMAG25S
Reflector (all glass) Type III	VMR253 (R3)	VMAG25S
Reflector(all glass) Type V	VMR255 (R5)	VMAG25S
Enclosed Reflector	VMER40 (ER)	VMERG
Enclosed Reflector with Polycarbonate Lens*	VMPE40 (EP) ⑥	—
Reflector (Polycarbonate spin top) 12" Type V*	VZRP175B (P5)	VMRWGS
Reflector (glass spin top) 12" Type V	VZRG4050 (S5)	VMRWGS
Reflector (glass spin top) 12" Type II	VZRG4020 (S2)	VMRWGS
Globe (Silicone coated)	VMG25F (FG)	VMAG25S
Globe Teflon® coated ①	VMG25T (TG)	VMAG25S
Reflector Teflon® coated (all glass) Type I	VMR251T (T1)	VMAG25S
Reflector Teflon® coated (all glass) Type III	VMR253T (T3)	VMAG25S
Reflector Teflon® coated (all glass) Type V	VMR255T (T5)	VMAG25S
Reflector Teflon® coated (spin top) 12" Type V	VZRG4050T (T2)	VMRWGS
Reflector Teflon® coated (spin top) 12" Type II	VZRG4020T (T2)	VMRWGS

*Non-Glass over Food/Grain Class II Div 1 Group G Certified; VMPE40 to 55°C; VZRP175B TO 40°C

① Teflon is a registered trademark of DuPont, Inc.

VM4L LED REFLECTORS AND ACCESSORIES	
DOME REFLECTOR (Polyester reinforced fiberglass)	VMPSD40
ANGLE REFLECTOR (Polyester reinforced fiberglass)	VMPA40
DEEP DOME REFLECTOR (White Painted Aluminum)	HRD400
DEEP DOME REFLECTOR (Anodized Aluminum)	HRD400ALZ
120VAC Photocell with FS Style Cover②	VMFSPC1
208-277VAC Photocell with FS Style Cover②	VMFSPC2
Tank adapter to Crouse-Hinds®③ VM Series mounts	VMCHVM
Tank adapter to Hazlux® 3④ Series mounts	VMHLDS
Bottom Closure for VMAG25S	VMAGBC
4-sided EXIT Accessory (use without guard)⑤	VEXA400

② Order single-gang FS box separately. For photocell factory installed in tank, see logic.

③ See online catalog page L223 for more information

④ Similar to VMCHVM configured for Hazlux dimensions; Trademark of Thomas&Betts®

⑤ For use with Generator or UPS powered fixtures

⑥ For Wall applications mount must be spaced out

⑦ Guards are 316 Stainless. Bottom closure for VMAG25S pt. no. VMAGBC



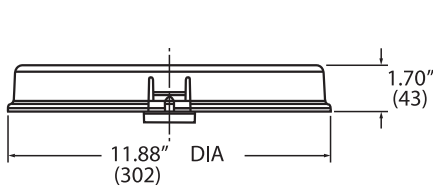
VM4L LED HOUSINGS & GLOBE, DRIVERS AND LEDS - ELECTRICAL RATINGS					
CAT. NO.	VOLTAGE 50/60HZ	WATTAGE	AMPS 120/277	CIL ^②	WEIGHT
VM4L12030	120-277VAC	123.9	1.04/.45	10560	25.5 LBS

THERMAL PERFORMANCE DATA					
CAT. NO.	AMBIENT	C1D2	C2D1	L70	SUPPLY WIRE
VM4L12030	40°C	T4A	T3C (EFG)	55,000 HRS	75°C
	55°C ^③	T4	T3C (EFG)	50,000 HRS	90°C

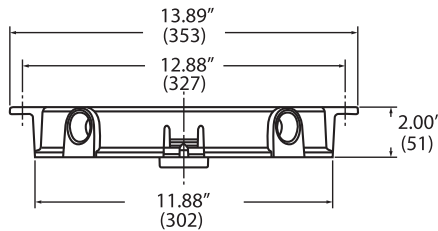
① Driver THD < 20%, Powerfactor 99% @ 120V; Line Regulation 2%; Load regulation 5%; Protected against Over-voltage and Over-current.

② CIL = Calculated Initial Lumens of LED component based on mfg. data and driver current INSIDE the optic. This value is provided as a reference only for comparison to traditional light sources such as incandescent, HID, or fluorescent which use initial values in "relative" photometry. KILLARK LED luminaires are tested using the Absolute photometry method (LM79-08), which calculates delivered lumens only. KILLARK's LED luminaires provide very bright white 5000° K (CCT) color and can appear brighter than traditional light sources with higher lumen values under both photopic and scotopic conditions.

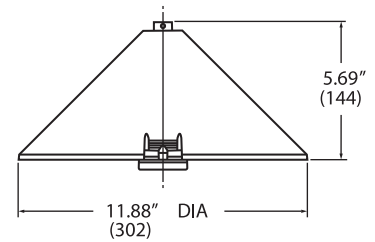
③ All optics suitable for 55°C except VRZP175B which is limited to 40°C



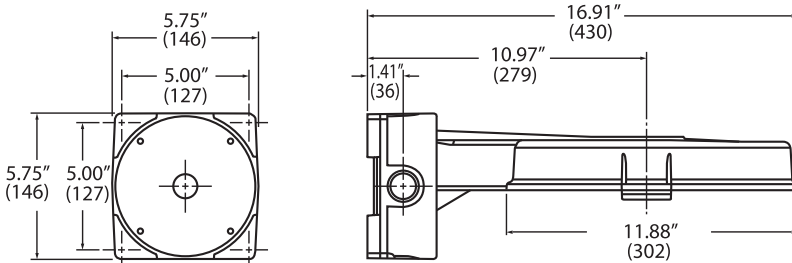
Pendant Mount



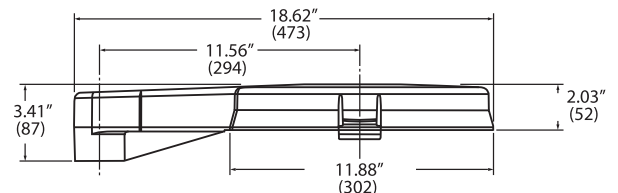
Ceiling Mount



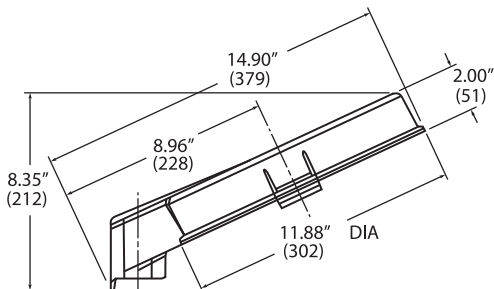
Cone Mount



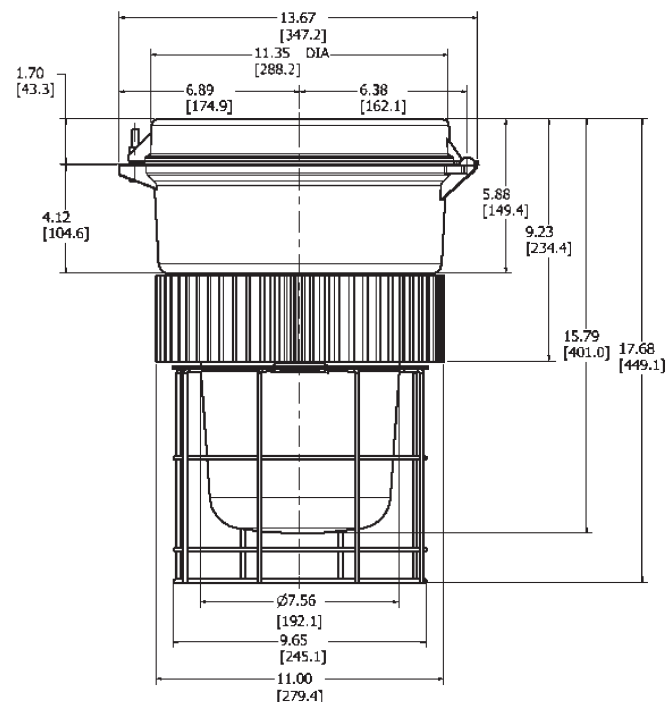
Wall Bracket Mount



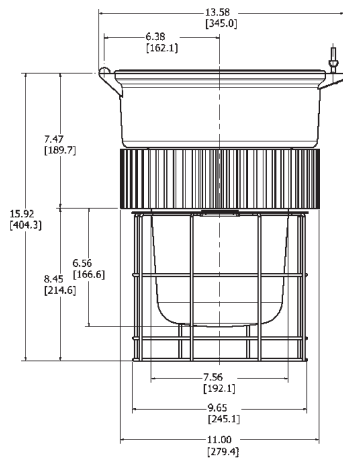
Stanchion (90°) Mount



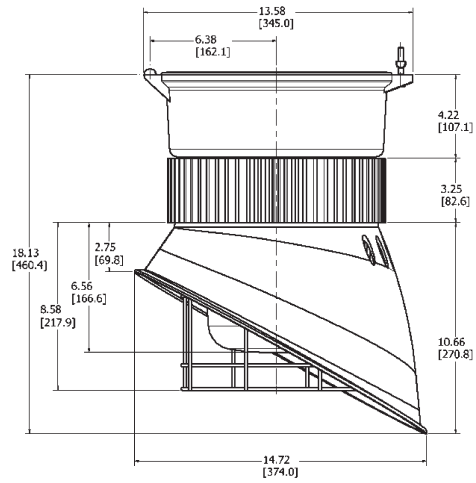
Stanchion (25°) Mount



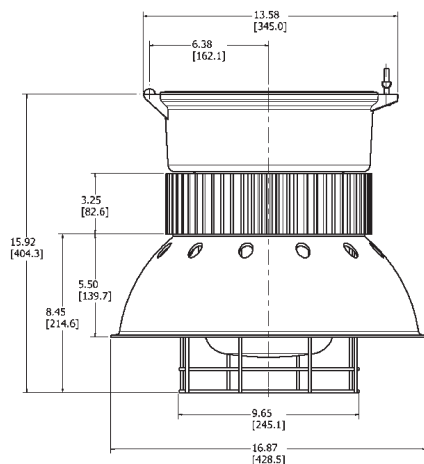
VM4L Pendant w/VMG or VMR and Guard



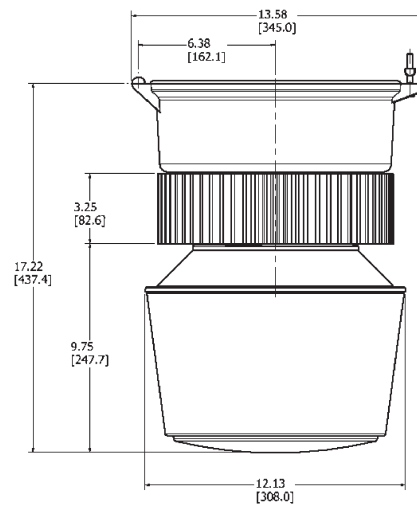
VM4L w/ VMG or VMR and Guard



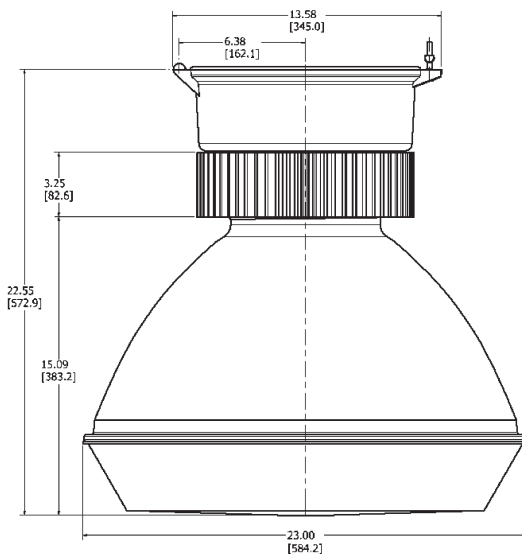
VM4L w/ VMG and Angle Refractor and Guard



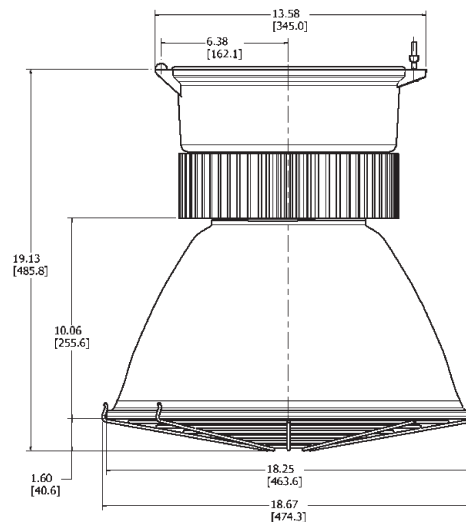
VM4L w/ VMG and Dome Reflector



VM4L w/ 12" Spin-Top Refractor



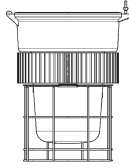
VM4L w/ VMEP40 Food Optic



VM4L w/ VMER40 Enclosed Reflector and Guard



LED 120 Watt Globe VMG25



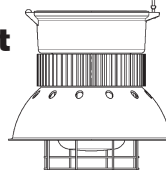
Zonal Lumen Summary

Zone	Lumens	%Lamp	%Fixt
0-30	1293	N.A.	20.3%
0-40	2342	N.A.	36.8%
0-60	4570	N.A.	71.8%
0-90	6279	N.A.	98.6%
90-120	56	N.A.	0.9%
90-130	72	N.A.	1.1%
90-150	87	N.A.	1.4%
90-180	89	N.A.	1.4%
0-180	6369	N.A.	100

Absolute Photometry

Total Luminaire Efficiency = N.A.%
Spacing to Mounting Height Ratio 1.4

LED 120 Watt Globe and Dome Reflector



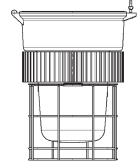
Zonal Lumen Summary

Zone	Lumens	%Lamp	%Fixt
0-30	1613	N.A.	28.3%
0-40	2853	N.A.	50.1%
0-60	5163	N.A.	90.7%
0-90	5673	N.A.	99.6%
90-120	14	N.A.	0.2%
90-130	16	N.A.	0.3%
90-150	20	N.A.	0.3%
90-180	21	N.A.	0.4%
0-180	5694	N.A.	100

Absolute Photometry

Total Luminaire Efficiency = N.A.%
Spacing to Mounting Height Ratio 1.4

LED 120 Watt Glass Type V Refractor

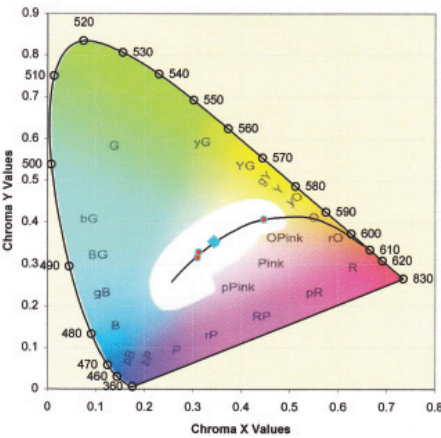
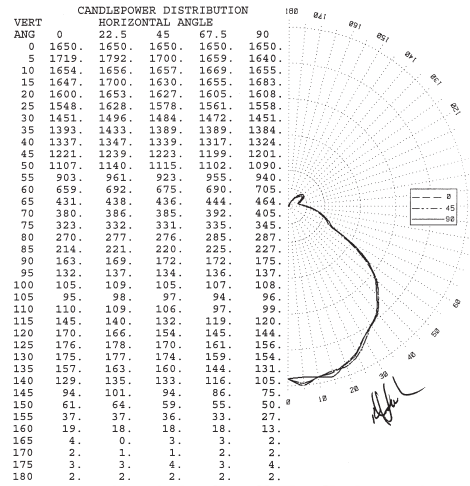
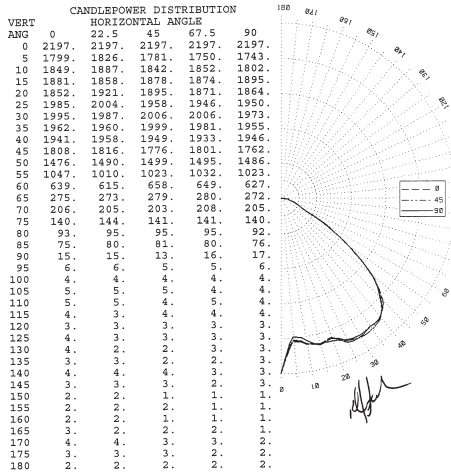
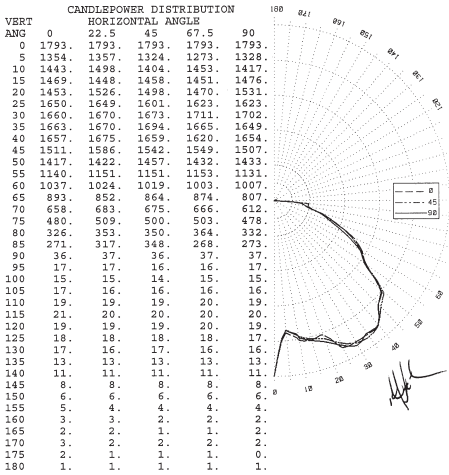


Zonal Lumen Summary

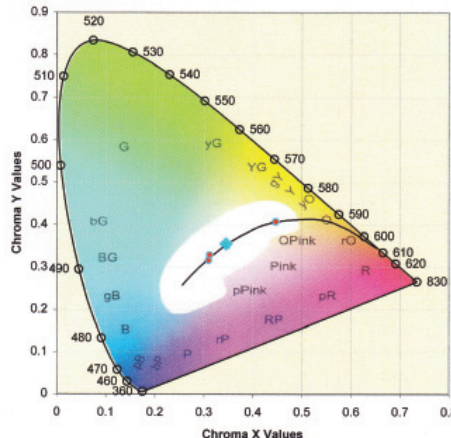
Zone	Lumens	%Lamp	%Fixt
0-30	1366	N.A.	23.6%
0-40	2245	N.A.	38.8%
0-60	4032	N.A.	69.7%
0-90	5064	N.A.	87.5%
90-120	379	N.A.	6.6%
90-130	530	N.A.	9.2%
90-150	706	N.A.	12.2%
90-180	723	N.A.	12.5%
0-180	5787	N.A.	100

Absolute Photometry

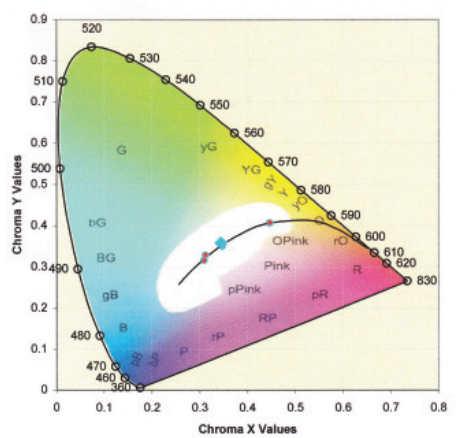
Total Luminaire Efficiency = N.A.%
Spacing to Mounting Height Ratio 1.3



Chromaticity 5016.1 K° (CCT); 71.2 CRI
Certified Report BAL16089.0



Chromaticity 4965.1 K° (CCT); 71.0 CRI
Certified Report BAL16090.0



Chromaticity 5006.8 K° (CCT); 71.6 CRI
Certified Report BAL16091.0

CERTILITE®

**MBL Series 22 & 45 Watt
Compact Size**



Features MBL Series

- LED Source provides 2,900 lumens (Globe) using less than 50W of power, or 1,400 lumens using 25W of power.
- Energy savings combine with long life (50,000 to 60,000 maintenance-free hours), with excellent color rendering and instant on.
- Compact in size, MBL LED luminaires are available with glass globes, all-glass refractors or spin-top refractors.
- Ambient suitability -40°C to +55°C.

Class I, Div. 2, Groups A,B,C,D
Class I, Zone 2, Groups IIC, IIB, IIA
Class II, Div. 1 & 2, Groups E,F,G
Class III
Suitable for wet locations
UL Marine
NEMA 3, 4X

Certified - File LR11713

MBL4530 ** SERIES LED FIXTURES 45WATTS 120-277VAC 50/60HZ			
MOUNT	Globe & Guard	Type V All Glass Refractor & Guard	8" Spin-top Type V Refractor & Guard
3/4" PENDANT	MBL4530A2GLG	MBL4530A2R5G	MBL4530A2S8G
3/4" CEILING	MBL4530X2GLG	MBL4530X2R5G	MBL4530X2S8G
3/4" WALL	MBL4530B2GLG	MBL4530B2R5G	MBL4530B2S8G
1-1/4" STANCHION	MBL4530D4GLG	MBL4530D4R5G	MBL4530D4S8G

** Change "45" in Logic to "22" for 22W Model

AMBIENT	T-CODE C1D2 / C2D1	LM70	SUPPLY WIRE
MBL4530 40°C	T4A / T4 EFG	55,000 HOURS	90°C
MBL2230 40°C	T4A / T4 EFG	60,000 HOURS	75°C
MBL2230 55°C	T4 / T4 EFG	50,000 HOURS	90°C

REFLECTORS: DOME VMPSD17; ANGLE VMPA17
 CONSULT ONLINE CATALOG FOR OTHER AVAILABLE MOUNT SIZES & OPTICS

CERTILITE®V

**VM1L Series 45 Watt
Reduced Profile**



Features VM1L Series

- LED Source provides 3,000 lumens (Globe) using less than 50W of power.
- Energy savings combine with long life (50,000 to 55,000 maintenance-free hours), with excellent color rendering and instant on.
- Lowest profile configuration in the CertiLite®V Series with it's unique features. Available with globes, all-glass refractors, or spin-top refractors
- Factory installed photocells available.
- Ambient suitability -40°C to +55°C.

Class I, Div. 2, Groups A,B,C,D
Class I, Zone 2, Groups IIC, IIB, IIA
Class II, Div. 1 & 2, Groups E,F,G
Class III
Suitable for wet locations
UL Marine
NEMA 3, 4, 4X; IP66

Certified - File LR11713

VM1L4530 SERIES LED FIXTURES 45 WATTS 120-277VAC 50/60HZ			
MOUNT	Globe & Guard	Type V All Glass Refractor & Guard	12" Spin-top Type V Refractor & Guard
3/4" PENDANT	VM1L4530A2GLG	VM1L4530A2R5G	VM1L4530A2S5G
3/4" CEILING	VM1L4530X2GLG	VM1L4530X2R5G	VM1L4530X2S5G
3/4" WALL	VM1L4530B2GLG	VM1L4530B2R5G	VM1L4530B2S5G
1-1/4" STANCHION	VM1L4530D4GLG	VM1L4530D4R5G	VM1L4530D4S5G

AMBIENT	T-CODE C1D2 / C2D1	LM70	SUPPLY WIRE
40°C	T4A / T4 EFG	55,000 HOURS	75°C
55°C	T4 / T4 EFG	50,000 HOURS	90°C

REFLECTORS: DOME VMPSD40; ANGLE VMPA40
 CONSULT ONLINE CATALOG FOR OTHER AVAILABLE MOUNT SIZES & OPTICS

CERTILITE®V

**EML Series 45 Watt
Explosion Proof**



Features EML Series

- LED Source provides 2,900 lumens (Globe) using less than 50W of power.
- Energy savings combine with long life (50,000 to 55,000 maintenance-free hours), with excellent color rendering and instant on.
- Factory sealed - no external seal required. Simply wire mounting cap and thread in fixture to install.
- Ambient suitability -30°C to +55°C.

Class I, Div. 1, Groups C,D
Class I, Zone 1 Groups IIB, IIA
Class II, Div. 1 & 2, Groups E,F,G
Class III, Div. 1 & 2
Suitable for wet locations
Marine
NEMA 3, 4, 4X
Factory Sealed

Certified - File LR11713

EML4530 SERIES LED FIXTURES 45 WATTS 120-277VAC 50/60HZ			
MOUNT *	FLUTED Globe & Guard	CLEAR Globe & Guard **	
3/4" PENDANT	EML4530A2G	EMLC4530A2G	
3/4" CEILING	EML4530X2G	EMLC4530X2G	
3/4" WALL	EML4530B2G	EMLC4530B2G	
1-1/4" STANCHION	EML4530D4G	EMLC4530D4G	

AMBIENT	T-CODE C1D1 / C2D1	LM70	SUPPLY WIRE
40°C	T6 / T4A EFG	55,000 HOURS	75°C
55°C	T5 / T4 EFG	50,000 HOURS	90°C

REFLECTORS: DOME ERSD30; ANGLE ERA30
 * FOR 1" MOUNTS: A3, X3, B3; STANCHION ALSO FITS 1-1/2"
 ** EXCLUSIVE FROM KILLARK FOR MAXIMUM BRIGHTNESS

Refer to on-line catalog for complete information on low wattage LED fixtures.

www.hubbell-killark.com



Ideas for a **greener** tomorrow.



HSI=GREEN

HUBBELL SUSTAINABILITY INITIATIVE



KILLARK
A Division of Hubbell Incorporated (Delaware)

3940 M.L. King Dr. St. Louis, MO 63119
TEL: (314) 531-0460 FAX: (314) 531-7164
www.hubbell-killark.com



Printed on 100% recycled paper

RACO® BELL® KILLARK® HAWKE® CHALMIT® WIEGMANN®

MCLEDHW 06-11

©2011 Hubbell Incorporated (Delaware)