



## HAZARDOUS MERCMASTER™ LED GENERATION 3 SERIES LUMINAIRES

#### **APPLICATIONS**

- Enclosed and gasketed fixtures suitable for use in:
  - A wide range of industrial, chemical processing and other areas where flammable gases and vapors or
  - combustible dusts are present
  - Marine and wet locations
  - Suitability includes use where there may be simultaneous exposure to flammable gases and vapors or combustible dusts
- Typical applications include:
- Power plants
- Processing plants
- Chemical plants
- Oil refineries
- Waste and sewage treatment
- Other areas where dust, water, dirt and rough usage are a problem

#### FEATURES

- Modular design provides thousands of combinations for maximum versatility.
- Design is suited for low mounting heights, from 7 ft., up to 30 ft.
- Seven light outputs provide up to 20,100 lumens.

Nominal Lumens ①	HID Equivalent	Model Number
3500	70-100W	MLGL3
5500	100-150W	MLGL5
7500	175-250W	MLGL7
9500	250-350W	MLGL9/MLGH9
11,500	350-400W	MLGH1
14,500	400W	MLGH3
17,500	400-600W	MLGH6
① Nominal lumen value for 5000K, clear glass globe. Type V wide.		

Detailed lumen information is provided in tables in catalog pages.

- Choice of optics for optimal light distribution in a variety of applications: Type I, Type III, Type V or Type V Wide.
- Choice of color temperature (CCT): 5000K cool white, 4000K neutral white or 3000K warm white.
- Customize to the application requirements with four different globe options: clear and diffused
- polycarbonate, clear glass, or prismatic glass refractor. • Seven standard mounting hood designs allow for mounting in any location. Uses same mounting hoods as Mercmaster™ III.
- Retrofit adapters for Crouse-Hinds™\*, Mercmaster II, and Killark\* hoods available.
- Hinge has high lip for added safety during installation and servicing. Hinge and bolt construction assures 360° compression at all points on fixture housing gasket for positive sealing. Swing away design of captive bolt and nut simplifies installation.
- Rugged housing with superior thermal design translates to long luminaire life.
- Luminaire housing has wiring compartment with terminal block separate for easy wiring access.
- Standard screw-type terminal block can accept UL/CSA 4 mm<sup>2</sup> to 6 mm<sup>2</sup> (26-10 AWG) wire.
- Standard 6 kV surge protection.
- Heavy duty, high temperature silicone gaskets.
- Photometric data and electronic drawings available upon request.
- Ambient Temperature: -40 °C to +65 °C (-40 °F to +149 °F)
- Standard NPT threads with M20 option.
- LED L70 reported at 60,000 hours.
- Field replaceable globes and LED driver.

#### STANDARD MATERIALS

- Mounting hoods and bodies: cast copperfree (4/10 of 1% max.) aluminum
- Gaskets: silicone
- All hardware and catch assemblies: stainless steel
  Globe: polycarbonate or glass
- Refractor: heat-resistant prismatic glass
- Glass globe guard and safety cable: stainless steel
- wire
- Glass refractor guard: die cast aluminum

#### STANDARD FINISHES

 Mounting hoods, bodies and glass refractor guard: gray epoxy powder coat finish, electrostatically applied for complete uniform protection

#### OPTIONS

- Globe and refractor guards available, purchase separately.
- Safety cable available, purchase separately.
- All Mercmaster<sup>™</sup> luminaires have provision for fusing; add suffix –F at the end of the catalog number.
- Photocontrols are available and are configured to your operating voltage. Add suffix -1 for 120V, -2 for 208V, -3 for 240V,-4 for 277V.
- Drain is available to divert water existing in the conduit system, purchase separately.

#### DESIGN LIGHTS™ CONSORTIUM

• Check DLC QPL for current list of products.

♦ Killark is a registered trademark of Hubbell Incorporated.
+ Crouse-Hinds is a registered trademarks of Cooper Crouse-Hinds.



For product information: www.masteringled.com 1.800.621.1506



# CONSIDER IT SOLVED



- Class I, Division 2, Groups A, B, C, D
- Class II, Division 1 & 2, Group E, F, G

- .
- .

- .

- ATEX RATINGS
  - Zone 2 and 21/22

HAZARDOUS MERCMASTER™ LED GENERATION 3 SERIES LUMINAIRES

- Gas: Zones 2

ATEX/IECEX CERTIFICATIONS AND COMPLIANCES

Certification Type: Mercmaster Generation 3

- . 🖾 || 3 G
- Class III (€x) || 2 GD - Conforming to ATEX 2014/34/EU: II 3 G Class I Zone 2 AFx ec IIC IP66 - Type of Protection: Ex ec IIC T\* Gc . Zone 21 AEx tb IIIC . IK08 - Temperature Class: T6 to T3 Class I Zone 2 Ex ec IIC – Dust: Zones 21 and 22 NEC/CEC CERTIFICATIONS AND COMPLIANCES Zone 21 Fx th IIIC - Conforming to ATEX 2014/34/EU: II 2 D • UL Standard: UL 844; UL 1598; UL 50E; UL 8750; Type 3R, 4, 4X - Type of Protection: Ex op is tb IIIC T\*\*°C Db UL 60079-0; UL 60079-7; UL 60079-31 Ex tc IIIC T\*\*°C Dc IP66/67 . CSA Standard: C22.2 No. 0 - 10; C22.2 No. 94.2 - 15; Simultaneous Exposure Surface Temperature: +61 °C to +95 °C C22.2 No. 137 -M1981; C22.2 No. 250.0 - 08; C22.2 Suitable for Use in Wet Locations (+142 °F to +203 °F) No. 250.13 -14; C22.2 No. 60529; C22.2 No. 60079-Marine Outside Type (Salt Water) Ambient Temperature: -40 °C up to +65 °C 0:15; C22.2 No. 60079-7:16; C22.2 No. 60079-American Bureau of Shipping (ABS) (-40 °F up to 149 °F) 31:15; CSA E60598-1:16 International Dark Sky (IDA) Approved ATEX Certificate: Sira 17ATEX9365X NEMA ANSI/IEC Standards: 60529 IECEx Certificate: IECEx SIR 17.0085X cCSAus: 164460, Certificate Number: 70112879 **IECEX RATINGS** Index of Protection according EN/IEC 60529: IP66 Zone 2 and 21/22 Impact Resistance (shock): IK08 Ex ec IIC Photobiological Safety, IEC 62778 and IEC 62471: • Fx th IIIC RG0 all models . Ex op is IIIC . IP66 . IK08 BU MLG L3 2 5 1 Series: Hub Size: Light Distribution Pattern: Options: MLG - Mercmaster LED 2-3/4" NPT 1 - Type I ⑧ 1 - Photocontrol 120V (S 3 - 1" NPT 2 - Photocontrol 208V (5) Generation 3 3 - Type III ⑧ 4 - 1-1/4" NPT stanchion 5 - Type V 3 - Photocontrol 240V (5) Series 5 - 1-1/2" NPT stanchion W - Type V Wide 4 - Photocontrol 277V (5) 6 - Metric M20 Blank - No Photocontrol Blank - If using adapter or no hood (9) Mounting: Color Temperature: Voltage: A - Pendant C - Cool, 5000K BU - 120-277 Vac, 50/60Hz; or 125-300 Vdc N - Neutral, 4000K B - Watertight Pendant 🔺 BH - 347-480 Vac, 50/60Hz 🔺 C - Ceiling 6 W - Warm, 3000K D - Pendant Cone ® R - 90° Stwanchion ① S - 25° Stanchion ① T - Trunnion K - Killark™ Adapter Universal ▲ U - Mercmaster II Adapter, Ceiling or Pendant 🔺 V - Mercmaster II Adapter, Stanchion or Wall 🔺 W - Wall X - Crouse Hinds™ Adapter, Ceiling or Pendant ⑦ Y - Crouse Hinds™ Adapter, Stanchion or Wall Blank - No mounting hood Lumen (nominal): ② Globe Material: Options: ④ L3 - 3,500 P - Clear Polycarbonate Globe F - Fusing L5 - 5,500 D - Diffused Polycarbonate Globe Blank - No fusing G - Clear Glass Globe ③ L7 - 7,500 L9 - 9,500 | - Glass Prismatic Refractor 3 @ H9-9,500 H1 - 11.500 H3 - 13,500 H6 - 17,500 ① 3/4" NPT, 1" NPT and Metric M20 hub entries are not offered in this mounting option <sup>©</sup> For lumen output information, see Lumen Values Table.
- ③ Guards for the alass refractors and alobes are ordered separately. See the Accessories for more information.
- <sup>6</sup> Fusing only permitted for cCSAus rating. Factory installed. Use of fuse voids Marine Outside Type (Salt Water) rating. Fusing is mounted in the driver housing. For retrofit applications, fusing must be removed from the © Luminaires with photocontrol are not rated IP66/67, Class II, 3R, 4, 4X, or Marine Outside Type (Salt Water). Photocontrol available for 120-277 Vac only. Factory installed in the mounting hood. Photocontrols only certified for cCSAus.
- © Ceiling-mount and pendant cone mounting hoods and adapters are not designed to use the in hood photocontrol. Ceiling and pendant cone mounts must use an FS/FD box with photocontrol. Contact your local sales

APPLETON

rep for more information. ⑦ Only allowed for Type V and Type V wide light distribution.

- ® Type I and Type III use a multiple hinge housing.
- Hub size does not apply to luminaires ordered with adapters.
   I-Glass prismatic refractor is only available in light distribution pattern, Type V. Refractor is not rated for ATEX/IECEX.
- Image: Source of the second second
- Adapters, watertight pendant hood and BH Voltage only certified for CSAus. Note: IDA Dark Sky Approved when ordering [I]MLG[A/B/C/D/R/W]xxW[P/D/G]5Bxxx with MMVISOR accessory

United States: 1.800.621.1506 | Asia/Pacific: + 65.6556.1100 | Australia: + 61.3.9721.0348 Canada: + 1.888.765.2226 | China: + 86.21.3338.7000 | Europe: + 33.3.22.54.13.90 Mexico/Latin America: + 52.55.5809.5049 | Middle East/Africa/India: + 971.4.811.8100 www.masteringled.com



Appleton Grp LLC d/b/a Appleton Group. The Appleton and Emerson logos are registered in the U.S. Patent and Trademark Office. All other product or service names are the property of their registered owners. © 2019, Appleton Grp LLC. All rights reserved

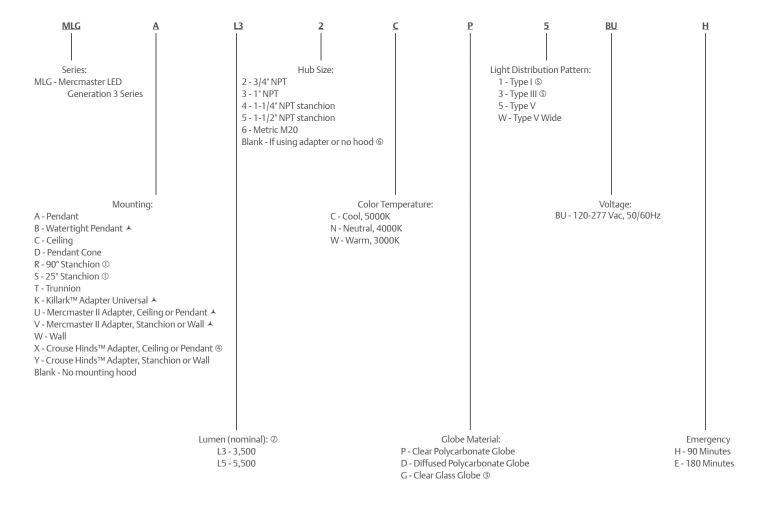
### HAZARDOUS MERCMASTER™ LED GENERATION 3 EMERGENCY BATTERY BACKUP SERIES LUMINAIRES

### **NEC/CEC RATINGS**

- Class I, Division 2, Groups A, B, C, D
- Class II, Division 1 and 2, Groups E, F, G
- Class III .
- Class I, Zone 2 IIC
- Zone 20 IIIC
- Type 3R, 4, 4X
- . IP66/67
- Simultaneous Exposure
- Suitable for Use in Wet Locations
- Marine Outside Type (Salt Water)

#### NEC/CEC CERTIFICATIONS AND COMPLIANCES

- UL Standard: UL 844; UL 1598; UL 50E; UL 8750; UL 60079-0; UL 924
- CSA Standard: C22.2 No. 0 -10; C22.2 No. 94.2 15; C22.2 No. 137 -18; C22.2 No. 250.0 - 08; C22.2 No. 250.13 -14: CSA E60598-1:16
- NEMA ANSI/IEC Standards: 60529
- . cCSAus: 164460, Certificate Number: 70182640



- 3/4" NPT, 1" NPT and Metric M20 hub entries are not offered in this mounting option
  For lumen output information, see Lumen Values Table.
  Guards for the globes are ordered separately. See the Accessories for more information.
  Only allowed for Type V and Type V wide light distribution.
  Type I and Type III use a multiple hinge housing.

- Hub size does not apply to luminaires ordered with adapters.
   Adapters only certified for cCSAus.

**APPLETON** 

United States: 1.800.621.1506 | Asia/Pacific: + 65.6556.1100 | Australia: + 61.3.9721.0348 Canada: + 1.888.765.226 | China: + 86.21.3338.7000 | Europe: + 33.3.22.54.13.90 Mexico/Latin America: + 52.55.5809.5049 | Middle East/Africa/India: + 971.4.811.8100 www.masteringled.com

