



**HAZlite™**

**americanlite®**

**We light your world™**





Safety and reliability have been the cornerstone of our business. Americanlite® is dedicated to meeting customer needs, with engineering solutions, new product development and on-time delivery in every phase of the project. This commitment underpins our proven ability to supply lower cost total system solutions and savings over the entire lifetime of a project.

Americanlite® Hazlite™ fixtures are a family of fixtures suitable for use in a wide range of indoor and outdoor Class I Division 2 applications. UL, cUL and CE certified for use in hazardous locations, providing a single solution for applications around the world. Americanlite® Hazlite™ fixtures are designed to withstand the harshest conditions and operate across your facilities without incidents.

Americanlite® Hazlite™ fixtures are ideal for indoor and outdoor general area lighting in oil & gas refineries, drilling rigs, petrochemical plants, food and beverage facilities, and other industrial applications where flammable gases, vapors, dusts, fibers or flyings are present.

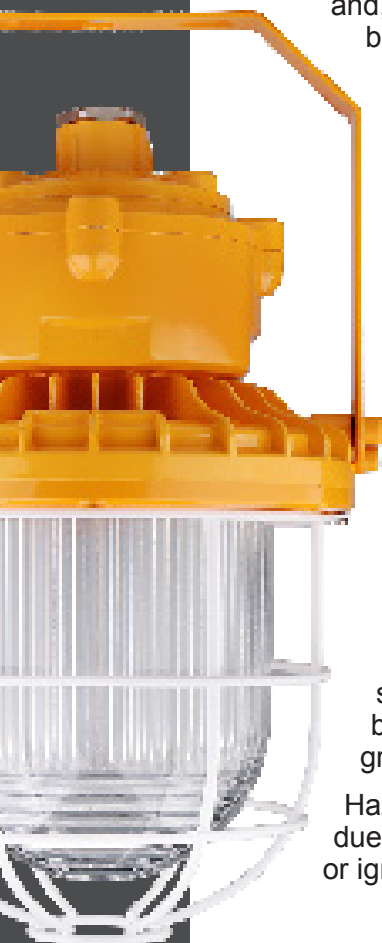
Simply because hazardous location materials are present does not mean that the conditions necessary for an explosion to occur also exist. With explosive materials several other factors must occur simultaneously to result in an explosion. Larger dust particles are often referred to as fibres or flyings and, if sufficient material is present, elevated temperatures may not cause a fire but may result in a flash fire.

Although there is the risk of an explosion with both Explosive gas and dust materials, the factors required for that to occur are somewhat different. In both cases the material needs to mix with air (to provide the oxygen required), be in specific fuel to air concentrations (flammable limits) and then encounter an ignition source with sufficient energy to start an explosion.

In reality, flammable gases and vapors and combustible dusts exist almost everywhere. Fortunately, they are usually present in quantities far less than what is required for a fire or explosion hazard to occur. Therefore, the fact that flammable gases, vapors, or combustible dust may be present does not define a hazardous location; materials must be present in sufficient quantities or concentrations that pose a risk that an explosion could occur.

Electrical equipment must be designed and manufactured in such a way that it cannot become a source of ignition when used in an explosive gas atmosphere. The code addresses this by permitting only certain types of equipment to be installed in hazardous locations (either “explosionproof” or “intrinsically safe”). Equipment that is approved for Class I, Division 1, locations has to be specifically manufactured for the intended use and must carry markings to identify that. In Class I, Division 2 locations, certain “non-hazardous” types of equipment, such as terminals and non-sparking motors, are permitted. Equipment specifically built for Class I locations will be marked to indicate where the equipment can be installed. This is discussed in greater detail below.

Hazardous locations are those locations where the risk of a fire or explosion may exist due to the presence of flammable gases or vapors, flammable liquids, combustible dust, or ignitable fibers or flyings.





In the Division System, Hazardous (Classified) Locations are divided into three Classes based on the explosive characteristics of the material. The Classes of material are further divided into “Divisions” or “Zones” based on the probability that the material will be present in sufficient quantities for an explosion could occur. The Zone system has three levels of hazard whereas the Division system has two levels.

Class I Division 2 areas are defined in the code as; “areas where flammable volatile liquids, flammable gases, or vapors are, processed, handled or used, but in which the liquids, gases, or are normally confined within closed containers or closed systems from which they can escape only as a result of accidental rupture

or breakdown of the containers or systems or the abnormal operation of the equipment”. Or, where hazardous concentrations of gases or vapors are normally prevented by positive mechanical ventilation, but which may become hazardous as the result of failure or abnormal operation of the ventilating equipment.”

The table below provides a comparison between the “Class/Division” System and the “Zone” System

EXPLOSIVE ATMOSPHERE	DIVISION SYSTEM	ZONE SYSTEM
Gases and Vapors*	Class I	Explosive Gas Atmospheres, Zones 0, 1 and 2
Combustible Dusts	Class II	Explosive Dust Atmospheres Zones 20, 21 and 22
Easily Ignited Fiber & Flyings	Class III	

\* The United States and Canada have incorporated the Zone System of Area Classification for all explosive atmospheres into their Electrical Codes

Division 2 locations also exist around Division 1 locations where there is no barrier or partition to separate the Division 1 space from a non- hazardous location, or where ventilation failure (an abnormal condition) might extend the area where flammable material is present under normal conditions.

## CLASS I LOCATIONS

### DIVISION SYSTEM GAS GROUPS A, B, C, & D

**Group A** -The highest explosion pressures of the materials grouped are generated by acetylene, the only material in Group A. Thus, explosion proof equipment designed for Group A must be very strong to withstand the explosion anticipated, and must have a very small gap between joint surfaces. Explosion proof equipment for Group A is the most difficult to design and there is less explosion proof equipment listed for this group than for any other group.

**Group B** - Group B materials produce explosion pressures somewhat less than acetylene, and the design of explosion proof enclosures for this group is somewhat less rigorous than for Group A enclosures. However, because of the very high explosion pressures in both Groups A and B, and, in particular, the very small gap between mating surfaces needed to prevent propagation of an explosion, there are no explosion proof motors listed for use in either Group A or B locations.

**Group C** - The chemical materials in Group C fall within the range between Groups B and D in both the explosion pressures generated and the gap between mating surfaces of explosion proof equipment that will prevent an explosion.

**Group D** - Group D is the most common group encountered in the field, and there is more equipment available for this group than for any other group.

## HAZRH1™ 60w / 100w / 150w

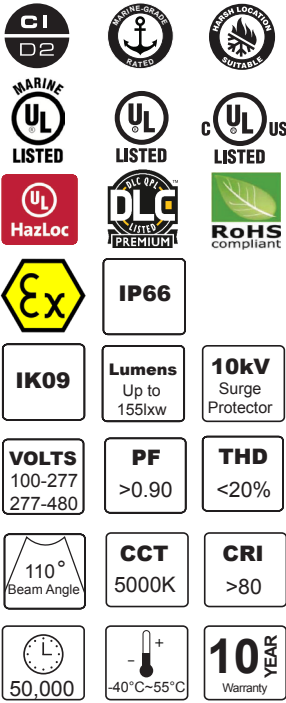


The HAZRH1™ Series round high bay, is a hazardous location family of fixtures suitable for use in a wide range of indoor and outdoor Class I Division 2 applications. Available in four options, HAZRH1™ Series can be used for ceiling, pendant, wall and surface applications, and replace traditional HID fixtures ranging from 100W to over 400W. The compact and low weight luminaires are safe and easy to use in harsh and hazardous locations where flammable, explosive vapors or gases are present. They are an ideal solution where long life and low maintenance are desired.

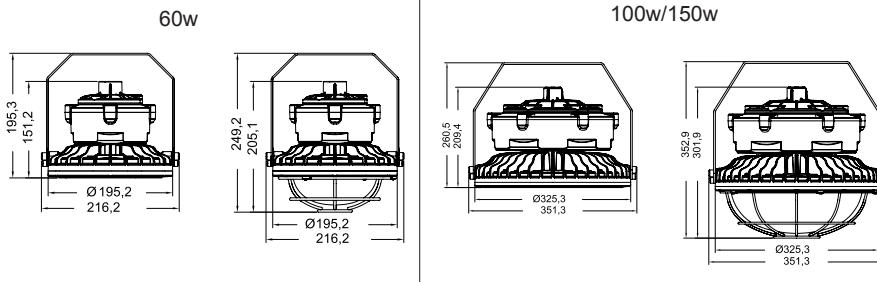
HAZRH1™ Series fixtures are built to protect, save and last longer. Fixture body made of ADC12 die casting aluminum ≤0.4% cooper-free; all screws are 304 stainless steel, flat clear lens cover is high borosilicate tempered glass, 8mm thickness. Wireguard made of SUS304 stainless steel with white powder painting, UL 1598A standard. State of the art Sosen driver, Samsung led chip SMD 2835 (0.5W); fixture entry is 3/4". All components are painted with our exclusive Duratek™ polyester powder coat finish and applied by electrostatic process, for durability and corrosion protection.

HAZRH1™ Series delivers exceptional efficiency, performance and advanced engineering. Up to 155 l x w, standard 10KV standard protection, it lowers energy consumption while providing 50,000+ hours of running lamp life. It sets the bar even higher for the lighting industry in terms of shock resistance (IK09), cold start capabilities, minimal heat production which improves service life, and overall safety. Certified for Class I, Division 2, it provides global lighting solutions for a wide range of industrial and hazardous applications.

HAZRH1™ Series is certified for use in UL, cUL and IEC hazardous locations, providing a single solution for applications around the world. These light fixtures are ideal for indoor and outdoor general area lighting in oil & gas refineries, drilling rigs, petrochemical plants, food and beverage facilities, and other industrial applications where flammable gases, vapors, dusts, fibers or flyings are present.



### Dimensions (mm)



### Tests / Certificates:

- UL844
- UL8750
- UL1598
- UL1598A
- CSA22.2 No.137.0
- CSA22.2 No.250.0
- CSA22.2 No.137.13
- EMC 2014/30/EU
- EN 55015:2013/A1:2015
- EN 61547:2009
- EN 6100-3-2:2014
- EN 61000-3-3:2013
- LVD 2014/35/EU
- EN 60598-1:2015/AC:2016
- EN 60598-2-1:1989

### Ordering information

Item	Watts	Voltage	Lumens	CCT	Housing	Options
AL570000	60w	100-277	8400	Blank	5000K	WG Wireguard
AL570001	100w	100-277	15000	3	3000K	M Marine Grade
AL570002	150w	100-277	23250	4	4000K	CE European Certification
AL570003	150w	277-480	22500	57	5700K	
AL570000WG	60w	100-277	8100	65	6500K	
AL570001WG	100w	100-277	14500			
AL570002WG	150w	100-277	22500			
AL570003WG	150w	277-480	21750			

### Notes

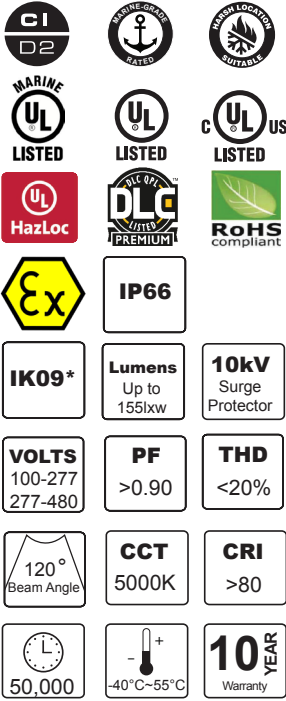
- SP 60w=6kV, 100w/150w=10kV
- CE =100-240V / II 2G Ex db IIC T6 Gb
- 6500K= No DLC
- All lumens per watt same for 4K/5K/57K/65K. 3000K: 8% less
- 60w/150w: CI D2 Group A,B,C,D. T4A
- 100w: CI D2 Group A,B,C,D. T5

### Packing information

Model	Pieces / master	Box Dimensions (cm)	CBM (Master)	Gross weight (Kg)
60w	2	50 x 25.5 x 26	0.0331	8.92
60w with Wireguard	2	50 x 25.5 x 31	0.0395	9.88
100w/150w	1	40 x 40 x 34.5	0.0552	12.35
100w/150w with Wireguard	1	40 x 40 x 44	0.0704	13.83

## HAZRH2™

60w / 100w / 150w



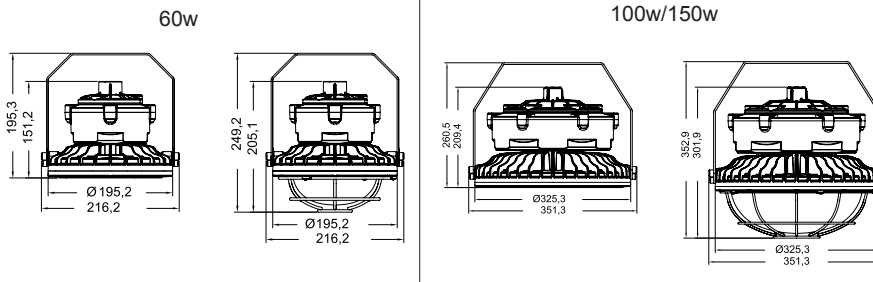
The HAZRH2™ Series round high bay, is a hazardous location family of fixtures suitable for use in a wide range of indoor and outdoor Class I Division 2 applications. Available in four options, HAZRH2™ Series can be used for ceiling, pendant, wall and surface applications, and replace traditional HID fixtures ranging from 100W to over 400W. The compact and low weight luminaires are safe and easy to use in harsh and hazardous locations where flammable, explosive vapors or gases are present. They are an ideal solution where long life and low maintenance are desired.

HAZRH2™ Series fixtures are built to protect, save and last longer. Fixture body made of ADC12 die casting aluminum ≤0.4% cooper-free; all screws are 304 stainless steel, spherical prismatic lens cover is high borosilicate tempered glass, 8mm thickness. Wireguard made of SUS304 stainless steel with white powder painting, UL 1598A standard. State of the art Sosen driver, Samsung led chip SMD 2835 (0.5W); fixture entry is 3/4". All components are painted with our exclusive Duratek™ polyester powder coat finish and applied by electrostatic process, for durability and corrosion protection.

HAZRH2™ Series delivers exceptional efficiency, performance and advanced engineering. Up to 155 l x w, standard 10KV standard protection, it lowers energy consumption while providing 50,000+ hours of running lamp life. It sets the bar even higher for the lighting industry in terms of shock resistance (IK09), cold start capabilities, minimal heat production which improves service life, and overall safety. Certified for Class I, Division 2, it provides global lighting solutions for a wide range of industrial and hazardous applications.

HAZRH2™ Series are certified for use in UL, cUL and IEC hazardous locations, providing a single solution for applications around the world. These light fixtures are ideal for indoor and outdoor general area lighting in oil & gas refineries, drilling rigs, petrochemical plants, food and beverage facilities, and other industrial applications where flammable gases, vapors, dusts, fibers or flyings are present.

### Dimensions (mm)



### Tests / Certificates:

- UL844
- UL8750
- UL1598
- UL1598A
- CSA22.2 No.137.0
- CSA22.2 No.250.0
- CSA22.2 No.137.13
- EMC 2014/30/EU
- EN 55015:2013/A1:2015
- EN 61547:2009
- EN 6100-3-2:2014
- EN 61000-3-3:2013
- LVD 2014/35/EU
- EN 60598-1:2015/AC:2016
- EN 60598-2-1:1989

### Ordering information

Item	Watts	Voltage	Lumens	CCT	Housing	Options
AL570004	60w	100-277	7800	Blank	5000K	Blank Yellow
AL570005	100w	100-277	14500	3	3000K	G Gray
AL570006	150w	100-277	23250	4	4000K	
AL570007	150w	277-480	22500	57	5700K	
AL570004WG	60w	100-277	7200	65	6500K	WG Wireguard
AL570005WG	100w	100-277	14000			M Marine Grade
AL570006WG	150w	100-277	21750			CE European Certification
AL570007WG	150w	277-480	21000			

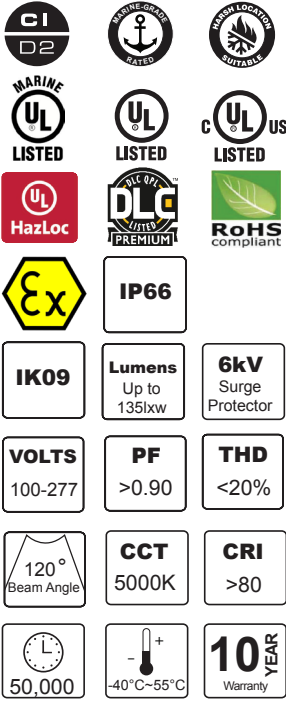
### Notes

- SP 60w=6kV, 100w/150w=10kV
- 60w=IK09 100w/150w=IK07
- CE =100-240V / II 2G Ex db IIC T6 Gb
- 6500K= No DLC
- All lumens per watt same for 4K/5K/57K/65K. 3000K: 8% less
- 60w/150w: CI D2 Group A,B,C,D. T4A
- 100w: CI D2 Group A,B,C,D. T5

### Packing information

Model	Pieces / master	Box Dimensions (cm)	CBM (Master)	Gross weight (Kg)
60w	2	50 x 25.5 x 26	0.0331	8.92
60w with Wireguard	2	50 x 25.5 x 31	0.0395	9.88
100w/150w	1	40 x 40 x 34.5	0.0552	12.35
100w/150w with Wireguard	1	40 x 40 x 44	0.0704	13.83

## HAZRH3™ 60w



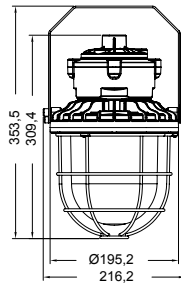
The HAZRH3™ Series round high bay, is a hazardous location family of fixtures suitable for use in a wide range of indoor and outdoor Class I Division 2 applications. HAZRH3™ Series can be used for ceiling, pendant, wall and surface applications, and replace traditional HID fixtures. The compact and low weight luminaires are safe and easy to use in harsh and hazardous locations where flammable or explosive vapors or gases are present. They are an ideal solution where long life and low maintenance are desired.

HAZRH3™ Series fixtures are built to protect, save and last longer. Fixture body made of ADC12 die casting aluminum ≤0.4% cooper-free; all screws are 304 stainless steel, “U” spherical prismatic lens cover is high borosilicate tempered glass, 8mm thickness. Wireguard made of SUS304 stainless steel with white powder painting, UL 1598A standard. State of the art Sosen driver, Samsung led chip SMD 2835 (0.5W); fixture entry is 3/4”. All components are painted with our exclusive Duratek™ polyester powder coat finish and applied by electrostatic process, for durability and corrosion protection.

HAZRH3™ Series delivers exceptional efficiency, performance and advanced engineering. Up to 135 l x w, standard 6KV standard protection, it lowers energy consumption while providing 50,000+ hours of running lamp life. It sets the bar even higher for the lighting industry in terms of shock resistance (IK09), cold start capabilities, minimal heat production which improves service life, and overall safety. Certified for Class I, Division 2, it provides global lighting solutions for a wide range of industrial and hazardous applications.

HAZRH3™ Series are certified for use in UL, cUL and IEC hazardous locations, providing a single solution for applications around the world. These light fixtures are ideal for indoor and outdoor general area lighting in oil & gas refineries, drilling rigs, petrochemical plants, food and beverage facilities, and other industrial applications where flammable gases, vapors, dusts, fibers or flyings are present.

### Dimensions (mm)



### Tests / Certificates:

- UL844
- UL8750
- UL1598
- UL1598A
- CSA22.2 No.137.0
- CSA22.2 No.250.0
- CSA22.2 No.137.13
- EMC 2014/30/EU
- EN 55015:2013/A1:2015
- EN 61547:2009
- EN 6100-3-2:2014
- EN 61000-3-3:2013
- LVD 2014/35/EU
- EN 60598-1:2015/AC:2016
- EN 60598-2-1:1989

### Ordering information

Item	Watts	Voltage	Lumens	CCT	Housing	Options
AL570008	60w	100-277	8100	Blank 5000K 3 3000K 4 4000K 57 5700K 65 6500K	Blank Yellow G Gray	WG Wireguard M Marine Grade CE European Certification
AL570008WG	60w	100-277	7800			

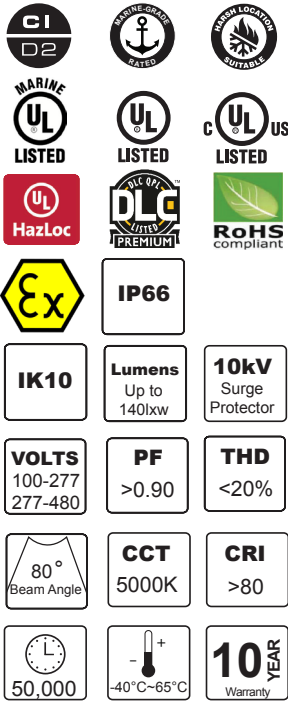
### Notes

- CE =100-240V / II 2G Ex db IIC T6 Gb
- 6500K= No DLC
- All lumens per watt same for 4K/5K/57K/65K. 3000K: 8% less
- **60w: CI D2 Group A,B,C,D. T4A**

### Packing information

Model	Pieces / master	Box Dimensions (cm)	CBM (Master)	Gross weight (Kg)
60w	2	50 x 25.5 x 41	0.0514	11.4
with Wireguard	2	50 x 25.5 x 41	0.0514	12

## HAZLH1™ 40w / 80w / 120w



HAZLH1™ Linear High Bay Series is the ideal solution for high vibration, impact and hose down applications in Class I hazardous locations.

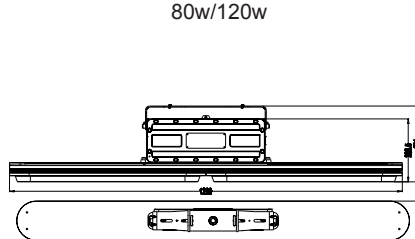
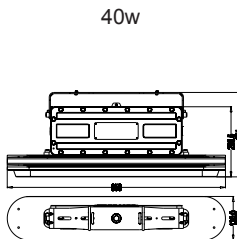
The HAZLH1™ Series is a linear LED luminaire engineered to stand up to the toughest operating conditions in Class I Division 2 environments such as petroleum refineries and grain processing facilities. A slim and lightweight profile and variety of mounting options enable this long-lasting, high-performance fixture to address virtually any lighting need in harsh and hazardous locations.

HAZLH1™ Series is designed for use in heavy industrial locations. It provides comfortable, uniform illumination in a lightweight, low profile design that comes in three lumen packages and 6 different beam patterns, delivering just the right amount of work plane brightness.

HAZLH1™ Series fixtures are built to protect, save and last longer. Fixture body made of AL6063-T5 extrusion aluminum <0.1% cooper-free, driver box made of ADC12 die casting aluminum ≤0.4% cooper-free. All screws are 304 stainless steel, flat lens cover is high borosilicate tempered glass, 6 mm thickness. Wireguard (optional) made of SUS304 stainless steel with white powder painting, UL 1598A standard. State of the art Sosen driver, Samsung led chip SMD 2835 (0.5W); All components are painted with our exclusive Duratek™ polyester powder coat finish and applied by electrostatic process, for durability and corrosion protection.

HAZLH1™ Series are certified for use in UL, cUL and IEC hazardous locations, providing a single solution for applications around the world. Oil and gas refineries, petrochemical facilities, food and beverage facilities, platforms, loading docks, tunnels, outdoor wall and stanchion mounted general area lighting, and where flammable vapors, gases, ignitable dusts, fibers or flyings are present.

### Dimensions (mm)



### Tests / Certificates:

- UL844
- UL8750
- UL1598
- UL1598A
- CSA22.2 No.137.0
- CSA22.2 No.250.0
- CSA22.2 No.137.13
- EMC 2014/30/EU
- EN 55015:2013/A1:2015
- EN 61547:2009
- EN 6100-3-2:2014
- EN 61000-3-3:2013
- LVD 2014/35/EU
- EN 60598-1:2015/AC:2016
- EN 60598-2-1:1989

### Ordering information

Item	Watts	Voltage	Lumens
AL570009	40w	100-277	5600
AL570010	80w	100-277	11200
AL570011	80w	277-480	11200
AL570012	120w	100-277	16800
AL570009WG	40w	100-277	5400
AL570010WG	80w	100-277	10800
AL570011WG	80w	277-480	10800
AL570012WG	120w	100-277	16300

CCT	Housing	Options
<b>Blank</b> 5000K	<b>Blank</b> Yellow	<b>WG</b> Wireguard
<b>3</b> 3000K	<b>G</b> Gray	<b>M</b> Marine Grade
<b>4</b> 4000K		<b>CE</b> European Certification
<b>57</b> 5700K	<b>Beam</b>	
<b>65</b> 6500K	<b>Blank</b> 80°	
	<b>B2</b> 20°	
	<b>B3</b> 30°	
	<b>B5</b> 35°	
	<b>B6</b> 60°	
	<b>B10</b> 100°x110°	

### Notes

- Housing=IK10 Glass=IK08
- CE =100-240V / II 2G Ex db IIC T6 Gb
- 6500K= No DLC
- Beam 60° & 90° 130lxw  
3000K: 8% less
- **40w: CI D2 Group A,B,C,D. T4A**
- **80w/120w CI D2 Group A,B,C,D. T5**

### Packing information

Model	Pieces / master	Box Dimensions (cm)	CBM (Master)	Gross weight (Kg)
40w	1	76 x 22 x 30.5	0.0509	12.5
80w/120w	1	141 x 22 x 30.5	0.0946	19.5

## HAZFH1™

60w / 100w / 150w



<b>CI D2</b>	<b>MARINE GRADE RATED</b>	<b>HARSH LOCATION SUITABLE</b>
<b>MARINE UL LISTED</b>	<b>UL LISTED</b>	<b>cUL US LISTED</b>
<b>HazLoc</b>	<b>DLC PREMIUM</b>	<b>RoHS compliant</b>
<b>Ex</b>	<b>IP66</b>	
<b>IK09</b>	<b>Lumens Up to 155lxw</b>	<b>10kV Surge Protector</b>
<b>VOLTS 100-277 277-480</b>	<b>PF &gt;0.90</b>	<b>THD &lt;20%</b>
<b>110° Beam Angle</b>	<b>CCT 5000K</b>	<b>CRI &gt;80</b>
<b>50,000</b>	<b>-40°C-55°C</b>	<b>10 YEAR Warranty</b>

HAZFH1™ Series floodlights consume 50% less energy than traditional HID fixtures and provides years of high-quality, maintenance-free illumination for Class I Division 2 applications. Engineered for maximum durability in harsh and hazardous locations, the flood light is marine-grade and able to operate in temperatures of up to 55°C.

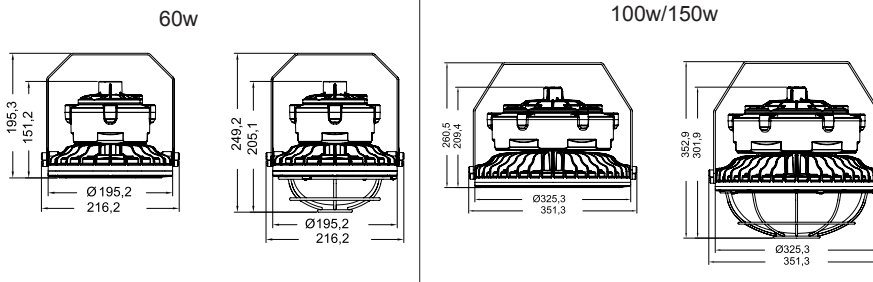
HAZFH1™ Series floodlights trunnion mount luminaires provide directional lighting in both vertical and horizontal planes when used with floodlight mounting hardware. These floodlights are ideal for outdoor wall and stanchion mounted general area lighting

HAZFH1™ Series fixtures are built to protect, save and last longer. Fixture body made of ADC12 die casting aluminum ≤0.4% cooper-free; all screws are 304 stainless steel, flat clear lens cover is high borosilicate tempered glass, 8mm thickness. Wireguard made of SUS304 stainless steel with white powder painting, UL 1598A standard. State of the art Sosen driver, Samsung led chip SMD 2835 (0.5W); fixture entry is ¾". All components are painted with our exclusive Duratek™ polyester powder coat finish and applied by electrostatic process, for durability and corrosion protection.

HAZFH1™ Series delivers exceptional efficiency, performance and advanced engineering. Up to 155 lx w, standard 10KV standard protection, it lowers energy consumption while providing 50,000+ hours of running lamp life. It sets the bar even higher for the lighting industry in terms of shock resistance (IK09), cold start capabilities, minimal heat production which improves service life, and overall safety. Certified for Class I, Division 2, it provides global lighting solutions for a wide range of industrial and hazardous applications.

HAZFH1™ Series are certified for use in UL, cUL and IEC hazardous locations, providing a single solution for applications around the world Typical applications include Oil and Gas Refineries, Petrochemical Plants, Foundries, Drilling Rigs, Pulp and Paper Mills, Food and Beverage Processing Facilities, Loading Docks, Power Plants, Water and Wastewater Treatment Facilities and other areas where corrosive, wet, dirty and tough environments are a problem.

### Dimensions (mm)



### Tests / Certificates:

- UL844
- UL8750
- UL1598
- UL1598A
- CSA22.2 No.137.0
- CSA22.2 No.250.0
- CSA22.2 No.137.13
- EMC 2014/30/EU
- EN 55015:2013/A1:2015
- EN 61547:2009
- EN 61000-3-2:2014
- EN 61000-3-3:2013
- LVD 2014/35/EU
- EN 60598-1:2015/AC:2016
- EN 60598-2-1:1989

### Ordering information

Item	Watts	Voltage	Lumens	CCT	Housing	Options
AL570013	60w	100-277	8400	Blank	5000K	<b>WG</b> Wireguard
AL570014	100w	100-277	15000	<b>3</b>	3000K	<b>M</b> Marine Grade
AL570015	150w	100-277	23250	<b>4</b>	4000K	<b>CE</b> European Certification
AL570016	150w	277-480	22500	<b>57</b>	5700K	
AL570013WG	60w	100-277	8100	<b>65</b>	6500K	
AL570014WG	100w	100-277	14500			
AL570015WG	150w	100-277	22500			
AL570016WG	150w	277-480	21750			

### Notes

- SP 60w=6kV, 100w/150w=10kV
- CE =100-240V / II 2G Ex db IIC T6 Gb
- 6500K= No DLC
- All lumens per watt same for 4K/5K/57K/65K. 3000K: 8% less
- **60w/150w: CI D2 Group A,B,C,D. T4A**
- **100w CI D2 Group A,B,C,D. T5**

### Packing information

Model	Pieces / master	Box Dimensions (cm)	CBM (Master)	Gross weight (Kg)
60w	2	50 x 25.5 x 26	0.0331	8.92
60w with Wireguard	2	50 x 25.5 x 31	0.0395	9.88
100w/150w	1	40 x 40 x 34.5	0.0552	12.35
100w/150w with Wireguard	1	40 x 40 x 44	0.0704	13.83





## Warranty

Americanlite® is pleased to provide a 10 year limited warranty covering the LED fixtures in this catalogue. Americanlite® warrants that the LED fixtures comply with Americanlite®'s published specifications and are free from defects in materials and workmanship.

All our equipment is UL, ETL or CE approved and manufactured with approved components. Americanlite® reserves the right to change or improve the design or components of any of its products due to parts availability or changes in standards, without assuming any obligation to modify any product previously manufactured and without notice. All equipment is tested and inspected before shipment.

This warranty is void if the product is operated outside of its normal operating conditions. The foregoing warranty does not apply to failures caused by acts of God or as a result of any abuse, misuse, abnormal use, or use in violation of any applicable standard, code or instructions for use in installations, including, but not limited to, those contained in the Standards for the International Electrotechnical Commission. Americanlite® reserves and has the right to examine failed lamp to determine the cause of failure, excessive lumen depreciation and patterns of usage.