

# EU-TYPE EXAMINATION CERTIFICATE

Equipment or Protective System Intended for use in Potentially Explosive Atmospheres Directive 2014/34/EU

- 1. EU-Type Examination Certificate Number: ITS18ATEX104171 Issue 02
- 2. Product: Areamaster Generation 2 LED Luminaire, model: AMLGxyzwBUm Areamaster High Lumen (HL) LED Luminaire, model: AMLHxyzwBUm Baymaster LED Luminaire, model: BLLpxyzwNBUm Baymaster High Lumen (HL) LED luminaire, model: BHLpxyzwNBUm
- 3. Manufacturer: Appleton Group LLC
- 4. Address: 9377 W Higgins Rd; Rosemont, IL 60018, USA
- 5. This product and any acceptable variation thereto is specified in the schedule to this certificate and the documents therein referred to.
- 6. Intertek Testing and Certification Limited, Notified Body number 0359 in accordance with Article 17 of Directive 2014/34/EU of the European Parliament and of the Council dated 26 February 2014, certifies that the product has been found to comply with the Essential Health and Safety Requirements relating to the design and construction of products intended for use in potentially explosive atmospheres given in Annex II of the Directive.
- 7. Compliance with the Essential Health and Safety Requirements has been assured by compliance with EN 60079-0:2012+A11, EN 60079-7:2015, EN 60079-28:2015, EN 60079-31:2014 except in respect of those requirements referred to within item 14 of the Schedule.
- **8.** If the sign "X" is placed after the certificate number, it indicates that the product is subject to the special conditions of use specified in the Schedule to this certificate.
- **9.** This EU-Type Examination Certificate relates only to the design and construction of the specified product. Further requirements of the Directive apply to the manufacturing process and supply of this product. These are not covered by this certificate.
- **10.** The marking of the product shall include the following:

II 2 D Ex op is tb IIIC T85°C/T100°C Db (certain models only – see note)



-40°C ≤ Ta ≤ +65°C IP 66/67

**Certification Officer:** 

Moss

Date:

4th Spetember 2020

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek material, product or service must first be approved in writing by Intertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA



#### EU-Type Examination Certificate Number: ITS18ATEX104171

#### 11. Description of Equipment or Protective System

The Areamaster Generation 2, Areamaster High Lumen (HL), Baymaster and the Baymaster High Lumen luminaires are made up of three main body parts, the driver housing, the LED array board(s) housing and the glass cover frame. The luminaires contain an IECEx certified LED driver (either 100W or 150W), LED array and AC/DC terminal blocks. Areamaster Generation 2/Baymaster models utilize 1 LED driver, while the Areamaster/Baymaster High Lumen (HL) models utilizes 2 LED drivers. Also, the Areamaster Generation 2/Baymaster model luminaires consist of 1 LED module, while the Areamaster/Baymaster High Lumen (HL) luminaires consist of 2 LED modules. The joints on the housing are sealed by a Silicone ring joined by vulcanization which is secured in position in a groove by RTV sealant or for the window an RTV (flexible one-piece Silicone bead) seal is secured in position using clips secured by screws.

The driver housing is comprised of a two-compartment construction, where construction one is the driver housing and compartment two is the integral wiring box. The driver housing is made from Cast Aluminum Alloy, provided with cooling fins on three of the external edges and across the top of the luminaire. The wiring compartment is supplied with two or three  $\frac{3}{-14}$  NPT threaded conduit entries (one or two sealed with a close-up plug). The cover to the wiring compartment is secured by four #8-32 x 7/8 cap pan head screws and sealed by a Silicone ring joined by vulcanization which is secured in position in a groove by RTV sealant. Inside the driver housing, the driver, wiring and terminal block(s) are secured by mechanical means.

The LED Array board housing is made from Cast Aluminum Alloy, with the external provided with cooling fins on three of the external edges. The array board housing is secured to the driver housing by four ¼-20 x 1-¼ cap hex head bolts and sealed by a Silicone ring joined by vulcanization which is secured in position in a groove by RTV sealant. Inside the array board housing, the LED array(s) is/are secured by mechanical means (via five or twelve 4-40 SS screws).

The glass cover frame is made from Cast Aluminum Alloy. The frame is fitted with either a clear or diffused (frosted) tempered low iron float glass lens, in either 174.24mm x 174.24mm or 231.14mm x 220.98mm size. The glass is secured with four #6-32 x  $\frac{1}{4}$  pan SS screws and clips. The glass is additionally sealed with RTV. The frame is secured to the array board housing by four  $\frac{1}{4}$ -20 x 1- $\frac{1}{4}$  cap hex head bolts and sealed by a Silicone ring joined by vulcanization which is secured in position in a groove by RTV sealant.

The only difference between the Areamaster Generation 2, Areamaster High Lumen, Baymaster, and the Baymaster High Lumen is the enclosure powder coating, where the Areamaster luminaires are bronze and Baymaster luminaires are gray in color.

- II 2 D Ex op is tb IIIC T85°C/T100°C Db rating pertains to the following LED luminaire constructions only:
  - Areamaster Gen 2/Baymaster with light engine (LED array) LLOMAFF-A3N201A (3000K-W), LLOMAFF-A3N602A (5000K-A), LLOMAFF-A3N202A (3000K-A), LLOMAFF-A3N601A (5000K-W), LLOMAFF-A3N601B (5000K-no optic), LLOMAFF-A3N604A (5000K-S), or LLOMAFF-A3N204A (3000K-S)

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 75A



#### EU-Type Examination Certificate Number: ITS18ATEX104171

 Areamaster/Baymaster LED High Lumen with light engine (LED array) LLOMAGA-A4N601B (5000K-no optic), LLOMAGA-A4N601A (5000K-W), LLOMAGA-A4N201A (3000K-W), LLOMAGA-A4N604A (5000K-S), or LLOMAGA-A4N204A (3000K-S)

Reference Intertek Test Report 103509278DAL-001 and partial IECEx ExTR GB/ITS/ExTR18.0032/00 for more information.

- Areamaster Gen 2/Baymaster with light engine (LED array) 59660049001 (5000K), 59660049002 (4000K), 59660049003 (3000K)
- Areamaster Gen 2/Baymaster with light engine (LED array) 59660047001 (5000K), 59660047002 (4000K), 59660047003 (3000K)
- Areamaster/Baymaster LED High Lumen with light engine (LED array) 59660048001 (5000K), 59660048002 (4000K), 59660048003 (3000K)
- Areamaster/Baymaster LED High Lumen with light engine (LED array) 59660046001 (5000K), 59660046002 (4000K), 59660046003 (3000K)

Reference Test Data within 103941167DAL-001 60079-28 checklist for more information.

| Areamaster Generation 2 Model Series<br>AMLGxyzwBUm LED luminaire               | Baymaster Model Series BLLpxyzwNBUm LED<br>luminaire  |  |  |  |  |
|---|---|--|--|--|--|
| Model code breakdown for AMLGxyzwBU:  | Model code breakdown for BLLpxyzbBU:  |  |  |  |  |
| <b>x</b> = Lumens (L6=9000 lumens, L7=15000<br>Lumens<br>or L8=19000 Lumens)    | p = Pendant Mount (P = Quick Connect<br>Pendant mount provided, Blank = no QC<br>Pendant mount)         |  |  |  |  |
| <b>y</b> = Correlated Color Temperature – CCT<br>(C=5000K, N=4000K or W=3000K)  | <b>x</b> = Lumens (L6=9000 lumens, L7=15000<br>Lumens<br>or L8=19000 Lumens)                            |  |  |  |  |
| <b>z</b> = Glass Type (G=Clear Glass or F=Frosted<br>Glass)                     | <b>y</b> = Correlated Color Temperature – CCT<br>(C=5000K, N=4000K or W=3000K)                          |  |  |  |  |
| <pre>w = Beam Pattern (6=(no optic) or 7=(with optic))</pre>                    | z = Glass Type (G=Clear Glass or F=Frosted<br>Glass)  |  |  |  |  |
| <b>m</b> = Metric M20 adaptor option (M=M20 adaptor included)                   | <ul><li>w = Beam Pattern (A=Aisle(with optic),</li><li>M=Medium(no optic), W=Wide(with optic)</li></ul> |  |  |  |  |
|   | <pre>m = Metric M20 adaptor option (M=M20<br/>adaptor included)</pre>                                   |  |  |  |  |
| Note: Option L6 utilizes the 100W driver and L7 and L8 utilize the 150W driver. |   |  |  |  |  |

The model nomenclature for the Areamaster and Baymaster LED luminaires is shown below:

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA



EU-Type Examination Certificate Number: ITS18ATEX104171

| Aodel code breakdown for BHLpxyzwNBU:<br>= Pendant Mount (P = Quick Connect<br>Pendant mount provided, Blank = no QC<br>Pendant mount)<br>= Lumens (L1=24000 lumens, L2=30000<br>umens or L3=38000 Lumens) | Lumens<br>or L8=19000 I<br>y = Correlated   |
|--|---|
| endant mount provided, Blank = no QC<br>endant mount)<br>= Lumens (L1=24000 lumens, L2=30000<br>umens or L3=38000 Lumens)  | <ul> <li>x = Lumens (Lumens<br/>or L8=19000 L</li> <li>y = Correlated<br/>(C=5000K or V</li> </ul>            |
| umens or L3=38000 Lumens)  | -   |
|  | 1   |
| r = Correlated Color Temperature – CCT<br>C=5000K, N=4000K or W=3000K)   | <b>z</b> = Glass Type<br>Glass)   |
| = Glass Type (G=Clear Glass or F=Frosted<br>Glass)   | <b>w</b> = Beam P<br>optic))  |
| <b>v</b> = Beam Pattern (W=Wide (with optic),<br>/I=Medium(no optic), N=Narrow (with optic)<br>/=Very Narrow (with optic)  |   |
| n = Metric M20 adaptor option (M=M20   |   |
| v<br>//<br>/=  | = Beam Pattern (W=Wide (with optic),<br>=Medium(no optic), N=Narrow (with optic)<br>=Very Narrow (with optic) |

#### Electrical parameters/ratings for the above luminaire models is shown below:

120 – 277 VAC, 50/60 Hz

125-300 VDC

150 W (max), 1.8A (max) for AMLG and BLL models

315 W (max), 2.7A (max) for AMLH and BHL models

#### Temperature codes assigned to each model type based on driver current is shown below:

## Areamaster Generation 2 and Baymaster models for Gas/Dust atmospheres with the following light engines (LED arrays):

LLOMAFF-A3N201A (3000K-W), LLOMAFF-A3N602A (5000K-A), LLOMAFF-A3N202A (3000K-A), LLOMAFF-A3N601A (5000K-W), LLOMAFF-A3N601B (5000K-no optic), LLOMAFF-A3N604A (5000K-S), or LLOMAFF-A3N204A (3000K-S), 59660049001 (5000K), 59660049002 (4000K), 59660049003 (3000K), 59660047001 (5000K), 59660047002 (4000K), 59660047003 (3000K)

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA



EU-Type Examination Certificate Number: ITS18ATEX104171

|                | Ex ec IIC | c ec IIC    |       |        | Ex tb/tc IIIC |        |  |
|----------------|-----------|-------------|-------|--------|---------------|--------|--|
| Ambient        | 100W      | 150W Driver |       | 100W   | 150W Driver   |        |  |
| temperature    | Driver    |             |       | Driver |               |        |  |
|                | 410mA     | 680mA       | 930mA | 410mA  | 680mA         | 930mA  |  |
| -40°C≤Ta≤+40°C | T5        | T4          | Т3    | T85°C  | T85°C         | T85°C  |  |
| -40°C≤Ta≤+55°C | T4        | Т3          | Т3    | T85°C  | T85°C         | T100°C |  |
| -40°C≤Ta≤+65°C | T4        | Т3          | T3    | T85°C  | T100°C        | T100°C |  |

## Areamaster High Lumen and Baymaster High Lumen models for Gas/Dust atmospheres with the following light engines (LED arrays):

LLOMAGA-A4N601B (5000K-no optic), LLOMAGA-A4N601A (5000K-W), LLOMAGA-A4N201A (3000K-W), LLOMAGA-A4N604A (5000K-S), or LLOMAGA-A4N204A (3000K-S), 59660048001 (5000K), 59660048002 (4000K), 59660048003 (3000K), 59660046001 (5000K), 59660046002 (4000K), 59660046003 (3000K)

|                | Ex ec IIC | -           |       | Ex tb/tc IIIC |             |        |
|----------------|-----------|-------------|-------|---------------|-------------|--------|
| Ambient        | 100W      | 150W Driver |       | 100W          | 150W Driver |        |
| temperature    | Driver    |             |       | Driver        |             |        |
|                | 530mA     | 680mA       | 915mA | 530mA         | 680mA       | 915mA  |
| -40°C≤Ta≤+40°C | Т4        | T4          | Т3    | T85°C         | T85°C       | T85°C  |
| -40°C≤Ta≤+55°C | T4        | T4          | Т3    | T85°C         | T100°C      | T100°C |
| -40°C≤Ta≤+65°C | T4        | Т3          |       | T100°C        | T100°C      |        |

## Areamaster High Lumen and Baymaster High Lumen models for Gas/Dust atmospheres where very narrow optic (3 x 3 beam) is used (AMLHxyz3BU and BHLxyzVNBU):

|                | Ex ec IIC |             |       | Ex tb/tc IIIC |             |        |
|----------------|-----------|-------------|-------|---------------|-------------|--------|
| Ambient        | 100W      | 150W Driver |       | 100W          | 150W Driver |        |
| temperature    | Driver    |             |       | Driver        |             |        |
|                | 530mA     | 680mA       | 915mA | 530mA         | 680mA       | 915mA  |
| -40°C≤Ta≤+40°C | T4        | T4          | Т3    | T100°C        | T100°C      | T100°C |
| -40°C≤Ta≤+55°C | T4        | T4          | Т3    | T100°C        | T100°C      | T100°C |
| -40°C≤Ta≤+65°C | T4        | Т3          |       | T100°C        | T100°C      |        |

#### 12. Report Number

Intertek Report: 103941167DAL-002 Issue: 1 Dated: July 24, 2019. Intertek Report: 104044732DAL-004 Issue: 2 Dated: August 6, 2020.

### 13. Special Conditions of Certification

(a). Special Conditions of Use

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA



#### EU-Type Examination Certificate Number: ITS18ATEX104171

- None
- (b). Conditions of Manufacture Routine Tests
  - Routine Dielectric Strength testing of the LED luminaires per IEC 60079-7:2015, Clause 7.1 is applicable. Dielectric strength shall be verified by test at the following test voltage and maintained for at least 1 min without dielectric breakdown occurring:

For other electrical equipment and Ex Components, where working voltages exceeding 90 V peak are present:  $(1\ 000 + 2U)$  V r.m.s. + 5/0 % or 1 500 V r.m.s. +5 0 %, whichever is greater, where U is the working voltage. The LED luminaire shall be tested as follows:

• Between inputs and ground (frame of the enclosure) – 1600V r.m.s.

Alternatively, a test shall be carried out at 1.2 times the test voltage, but maintained for at least 100ms.

• Where the equipment incorporates certified components, the manufacturer shall ensure that any changes to those components do not affect the compliance of the certified product that is the subject of this certificate.

#### 14. Essential Health and Safety Requirements (EHSRs)

The relevant Essential Health and Safety Requirements (EHSRs) have been identified and assessed in Intertek Report: 103941167DAL-002 Issue: 1 Dated: July 24, 2019 and 104044732DAL-004 Issue: 2 Dated: August 6, 2020.

| Title:  | Drawing No.: | Rev.<br>Level: | Date:      |
|---|--------------|----------------|------------|
| COVER TERMINAL BOX CASTING AREAMASTER LED<br>HIGH LUMEN | 609160       | Ν              | 10/25/2016 |
| HOUSING HEATSINK CASTING AREAMASTER LED GEN 2.0         | 609172       | L              | 8/23/2018  |
| HOUSING DRIVER CASTING AREAMASTER LED GEN 2.0           | 609173       | Р              | 05/03/2017 |
| COVER CASTING AREAMSTER LED GEN 2.0                     | 609174       | К              | 11/04/2016 |
| CLEAR TEMPERED AR COATING GLASS AREAMASTER<br>GEN 2     | 609204       | E              | 06/27/2018 |
| AREAMASTER LED GEN 2.0                                  | 615044       | E              | 06/19/2019 |
| NO MOUNT BAYMASTER LED GEN 2.0                          | 615064       | С              | 06/19/2019 |
| DIFFUSED TEMPERED AR COATING GLASS AREAMASTER GEN 2     | 615025       | D              | 06/27/2018 |
| GASKET, O-RING DIA 0.26 AREAMASTER LED                  | 615060       | D              | 06/27/2018 |
| GASKET SILICONE HOLLOW O-RING AREAMASTER LED            | 615057       | С              | 06/27/2018 |
| ZONE 2 RATED LED DRIVER (100W – BU VERSION)             | 299707455    | 05             | 06/01/2018 |

#### **15.** Drawings and Documents

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA



EU-Type Examination Certificate Number: ITS18ATEX104171

| ZONE 2 RATED LED DRIVER (150W – BU VERSION)                          | 299707456 | 05 | 06/01/2018 |
|--|-----------|----|------------|
| LED ENGINE – WIDE 3000K AREAMASTER LED – GEN 2                       | 603278    | D  | 11/20/2017 |
| LED ENGINE – AISLE 5000K AREAMASTER LED – GEN 2                      | 603279    | D  | 11/20/2017 |
| LED ENGINE – AISLE 3000K AREAMASTER LED – GEN 2                      | 603280    | D  | 11/20/2017 |
| LED ENGINE - WIDE 5000K AREAMASTER LED – GEN 2                       | 609175    | D  | 11/20/2017 |
| LED ARRAY – 5000K WITHOUT SECONDARY OPTICS<br>AREAMASTER LED – GEN 2 | 609207    | С  | 11/20/2017 |
| LED ENGINE – AISLE WIDE 5000K AREAMASTER LED –<br>GEN 2              | 615038    | В  | 11/20/2017 |
| LED ENGINE – AISLE WIDE 3000K AREAMASTER LED –<br>GEN 2              | 615039    | В  | 11/20/2017 |
| AREAMASTER HIGH LUMEN ARRAY LAYOUT                                   | 634611    | Α  | 10/13/2017 |
| AREAMASTER/BAYMASTER LED GEN2 LED ARRAY<br>BOARD                     | 637008    | А  | 11/20/2017 |
| THREADED PLUG – SQUARE RECESS  | 503712    | С  | 10/31/2016 |
| G5-3 FACTORY WIRING TERMINAL PHOENIX G5/3-EX-<br>2703172             | 609194    | С  | 10/25/2016 |
| FERMINAL BLOCK PHOENIX UT-4, 3044                                    | 609197    | С  | 08/23/2018 |
| TERMINAL BLOCK PHOENIX UT4-PE 3044128                                | 609198    | С  | 08/23/2018 |
| END CLAMP-CLIPFIX 35-5 PHOENIX #3022276                              | 609199    | В  | 10/25/2016 |
| SHUNT PHOENIX CONTACT TYPE FBS 2-6 3030336                           | 609196    | В  | 07/17/2017 |
| *SILICON ADHESIVE/SEALANT RTV – GENERAL<br>PURPOSE                   | 669014    | Ρ  | 03/21/2019 |
| CONDUCTIVE COMPOUND  | 669166    | В  | 09/28/2017 |
| AREAMASTER LED HIGH LUMEN AND GEN 2<br>NAMEPLATE LABEL               | 663474    | E  | 12/11/2018 |
| BAYMASTER LED HIGH LUMEN AND GEN 2 NAMEPLATE<br>LABEL                | 663475    | D  | 12/11/2018 |
| *AREAMASTER LED HIGH LUMEN AND GEN 2 IECEX<br>NAMEPLATE LABEL        | 663476    | D  | 07/24/2020 |
| *BAYMASTER LED HIGH LUMEN AND GEN 2 IECEX<br>NAMEPLATE LABEL         | 663477    | D  | 07/24/2020 |
| SERIAL NUMBER NAMEPLATE  | 663570    | Α  | 10/2/2017  |
| THERMAL PAD FOR AMLED GEN2 ZONE2                                     | 606204    | С  | 01/04/2018 |
| THERMAL PAD FOR AMLED HL ZONE2                                       | 606206    | С  | 01/04/2018 |
| COVER SUB ASSEMBLY AREAMASTER LED HIGH LUMEN                         | 618367    | А  | 07/17/2018 |
|  | 610266    | А  | 07/17/2018 |
| COVER SUB ASSEMBLY AREAMASTER LED GEN 2                              | 618366    | ~  | 0,,1,,2010 |

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA Registered No 3272281 Registered Office: Academy Place, 1-9 Brook Street, Brentwood, Essex, CM14 5NQ.



#### EU-Type Examination Certificate Number: ITS18ATEX104171

| <i>//</i>   |            |    |            |
|---|------------|----|------------|
| DRIVER HOUSING & GASKET SUBASSEMBLY<br>AREAMASTER LED HIGH LUMEN                            | 609255     | В  | 09/04/2017 |
| LED ENGINE SUBASSEMBLY AREAMASTER /<br>BAYMASTER LED HIGH LUMEN                             | 609257     | С  | 12/22/2017 |
| NO MOUNT BAYMASTER LED HIGH LUMEN   | 609354     | С  | 06/19/2019 |
| AREAMASTER LED HIGH LUMEN   | 615043     | С  | 06/19/2019 |
| *Installation Instructions for Appleton Areamaster High<br>Lumen LED Luminaire – Yoke Mount | 650525-000 | н  | 01/30/2020 |
| *Installation Instructions for Appleton Areamaster GEN<br>2 LED Luminaire – Yoke Mount      | 650525-001 | G  | 01/30/2020 |
| *Installation Instructions for Appleton Baymaster HL<br>LED Luminaire – No Mount            | 650547-000 | F  | 04/20/2020 |
| *Installation Instructions for Appleton Baymaster LED<br>Luminaire – No Mount               | 650547-001 | F  | 04/20/2020 |
| LED ENGINE – WIDE 3000K<br>AREAMASTER LED – HIGH LUMEN                                      | 603270     | D  | 11/20/2017 |
| LED ENGINE – WIDE 5000K<br>AREAMASTER LED – HIGH LUMEN                                      | 609165     | D  | 11/20/2017 |
| LED ENGINE – NARROW 3000K<br>AREAMASTER LED – HIGH LUMEN                                    | 603271     | D  | 11/20/2017 |
| LED ENGINE – NARROW 5000K<br>AREAMASTER LED – HIGH LUMEN                                    | 609166     | D  | 11/20/2017 |
| LED ARRAY – 5000K WITHOUT SECONDARY OPTICS<br>AREAMASTER LED – HIGH LUMEN                   | 609206     | с  | 11/20/2017 |
| LED ENGINE – AISLE WIDE 5000K<br>AREAMASTER LED – HIGH LUMEN                                | 615036     | В  | 11/20/2017 |
| LED ENGINE – AISLE WIDE 3000K<br>AREAMASTER LED – HIGH LUMEN                                | 615037     | В  | 11/20/2017 |
| LED LENS 3X3 PATTERN BAYMASTER LED  | 615051     | С  | 01/15/2018 |
| 3/4" NPT TO M20 REDUCER   | 609399     | 01 | 11/13/2018 |
| *HOOD AND GASKET SUBASSEMBLY BAYMASTER LED  | 609270     | С  | 02/14/2020 |
| *ADAPTOR SUBASSEMBLY BAYMASTER LED  | 609290     | А  | 07/12/2017 |
| *DRIVER HOUSING & ADAPTOR ASSEMBLY BAYMASTER<br>LED GEN2                                    | 609293     | А  | 07/13/2017 |
| *PENDANT HOOD ASSEMBLY BAYMASTER LED  | 609294     | В  | 11/22/2017 |
| *HOOD, PENDANT MOUNT CASTING QUICK CONNECT  | 615063     | В  | 12/12/2017 |
| *TERMINAL BLOCK ASSEMBLY  | 610621     | М  | 02/24/2020 |
|   |            |    |            |

Note: An \* is included before the title of documents that are new or revised.

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek material, product or service must first be approved in writing by Intertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 TSA



EU-Type Examination Certificate Number: ITS18ATEX104171

#### 16. Details of Certificate changes Issue 1

Revision of the existing certificate is in order to add the following light engines (LED arrays) to the equipment construction:

- Areamaster Gen 2/Baymaster with light engine (LED array) 59660049001 (5000K), 59660049002 (4000K), 59660049003 (3000K)
- Areamaster Gen 2/Baymaster with light engine (LED array) 59660047001 (5000K), 59660047002 (4000K), 59660047003 (3000K)
- Areamaster/Baymaster LED High Lumen with light engine (LED array) 59660048001 (5000K), 59660048002 (4000K), 59660048003 (3000K)
- Areamaster/Baymaster LED High Lumen with light engine (LED array) 59660046001 (5000K), 59660046002 (4000K), 59660046003 (3000K)

All light engines (LED arrays) have been evaluated with secondary LED array optics (lens).

Also, the above specified LED array models intruduce 4000K color temperature option to the luminaire construction.

#### **Details of Certificate changes Issue 2**

Reference Intertek Report: 104044732DAL-004 Issue: 2 Dated: August 6, 2020 for more details.

Changes made to the previously evaluated Areamaster/Baymaster Generation 2 (Gen 2)/LED and Areamaster/Baymaster High Lumen (HL) LED luminaires encompasses the following:

- 1) Addition of the Quick Connect feature to the luminaire enclosure for the purpose of pendant hood mounting. The Quick Connect assembly consists of the following:
  - Pendant Hood made out of the same aluminium material as the LED luminaire enclosure. Each Pendant Hood contains the same powder coating as its associated enclosure (gray for Baymaster luminaires). The Pendant Hood also houses a polymeric terminal block with copper contacts, as well as a polymeric strain relief and a grounding screw. Polymeric terminal block is secured within the Pendant Hood utilizing 2 set screws, where the strain relief is mechanically secured to the polymeric terminal block (via clips). The strain relief may or may not be utilized with this assembly. The gasket utilized with the Pendant Hood (connection between the Pendant Hood and Quick Connect Adaptor) is Parker, or Sur-Seal molded gasket, which is further secured to the Pendant Hood body via RTV seal/adhesive. Pendant Hood is connected to the power junction box (in the field) via a ¾" threaded conduit which is also secured via a set screw.
  - Quick Connect Adaptor made out of the same aluminium material as the LED luminaire enclosure. Each Quick Connect Adaptor contains the same powder coating as its associated enclosure (gray for Baymaster luminaires). Quick Connector Adaptor also houses a polymeric connector block (for the polymeric terminal block housed within the Pendant Hood), with a copper contact which provides connection to the Pendant Hood polymeric

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 75A



terminal block. Polymeric connector block is secured within the Quick Connector Adaptor using 2 set screws. Quick Connector Adaptor is secured to the Pendant Hood via a mechanical retention (twist lock mechanism), as well as a set screw. Connection between the Quick Connector Adaptor and the main enclosure body is sealed via a gasket Midwest Sealing Products closed cell silicone sponge (further secured to the enclosure body via RTV seal/adhesive) and secured via 3 screws.

o Addition of assembly location:

Emerson Climate Technologies Arabia Building No. 7874 Unit No. 1 Dammam 34332-3620, Saudi Arabia

| Title:   | Drawing No.: | Rev. Level: | Date:      |
|--|--------------|-------------|------------|
| HOOD AND GASKET SUBASSEMBLY<br>BAYMASTER LED   | 609270       | С           | 02/14/2020 |
| ADAPTOR SUBASSEMBLY BAYMASTER LED  | 609290       | A           | 07/12/2017 |
| DRIVER HOUSING & ADAPTOR ASSEMBLY<br>BAYMASTER LED GEN2  | 609293       | A           | 07/13/2017 |
| PENDANT HOOD ASSEMBLY BAYMASTER LED  | 609294       | В           | 11/22/2017 |
| HOOD, PENDANT MOUNT CASTING QUICK<br>CONNECT   | 615063       | В           | 12/12/2017 |
| *SILICON ADHESIVE/SEALANT RTV – GENERAL<br>PURPOSE   | 669014       | Р           | 03/21/2019 |
| *TERMINAL BLOCK ASSEMBLY   | 610621       | Μ           | 02/24/2020 |
| *Installation Instructions for Appleton<br>Areamaster High Lumen LED Luminaire – Yoke<br>Mount | 650525-000   | н           | 01/30/2020 |
| *Installation Instructions for Appleton<br>Areamaster GEN 2 LED Luminaire – Yoke<br>Mount      | 650525-001   | G           | 01/30/2020 |
| *Installation Instructions for Appleton<br>Baymaster HL LED Luminaire – No Mount               | 650547-000   | F           | 04/20/2020 |
| *Installation Instructions for Appleton<br>Baymaster LED Luminaire – No Mount                  | 650547-001   | F           | 04/20/2020 |
| *AREAMASTER LED HIGH LUMEN AND GEN 2<br>IECEX NAMEPLATE LABEL                                  | 663476       | D           | 07/24/2020 |
| *BAYMASTER LED HIGH LUMEN AND GEN 2<br>IECEX NAMEPLATE LABEL                                   | 663477       | D           | 07/24/2020 |

2) Addition of the following control drawings to the list of the existing control drawings:

<u>Note</u>: An \* is included before the title of documents that are revised.

This Certificate is for the exclusive use of Intertek's client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this Certificate. Only the Client is authorized to permit copying or distribution of this Certificate and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tertek. Intertek Testing & Certification Limited, Cleeve Road, Leatherhead, Surrey, KT22 7SA