

MARINE DIVISION

17 bis Place des Reflets - La Défense 2
92400 Courbevoie - France

Tel. 33 1 42 91 52 91
Fax. 33 1 42 91 28 94
www.veristar.com



Certificate number: 05605/A2 EC

File number : ACE 09/160/01 + ACI
5500/001/001

Annex A1 Item number : A.1/3.40

This certificate is not valid when presented without the full attached schedule composed of 7 sections

EC TYPE EXAMINATION CERTIFICATE

*as per Module B of European Union Council Directive 96/98/EC on marine equipment
as last amended by Commission Directive 2002/75/EC of 2 September 2002*

This certificate is issued to

THOMAS & BETTS LTD.

Chelmsford - UNITED KINGDOM

for the type of product

LOW-LOCATION LIGHTING SYSTEMS (COMPONENTS ONLY)

LOW LOCATION LIGHTING (LLL) type "Guide-Lite"

Regulations and standards :

SOLAS 74, as amended (last amendment) Regulations II-2/13.3.2.5.1, II-2/13.3.2.5.2 - IMO Resolution MSC.98 (73) Chapter 11 (FSS Code) - IMO Resolution A.752 (18) - ISO 15370 (2001).

This certificate is issued under the French Maritime Authority to attest that BUREAU VERITAS did undertake the relevant type-examination procedures for the product identified above which was found to comply with the relevant requirements of the Council Directive 96/98/EC of 20 December 1996 as amended



This certificate is valid until : 04 Aug 2010

At Paris la Défense, on : 21 Dec 2007

For BUREAU VERITAS, Notified Body N°0062

By order of the Secretary

L.COURREGELONGUE

Approval office



Local office : BV LONDON

Surveyor : S. Yule



This certificate does not allow to issue the Declaration of Conformity and to affix the mark of conformity (wheelmark) to the products corresponding to this type. To this end, the production-control phase module (D, E or F) of Annex B of the Directive is to be complied with and controlled by a written inspection agreement with a notified body.

This certificate remains valid until the date stated above, unless cancelled or revoked, provided the conditions indicated in the subsequent page(s) are complied with and the product remains satisfactory in service. This certificate will not be valid if the applicant makes any changes or modifications to the approved product, which have not been notified to, and agreed in writing with BUREAU VERITAS. Should the specified regulations or standards be amended during the validity of this certificate, the product(s) is/are to be re-approved prior to it/they being placed on board vessels to which the amended regulations or standards apply. BUREAU VERITAS S.A. is designated by the French Maritime Authority as a "notified body" under the terms of the French Regulations Division 140 Chapter 140-2. This certificate is issued within the scope of the General Conditions of BUREAU VERITAS Marine Division. Any Person not a party to the contract pursuant to which this document is delivered may not assert a claim against BUREAU VERITAS for any liability arising out of errors or omissions which may be contained in said document, or for errors of judgement, fault or negligence committed by personnel of the Society or of its Agents in establishment or issuance of this document, and in connection with any activities for which it may provide.

THE SCHEDULE OF APPROVAL

1. PRODUCT DESCRIPTION :

"Guide-LITE": Low Level, Linear Emergency Lighting System (LLL)

Type EL (electrically powered)

Type	Part N°	Description
Indicator	GLEX-IND7	Led indicator exit vertical
Module	GBD12/2 GBD12/G/3	1200 mm LED MODULE
Module	GBD18/2 GBD18/G/3	1800 mm LED MODULE
Module	GBD2/2 GBD2/G/3	160 mm LED MODULE
Module	GB24/2 GBD24/G/3	2400 mm LED MODULE
Module	GBD3/2 GBD3/G/3	260 mm LED MODULE
Module	GBD6/2 GBD6/G/3	600 mm LED MODULE
Module	SCD12/2	1160 mm LED MODULE
Module	SCD6/2	560 mm LED MODULE
Module	SCDA/R/2	LED ARROW MODULE - RED
Module	SCHM512/2	Lamp Module - High Brightness
Module	SCHM712/2	Lamp Module - High Brightness
Module	SCM1/2	Lamp Module
Module	SCM12/2	Lamp Module
Module	SCM2/2	Lamp Module
Module	SCM3/2	Lamp Module
Module	SCM4/2	Lamp Module
Module	SCM5/2	Lamp Module
Module	SCM6/2	Lamp Module

Type	Part N°	Description
Connector	SCC/ES/2	Module End Stop MK2
Connector	SCC/J/2	Connector Joiner MK2
Connector	SCC1100/2	1100 mm BRIDGING CONNECTOR
Connector	SCC1300/2	Bridging Connector
Connector	SCC150/2	Bridging Connector
Connector	SCC150/L/T/2	Bridging Connector -LH
Connector	SCC150/R/T/2	Bridging Connector - RH
Connector	SCC150/X/2	150 mm CROSS CONNECTOR
Connector	SCC1500/2	Bridging Connector
Connector	SCC300/2	BRIDGING CONNECTOR
Connector	SCC3000/2	3000 mm BRIDGING CONNECTOR
Connector	SCC400/2	Bridging Connector
Connector	SCC50/2	Bridging Connector
Connector	SCC600/2	Bridging Connector
Connector	SCC6000/2	SCC BRIDGING CONNECTOR 6000 MM
Connector	SCC80/L/T/2	80 mm BRIDGING CONNECTOR-LEFT
Connector	SCC80/R/T/2	80 mm BRIDGING CONNECTOR-RIGHT
Connector	SCC8000/2	8000 mm BRIDGING CONNECTOR
Connector	SCC85/2	Bridging Connector
Connector	SCIP4000/L/2S	Input Connector - SILICON
Connector	SCIP4000/R/2S	Input Connector - SILICON

Type	Part N°	Description
Module Spacer	GLP125	25 mm Infill Spacer - Grey
Module Spacer	GLP180	90 Degree Infill Spacer - Grey
Module Spacer	GLP2400	INFILL SPACER (2.4M)
Module Spacer	GLP40	Infill Spacer - Grey

Type	Part N°	Description
Profile	GLA10	CARPET TO WALL PROFILE
Profile	GLA15	GLAD10 CARPET TO WALL WITH GRIP
Profile	GLA20	2.4 m Extrusion - Mill
Profile	GLA32	2.4 m Extrusion - Mill
Profile	GLA35	2.4 m Extrusion - Mill EXI 104
Profile	GLA45	2.4 m Extrusion - Mill
Profile	GLA46	2.4 m Extrusion - Mill
Profile	GLA60	CARPET TO CARPET PROFILE 2.4 m
Profile	GLA65	GLA60 CARPET/CARPET WITH GRIP
Profile	GLA80	2.4 m EXTRUSION
Profile	GLA84	2.4 m Extrusion - Mill
Profile	GLA85	2.4 m Extrusion - Mill
Profile	GLA86	2.4 m Extrusion - Mill
Profile	GLA87	CARPET TO CARPET PROFILE-ALUM
Profile	GLA90	2.4 m Extrusion - Mill
Profile	GLA90/TWIN	2.4 mtr TWIN ANGLED PROFILE
Profile	GLABS46/B	ABS EDGE RAIL - BLACK
Profile	GLABS46/BE	ABS EDGE RAIL - BEIGE
Profile	GLABS46/G	ABS EDGE RAIL - GOLD
Profile	GLABS46/GY	ABS EDGE RAIL - GREY
Profile	GLABS46/W	ABS EDGE RAIL - WHITE
Profile	GLABS86/B	ABS CARPET THRESHOLD - BLACK
Profile	GLABS86/G	ABS CARPET THRESHOLD - GOLD
Profile	GLABS89/GY	ABS CARPET THRESHOLD - GREY
Profile	GLABS89/GY	ABS CARPET THRESHOLD - GREY

Type	Part N°	Description
Profile Endstop	GLA32/ES	GLA32 End Stop
Profile Endstop	GLA35/ES/L	GLA35 LH End Stop
Profile Endstop	GLA35/ES/R	GLA35 RH End Stop - Mill
Profile Endstop	GLA45/ES	GLA45 End Stop - Mill
Profile Endstop	GLA46/ES	GLA46 End Stop
Profile Endstop	GLA46/RAMP/ESK	GLA46/RAMP END STOP KIT
Profile Endstop	GLA85/ES	End Stop - Mill
Profile Endstop	GLA86/ES	End Stop - Mill
Profile Endstop	GLA90/ES	GLA90 END STOP
Profile Endstop	GLPC86	CORNER MOULDING
Profile Endstop	GLPINT90	GLP/INT/90 CORNER SPACER

Type	Part N°	Description
Power Supplies	GPS2206.5TB	200V AC/200V DC PSU WHITE BATTE

2. DOCUMENTS AND DRAWINGS :

Existalite drawings: M105069, M105072C, C105068C, H105063C, M105060C, all dated 93-07-20 - GLI/001 SMC module GLI/400 SCD/T/MII module, GLI/200 SCHM module all dated 1993-10-26 - GLP-40, GLP-80, GLP-125 all dated 1992-07-08 - GLA-45 dated 1992-07-01 - MOD025, MOD021, MOD022, MOD019, MOD047, MOD 059, PRO004, PRO030, PRO034.

3. TEST REPORTS :

Test report issued by BSI referenced 188371/2-2 dated 1991-03-23
 Test report issued by BSI referenced 188371/1-2 dated 1992-03-23
 Test report issued by GEC Ferranti referenced ETL/R1236 dated 1992-08-10
 Test report issued by GEC Ferranti referenced ETL/R1235 dated 1992-07-10
 Test report issued by BSI referenced 247/4659993 dated 25/02/05
 Test report issued by BSI referenced 247/4237647 dated 02/07/01(as per ISO 15370:2001 § 4.3.3.2)
 Test report issued by BSI referenced 288/4659995 dated 11/02/05
 Test report issued by BSI referenced 228/4659994 dated 03/03/05
 Test report issued by BSI referenced 247/4637804 dated 21/01/05

4. APPLICATION / LIMITATION :

4.1 - The arrangement of L.L.L. and layout shall be submitted, in accordance with SOLAS amendments A.752 (18). The electrical circuit should be arranged so that failure of any single light, lighting strip, or battery will not result in the marking being ineffective.

4.2 - Approval valid for ships having to comply with SOLAS 74 Convention, as amended, and for units having to comply with IMO Resolution A649. (The "MODU Code").

4.3 - Drawings showing location and arrangement of the light fittings are to be submitted for review in each case.

4.4 - Exposed LLL strip material shall satisfy IMO FTP code Parts 2 & 5 criterias for smoke and toxicity and low-flame spread characteristics .

4.5 - The lights or lighting assemblies are to be continuous except as interrupted by constructional constraints, such as corridors or cabin doors, etc... and are to provide a visible delineation along the escape route and, where applicable, are to lead to the exit door handles. Interruption of the LLL system, due to constructional constraints is not to exceed 2 meters.

4.6 - The lighting is to be provided on at least one side of the corridor or stairway. In corridors and stairways, in excess of 2 meters width, lighting is to be provided on both sides.

4.7 - In corridors the lighting is to be installed either on the bulkhead within 300 mm of the deck or alternatively, on the deck within 150 mm of the bulkhead.

4.8 - In stairways the lighting is to be installed within 300 mm above the steps such that each step may be readily identified from either above or below that step. The top and bottom steps are to be further identified to show that there are no further steps.

4.9 - In all passenger cabins, a notice explaining the LLL system should be installed on the inside of the cabin door. It should also have a diagram showing the location of, and the way to, the two closest exits with respect to the cabin.

5. PRODUCTION SURVEY REQUIREMENTS :

This certificate does not allow the applicant to issue the Declaration of Conformity and to affix the mark of conformity (wheelmark) to the products corresponding to this type. To this end, the production-control phase module D "Production Quality Assurance" or E "Product Quality Assurance" or F "Product Verification" of Annex B of the Directive is to be complied with and controlled by a written inspection agreement with a Notified Body.

6. MARKING OF PRODUCT :

Maker's name or trade mark,

Serial number of the units,

Equipment type number or model identification under which it was type-tested.

Markings as per MED 96/98/EC when authorized by a Notified Body:

☒ YYYY/XX where YYYY is the number of the Notified Body undertaking surveillance module (when BV, 0062) and where XX are the last two digits of year mark affixed.

7. OTHERS :

7.1 - This approval is given on the understanding that the Society reserves the right to require check tests to be carried out on the units at any time and that **Thomas & Betts LTD, Chelmsford - United Kingdom**, will accept full responsibility for informing shipbuilders, shipowners or their sub-contractors of the proper methods of use and general maintenance of the units and the conditions of this approval.

7.2 - This certificate supersedes EC Type Examination Certificate N° 05605/A1 EC issued on 04/08/2005 by the Society.

*** END OF CERTIFICATE ***