

CERTIFICATE OF TYPE APPROVAL

This is to certify that

The product detailed below will be accepted for compliance with the applicable Lloyd's Register Rules and Regulations and with the International Convention for the Safety of Life at Sea, (SOLAS), 1974, as amended, for use on ships and offshore installations classed with Lloyd's Register, and for use on ships and offshore installations when authorised by contracting governments to issue the relevant certificates, licences, permits etc.

Manufacturer	Daniamant Limited
Address	Unit 3, The Admiral Park Airport Service Road Hilsea Portsmouth Hampshire, PO3 5RQ United Kingdom (UK)
Product Type	LIFERAFT LIGHTS
Product Description	Mechanically activated position indicating light for use on liferafts - Type: "RL5 (Daniamant)"
Specified Standards	IMO Resolution MSC.81(70) Part 1 as amended by Resolution MSC.226(82)

The attached Design Appraisal Document forms part of this certificate.
This certificate remains valid unless cancelled or revoked, provided the conditions in the attached Design Appraisal Document are complied with and the equipment remains satisfactory in service.

Date of issue 24 March 2011

Expiry date 23 March 2016

Certificate No. SAS S110052

Signed



Sheet No 1 of 3

Name

L. Thomas
Surveyor to Lloyd's Register EMEA
A Member of the Lloyd's Register Group

Note:

This certificate is not valid for equipment, the design or manufacture of which has been varied or modified from the specimen tested. The manufacturer should notify Lloyd's Register of any modification or changes to the equipment in order to obtain a valid certificate.

"Lloyd's Register, its affiliates and subsidiaries and their respective officers, employees or agents are, individually and collectively, referred to in this clause as the 'Lloyd's Register Group'. The Lloyd's Register Group assumes no responsibility and shall not be liable to any person for any loss, damage or expense caused by reliance on the information or advice in this document or howsoever provided, unless that person has signed a contract with the relevant Lloyd's Register Group entity for the provision of this information or advice and in that case any responsibility or liability is exclusively on the terms and conditions set out in that contract."

DESIGN APPRAISAL DOCUMENT

Date 24 March 2011	Quote this reference on all future communications LDSO/TA/SFS/LT
-----------------------	---

ATTACHMENT TO CERTIFICATE OF TYPE APPROVAL No. SAS S110052

The undernoted documents have been appraised for compliance with the relevant requirements of International Conventions, and this Design Appraisal Document forms part of the Certificate.

EXAMINED DOCUMENTATION

- Daniamant Technical Manual TF011, RL5 Liferaft Light - Revision 02.
- Installation and maintenance instructions, Document No: 48-135 issue 2

TEST REPORTS

<u>Report No.</u>	<u>Report Title or Test Description</u>	<u>Date</u>
No. 010-06	RL5 Complete Evaluation and Test Report	15.06.2006
No. 08-10	RL5 Tested to meet the requirements of MSC.226(82), witnessed by LR Surveyor	26.03.2008
11-01 issue 2	Test report for RL5 with modified 8 LED external light assembly.	16.03.2011

CONDITIONS OF CERTIFICATION

- a) For use with SOLAS approved liferafts:
 - b) Certified for use with the battery described in the drawing no. 90-1000D listed above.
 - c) Certified for use with the battery "Type CR17505" Daniamant ApS Control number 5024"
1. The battery/light unit must be replaced on or before the expiry date marked on its labels. The date of expiry shall not exceed 50% of the service life of the battery as established by the battery manufacturer.
 2. Each light is to be marked with the information required by the LSA Code Regulation 1.2.2.9 and ISO 24408 Paragraph 4.3.
 3. Detailed fitting, operation and disposal instructions are to be provided to each purchaser of the subject lights. As prescribed by SOLAS Regulation III/35 one or more additional copies shall be provided for inclusion in the vessel's Training Manual.
 4. The arrangements and installation of the lights on board are not part of this design appraisal or certificate and are to be to the satisfaction of the Surveyors attending on board.
 5. If the specified standards are amended during the validity of this certificate, this product type is to be re-approved prior to it being supplied to vessels to which the amended standards apply.

DESIGN APPRAISAL DOCUMENT

Date 24 March 2011	Quote this reference on all future communications LDSO/TA/SFS/LT
-----------------------	---

ATTACHMENT TO CERTIFICATE OF TYPE APPROVAL No. SAS S110052

6. Production items are to be manufactured in accordance with a quality control system which shall be maintained to ensure compliance with SOLAS Regulation III/5.
7. Production tests are to be conducted in accordance with the applicable requirements of IMO Resolution MSC.81(70), Part 2, Paragraph 1.2 and ISO 24408:2005 Annexe A-Production testing and inspection procedures. This does not preclude any further testing to additional requirements of the Marine Administration of the country where the ship is registered (i.e. the flag state) or those acting on behalf of that Administration.
8. Should a change of Place of Production from that stated below be required i.e. where the stages of manufacture/assembly/testing of this product take place, the new Place of Production is to be advised to us prior to the change taking place. This Certificate will require to be updated for Approval to be maintained.

NOTE: Manufacturer operates a Quality Assurance system in accordance with ISO 24408(2005) as listed in MED Directive 2009/26/EC.

PLACES OF PRODUCTION

Daniamant Limited
Unit 3, Admiral Park
Airport Service Road
Portsmouth
Hampshire, PO3 5RQ
United Kingdom (UK)

and

Daniamant ApS
Industrivej 24C
3550 Slangerup
Denmark


Lloyd's Register EMEA
Southampton Office

L. Thomas
Senior Surveyor
Statutory Fire & Safety
London Design Support Office
Lloyd's Register EMEA

Supplementary Type Approval Terms and Conditions

This certificate and Design Appraisal Document relates to type approval, it certifies that the prototype(s) of the product(s) referred to herein has/have been found to meet the applicable design criteria for the use specified herein, it does not mean or imply approval for any other use, nor approval of any products designed or manufactured otherwise than in strict conformity with the said prototype(s).