

# DET NORSKE VERITAS

## TYPE APPROVAL CERTIFICATE

CERTIFICATE NO. LB-427

This is to certify that the Line-throwing appliances

with type designation(s) **Pneumatic Line Thrower Rescue 230** 

Manufactured by **Restech Norway AS** BODØ, Norway

is found to comply with SOLAS as amended. LSA Code as amended. IMO Resolution MSC.81(70) as amended

> Application Approved for use as Line Throwing appliances onboard ships.

Høvik, 2012-11-29 for Det Norske Veritas AS

Petter Langne

Head of Section



DNV local office: Bodø

This Certificate is valid until 2016-12-31

Martin Gjelstad Surveyor

1611

This Certificate is subject to terms and conditions overleaf. Any significant change in design or construction may render this Certificate invalid. The validity date relates to the Type Approval Certificate and not to the approval of equipment/systems installed.

If any person suffers loss or damage which is proved to have been caused by any negligent act or omission of Det Norske Veritas, then Det Norske Veritas shall pay compensation to such person for his proved direct loss or damage. However, the compensation shall not exceed an amount equal to ten times the fee charged for the service in question, provided that the maximum compensation shall never exceed USD 2 million. In this provide the Norske Veritas' shall mean the Foundation Det Norske Veritas as well as all its subsidiaries, directors, employees, agents and any other acting on behalf of Det Norske Veritas.



Certificate No.: LB-427 File No.: Job Id.:

A.1/1.11 262.1-014385-1

#### **Product description**

"Pneumatic Line Thrower Rescue 230" is a line throwing system based on compressed air as driving force and with minimum shooting range of 230 m.

Firing unit with built-in cylinder for compressed air up to 300 bars. Ref. drawing 10-00 rev. D. Base unit:

Made of ABS plastic with aluminium inner tube. Filled with 240 m nylon line 3,2 mm thick and of breaking Projectiles: strength not less than 2000 N. Projectiles are reloadable and reusable. Ref. drawing 12-00 rev. A.

#### Application/Limitation

Every line-throwing appliance shall include not less than four projectiles and lines.

Each product is to be supplied with its manual for installation, use and maintenance.

### Type Approval documentation

Certification in accordance with Standard for Certification No. 1.2, Type Approval, April 2009.

Test report No. STF23 A95014 dated 6 March 1995 and F23377 dated 17 September 2012 from Sintef, Trondheim, Norway.

Drawing Nos. 10-00 rev. D dated 19 July 1995 and 12-00 rev. A dated 15 August 1995 from Restech Norway A/S.

Test/survey report dated 7 June 2004 from DNV Harstad (mail).

Initial Survey report dated 28 November 2012 from DNV Bodø.

#### Tests carried out

Tested according to IMO Res. MSC.81(70) Part 1 as amended.

### Marking of product

The product or packing is to be marked with name of manufacturer, type designation.

### Certificate Retention Survey

Det Norske Veritas' surveyor is to be given permission to perform Certification Retention Surveys at any time during the validity period of this certificate and at least every second year. The arrangement is to be in accordance with procedure described in Standard for Certification No. 1.2 item 4.

