DNV·GL

Certificate No:
TAD00000XX

TYPE APPROVAL CERTIFICATE

This is to certify:

That the Accumulators

with type designation(s)
Accumulator, 14.5" Bore, Piston Style
Drawing No. A145LX010

Issued to
Parker Hannifin Corp. dba Accumulator & Cooler Division
Machesney Park, IL, USA

is found to comply with
DNVGL-OS-E101 – Drilling facilities, Edition January 2018
DNVGL-SI-0166 - Verification for Compliance with Norwegian shelf regulations - Ch.2 Sec.7 DRILL(N), July 2015

Application :

See Page 2

Product(s) approved by this certificate is/are accepted for installation on all vessels classed by DNV GL.

This Type Approval Certificate is 3 pages long, and replaces D-5624, as issued on 2014-06-06.
Issued at **Houston** on **2018-07-27**
This Certificate is valid until **2023-07-26**. for **DNV GL**
DNV GL local station: **Houston, Approval CMC**

Approval Engineer: **M. Kevin Mandeville Jr.**

Meindert van Mierlo
Head of Section

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.

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Job Id: **262.1-017585-2**
Certificate No: **TAD00000XX**

The following design codes and standards were used as reference:

ASME Boiler and Pressure Vessel Code, Section VIII, Division1, 2017 Edition

Product description

Accumulator A14.5L11550X10K, 50 Gal capacity, Piston style body with threaded end cap retainer rings
Accumulator A14.5L18480X10K, 80 Gal capacity, Piston style body with threaded end cap retainer rings
Accumulator A14.5L23100X10K, 100 Gal capacity, Piston style body with threaded end cap retainer rings
Accumulator A14.5L25410X10K, 110 Gal capacity, Piston style body with threaded end cap retainer rings
Accumulator A14.5L27720X10K, 120 Gal capacity, Piston style body with threaded end cap retainer rings
Accumulator A14.5L34650X10K, 150 Gal capacity, Piston style body with threaded end cap retainer rings
Accumulator A14.5L36960X10K, 160 Gal capacity, Piston style body with threaded end cap retainer rings

Application/Limitation

Design Parameter	Value	Equivalent
Max Internal Working Pressure	7,500 psi	**!Syntax Error** bar
Max Internal Test Pressure	11,250 psi	**!Syntax Error** bar
Min Design Temperature	-4 °F	-20°C
Max Design Temperature	200 °F	93,333 °C
Corrosion Allowance	0in	0mm

Type Approval documentation

Tests carried out

Type testing waived for this renewal. Renewal audit carried out on 2018-07-25.

Marking of product

For traceability, the following marking is to be carried out on each product:

1. Serial No.
2. Manufacturer's Name or Trademark
3. Additional marking at the manufacturer's discretion

Certificate Retention Survey

For retention of the Type Approval Certificate, DNV GL's surveyor shall perform a retention survey after 2 and 3.5 years, in accordance with DNV GL's Class Program DNVGL-CP-0338, Type Approval Scheme.

Other conditions/comments

- Examination of castings to be in accordance with the requirements of ASME 2017 BPVC Section VIII, Division 1, Mandatory Appendix 7 & 8 for magnetic particle or liquid penetrant testing.
- DNV GL Ref. Project No. A0512870

END OF CERTIFICATE