



## Lloyd's Register Approved Service Supplier

<b>Supplier</b>	<b>NMS Nautical Marine Service GmbH</b>
<b>Address</b>	Am Tabakquartier 62/Loft 124, Bremen, 28197, Germany
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The above company having been assessed hereby receives approval in accordance with the requirements of Lloyd's Register Procedures for Approval of Service Suppliers as Supplier from the address(es) listed above for the provision of

**Maintenance, thorough Examination, Operational Testing, Overhaul and Repair of Lifeboats and Rescue Boats, Launching Appliances and Release Gear**

This approval is restricted to personnel directly employed by the Service Supplier. It does not cover agents, subcontractors nor subsidiaries. Service supplier's personnel are certified in accordance with a recognized national, international or industry standard - ISO 23678, or a manufacturer's certification programme for the equipment listed in the Appendix A (LR24110047AS) to this approval. The recognition is in accordance with Resolution MSC.402(96) Annex, Section 7 & 8 and IACS UR Z17 (Rev.14 Mar 2019).

This Service Supplier has been approved to service the equipment in accordance with IMO Resolution MSC.402(96), as amended.

Service engineers are to be provided with a valid certificate, issued by this Approved Service Supplier, which defines their level of qualification and the scope of the certification (i.e. makes and types of equipment and specifically state which activities (e.g. annual thorough examination and operational tests; 5-year thorough examination, overhaul; overload operational tests; repairs) are covered by the certification). This certificate should be made available when requested.

This approval is conditional upon the Supplier maintaining the documented scheme as audited by any member of the Lloyd's Register Group and hereby approved; and notifying Lloyd's Register in writing of any change to that scheme including any change in personnel, equipment or procedures. This certificate is issued to the Supplier and, subject to the Supplier complying with the necessary conditions, is valid to the date referred to above.

**Joachim Addiks**

Lead Surveyor to Lloyd's Register EMEA  
A member of the Lloyd's Register group

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### Appendix A

The Service Supplier has been approved to service the following equipment in accordance with MSC 402 (96).

Service Supplier's personnel are certified in accordance with a recognized national, international or industry standard – ISO 23678: **Training via CRALOG A/S, Knoten 7, Frederikshavn, 9900, Denmark**

DAVITS	
Maker	Type / Model
ABAS	<b>Single Arm Slewing</b> KDE-series, MDE-series
ACEBI	<b>Free fall secondary hydraulic A Frame</b> TPF-series  <b>Gravity single and twin fall outrigger</b> A-series, AF-series, PF-series  <b>Single arm Slewing</b> PFR-series, RRP-series, TPU-series  <b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> TPF-series, TPU-series  <b>Twin / Single Fall Gravity Rollertrack</b> GRA-series  <b>Twin Fall Gravity Pivoting / Luffing</b> SPG-series  <b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> TPC-series
ACTA	<b>Free fall secondary hydraulic A Frame</b> HSC-series  <b>ACTA Single arm Slewing</b> DR-series, HSC-series, MOB-series
ALEXANDER RYAN	<b>Gravity single and twin fall outrigger</b> BH-series
ARIM	<b>Single arm Slewing</b> ARPV-series  <b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> ARPV-series  <b>Twin Fall Gravity Pivoting / Luffing</b> AHA-series
BADA HEAVY IND. CO., LTD (EX. DAERYUCK MACHINERY)	<b>Free fall secondary hydraulic A Frame</b> BDF-series

	<p><b>Gravity freefall primary</b> BDF-series</p> <p><b>Single arm Slewing</b> BDR-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> BDH-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> BDH-series</p>
BIANCHI & CHECCHI	<p><b>Gravity single and twin fall outrigger</b> PE-series, PET-series</p>
DAVIT INTERNATIONAL	<p><b>Free fall secondary hydraulic A Frame</b> D-FH-series</p> <p><b>Gravity single and twin fall outrigger</b> D-FO-series</p> <p><b>Single arm Slewing</b> D-BR-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> D-NPS.SP-series, D-TT.SP.-series</p> <p><b>Single or Twin Fall Lifeboat Rescue Boat / Fast Rescue Boat Telescopic Hydraulic</b> DTT.SP-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> D-RT-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> D-NP-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> D-NP-series</p>
DENIZSAN	<p><b>Free fall secondary hydraulic A Frame</b> DSFDD-series</p> <p><b>Single arm Slewing</b> DSRBD-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> DSFRB-series</p>
DONGNAM MARINE CRANE CO., LTD.	<p><b>Single arm Slewing</b> DSAD-series</p>

	<p><b>Twin Fall Gravity Pivoting / Luffing</b> DHGD-series</p>
DSB ENGINEERING CO LTD	<p><b>Free fall secondary hydraulic A Frame</b> DSBDF-series</p> <p><b>Single arm Slewing</b> DSB23DR-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> DSBARH-series, DSBDP-series, DSBDR-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> DSBDL-series, DSBDTL-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> DSBDYL-series</p>
FASSMER	<p><b>Twin Fall Gravity Pivoting / Luffing</b> FPD-series</p>
GLOBAL DAVIT	<p><b>Gravity single and twin fall outrigger</b> RSP.O-series</p> <p><b>Single arm Slewing</b> FHS-series, LMS-series, RHL-series, RHP-series, RHS-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> RHP-series, RHP.HC-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> GLP.RT-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing GLP.FP-series, GLP.MP-series,</b> GSP.FP-series, GSP.MP-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> GLP.FLH-series, GLP.FPH-series, GSP.FPH-series, RHL-series, RHP-series</p>
GREBEN	<p><b>Free fall secondary hydraulic A Frame</b> HFF-series</p> <p><b>Gravity single and twin fall outrigger</b> FOD-series</p> <p><b>Single arm Slewing</b> RLC-series, SAR-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> GR-RTD-series</p>

	<p><b>Twin Fall Gravity Pivoting / Luffing</b> SPG-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> GD-PD-series, HD-series</p>
GURDESAN	<p><b>Free fall secondary hydraulic A Frame</b> GD-FFD-series</p> <p><b>Single arm Slewing</b> GD-KHK-series, GD-RRS-series</p>
HARDING (UMO SCHAT HARDING)	<p><b>Free fall secondary hydraulic A Frame</b> FF-series</p> <p><b>Gravity freefall primary</b> LA-series</p> <p><b>Gravity single and twin fall outrigger</b> ORD-series</p> <p><b>Single arm Slewing</b> SRR-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> SA-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> HD-SPG-series</p>
HARDING (WATERCRAFT)	<p><b>Twin / Single Fall Gravity Rollertrack</b> WRG-series</p>
IKNOW MACHINERY (TSUJI HEAVY INDUSTRIES)	<p><b>Twin Fall Gravity Pivoting / Luffing</b> HD-series</p>
JIANGSU JIAOYAN MARINE EQUIPMENT CO., LTD (JIANGYIN XINJIANG F.R.P. CO. LTD)	<p><b>Free fall secondary hydraulic A Frame</b> JYF-series</p> <p><b>Gravity single and twin fall outrigger</b> JYP-series</p> <p><b>Single arm Slewing</b> JYR-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> JYGR-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> JYHG-series</p>

<p>JIANGYIN NEPTUNE MARINE APPLIANCE CO. LTD.</p>	<p><b>Twin Fall Gravity Pivoting / Luffing</b> NPT 60 DL-series</p> <p><b>Free fall secondary hydraulic A Frame</b> NPT-DF-series</p> <p><b>Gravity single and twin fall outrigger</b> NPT-DP-series</p> <p><b>Single arm Slewing</b> NPT-DR-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> NPT-DR-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> NPT-DL-series, NPT-DP-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> NPT-DYL-series</p>
<p>JIANGYIN WOLONG F.R.P. BOAT CO. LTD.</p>	<p><b>Free fall secondary hydraulic A Frame</b> JY-FH-series</p> <p><b>Gravity single and twin fall outrigger</b> JYPL-series</p> <p><b>Single arm Slewing</b> JYSA-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> JY-LFR-series, JY-LRHE-series, JY-PLR-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> JYHE-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> JYPL-series</p>
<p>JIANGYINSHI BEIHAI</p>	<p><b>Free fall secondary hydraulic A Frame</b> FA-series</p> <p><b>Gravity single and twin fall outrigger</b> PD-series</p> <p><b>Single arm Slewing</b> SA-series, SAC-series, SMR-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> FRH-series</p>

	<b>Twin Fall Gravity Pivoting / Luffing</b> LB-H-series
MACGREGOR (TTS) (HYDRAMARINE)	<b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> HMC-series, HMD-series
MANSEI	<b>Free fall secondary hydraulic A Frame</b> FE-series  <b>Single arm Slewing</b> SAR-series  <b>Twin / Single Fall Gravity Rollertrack</b> GRA-series  <b>Twin Fall Gravity Pivoting / Luffing</b> ABD-series, AH-series, AV-series, EH-series, EM-series, M-series
NED-DECK MARINE (PALFINGER)	<b>Gravity single and twin fall outrigger</b> FPG-series  <b>Single arm Slewing</b> SCH-series, SCM-series, SCT-series, SEC-series  <b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> PFH-series, PRH-series, PRHE-series
NINGBO ASIA F.R.P. BOAT MANUFACTURING CO LTD	<b>Free fall secondary hydraulic A Frame</b> YZF-series  <b>Single arm Slewing</b> ZFDZ-series  <b>Twin Fall Gravity Pivoting / Luffing</b> L-series
NMF	<b>Single arm Slewing</b> BPK-series
NOR DAVIT	<b>Gravity single and twin fall outrigger</b> PL-series  <b>Twin Fall Gravity Pivoting / Luffing</b> SDP-series
NOREQ (PALFINGER)	<b>Gravity single and twin fall outrigger</b> NRD-series  <b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> NPD-series  <b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> NPD-series

ORIENTAL PRECISION	<p><b>Free fall secondary hydraulic A Frame</b> FD-series</p> <p><b>Single arm Slewing</b> RD-series, SHS-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> HGD-series</p>
ORIENTAL PRECISION - SEKIGAHARA	<p><b>Twin Fall Gravity Pivoting / Luffing</b> SHS-series</p>
PALFINGER	<p><b>Gravity freefall primary</b> FF-series</p> <p><b>Gravity single and twin fall outrigger</b> FPG-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> SCH-R-series, SCM-L-series, SCM-R-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> NPT-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> NPT-series, VIP-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> NPD-series, PFH-series</p>
QINGDAO BEIHAI SHIPBUILDING HEAVY INDUSTRY CO. LTD.	<p><b>Free fall secondary hydraulic A Frame</b> BD-FF-series</p> <p><b>Single arm Slewing</b> BD- SA-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> BD-AR-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> BD-PV-series</p>
REDROCK	<p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> RDA-series</p> <p><b>Single or Twin Fall Lifeboat Rescue Boat / Fast Rescue Boat Telescopic Hydraulic</b> RDT-series</p>
SEKIGAHARA	<p><b>Free fall secondary hydraulic A Frame</b> SF-series</p> <p><b>Single arm Slewing</b> SSS-series</p>

	<p><b>Twin / Single Fall Gravity Rollertrack</b> AT-series, STS-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> SFA-series, SFB-series, SFP-series, SHS-series</p>
SEZAMOR	<p><b>Single arm Slewing</b> ZZ-ZOL-series, ZZ-ZOT-series</p>
SHIN MYUNG TECH	<p><b>Single arm Slewing</b> SMRBD-SD-series, SMRBD&amp;LRD-series,</p>
SURVIVAL SYSTEMS INT	<p><b>Gravity single and twin fall outrigger</b> PL-series</p>
TSUJI HEAVY INDUSTRIES	<p><b>Single arm Slewing</b> RP-series</p> <p><b>Twin / Single Fall Gravity Rollertrack</b> T83-series, TC-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> H-series</p>
VANGUARDE	<p><b>Gravity single and twin fall outrigger</b> PL-series</p> <p><b>Single arm Slewing</b> HS-series, MS-series, VS-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> DH-series, PR-series, PRH-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> LE-series, VL-series</p> <p><b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> PFH-series, SRH-series</p>
VERHOEF	<p><b>Free fall secondary hydraulic A Frame</b> FL-50 series</p>
VIKING (NORSAFE)	<p><b>Gravity freefall primary</b> SW-series</p> <p><b>Gravity single and twin fall outrigger</b> A-series, C-series, D-series</p> <p><b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> NDA-series, NRB-series</p> <p><b>Twin Fall Gravity Pivoting / Luffing</b> E-series</p>

	<b>Twin Fall Hydraulic / Pivoting / Luffing Gravity Lowering</b> LH-series
VIKING (NORSAFE) (JIANGYIN)	<b>Single arm Slewing</b> NDSC-series  <b>Free fall secondary hydraulic A Frame</b> HD-series
WELIN LAMBIE	<b>Single arm Slewing</b> LRW-series
WUXI DONGWU	<b>Free fall secondary hydraulic A Frame</b> F55-F70-series  <b>Single arm Slewing</b> 21 - 35KN-series  <b>Twin / Single Fall Gravity Rollertrack</b> 25KN -30KN-series  <b>Twin Fall Gravity Pivoting / Luffing</b> 18KN-110KN-series
WUXI HUAHAI	<b>Gravity single and twin fall outrigger</b> PD-series  <b>Single arm Slewing</b> HMB-series  <b>Single Fall Rescue / Fast Rescue Boat A Frame Hydraulic</b> HMDA-series  <b>Twin Fall Gravity Pivoting / Luffing</b> HMD-series
ZHENJIANG MARINE AUXILIARY MACHINERY WORKS	Gravity single and twin fall outrigger PL-series

RELEASE GEAR	
Maker	Type
BADA HEAVY IND. CO., LTD (EX. DAERYUCK MACHINERY)	<b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> BHA-series  <b>Freefall Hydraulic / mechanical</b> BHA-series  <b>Rescue boat / Davit Launched Liferaft / Lift over centre automatic</b> BHA-series  <b>Rescue boat offload lift over center</b> BHR-series

BALDEN	<p><b>Lifeboat on load lift not over centre, flat to flat rotating cams</b> BD-LBH-series</p> <p><b>Rescue boat / Davit Launched Liferaft / Lift over centre automatic</b> BDHR-series</p>
BC SERVICE	<p><b>Devices For Activating Release: Central Release Unit</b> U HOOK-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> U HOOK-series</p> <p><b>Lifeboat on load lift not over centre, forward or reverse curve to curve rotating cams</b> U HOOK-series</p> <p><b>Rescue boat offload lift over center</b> U HOOK-series</p>
DAVIT INTERNATIONAL	<p><b>Rescue boat offload lift over center</b> OLH-series</p> <p><b>Rescue boat offload w. Onload capability</b> RH-series</p>
FASSMER	<p><b>Devices For Activating Release: Central Release Unit</b> DUPLEX &lt; 6.6T-series, DUPLEX &gt; 6T-series</p> <p><b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> FFH-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Float</b> DUPLEX &lt; 6.6T-series, DUPLEX &gt; 6T-series</p> <p><b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> DUPLEX&gt;6T-series</p> <p><b>Lifeboat on load lift not over centre, forward or reverse curve to curve rotating cams</b> DUPLEX&lt;6.6T-series</p>
GLOBAL DAVIT	<p><b>Rescue boat offload lift over center</b> HRN-series</p> <p><b>Rescue boat offload w. Onload capability</b> HR-series</p>
GREBEN	<p><b>Devices For Activating Release: Central Release Unit</b> NLH-series</p> <p><b>Devices For Activating Release: Electronic Sensor</b> NLH-series</p> <p><b>Lifeboat on load lift not over centre, up and down pins / collars</b> NLH-series</p>

HARDING (UMO SCHAT HARDING)	<p><b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> FFH-series</p> <p><b>Freefall Hydraulic / mechanical</b> FFH-series</p> <p><b>Rescue boat offload w. Onload capability</b> RRH-series</p>
HATECKE	<p><b>Rescue boat / Davit Launched Liferaft / Lift over centre automatic</b> SIMPLEX 2.0I OFF LOAD-series</p>
HATECKE (ERNST HATECKE)	<p><b>Devices For Activating Release: Central Release Unit</b> DUPLEX &lt; 6T-series, DUPLEX &gt; 6T-series</p> <p><b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> GFF-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Float</b> DUPLEX &lt; 6T-series, DUPLEX &gt; 6T-series</p> <p><b>Freefall Hydraulic / mechanical</b> GFF-series</p> <p><b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> DUPLEX&gt;6T-series</p> <p><b>Lifeboat on load lift not over centre, forward or reverse curve to curve rotating cams</b> DUPLEX&lt;6.6 T-series</p>
HENRIKSEN	<p><b>Fast rescue boat offload / Manual or automatic</b> HCH-series, HMK-series</p>
HLB (HYUNDAI LIFEBOATS)	<p><b>Devices For Activating Release: Central Release Unit</b> TALON MK 1-series, TALON MK 2-Series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> TALON MK 1-series, TALON MK 2-Series</p> <p><b>Lifeboat on load lift not over centre, flat to flat rotating cams</b> TALON MK 1-series</p> <p><b>Lifeboat on load lift not over centre, forward or reverse curve to curve rotating cams</b> TALON MK 2-series</p>
HOEI SENPAKU CO., LTD	<p><b>Devices For Activating Release: Central Release Unit</b> HS-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> HS-series</p> <p><b>Lifeboat on load lift not over centre, flat to flat rotating cams</b> HS-series</p>

<p>JIANGSU JIAOYAN MARINE EQUIPMENT CO., LTD (JIANGYIN XINJIANG F.R.P. CO. LTD)</p>	<p><b>Devices For Activating Release: Central Release Unit</b> JXN-1B-series</p> <p><b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> JX-2-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> JXN-1B-series</p> <p><b>Fast Rescue Boat Offload with On-Load Capability</b> JXN-3-series</p> <p><b>Freefall Hydraulic / mechanical</b> JX-2-series</p> <p><b>Lifeboat on load lift not over centre, up and down pins / collars</b> JXN-1B-series</p>
<p>JIANGYIN NEPTUNE MARINE APPLIANCE CO., LTD.</p>	<p><b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> NPT-HK-series</p>
<p>JIANGYIN WOLONG F.R.P. BOAT CO. LTD.</p>	<p><b>Devices For Activating Release: Central Release Unit</b> HK-series</p> <p><b>Fast Rescue Boat Offload with On-Load Capability</b> HK-series</p> <p><b>Freefall Hydraulic / mechanical</b> FHK-series</p> <p><b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> HK-series</p>
<p>MANSEI</p>	<p><b>Rescue boat / Davit Launched Liferaft / Lift over centre automatic</b> RH3-series</p>
<p>NINGBO ASIA F.R.P. BOAT MANUFACTURING CO LTD</p>	<p><b>Devices For Activating Release: Central Release Unit</b> HK-series</p> <p><b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> HK-series</p>
<p>NISHI-F CO., LTD., (EX. ISHIHARA DOCKYARD, NISHI-NIPPON)</p>	<p><b>Devices For Activating Release: Central Release Unit</b> IHM 12-series, IHM 13-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Float</b> IHM 12-series, IHM 13-series</p> <p><b>Lifeboat on load lift not over centre, flat to flat rotating cams</b> IHM 12-series, IHM 13-series</p>
<p>PALFINGER</p>	<p><b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> FFH-series</p>

	<p><b>Fast rescue boat offload / Manual or automatic</b> CAR-35F-series</p> <p><b>Freefall Hydraulic / mechanical</b> FFH-series</p> <p><b>Rescue boat / Davit Launched Liferaft / Lift over centre automatic</b> CAR 35-series</p> <p><b>Rescue boat offload w. Onload capability</b> RRH-series</p>
SEZAMOR	<p><b>Rescue boat / Davit Launched Liferaft / Lift over centre automatic</b> HS-series</p> <p><b>Rescue boat offload lift over center</b> HLR-18 series</p>
SHIGI SHIPBUILDING CO. LTD.	<p><b>Devices For Activating Release: Central Release Unit</b> SRS-series, SZK-30-series, SZK-5-Series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Float</b> SRS-series, SZK-30-series, SZK-5-Series</p> <p><b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> SRS-series</p> <p><b>Lifeboat on load lift not over centre, up and down pins / collars</b> SZK-series, SZK-30-series, SZK5-series</p>
SURVITEC	<p><b>Devices For Activating Release: Central Release Unit</b> SAFELAUNCH-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> SAFELAUNCH-series</p> <p><b>Lifeboat on load lift not over centre, forward or reverse curve to curve rotating cams</b> SAFELAUNCH-series</p>
SURVIVAL SYSTEMS INT.	<p><b>Devices For Activating Release: Central Release Unit</b> SURESAFE-series, TRIPLE 5 LX-series</p> <p><b>Lifeboat on load lift over centre</b> SURESAFE-series, TRIPLE 5 LX-series</p>
VANGUARDE	<p><b>Devices For Activating Release: Central Release Unit</b> C-SAFE-series</p> <p><b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> C-SAFE-series</p>

	<b>Lifeboat on load lift not over centre, Curve to flat rotating cams</b> C-SAFE-series
VERHOEF	<b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> TWISTLOCK-series  <b>Freefall Hydraulic / mechanical</b> TWISTLOCK-series
VIKING (NORSAFE)	<b>Devices For Activating Release: Central Release Unit</b> NADIRO D.I.B-series, TOR MK 1-series, TOR MK 2-series  <b>Devices For Activating Release: Electronic Sensor</b> NADIRO D.I.B-series  <b>Devices for activating release: Free Fall Hydraulic Primary and Secondary</b> GES-series  <b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> TOR MK 1-series, TOR MK 2-Series  <b>Fast Rescue boat offload</b> K4-series  <b>Lifeboat on load lift not over centre, flat to flat rotating cams</b> TOR MK 1-series, TOR MK 2-series
WILLIAM MILLS	<b>Devices For Activating Release: Central Release Unit</b> TITAN-series  <b>Devices For Activating Release: Hydrostatic Unit with Diaphragm</b> TITAN-series  <b>Lifeboat on load lift not over centre, flat to flat rotating cams</b> TITAN-series

<b>SURVIVAL CRAFT, RESCUE BOATS (Incl. Fast Rescue Boats)</b>	
<b>Maker</b>	<b>Type</b>
BALDEN	<b>Totally enclosed lifeboat, twin fall, dry version</b> BD-LB-series  <b>Totally enclosed lifeboat, twin fall, tanker version</b> BD-LB-series
DAFER (NARWHAL)	<b>Rescue Boat, single fall</b> SV-series
DSB DEUTSCHE SCHLAUCHBOOTE	<b>Rescue Boat, single fall</b> IRB-series
DSB ENGINEERING CO LTD	<b>Partially enclosed lifeboat, twin fall</b> DSBP-series

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	<p><b>Rescue Boat, single fall</b> DSBRFA-series</p> <p><b>Totally enclosed lifeboat, freefall</b> DSBFC-series, DSBFF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> DSBC-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> DSBF-series</p>
FASSMER	<p><b>Partially enclosed lifeboat, twin fall</b> CL-P-series, PLL-series, PLT-series</p> <p><b>Rescue Boat, single fall</b> RR-series</p> <p><b>Totally enclosed lifeboat, freefall</b> CFL-series, GAR-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> CL-series, CLX-series, GMR-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> CL-series, CLX-series, DRAGON-series</p>
GEPA	<p><b>Partially enclosed lifeboat, twin fall</b> G-FYK-series</p> <p><b>Rescue Boat, single fall</b> G-RB-series</p> <p><b>Totally enclosed lifeboat, freefall</b> G-FFF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> G-FK-series</p>
GREBEN	<p><b>Rescue Boat, single fall</b> RB-series</p> <p><b>Totally enclosed lifeboat, freefall</b> FFL-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> TEL-series</p>
HARDING (UMO SCHAT HARDING)	<p><b>Totally enclosed lifeboat, freefall</b> FF-series</p>

	<p><b>Totally enclosed lifeboat, twin fall, tanker version</b> MCB-series</p>
HATECKE (ERNST HATECKE)	<p><b>Partially enclosed lifeboat, twin fall</b> PEL-series</p> <p><b>Rescue Boat, single fall</b> RB-series</p> <p><b>Totally enclosed lifeboat, freefall</b> GFF-series</p>
HLB (HYUNDAI LIFEBOATS)	<p><b>Rescue Boat, single fall</b> HDR-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> HDL-series, HLB-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> HDL-series, HLB-series</p>
HOEI SENPAKU CO., LTD	<p><b>Totally enclosed lifeboat, twin fall, dry version</b> HS-series</p>
JAPAN MARINE UNITED CORP	<p><b>Totally enclosed lifeboat, twin fall, dry version</b> GF-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> GTR-series</p>
JIANGSU JIAOYAN MARINE EQUIPMENT CO., LTD (JIANGYIN XINJIANG F.R.P. CO. LTD)	<p><b>Rescue Boat, single fall</b> GJ-series</p> <p><b>Totally enclosed lifeboat, freefall</b> JY-FF-series</p>
JIANGYIN NEPTUNE MARINE APPLIANCE CO., LTD.	<p><b>Fast Rescue Boat, single fall</b> NPT-RA-series</p> <p><b>Rescue Boat, single fall</b> NPT-R-series, NPT-RA-series, NPT-RB-series, NPT-RFA-series</p> <p><b>Totally enclosed lifeboat, freefall</b> NPT-FF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> NPT-C-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> NPT-F-series</p>
JIANGYIN WOLONG F.R.P. BOAT CO. LTD.	<p><b>Partially enclosed lifeboat, twin fall</b> JYP-series</p>

	<p><b>Totally enclosed lifeboat, freefall</b> JYCF-series, JYFF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> JYC-series, JYCA-series</p>
JIANGYIN XINJIANG	<p><b>Totally enclosed lifeboat, freefall</b> JY-FN-series</p>
JIANGYINSHI BEIHAI	<p><b>Partially enclosed lifeboat, twin fall</b> JYB-B-series</p> <p><b>Rescue Boat, single fall</b> JY-BR-series, JYB-KR-series, SC-KR-series</p> <p><b>Totally enclosed lifeboat, freefall</b> JYB-FF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> JYB-C-series</p>
MARE SAFETY AS	<p><b>Rescue Boat, single fall</b> RB-series</p>
MULDER EN RIJKE	<p><b>Totally enclosed lifeboat, single fall</b> TELB-S-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> TELB-series</p>
NARWHAL	<p><b>Rescue Boat, single fall</b> SV-series</p>
NARWHAL (DAFER)	<p><b>Fast Rescue Boat, single fall</b> SV-series</p>
NED-DECK MARINE (PALFINGER)	<p>Totally enclosed lifeboat, twin fall, tanker version NPT-series</p>
NINGBO ASIA F.R.P. BOAT MANUFACTURING CO LTD	<p><b>Open lifeboat, twin fall</b> BJ-series</p> <p><b>Rescue Boat, single fall</b> BJ-series, YZ-series</p> <p><b>Totally enclosed lifeboat, freefall</b> YZFC-series, YZFF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> YZC-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> YZF-series</p>
NISHI-F CO., LTD., (EX. ISHIHARA DOCKYARD, NISHI-NIPPON)	<p><b>Partially enclosed lifeboat, twin fall</b> PML-series</p>

	<p><b>Totally enclosed lifeboat, freefall</b> FF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> EML-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> EML-series</p>
NOREQ (PALFINGER)	<p><b>Rescue Boat, single fall</b> RRB-series</p> <p><b>Totally enclosed lifeboat, freefall</b> LBF-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> LBT-series</p>
PALFINGER	<p><b>Partially enclosed lifeboat, twin fall</b> CTL-series, MPC-series, NPT-T-series</p> <p><b>Rescue Boat, single fall</b> RSQ-series</p> <p><b>Totally enclosed lifeboat, freefall</b> FF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> KISS-C-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> KISS-T-series</p>
QINGDAO BEIHAI SHIPBUILDING HEAVY INDUSTRY CO. LTD.	<p><b>Rescue Boat, single fall</b> BH-R-series</p> <p><b>Totally enclosed lifeboat, freefall</b> BH-F-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> BH-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> BH-series</p>
SHIGI SHIPBUILDING CO. LTD.	<p><b>Partially enclosed lifeboat, twin fall</b> SZPR-series</p> <p><b>Rescue Boat, single fall</b> VOX46-series</p>

	<p><b>Totally enclosed lifeboat, freefall</b> FEL-series</p>
SURVITEC	<p><b>Totally enclosed lifeboat, freefall</b> FF-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> SC-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> SC-series</p>
SURVIVAL SYSTEMS INT	<p><b>Totally enclosed lifeboat, single fall</b> CA-series</p>
TSUNEISHI	<p><b>Totally enclosed lifeboat, twin fall, dry version</b> TL-series</p>
TSUNEISHI (KAMBARA RINGYO)	<p><b>Totally enclosed lifeboat, twin fall, dry version</b> KL-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> KL-series</p>
VANGUARDE	<p><b>Rescue Boat, single fall</b> VG-KR-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> VG-C-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> VG-F-series, VG-HLB-series</p>
VIKING (NORSAFE)	<p><b>Partially enclosed lifeboat, twin fall</b> MINIMA-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> JYN-series, MAGGIE-series, MAUD-series, MAXIMA-series, MIRAM-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> MAGGIE-series, MAUD-series, MAXIMA-series, MIRAM-series</p>
VIKING (NORSAFE) (JIANGYIN)	<p><b>Rescue Boat, single fall</b> MATRIX-series</p>
WATERCRAFT (WATERCRAFT HELLAS)	<p><b>Totally enclosed lifeboat, twin fall, dry version</b> MK 5-series</p>
WATERMAN OY	<p><b>Partially enclosed lifeboat, twin fall</b> 391-series, 393-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> 351-series, 377-series</p>
WUXI HAIHONG BOAT MAKING CO., LTD	<p><b>Totally enclosed lifeboat, freefall</b> HH-FC-series</p>

	<p><b>Totally enclosed lifeboat, twin fall, dry version</b> HH-C-series</p> <p><b>Totally enclosed lifeboat, twin fall, tanker version</b> HH-T-series, HH-TS-series</p>
ZHENJIANG MARINE AUXILIARY MACHINERY WORKS	<p><b>Fast Rescue Boat, single fall</b> YH-FRB-series</p> <p><b>Rescue Boat, single fall</b> YH-FRA-series, YH-R-series</p> <p><b>Totally enclosed lifeboat, twin fall, dry version</b> YH-QFP-series</p>

WINCHES	
Maker	Type
ACEBI	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> TBE-series
ALEXANDER WELIN	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> AIW-series
BADA HEAVY IND. CO., LTD (EX. DAERYUCK MACHINERY)	<p><b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> BDF-series, BLW-series, BMW-series, BRW-series</p> <p><b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone /disk / pads / band / decent brake centrifugal w pads</b> BA-series, BM-series, PWD-series</p> <p><b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> BMW-series, BW-series</p>
BADA HEAVY INDUSTRIES CO., LTD.	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> BLW-series
DAVIT INTERNATIONAL	<p><b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> 01KN-series, 02KN-series, 03 KN- series, 04KN-series, 07KN-series</p> <p><b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> 06KN-series</p> <p><b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone /disk / pads / band / decent brake centrifugal w pads</b> 12-series, 40-series</p>

FASSMER	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> FFWH-series
GLOBAL DAVIT	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> W05HC-series, W08HC-series, WS-series  <b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> 14KN-series, 20KN-series, 26KNseries
GREBEN	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> HW-series  <b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> EW-series
GURDESAN	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> GD-FLW-series  <b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> GD-HC-A-series
HARDING (UMO SCHAT HARDING)	<b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> HD-series, MW-series  <b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes, multiple disks, hydraulically operated / decent brake hydraulic pump</b> CW-series
HARDING (UMO SCHAT HARDING) (SCHAT DAVIT COMPANY) (PALFINGER)	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> FME-series  <b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> BE-series
HARDING (UMO SCHAT HARDING) (PALFINGER)	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes, multiple disks, hydraulically operated / decent brake hydraulic pump</b> W-series
HARDING (WATERCRAFT)	<b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> MW-series
HATECKE (ERNST HATECKE)	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> FFA-series
HYDRALIFT	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> SP-series
IKNOW MACHINERY (TSUJI HEAVY INDUSTRIES)	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> EB-series

JAPAN MARINE UNTIED CORP.	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> MU-series
JIANGSU JIAOYAN MARINE EQUIPMENT CO., LTD (JIANGYIN XINJIANG F.R.P. CO. LTD)	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> JYWP-series
JIANGYIN NEPTUNE MARINE APPLIANCE CO., LTD.	<b>Single Drum Gravity lowering electric hoisting lifeboat / rescue boat / static brake pad, cone, disk, band / decent brake centrifugal pads</b> NPT-DW-series  <b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> NPT-DS-series, NPT-DW-series
JIANGYIN WOLONG F.R.P. BOAT CO. LTD.	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> JYD-series
JIANGYINSHI BEIHAI	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> DW-series
MANSEI	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> SW-series  <b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> 06KN-series, FW-series  <b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> CMW-series, MW-series
NED-DECK MARINE (PALFINGER)	<b>Single Drum Gravity lowering electric hoisting lifeboat / rescue boat / static brake pad, cone, disk, band / decent brake centrifugal pads</b> 04-series
NED-DECK MARINE (PALFINGER)	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> HWCT-series  <b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> 15-series
NOR DAVIT	<b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone / disk / pads / band / decent brake centrifugal w pads</b> SP-series
ORIENTAL PRECISION	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> BWE-series, SWE-series

PALFINGER	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes, multiple disks, hydraulically operated / decent brake hydraulic pump</b> CW-series, W-series
QINGDAO BEIHAI SHIPBUILDING HEAVY INDUSTRY CO. LTD.	<b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone /disk / pads / band / decent brake centrifugal w pads</b> BW-HL-series, BW-LL-series
SEC (SHIPS EQUIPMENT CENTRE)	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> WL-series
SEKIGAHARA	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> SNW-series, SWE-series
SURVIVAL SYSTEMS INT.	<b>Single Drum Gravity lowering electric hoisting lifeboat / rescue boat / static brake pad, cone, disk, band / decent brake centrifugal pads</b> W-series
TSUJI HEAVY INDUSTRIES	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> TC-series  <b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> EB-series
VERHOEF	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> FL 50-series
WELIN LAMBIE	<b>Single drum Gravity lowering electric hoisting liferaft / rescue boat / static brake pad, cone, disk, eccentric cam / decent brake centrifugal pads</b> 5619-series, 9502-series  <b>Twin Drum, gravity-lowering/electrically hoisting w / static brake cone /disk / pads / band / decent brake centrifugal w pads</b> 53-series, 55-series, 97-series
WUXI DONGWU	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> DS/Z-series, DZ-series
WUXI HUAHAI	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> HMW-series
ZHENJIANG MARINE AUXILIARY MACHINERY WORKS	<b>Twin Drum, gravity-lowering/electrically hoisting w/holding static brakes with mechanically operated multiple disks friction pads / decent brake centrifugal w pads</b> DP-series
ZOLLERN	<b>Single Drum, hydraulic-lowering/hydraulic hoisting</b> ZR-series