Certificate No.: 2410251043501247

TÜRK LOYDU

TYPE APPROVAL CERTIFICATE

This is to certify that the

Fire Extinguishing System Cylinders

TL Project No	**24-0501**
Manufacturer	**MARSİS MAKİNE VE GEMİ SANAYİ ANONİM ŞİRKETİ**
Address	**İstanbul Deri ve Endüstri Serbest Bl. Aydınlı SB mah. Kodalak Cad. No:12 Tuzla- İSTANBUL**
Product Type	**Vertical Tube Cylinders**
Reference Rule	**TL Rules, Part E, Chapter 103 - Metallic Materials, Special Materials for Naval Ships, 01.01.2022** **TL Rules, Part E, Chapter 107 - Naval Ship Technology, Ship Operation Installations and Auxiliary System, 01.01.2022** **TL Rules, Part A, Chapter 2, Material, 01.01.2023** **TL Rules, Part A, Chapter 3, Welding, 01.01.2023** **TL Rules, Part B, Chapter 4, Machinery, 01.07.2023**
Expire Date of Previous Certificate	**-**
Place and Date	**İSTANBUL / 14.11.2024**

Subject to the conditions referred to in the following pages, this certificate is valid until 14.11.2029.

Emrah SÖĞÜTÇÜ

New Building Division Manager

131877

This certificate is subject to terms and conditions described below:

- Any significant change in design or construction may render this Certificate invalid. Type Approval Certificate is not valid for equipment, the design or manufacture of which has been varied or modified from the specimen tested. This certificate is not valid for products without marking above mentioned. The manufacturer should notify TÜRK LOYDU of any modifications or changes to equipment in order to obtain valid certificate. This certificate shows that tested specimens as representative of the product complies of the TÜRK LOYDU rules, and revelant international instruments that apply to it.

Certificate No.: 2410251043501247

Product	: Fire Extinguishing System Cylinders
Approval No / Date	: PAE-EPAS/018579/24-0501/ŞÜ, 19.04.2024
Test Pressure	: 63 Bar.
Performed NDT	: Yes, RT.
Performed Tests	: - Quality and Management System Audit - Material Test - Dimensional Control Acc. To Approved Drawings - Pressure Tests - Burst Test - NDT-RT - Visual Inspections - Tests according to related standards- TS EN 14208& TS EN 13322-1. were found satisfactory.
Test Place	: MARSİS MAKİNE VE GEMİ SANAYİ ANONİM ŞİRKETİ, İSTANBUL
Last Inspection Date	: 01.10.2024
Others	: Design Temperature: 60 / -20 C Design Pressure: 42 Bar Corrosion Allowance: 0 mm Joint Efficiency: 1.0

	Product Description	Dimension
1	180 lt - 147 lt - 106 lt. - 52 lt. vertical tube cylinders	Ø 406 mm
2	32 lt - 16 lt - 8 lt. vertical tube cylinders	Ø 250 mm

Approval Conditions : - Transportable Gas cylinders pressure group is 1. Equipment is out of the scope of approval.
- Safety devices such as pressure should be type approved. The devices must be suitable for use on board.

Surveyor Name : Sezer Mahir TUĞCU

This certificate is subject to terms and conditions described below:
- Any significant change in design or construction may render this Certificate invalid. Type Approval Certificate is not valid for equipment, the design or manufacture of which has been varied or modified from the specimen tested. This certificate is not valid for products without marking above mentioned. The manufacturer should notify TÜRK LOYDU of any modifications or changes to equipment in order to obtain valid certificate. This certificate shows that tested specimens as representative of the product complies of the TÜRK LOYDU rules, and revelant international instruments that apply to it.