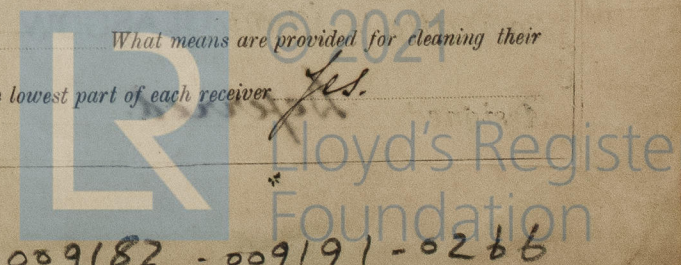


REPORT ON OIL ENGINE MACHINERY.

No. 43856

Date of writing Report 19 When handed in at Local Office 23. 7. 1924 Port of Glasgow  
No. in Survey held at Reg. Book. Clydebank Date, First Survey 26 Jan 1921 Last Survey 12 June 1924  
on the Single } Screw vessels Tons { Gross  
Twin } Net  
Triple }  
Master Built at Kobe, Japan By whom built Kawasaki Shipyard No. 4845 When built  
Engines made at Clydebank By whom made John Brown & Co. Engine No. 5028 When made 1924  
Donkey Boilers made at By whom made Boiler No. When made  
Brake Horse Power 2500 Owners Port belonging to  
Nom. Horse Power as per Rule 593 Is Refrigerating Machinery fitted for cargo purposes Is Electric Light fitted

2 or 4 stroke cycle 2 Single or double acting Single  
Maximum pressure in cylinders 500 lbs. No. of cylinders 6 No. of cranks 6 Diameter of cylinders 22"  
Length of stroke 33" x 2 Revolutions per minute 98 Means of ignition Heat of Compression Kind of fuel used Diesel fuel oil  
Is there a bearing between each crank No Span of bearings (Page 92, Section 2, par. 7 of Rules) 6' 0 5/8"  
Distance between centres of main bearings 7' 7" Is a flywheel fitted Yes Diameter of crank shaft journals as per Rule 15.6"  
as fitted 16.0"  
Diameter of crank pins 16 1/2" as per Rule 15.6"  
as fitted 16.0" Breadth of crank webs as per Rule 32" as fitted 32" Thickness of ditto as per Rule 9"  
as fitted 1 1/2" ends, 1 1/2" centre  
Diameter of flywheel shaft as per Rule 15.6"  
as fitted 16.0" Diameter of tunnel shaft as per Rule  
as fitted Diameter of thrust shaft as per Rule  
as fitted  
Is the screw shaft fitted with a continuous liner the whole length of the stern tube  
If the liner is in more than one length are the joints burned  
If the liner does not fit tightly at the part between the bearings in the stern tube, is the space charged with a plastic material insoluble in water and non-corrosive  
If without liners, is the shaft arranged to run in oil  
Diameter of outer gland fitted to stern tube Length of stern bush Diameter of propeller  
No. of blades state whether moveable Total surface square feet  
Is a governor or other arrangement fitted to prevent racing of the engine when detached Yes Thickness of cylinder liners 2 1/2" at centre  
Are the exhaust pipes and silencers water cooled or lagged with  
If the exhaust is led overboard near the waterline, what means are arranged to prevent water from being syphoned back to the engine  
Is the sea suction provided with an efficient strainer which can be cleared  
No. of bilge pumps fitted to the main engines None Diameter of ditto Stroke  
How driven  
No. and sizes of suctions connected to both main bilge pumps and auxiliary bilge pumps:—In engine room  
No. of ballast pumps How driven Sizes of pumps  
Is a separate auxiliary pump suction fitted in  
Are all the bilge suction pipes fitted with roses Are the roses in Engine Room always accessible  
Are all connections with the sea direct on the skin of the ship  
Are they fixed sufficiently high on the ship's side to be seen without lifting the floor plates  
Are they each fitted with a discharge valve always accessible on the plating of the vessel  
Are the bilge suction pipes, cocks and valves arranged so as to prevent any  
Is the screw shaft tunnel watertight Is it fitted with a watertight door  
If a wood vessel, what means are provided to prevent leakage of either fuel oil or of lubricating oil from saturating the woodwork  
No. of stages 4 each Diameter 25 1/2", 21 1/2", 17 3/4", 14 5/8", 11 1/2", 8 1/2" Stroke 19 Driven by Crank Shaft.  
No. of stages Diameters Stroke Driven by  
No. of stages Diameters Stroke Driven by  
Diameter 56 1/2" x 23 1/2" rectangular Stroke 33" Driven by Electric motor from overheads.  
Are the air compressors and their coolers made so as to be easy of access Yes  
No of high pressure air receivers 1 working 11 1/4" standing by 17 1/2" Internal diameter 17 1/2" Cubic capacity of each 18.35 cu ft  
Seamless, lap welded or riveted longitudinal joint Seamless Range of tensile strength 28/32 tons  
No. of starting air receivers Three Internal diameter 60"  
Material Steel Seamless, lap welded or riveted longitudinal joint Riveted  
Working pressure by rules 605 lbs. Is each receiver, which can be isolated.  
Can the internal surfaces of the receivers be examined Yes  
Is there a drain arrangement fitted at the lowest part of each receiver Yes  
safety valve as per Rule Yes  
Manholes



009182 - 009191 - 0266



# IS A DONKEY BOILER FITTED? HYDRAULIC TESTS:—

If so, is a report now forwarded?

DESCRIPTION.	DATE OF TEST.	WORKING PRESSURE.	TEST PRESSURE.	STAMPED.	REMARKS.
ENGINE CYLINDERS	29/11/23	500 lbs.	1000 lbs.		
COVERS	13/9/23, 10/12/23, 24/12/23, 1/2/24.	15 lbs.	30 lbs.		
JACKETS	25/10/23, 1/11/23	15 lbs.	30 lbs.		
PISTON WATER PASSAGES	4/10/23, 7/1/24.	50 lbs.	100 lbs.		
MAIN COMPRESSORS—1st STAGE	4/10/23, 7/1/24.	125 lbs.	250 lbs.		
2nd	5/11/23, 12/11/23.	350 lbs.	700 lbs.		
3rd	13/9/23, 13/12/23.	1100 lbs.	2200 lbs.		
AIR RECEIVERS—STARTING	17/1/24, 21/1/24, 24/1/24	600 lbs.	900 lbs.		
INJECTION	27/12/23	1200 lbs.	2400 lbs.		
AIR PIPES	4/12/23, 10/1/24, 25/1/24, 5/2/24.	1200 lbs.	2400 lbs.		
FUEL PIPES					
FUEL PUMPS					
SILENCER					
WATER JACKET	17/1/24, 21/1/24.	15 lbs.	30 lbs.		
SEPARATE FUEL TANKS					

PLANS. Are approved plans forwarded herewith for shafting  
(If not, state date of approval)

SPARE GEAR

To be checked in Japan.

John Brown & Company, Limited.

The foregoing is a correct description,

*John Brown*  
Clydebank Secretary.

Manufacturers.

Dates of Survey while building  
During progress of work in shops—  
During erection on board vessel—  
Total No. of visits—

Dates of Examination of principal parts—Cylinders—  
Crank shaft—  
Engines holding down bolts—  
Completion of fitting sea connections—  
Material of crank shaft—  
Material of tunnel shafts—  
Is the flash point of the oil to be used over 150° F.  
Is this machinery duplicate of a previous case—

General Remarks (State quality of workmanship, opinions as to class, &c.)

This set of engines has been built under Special Survey and the materials and workmanship, as far as can be seen, are sound and good and the engine has been tried under full load on the test bed with satisfactory results; are eligible in my opinion to have the record in the Register Book of L.M.S. engine, with date when installed.

Engines shipped to Kobe, Japan to be installed on board vessel.

The amount of Entry Fee ... £ 6 : 0 : 0  
Special ... £ 83 : 15 : 0  
Donkey Boiler Fee ... £ : : :  
Travelling Expenses (if any) £ : : :  
When applied for, 29.5.24  
When received, 25.8.24

A. Campbell  
Engineer Surveyor to Lloyd's Register of Shipping

FRI. 24 SEP 1926

FRI. 15 OCT 1926

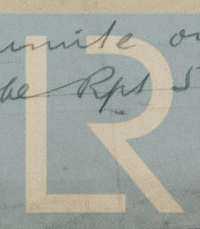
Committee's Minute GLASGOW

29 JUL 1924

Assigned

Deferred.

See minute on Kobe Rpt 5369



Lloyd's Register Foundation