

REPORT ON OIL ENGINE MACHINERY.

No. 86683.

Received at London Office

Date of writing Report 10 When handed in at Local Office 4 APR 1924 Port of BIRKENHEAD
 No. in Survey held at Reg. Book. BIRKENHEAD Date, First Survey 3rd Oct/23 Last Survey 8th April 1924
 on the ^{Single} ~~Triple~~ Screw vessels "LA. MAREA" (DIESEL ELECTRIC MOTOR SHIP) Tons { Gross Net }
 Master Built at BIRKENHEAD By whom built CAMMELL LAIRD & CO LD Yard No. 895 When built 1924
 Engines made at BIRKENHEAD By whom made CAMMELL LAIRD & CO LD Engine No. 895 When made 1924.
 Donkey Boilers made at BIRKENHEAD By whom made CAMMELL LAIRD & CO LD Boiler No. 895 When made 1924.
 Brake Horse Power 3300 Owners UNIFRUITCO S.S. CO LD (CLARK & SERVICE, MGRS) Port belonging to GLASGOW.
 Nom. Horse Power as per Rule AAA TOTAL Is Refrigerating Machinery fitted for cargo purposes YES Is Electric Light fitted YES

OIL ENGINES, &c.—Type of Engines CAMMELL LAIRD FULLAGAR ENCLOSED. 2 or 4 stroke cycle 2 Single or double acting SINGLE.
 Maximum pressure in cylinders 550 No. of cylinders 16 (4 ENGINES. 4 CYLINDERS PER ENGINE.) No. of cranks 4 Diameter of cylinders 14"
 Length of stroke 32" 16" x 2" Revolutions per minute 250 Means of ignition Compression Temperature Kind of fuel used Heavy oil
 Is there a bearing between each crank No Span of bearings (Page 92, Section 2, par. 7 of Rules) 3'-5 3/4"
 Distance between centres of main bearings 4'-5 3/4" Is a flywheel fitted Yes Diameter of crank shaft journals as per Rule as fitted as approved 9 1/2"
 Diameter of crank pins 9 1/2" Breadth of crank webs as per Rule as fitted as approved 13 1/2" Thickness of ditto as per Rule as fitted as approved 4 3/4"
 Diameter of flywheel shaft as per Rule as fitted as approved 9 1/2" Diameter of tunnel shaft as per Rule as fitted as approved 12 5/8" Diameter of thrust shaft as per Rule as fitted as approved 13 1/4"
 Diameter of screw shaft as per Rule as fitted 13 7/8" Is the screw shaft fitted with a continuous liner the whole length of the stern tube Yes
 Is the after end of the liner made watertight in the propeller boss Yes If the liner is in more than one length are the joints burned Yes
 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 Yes
 If two liners are fitted, is the shaft lapped or protected between the liners Yes If without liners, is the shaft arranged to run in oil Yes
 Type of outer gland fitted to stern tube Yes Length of stern bush 4'-7 1/2" Diameter of propeller 16 feet
 Pitch of propeller 15'-9" No. of blades 3 state whether moveable Yes Total surface 72 square feet
 Method of reversing Electric Is a governor or other arrangement fitted to prevent racing of the engine when declutched Yes Thickness of cylinder liners 1 1/2"
 Are the cylinders fitted with safety valves Yes Means of lubrication Forced Are the exhaust pipes and silencers water cooled or lagged with non-conducting material Yes If the exhaust is led overboard near the waterline, what means are arranged to prevent water from being syphoned back to the engine Exhaust led up funnel
 No. of cooling water pumps 2 Is the sea suction provided with an efficient strainer which can be cleared within the vessel Yes No. of bilge pumps fitted to the main engines 2 Diameter of ditto 5" Stroke 5"
 Can one be overhauled while the other is at work Yes No. of auxiliary pumps connected to the main bilge lines 4 How driven 2 Steam 2 Electric 1-3"
 Sizes of pumps 1 steam 2 1/2" x 15" duplex 1 electric 3 1/2" x 6" duplex No. and sizes of suction connected to both main bilge pumps and auxiliary bilge pumps:—In engine room 1.6" 1.2 1/2" (1.2 1/2") and in holds, etc. 3-2 1/2" from aft. 2-2 1/2" from forward No. of ballast pumps 1 How driven Electric centrifugal Sizes of pumps 4 1/4" Suct 4" Discharge
 Is the ballast pump fitted with a direct suction from the engine room bilges Yes State size 3" Is a separate auxiliary pump suction fitted in Engine Room and size Yes 7-6" line Are all the bilge suction pipes fitted with roses Yes Are the roses in Engine Room always accessible Yes
 Are the sluices on Engine Room bulkheads always accessible Yes Are all connections with the sea direct on the skin of the ship Yes
 Are they valves or cocks Both Are they fixed sufficiently high on the ship's side to be seen without lifting the floor plates Yes
 Are the discharge pipes above or below the deep water line above Are they each fitted with a discharge valve always accessible on the plating of the vessel Yes
 Are all pipes, cocks, valves and pumps in connection with the machinery accessible at all times Yes Are the bilge suction pipes, cocks and valves arranged so as to prevent any communication between the sea and the bilges Yes Is the screw shaft tunnel watertight Yes Is it fitted with a watertight door here necessary separate compartment worked from If a wood vessel, what means are provided to prevent leakage of either fuel oil or of lubricating oil from saturating the woodwork

AIR RECEIVERS:—No. of high pressure air receivers 4 Internal diameter 9 3/4" Cubic capacity of each 3.25 cu ft
 material open head M.S. Seamless, lap welded or riveted longitudinal joint Seamless Range of tensile strength 28-32 ton per sq in
 thickness 7/16 + 1/2" working pressure by Rules 1210 lbs No. of starting air receivers 4 Internal diameter 17 5/8"
 Total cubic capacity 73 cu ft Material open head M.S. Seamless, lap welded or riveted longitudinal joint Seamless
 Range of tensile strength 28-32 ton per sq in thickness 7/16 Working pressure by rules 1100 lbs Is each receiver, which can be isolated, fitted with a safety valve as per Rule Yes Can the internal surfaces of the receivers be examined Yes What means are provided for cleaning their inner surfaces Blast screen line 3 3/4" holes at each end starting " " 8 3/4" hole at bottom, and 4 1/2" hole at top Is there a drain arrangement fitted at the lowest part of each receiver Yes



