

# REPORT ON STEAM RECIPROCATING ENGINE MACHINERY.

Date of writing Report 31-1-1945 When handed in at Local Office 16 FEB 1945 Port of Ipwich  
 No. in Survey held at Yarmouth Date, First Survey 5 MAY 1944 Last Survey 26-1-1945  
 Reg. Book on the Vic 74 Tons { Gross 17 Net 17 }  
 Built at Hull By whom built Brown S & S. Ltd Yard No. 17 When built 1945  
 Engines made at Yarmouth By whom made E. Bunell & Son Ltd Engine No. 633 When made 1945  
 Boilers made at Am By whom made ✓ Boiler No. ✓ When made ✓  
 Registered Horse Power ✓ Owners Trinship J. van Transport Port belonging to ✓  
 Nom. Horse Power as per Rule 6.9 Is Refrigerating Machinery fitted for cargo purposes ✓ Is Electric Light fitted ✓  
 Trade for which vessel is intended Coasting

ENGINES, &c.—Description of Engines Compound Reciprocating Revs. per minute 150  
 of Cylinders 10 1/2" = 22" Length of Stroke 14" No. of Cylinders Two No. of Cranks Two  
 Crank shaft, dia. of journals as per Rule 4 3/8" Crank pin dia. 4 3/8" Crank webs Mid. length breadth Thickness parallel to axis 2 7/8"  
as fitted 4 3/8" Mid. length thickness shrunk Thickness around eye-hole 2"  
 Intermediate Shafts, diameter as per Rule Thrust shaft, diameter at collars as per Rule 4 3/8"  
as fitted as fitted 4 3/8"  
 Main Shafts, diameter as per Rule Screw Shaft, diameter as per Rule 4 7/8" Is the screw shaft fitted with a continuous liner ✓  
as fitted as fitted 4 7/8"  
 Bronze Liners, thickness in way of bushes as per Rule Thickness between bushes as per Rule Is the after end of the liner made watertight in the  
as fitted as fitted propeller boss  
 If the liner is in more than one length are the junctions made by fusion through the whole thickness of the liner ✓  
 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 two liners are fitted, is the shaft lapped or protected between the liners ✓ Is an approved Oil Gland or other appliance fitted at the after end of the tube  
at If so, state type Length of Bearing in Stern Bush next to and supporting propeller 20"  
 Propeller, dia. 66" Pitch 28" No. of Blades 4 Material C.I. whether Moveable ✓ Total Developed Surface 11.6 sq. feet  
 Feed Pumps worked from the Main Engines, No. 6m Diameter 2 1/8" Stroke 6" Can one be overhauled while the other is at work ✓  
 Bilge Pumps worked from the Main Engines, No. 6m Diameter 2 1/8" Stroke 6" Can one be overhauled while the other is at work ✓  
 Feed Pumps { No. and size ✓ Pumps connected to the { No. and size ✓  
 How driven ✓ Main Bilge Line How driven ✓  
 Ballast Pumps, No. and size ✓ Lubricating Oil Pumps, including Spare Pump, No. and size ✓  
 Are two independent means arranged for circulating water through the Oil Cooler ✓ Suctions, connected to both Main Bilge Pumps and Auxiliary  
 Bilge Pumps:—In Engine and Boiler Room ✓  
 In Pump Room ✓ In Holds, &c. ✓

Main Water Circulating Pump Direct Bilge Suctions, No. and size ✓ Independent Power Pump Direct Suctions to the Engine Room Bilges, ✓  
 No. and size ✓ Are all the Bilge Suction Pipes in holds and tunnel well fitted with strum-boxes ✓  
 Are the Bilge Suctions in the Machinery Space led from easily accessible mud-boxes, placed above the level of the working floor, with straight tail pipes to the bilges ✓  
 Are all Sea Connections fitted direct on the skin of the ship ✓ Are they fitted with Valves or Cocks ✓  
 Are they fixed sufficiently high on the ship's side to be seen without lifting the stokehold plates ✓ Are the Overboard Discharges above or below the deep water line ✓  
 Are they each fitted with a Discharge Valve always accessible on the plating of the vessel ✓ Are the Blow Off Cocks fitted with a spigot and brass covering plate ✓  
 What Pipes pass through the bunkers ✓ How are they protected ✓  
 What pipes pass through the deep tanks ✓ Have they been tested as per Rule ✓  
 Are all Pipes, Cocks, Valves, and Pumps in connection with the machinery and all boiler mountings accessible at all times ✓  
 Is the arrangement of Valves and their connections such as to prevent the possibility of water passing from the sea or from water tanks into the cargo or machinery spaces, or from one compartment to another ✓ Is the Shaft Tunnel watertight ✓ Is it fitted with a watertight door ✓ worked from ✓

MAIN BOILERS, &c.—(Letter for record ✓) Total Heating Surface of Boilers ✓  
 Which Boilers are fitted with Forced Draft ✓ Which Boilers are fitted with Superheaters ✓  
 No. and Description of Boilers ✓ Working Pressure ✓

IS A REPORT ON MAIN BOILERS NOW FORWARDED? ✓  
 IS A DONKEY BOILER FITTED? ✓ If so, is a report now forwarded? ✓

Can the donkey boiler be used for domestic purposes only ✓  
 PLANS. Are approved plans forwarded herewith for Shafting 28-10-41 Main Boilers ✓ Auxiliary Boilers ✓ Donkey Boilers ✓  
 (If not state date of approval)

Superheaters ✓ General Pumping Arrangements ✓ Oil fuel Burning Piping Arrangements ✓

## SPARE GEAR.

Has the spare gear required by the Rules been supplied ✓  
 State the principal additional spare gear supplied ✓

The foregoing is a correct description.

L. P. Bunell  
 Manufacturer.



5:5:44, 28:7:44, 21:8:44, 19:9:44  
 31-8-44, 11-9-44, 5-10-44, 10-10-44, 27-10-44  
 3-11-44, 7-11-44, 22-11-44, 13-12-44, 9-1-45, 26-1-45.

Dates of Survey while building  
 During progress of work in shops - -  
 During erection on board vessel - - -  
 Total No. of visits Eleven 15

Dates of Examination of principal parts - Cylinders 7-11-44 Slides 31-8-44 Covers 7-11-44  
 Pistons 31-8-44 Piston Rods 31-8-44 Connecting rods 31-8-44  
 Crank shaft 27-10-44 Thrust shaft 27-10-44 Intermediate shafts ✓  
 Tube shaft ✓ Screw shaft 5-10-44 Propeller 5-10-44  
 Stern tube 5-10-44 Engine and boiler seatings ✓ Engines holding down bolts ✓  
 Completion of fitting sea connections ✓ Boilers fixed ✓ Engines tried under steam 17/5/45  
 Completion of pumping arrangements ✓ Thickness of adjusting washers ✓  
 Main boiler safety valves adjusted ✓ Identification Mark ✓ Thrust shaft material Steel Identification Mark ✓  
 Crank shaft material Steel Identification Marks ✓ Tube shaft, material ✓ Identification Mark ✓  
 Intermediate shafts, material ✓ Identification Marks ✓ Steam Pipes, material ✓ Test pressure ✓ Date of Test ✓  
 Screw shaft, material Steel Identification Mark ✓ Is the flash point of the oil to be used over 150° F. ✓  
 Is an installation fitted for burning oil fuel ✓ Have the requirements of the Rules for the use of oil as fuel been complied with ✓  
 Is the vessel (not being an oil tanker) fitted for carrying oil as cargo ✓ If so, have the requirements of the Rules been complied with ✓  
 If the notation for Ice Strengthening is desired, state whether the requirements in this respect have been complied with ✓  
 Is this machinery duplicate of a previous case Yes If so, state name of vessel Brown and T. 15-16

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

The machinery has not been constructed in accordance with the Rule Requirements of the Society but has been constructed under the Supervision of the Society.  
 The scantlings are in accordance with the Society's Rules.  
 The workmanship is of good description.  
 The machinery, in our opinion, will be eligible for Record of L.M.C. (with date) when efficiently installed in a classed vessel.

The machinery installed in this vessel has been tried out & completed in accordance with the specification issued

J. Dobie

Certificate to be sent to  
 (The Surveys are requested not to write on or below the space for Committee's Minute.)

The amount of Entry Fee	£	:	:	When applied for,
Special	£	8	0	19
Donkey Boiler Fee	£	:	:	When received,
Travelling Expenses (if any)	£	3	18	19

Raynell and J.E. Surpie  
 Engineer Surveyors to Lloyd's Register of Shipping.

Committee's Minute  
 Assigned Not for classing Committee