

# REPORT ON STEAM RECIPROCATING ENGINE MACHINERY.

Received at London Office

Date of writing Report 4th Feb 1935 When handed in at Local Office 5 MAR 1935 Port of HULL

No. in Survey held at Hull Date, First Survey 23rd Nov. 1934 Last Survey 28th Feb. 1935  
 Reg. Book. on the Steel S.K. "Kingston Chrysolite" (Number of Visits 19) Tons { Gross 448.04  
 Net 173.71

Built at Beverley By whom built Book, Welton & Gemmell Ltd. Yard No. 599 When built 1935.2

Engines made at Hull By whom made Charles D. Holmes & Co. Ltd. Engine No. 1472 When made 1935

Boilers made at Hull By whom made Charles D. Holmes & Co. Ltd. Boiler No. 1472 When made 1935

Registered Horse Power Owners Kingston Steam Trawling Co. Ltd. Port belonging to Hull

Nom. Horse Power as per Rule 117 Is Refrigerating Machinery fitted for cargo purposes no Is Electric Light fitted Yes

Trade for which Vessel is intended Fishing

ENGINES, &c.—Description of Engines Reciprocating - Compound. Revs. per minute

Dia. of Cylinders 13 1/2" + 27" Length of Stroke 27" No. of Cylinders 2 No. of Cranks 2

Crank shaft, dia. of journals as per Rule 7.6" as fitted 7.75" Crank pin dia. 7.75" Crank webs Mid. length breadth 12" Thickness parallel to axis 5"  
 Mid. length thickness 5" shrunk Thickness around eye-hole 3 1/2"

Intermediate Shafts, diameter as per Rule 7.2" as fitted 7.625" Thrust shaft, diameter at collars as per Rule 220 to 205 mm. as fitted 220 to 205 mm.

Tube Shafts, diameter as per Rule 8.03" as fitted 8.375" Is the tube shaft fitted with a continuous liner Yes

Bronze Liners, thickness in way of bushes as per Rule 17.28/32" as fitted 18/32" Thickness between bushes as per Rule 13/32" as fitted 15/32" 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 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 shaft no If so, state type ✓

Length of Bearing in Stern Bush next to and supporting propeller 36"

Propeller, dia. 10'6" Pitch 11' No. of Blades 4 Material B.I. whether Movable no Total Developed Surface 39 sq. feet

Feed Pumps worked from the Main Engines, No. One Diameter 3" Stroke 13 1/2" Can one be overhauled while the other is at work ✓

Bilge Pumps worked from the Main Engines, No. One Diameter 3" Stroke 13 1/2" Can one be overhauled while the other is at work ✓

Feed Pumps { No. and size Duplex 7x5x6" Pumps connected to the Main Bilge Line { No. and size Duplex 7x5x6" + Ejector 3" dia  
 How driven Steam How driven Steam

Ballast Pumps, No. and size Two 5 1/2" x 6" x 15" Lubricating Oil Pumps, including Spare Pump, No. and size Two 5 1/2" x 6" x 15"

Are two independent means arranged for circulating water through the Oil Cooler Yes Suctions, connected to both Main Bilge Pumps and Auxiliary Bilge Pumps;—In Engine and Boiler Room 2 @ 2" dia

In Pump Room 5 @ 2" dia In Holds, &c.

Main Water Circulating Pump Direct Bilge Suctions, No. and size One 4 3/4" dia Independent Power Pump Direct Suctions to the Engine Room Bilges, No. and size One 3" ejector

Are all the Bilge Suction Pipes in holds and tunnel well fitted with strum-boxes Yes

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 Yes

Are all Sea Connections fitted direct on the skin of the ship Yes Are they fitted with Valves or Cocks Back

Are they fixed sufficiently high on the ship's side to be seen without lifting the stokehold plates Yes Are the Overboard Discharges 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 the Blow Off Cocks fitted with a spigot and brass covering plate Yes

What Pipes pass through the bunkers Forward suction. How are they protected Wood casings

What pipes pass through the deep tanks ✓ Have they been tested as per Rule Yes

Are all Pipes, Cocks, Valves, and Pumps in connection with the machinery and all boiler mountings accessible at all times Yes

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 Yes Is the Shaft Tunnel watertight ✓ Is it fitted with a watertight door ✓ worked from ✓

MAIN BOILERS, &c.—(Letter for record "S") Total Heating Surface of Boilers 1940 sq ft

Is Forced Draft fitted no No. and Description of Boilers One Single Ended Working Pressure 215 lb

IS A REPORT ON MAIN BOILERS NOW FORWARDED? Yes

IS A DONKEY BOILER FITTED? no If so, is a report now forwarded? ✓

Is the donkey boiler intended to be used for domestic purposes only ✓

PLANS. Are approved plans forwarded herewith for Shafting ✓ Main Boilers Yes Auxiliary Boilers ✓ Donkey Boilers ✓

(If not state date of approval)

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

### SPARE GEAR.

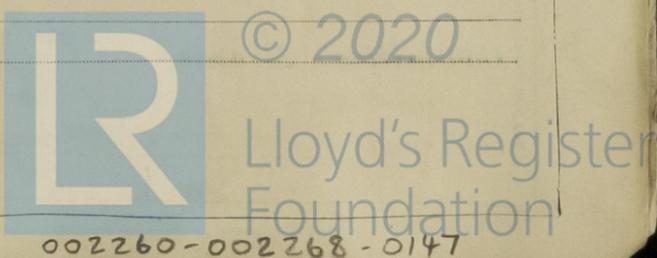
Has the spare gear required by the Rules been supplied Yes

State the principal additional spare gear supplied One set of air pump valves.  
 main + donkey check valve seats.  
 Impeller + shaft for centrifugal pump.  
 Top + bottom end bolts for cent. pump.  
 Valves for duplex pump.  
 Feed pump ram.  
 Safety valve spring.

The foregoing is a correct description,  
FOR CHARLES D. HOLMES & CO., LTD.

*[Signature]*

Manufacturer.



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

1934: - Nov 23, 30. (Dec 6, 19, 24)  
 1935: - Jan 10, 14, 17, 21, 28, 31 Feb 8, 13, 16, 18, 18, 22, 27, 28.  
 19.

Dates of Examination of principal parts—Cylinders 8-2-35 Slides 8-2-35 Covers 8-2-35  
 Pistons 8-2-35 Piston Rods 8-2-35 Connecting rods 8-2-35  
 Crank shaft 21-1-35 Thrust shaft See Newcastle Report 92230. Intermediate shafts 28-1-35  
 Tube shaft - Screw shaft 10-1-35 Propeller 10-1-35  
 Stern tube 24-12-34 Engine and boiler seatings 13-2-35 Engines holding down bolts 18-2-35  
 Completion of fitting sea connections 17-8-35  
 Completion of pumping arrangements 13-2-35 Boilers fixed 13-2-35 Engines tried under steam 28-2-35  
 Main boiler safety valves adjusted 22-2-35 Thickness of adjusting washers P 5/16" S 5/16"  
 Crank shaft material Steel Identification Mark 952 Thrust shaft material see Newcastle Report Identification Mark ✓  
 Intermediate shafts, material Steel Identification Marks 952 Tube shaft, material - Identification Mark ✓  
 Screw shaft, material Steel Identification Mark 952 Steam Pipes, material 10 copper Test pressure 430 lb Date of Test 16-2-35  
 Is an installation fitted for burning oil fuel ho. Is the flash point of the oil to be used over 150°F. ✓  
 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 ho. 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 "Kingston Cornelian"

General Remarks (State quality of workmanship, opinions as to class, &c.) The machinery of this vessel (see also Newcastle Report 92230) has been built under special survey and in accordance with the approved plans and rule and the materials and workmanship are sound and good. It has been tried under working conditions and found satisfactory and is eligible in my opinion, to be classed with record L.M.C. 2,35 C.L.

The Newcastle Report No 92230 on the turbine of this installation forwarded herewith

The Surveyors are requested not to write on or below the space for Committee's Minute.

The amount of Entry Fee ... £ 3 : 0 :  
 Ret. Special L.M.C. £ 25 : 17 :  
 Donkey Boiler Fee ... £ : :  
 Travelling Expenses (if any) £ : :  
 When applied for 5 MAR 1935  
 When received, 1.4 1935 7/4

B. Moffatt.  
 Engineer Surveyor to Lloyd's Register of Shipping.

Committee's Minute FRI. 15 MAR 1935  
 Assigned + L.M.C. 2,35 C.L.

