

REPORT ON STEAM RECIPROCATING ENGINE MACHINERY.

Received at London Office

28 APR 1928

Date of writing Report

19

When handed in at Local Office

27 APR 1928

Port of Sunderland

No. in Survey held at Sunderland

Date, First Survey 11 Oct 27 Last Survey 20 Apr 1928

(Number of Visits 40)

Reg. Book. 40054 on the S.S. "BACTRIA"

Built at Sunderland By whom built J. L. Thompson & Sons, Ltd. Yard No. 561

Gross 2402
Tons Net 1209
When built 1928

Engines made at Sunderland By whom made J. Dickinson & Sons, Ltd. Engine No. 892

when made 1928

Boilers made at -do-

By whom made -do-

Boiler No. 892

when made 1928

Registered Horse Power

Owners America-levant line Ltd.

Port belonging to London

Nom. Horse Power as per Rule

403

Is Refrigerating Machinery fitted for cargo purposes

No

Is Electric Light fitted

Yes

Trade for which Vessel is intended General cargo

ENGINES, &c.—Description of Engines Triple Expansion - Single Screw.

Revs. per minute 46

Dia. of Cylinders 24" - 40" - 66" Length of Stroke 45" No. of Cylinders Three

No. of Cranks Three

Crank shaft, dia. of journals as per Rule 12.568

as fitted 12 3/4" Crank pin dia. 12 3/4"

Crank webs Mid. length breadth 24 1/4"

Thrust shaft, diameter at collars as per Rule 12.568

Intermediate Shafts, diameter as fitted 12 1/8"

as per Rule 11.94"

Crank webs Mid. length thickness 8"

shrunk Thickness parallel to axis 8"

Tube Shafts, diameter as fitted 12 1/8"

as per Rule 12 1/8"

Screw Shaft, diameter as fitted 13 3/4"

as per Rule 13 3/4"

Bronze Liners, thickness in way of bushes as per Rule 4.04"

as fitted 3 1/4"

Is the { screw } shaft fitted with a continuous liner { 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 junctions made by fusion through the whole thickness of the liner

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

Is an approved Oil Gland or other appliance fitted at the after end of the tube shaft

Yes

Propeller, dia. 16 1/2" Pitch 15 1/4" No. of Blades Four

Material Bronze

whether Moveable No

Total Developed Surface 82 sq. feet

Feed Pumps worked from the Main Engines, No. None

Diameter 4"

Stroke 2 1/2"

Can one be overhauled while the other is at work Yes

Bilge Pumps worked from the Main Engines, No. Two

Diameter 4"

Stroke 2 1/2"

Can one be overhauled while the other is at work Yes

Feed Pumps { No. and size Two - Weirs 7 1/2 x 9 1/2 x 2 1/2 }

How driven Steam

Pumps connected to the Main Bilge Line

No. and size One - Ballast 8 1/2 x 10 x 10

Ballast Pumps, No. and size One - 8 x 10 x 10

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 4 at 2 1/2" dia & 1 at 3" dia

In Holds, &c. Fore Hold 2 at 2 1/2" dia Main Hold 2 at 3" dia

Aft Hold 2 at 3" dia

Tunnel Well 1 at 2 1/2" dia

Main Water Circulating Pump Direct Bilge Suctions, No. and size 1 at 8" dia

Independent Power Pump Direct Suctions to the Engine Room Bilges,

No. and size 1 at 4 1/2" dia

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 Both

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

None

How are they protected

None

What pipes pass through the deep tanks

None

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

Yes

Is it fitted with a watertight door

Yes

MAIN BOILERS, &c.—(Letter for record (S))

Total Heating Surface of Boilers 5944 sq. ft.

Is Forced Draft fitted Yes

No. and Description of Boilers 2-Single Ended Marine Type Working Pressure 180 lbs. sq. in.

IS A REPORT ON MAIN BOILERS NOW FORWARDED? Yes

IS A DONKEY BOILER FITTED? Yes

If so, is a report now forwarded? Yes

PLANS. Are approved plans forwarded herewith for Shafting

(If not state date of approval)

Main Boilers Yes

Auxiliary Boilers

Superheaters

General Pumping Arrangements Yes (with Ship Rpt.)

Oil fuel Burning Piping Arrangements

Donkey Boilers Yes

SPARE GEAR. State the articles supplied:— 1 C.I. Propeller, 1 set of coupling bolts & nuts, 2 Main Bearing bolts & nuts,

2 Top End bolts & nuts, 2 Bottom End bolts & nuts, 1 Set Feed Pump Valves, 1 Set Bilge Pump Valves, 50 Assorted

bolts & nuts, 3 Bars of Assorted Iron, 30 Condenser Tubes, 6 Plain Boiler Tubes, 1 w.t. Steel Plate,

1 Safety Valve Spring, 3 Patent Tube Stoppers, 3 Common Tube Stoppers, 1 Bottom End bearing, 6 Junk

Ring Bolts & Nuts.

The foregoing is a correct description,

For J. Dickinson & Sons, Limited.

J. Dickinson

Manufacturer.

Director.



© 2020

Lloyd's Register
Foundation

003333-003340-0082

Dates of Survey while building
 During progress of work in shops - - - 1927. Oct. 11, 28. Nov. 22, 23. 28/ Jan. 9, 10, 11. Feb. 1, 2, 3, 14, 24, 28, 29. Mar. 1, 2, 6, 8, 10, 12, 13, 14, 16.
 During erection on board vessel - - - 19. 21, 22, 23, 26, 27, 28, 29, 30. Apr. 2, 3, 4, 5, 13, 17, 19, 20.
 Total No. of visits 40

Dates of Examination of principal parts—Cylinders 27-3-28 Slides 19-3-28 Covers 27-3-28
 Pistons 8-3-28 Piston Rods 1-2-28 Connecting rods 9-1-28
 Crank shaft 1-3-28 Thrust shaft 23-3-28 Intermediate shafts 22-3-28
 Tube shaft ✓ Screw shaft 22-3-28 Propeller 26-3-28
 Stern tube 23-3-28 Engine and boiler seatings 16-3-28 Engines holding down bolts 3-4-28
 Completion of fitting sea connections 6-3-28
 Completion of pumping arrangements 20-4-28 Boilers fixed 30-3-28 Engines tried under steam 5-4-28
 Main boiler safety valves adjusted 5-4-28 Thickness of adjusting washers PE 3/8" : PA 3/8" : SF 3/8" : SA 3/8" : Dky. F. & A. 3/8"
 Crank shaft material Ingot Steel Identification Mark A.T.G. 1-3-28 Thrust shaft material Ingot Steel Identification Mark A.T.G. 23-3-28
 Intermediate shafts, material Ingot Steel Identification Marks A.T.G. 22-3-28 Tube shaft, material ✓ Identification Mark ✓
 Screw shaft, material Ingot Steel Identification Mark 22-3-28 Steam Pipes, material ✓ Hot Rolled Steel Test pressure 540 lbs. Date of Test 2-4-28
 Is an installation fitted for burning oil fuel No. Is the flash point of the oil to be used over 150°F. ✓
 Have the requirements of the Rules for carrying and burning oil fuel been complied with ✓
 Is this machinery duplicate of a previous case Yes. If so, state name of vessel S.S. "BOSNIA" (Sld. Rpt No. 29682)

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

The materials and workmanship are good.
 The Machinery has been constructed under Special Survey, and satisfactorily fitted in the vessel, and is eligible in my opinion for classification and the notation
 ✕ L.M.C. 4, 28.

It is submitted that
 this vessel is eligible for
 THE RECORD. + LMC 4.28 CL. F.D.

J. H.
 1/5/28.

a. T. Griffith.
 Engineer Surveyor to Lloyd's Register of Shipping.

The amount of Entry Fee ... £ 5: : When applied for,
 Special ... £ 85: 9 : 23 Apr. 1928
 Donkey Boiler Fee ... £ 7: 2 :
 Travelling Expenses (if any) £ : : When received,
 8-5-28

Committee's Minute FRI 4 MAY 1928
 Assigned + LMC 4:28
 CERTIFICATE WRITTEN CL. F.D.