

REPORT ON MACHINERY

No. 35778

22 JAN 1925

Received at London Office

Date of writing Report

19

When handed in at Local Office

21. 1.

1925 Port of

Hull.

No. in Survey held at Hull & Goole.

Date, First Survey 7/7/24

Last Survey 21/1/1925

1925

Reg. Book. on the Hull S. Inf "ABEILLE No 19"

(Number of Visits 27)

Tons { Gross 125 Net 3

Master Built at Goole.

By whom built Goole S.B. & R. Co. Ltd.

When built 1925

Engines made at Hull

By whom made Barlow S.B. & R. Co. Ltd

when made 1925

Boilers made at Hull.

By whom made Barlow S.B. & R. Co. Ltd

when made 1925

Registered Horse Power

Owners Cie de Reunyon & de Lancement des Port belonging to Havre.

Nom. Horse Power as per Section 28 93.

Is Refrigerating Machinery fitted for cargo purposes ho

Is Electric Light fitted ho

ENGINES, &c.—Description of Engines

Triple Expansion

No. of Cylinders 3

No. of Cranks 3

Dia. of Cylinders 13 1/2 - 22 - 34 Length of Stroke 24 Revs. per minute

Dia. of Screw shaft as per rule 7.37 as fitted 8 1/2 Material of screw shaft Steel

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 water tight

in the propeller boss Yes 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 two

liners are fitted, is the shaft lapped or protected between the liners

Dia. of Tunnel shaft as per rule 6.67 as fitted 6.67

Dia. of Crank shaft journals as per rule 6.93 as fitted 6.93

Dia. of Crank pin 4 1/2

Size of Crank webs 13 1/2 x 4 3/8 Dia. of thrust shaft under

collars 4 1/4 Dia. of screw 9 - 3 Pitch of Screw 11 - 6

No. of Blades 4

State whether moveable ho

Total surface 36 sq. ft.

No. of Feed pumps Two Diameter of ditto 2 1/2 Stroke 15

Can one be overhauled while the other is at work Yes

No. of Bilge pumps Two Diameter of ditto 2 1/2 Stroke 15

Can one be overhauled while the other is at work Yes

No. of Donkey Engines One

Sizes of Pumps 8 x 6 x 8 duplex

No. and size of Suctions connected to both Bilge and Donkey pumps

In Engine Room Two @ 2"

In Holds, &c. 1 @ 2" Each compartment.

No. of Bilge Injections 1 sizes 3 1/2 Connected to condenser, or to circulating pump CP.

Is a separate Donkey Suction fitted in Engine room & size Yes 2"

Are all the bilge suction pipes fitted with roses

Are the roses in Engine room always accessible

Are the sluices on Engine room bulkheads always accessible

Are all connections with the sea direct on the skin of the ship

Are they Valves or Cocks Both

Are they fixed sufficiently high on the ship's side to be seen without lifting the stokehold plates

Are the Discharge Pipes above or below the deep water line

Are the Blow Off Cocks fitted with a spigot and brass covering plate

Are they each fitted with a Discharge Valve always accessible on the plating of the vessel

How are they protected

What pipes are carried through the bunkers

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

Are the Bilge Suction Pipes, Cocks, and Valves arranged so as to prevent any communication between the sea and the bilges

Is the Screw Shaft Tunnel watertight

Is it fitted with a watertight door

worked from

BOILERS, &c.—(Letter for record S.)

Manufacturers of Steel Hull B. Scotland.

Parkgate S. Co.

Total Heating Surface of Boilers 400 sq. ft. Is Forced Draft fitted ho

No. and Description of Boilers One Single Ended.

No. of Certificate 3539

Working Pressure 180 lbs. Tested by hydraulic pressure to 320 lbs.

Date of test 29.10.24

No. of Certificate 3539

Can each boiler be worked separately

Area of fire grate in each boiler 47 sq. ft.

No. and Description of Safety Valves to

each boiler 2 Spring loaded

Area of each valve 5.9 sq. in.

Pressure to which they are adjusted 180 lbs.

Are they fitted with easing gear Yes

Smallest distance between boilers or uptakes and bunkers or woodwork 6"

Mean dia. of boilers 13 - 3

Length 11 - 6

Material of shell plates Steel

Thickness 1 3/32 Range of tensile strength 28/32 tons

Are the shell plates welded or flanged

Descrip. of riveting: cir. seams

long. seams T.R. S.B.S. Diameter of rivet holes in long. seams 1 1/8

Pitch of rivets 4 1/2

Lap of plates or width of butt straps 16 3/4

Per centages of strength of longitudinal joint rivets 89 plate 85.4

Working pressure of shell by rules 181

Size of manhole in shell 16 x 12

Size of compensating ring 3 1/2 x 30 x 1 3/32

No. and Description of Furnaces in each boiler 2 Brighton

Material Steel Outside diameter 48 1/4

Length of plain part top 10 1/2 bottom 10

Thickness of plates crown 7/8 bottom 7/8

Description of longitudinal joint welded

No. of strengthening rings

Working pressure of furnace by the rules 189

Combustion chamber plates: Material Steel Thickness: Sides 23/32 Back 11/16

Top 23/32 Bottom 23/32

Working pressure by rules 181

Pitch of stays to ditto: Sides 10 1/4 x 9 3/4 Back 9 3/8 x 8 1/4

Top 10 1/4 x 9 3/4

Working pressure by rules 181

Material of stays Steel Area at smallest part 2.03 sq. in.

Area supported by each stay 100

Working pressure by rules 181

End plates in steam space

Material Steel Thickness 1 1/8

Pitch of stays 8 1/2 x 7 1/2

How are stays secured

Working pressure by rules 181

Material of stays Steel

Area at smallest part 6.1

Area supported by each stay 324 sq. in.

Working pressure by rules 204

Material of Front plates at bottom Steel

Thickness 7/8

Material of Lower back plate Steel Thickness 7/8

Greatest pitch of stays 13 3/4 x 9 3/8

Working pressure of plate by rules 229

Diameter of tubes 3 1/2

Pitch of tubes 4 7/8

Material of tube plates Steel

Thickness: Front 7/8 Back 13/16

Mean pitch of stays 9 3/4

Girders to Chamber tops: Material Steel

Depth and

Pitch across wide water spaces 13 1/2

Working pressures by rules 188

Distance apart 10 1/4

Number and pitch of stays in each 2 @ 9 3/4

thickness of girder at centre 9 x 3 1/4 (2)

Length as per rule 30 3/4

% of strength of joint

Working pressure by rules 229

Steam dome: description of joint to shell

Diameter

Thickness of shell plates

Material

Description of longitudinal joint

Diam. of rivet holes

Pitch of rivets

Working pressure of shell by rules

Crown plates

Thickness

How stayed

UPERHEATER. Type

Date of Approval of Plan

Tested by Hydraulic Pressure to

Date of Test

Is a Safety Valve fitted to each Section of the Superheater which can be shut off from the Boiler

Is Easing Gear fitted

Diameter of Safety Valve

Pressure to which each is adjusted

002352-002360-0191



IS A DONKEY BOILER FITTED?

No

If so, is a report now forwarded?

SPARE GEAR. State the articles supplied:— Two top end bolts & nuts. Two bottom end bolts & nuts. Two main bearing bolts & nuts. Set of coupling bolts & nuts. Spare valves for main and donkey pumps. Main & donkey check valves. 25 Condensed tubes. One bottom end bearing complete.

The foregoing is a correct description,

SHIPBUILDING & ENGINEERING CO. LIMITED

Attyack

Manufacturer.

Dates of Survey while building { During progress of work in shops - - 1924: - Jul 7.22, Aug 11.21, Sep 1.4.10.17.30, Oct 8.15.27.28.29 Nov 4.13.24.29  
During erection on board vessel - - - Dec 1.5.10.12.13.15.20. 1925: Jan 20.21.  
Total No. of visits 27

Is the approved plan of main boiler forwarded herewith

Yes

" " " donkey " " "

Yes

Dates of Examination of principal parts—Cylinders 27.10.24 Slides 24.11.24 Covers 27.10.24 Pistons 24.11.24 Rods 13.11.24  
Connecting rods 13.11.24 Crank shaft 29.10.24 Thrust shaft 27.10.24 Tunnel shafts ✓ Screw shaft 27.10.24 Propeller 27.10.24  
Stern tube 27.10.24 Steam pipes tested 13.12.24 Engine and boiler seatings 5.12.24 Engines holding down bolts 13.12.24  
Completion of pumping arrangements 21.1.25. Boilers fixed 5.12.24 Engines tried under steam 20.12.24.  
Completion of fitting sea connections 1.12.24 Stern tube 1.12.24 Screw shaft and propeller 1.12.24.  
Main boiler safety valves adjusted 20.12.24. Thickness of adjusting washers  $\frac{11}{32}$  -  $\frac{11}{32}$   
Material of Crank shaft Steel Identification Mark on Do. 129 J.H.M. Material of Thrust shaft Steel Identification Mark on Do. 129 J.H.M.  
Material of Tunnel shafts ✓ Identification Marks on Do. ✓ Material of Screw shafts Steel Identification Marks on Do. 129 J.H.M.  
Material of Steam Pipes S.B. Copper, 3 3/4 Bars x 7 lbs. ✓ Test pressure 360 lbs per sq. in.  
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 Section 49 of the Rules been complied with ✓

Is this machinery duplicate of a previous case ✓ If so, state name of vessel ✓

General Remarks (State quality of workmanship, opinions as to class, &c. The engines & boiler of this vessel have been built under special survey and in accordance with the approved plans & the Society's Rules. The materials & workmanship are good. They have been satisfactorily fitted on board, tried under working conditions & found good. Safety valves adjusted and pumping arrangements found in order. The machinery is eligible in my opinion to have record in the Register Book of L.M.C. 1.25. C.L.

It is submitted that this vessel is eligible for THE RECORD. + LMC 1.25. CL.

CERTIFICATE WRITTEN

J.W.D. 23/1/25

Engineer Surveyor to Lloyd's Register of Shipping.

The amount of Entry Fee ... £ 2 : 0 :  
Special ... £ 25 : 5 :  
Donkey Boiler Fee ... £ : :  
Travelling Expenses (if any) £ : :  
When applied for, 15/1 1925  
When received, 17/1 1925

Committee's Minute

Assigned

23 JAN 1925  
+ L.M.C. 1.25  
C.L.



© 2020

Lloyd's Register Foundation