

REPORT ON BOILERS.

No. 42395.

Received at London Office WFO. 27 DEC. 1922

Date of writing Report 19 When handed in at Local Office 22/12/22 Port of Glasgow

No. in Survey held at Glasgow Date, First Survey 17.1.21 Last Survey Dec 1921 1922

Reg. Book. 78203 on the S/S British Architect (Number of Visits) Gross 7388 Net 4394

Master Built at Glasgow By whom built Blythwood S/S 2029801 When built 1922

Engines made at Glasgow By whom made Dunsmuir & Jackson Ltd 538 When made 1922

Boilers made at Glasgow By whom made " 60/125 When made 1922

Registered Horse Power 616. Owners British Tankers Ltd Port belonging to London.

MULTITUBULAR BOILERS ~~MAIN~~ ~~HEATING~~ ~~OR~~ DONKEY. — Manufacturers of Steel Steel Co of Scotland

(Letter for record S) Total Heating Surface of Boilers 958 sq ft Is forced draft fitted No No. and Description of Boilers one single ended Working Pressure 180 Tested by hydraulic pressure to 320 Date of test 29.9.22

No. of Certificate 16124 Can each boiler be worked separately Area of fire grate in each boiler 82.4 sq ft No. and Description of safety valves to each boiler Double Spring Area of each valve 3.98 sq in Pressure to which they are adjusted 185

Are they fitted with easing gear Yes In case of donkey boilers, state whether steam from main boilers can enter the donkey boiler No

Smallest distance between boilers or uptakes and bunkers or woodwork Mean dia. of boilers 10-6 $\frac{3}{4}$ Length 10-6

Material of shell plates S Thickness 57/64 Range of tensile strength 28-32 Are the shell plates welded or flanged No

Descrip. of riveting: cir. seams DR 20/11 long. seams TR 10/8 Diameter of rivet holes in long. seams 11/16 Pitch of rivets 67/8

Length of butt straps 1-4 Per centages of strength of longitudinal joint rivets 110 plate 84.4 Working pressure of shell by rules 181 Size of manhole in shell 19 $\frac{3}{4}$ x 15 $\frac{3}{4}$ Size of compensating ring 2.9 $\frac{3}{4}$ x 2.4 $\frac{3}{4}$ x 17/16 No. and Description of Furnaces in each boiler 2 Corrugated Material S Outside diameter 3-5 Length of plain part top Thickness of plates crown 3 1/2 bottom

Description of longitudinal joint welded No. of strengthening rings Working pressure of furnace by the rules 187 Combustion chamber plates: Material S Thickness: Sides 11/16 Back 21/32 Top 11/16 Bottom 11/16 Pitch of stays to ditto: Sides 9 $\frac{1}{2}$ x 8 $\frac{3}{4}$ Back 8 $\frac{1}{2}$ x 9 $\frac{1}{16}$

Top 8 $\frac{1}{2}$ x 9 $\frac{7}{8}$ If stays are fitted with nuts or riveted heads Nuts Working pressure by rules 181 Material of stays S Area at smallest part 173.136 $\frac{2}{7}$ Area supported by each stay 82.3 Working pressure by rules 180 End plates in steam space: Material S Thickness 1 $\frac{1}{2}$

Pitch of stays 20 x 13 $\frac{3}{8}$ How are stays secured DN Working pressure by rules 181 Material of stays S Area at smallest part 457

Area supported by each stay 267.5 Working pressure by rules 186 Material of Front plates at bottom S Thickness 1 Material of Lower back plate S Thickness 7/8 Greatest pitch of stays 14 $\frac{1}{2}$ Working pressure of plate by rules 190 Diameter of tubes 3

Pitch of tubes 4 $\frac{1}{4}$ x 4 $\frac{3}{16}$ Material of tube plates S Thickness: Front 1 Back 25/32 Mean pitch of stays 10 $\frac{5}{8}$ Pitch across wide water spaces 14 Working pressures by rules 183 Girders to Chamber tops: Material 9x4 Depth and thickness of girder at centre 8 x 7 $\frac{1}{8}$ (2) Length as per rule 2-4 $\frac{9}{16}$ Distance apart 97/8 Number and pitch of Stays in each 241.85

Working pressure by rules 203 Steam dome: description of joint to shell % of strength of joint

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

SUPERHEATER. Type None 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

Diameter of Safety Valve Pressure to which each is adjusted Is Easing Gear fitted

DUNSMUIR & JACKSON, Limited.

(The foregoing is a correct description,

Manufacturer.

Dates of Survey During progress of work in shops -- See accompanying Is the approved plan of boiler forwarded herewith Yes

while building During erection on board vessel -- Machinery Report Total No. of visits

GENERAL REMARKS (State quality of workmanship, opinions as to class, &c.) This Boiler has been built under Special Survey in accordance with the approved plan & the workmanship & material are of good quality - is now securely fitted on board.

This Report accompanies that of the Machinery

Survey Fee ... £ 4 : 4 : When applied for, 25/12/22.

Travelling Expenses (if any) £ : : When received, 25/12/22.

Committee's Minute GLASGOW 26 DEC. 1922

Assigned See accompanying machinery report.

Engineer Surveyor to Lloyd's Register of Shipping.



Lloyd's Register Foundation

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