

REPORT ON BOILERS.

No. 8636.

Received at London Office

SAT. SEP. 19. 1914

TUE. NOV. 17. 1914

Date of writing Report

191

When handed in at Local Office

18 Sep. 1914. Port of

MIDDLESBRO'

No. in Survey held at

Stockton

Date, First Survey July 3rd 1914.

Last Survey Sept 12th 1914.

Reg. Book.

on the

Steel screw steamer "Barford" BURESK (SS No. 642) Tons

(Number of Visits 8)

Gross

Net

Master

Built at Stockton

By whom built Richardson, Buck & Co. Ltd.

When built 1914

Engines made at

Stockton

By whom made

Messrs. Blair & Co.

When made 1914

Boilers made at

Stockton

By whom made

Riley Bros Ltd. (No. 4730)

When made 1914

Registered Horse Power

Owners

Messrs. Sandich & Co.

Port belonging to

MULTITUBULAR BOILERS MAIN, AUXILIARY OR DONKEY. — Manufacturers of Steel John Spencer Sons Ltd.

(Letter for record (a) Total Heating Surface of Boilers 863 sq ft Is forced draft fitted

Boilers One S. E. Gyle Mult. Working Pressure 90 lbs Tested by hydraulic pressure to 180 lbs Date of test 12.9.14

No. of Certificate 5385 Can each boiler be worked separately Area of fire grate in each boiler 33 sq ft No. and Description of

safety valves to each boiler 2 direct spring Area of each valve 7.07 Pressure to which they are adjusted 95 lbs

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 1.9 Int. Mean dia. of boilers 10.0 Length 10.0

Material of shell plates Steel Thickness 17/32 Range of tensile strength 28-32 Are the shell plates welded or flanged No

Descrip. of riveting: cir. seams B.R. Lap long. seams B.P.S. 2 Rivet Diameter of rivet holes in long. seams 15/16 Pitch of rivets 4

Lap of plates or width of butt straps 7 1/2 x 17/32 Per centages of strength of longitudinal joint rivets 96.6 plate 76.5 Working pressure of shell by

rules 91 lbs Size of manhole in shell 19 x 15 Size of compensating ring 7 x 7/4 M. Neil No. and Description of Furnaces in each

boiler Two plain Material Steel Outside diameter 36 Length of plain part top 78 Thickness of plates crown 9/16 bottom 105 bottom 6

Description of longitudinal joint Weld No. of strengthening rings None Working pressure of furnace by the rules 104 lbs Combustion chamber

plates: Material Steel Thickness: Sides 1/2 Back 1/2 Top 1/2 Bottom 3/4 Pitch of stays to ditto: Sides 9 x 7 Back 8 1/4 x 9

Top 9 x 7 If stays are fitted with nuts or riveted heads Nuts Working pressure by rules 97 lbs Material of stays Iron Diameter at

smallest part 1.45 Area supported by each stay 95.58 Working pressure by rules 91 End plates in steam space: Material Steel Thickness 25/32

Pitch of stays 18 x 17 How are stays secured 12 x 25/32 double 4 nuts Working pressure by rules 95 Material of stays Iron Diameter at smallest part 5.05

Area supported by each stay 324 Working pressure by rules 117 Material of Front plates at bottom Steel Thickness 25/32 Material of

Lower back plate Steel Thickness 25/32 Greatest pitch of stays 13 x 9 Working pressure of plate by rules 168 Diameter of tubes 3 1/2

Pitch of tubes 4 5/8 x 4 1/2 Material of tube plates Steel Thickness: Front 25/32 Back 9/16 Mean pitch of stays 9 1/4 Pitch across wide

water spaces 15 Working pressures by rules 104 lbs Girders to Chamber tops: Material Steel Depth and thickness of

girder at centre 5 1/2 x 1 1/2 Length as per rule 27 Distance apart 9 Number and pitch of Stays in each 2 27

Working pressure by rules 99 lbs Superheater or Steam chest: how connected to boiler None Can the superheater be shut off and the boiler worked

separately Diameter Length Thickness of shell plates Material Description of longitudinal joint Diam. of rivet

holes Pitch of rivets Working pressure of shell by rules Diameter of flue Material of flue plates Thickness

If stiffened with rings Distance between rings Working pressure by rules End plates: Thickness How stayed

Working pressure of end plates Area of safety valves to superheater Are they fitted with easing gear

SURVEY REQUEST NO. 963. ATTACHED.

RILEY BROS. (BOILER MAKERS) LIMITED

W. O. Riley, DIRECTOR, Manufacturer.

Dates of Survey: During progress of work in shops 1914. Jul. 3-31. Aug. 25-29. Sep. 2-5-9-12. while building: During erection on board vessel

Is the approved plan of boiler forwarded herewith Yes

Total No. of visits 8

GENERAL REMARKS (State quality of workmanship, opinions as to class, &c.) This boiler has been constructed under Special Survey, is of good material and workmanship, and has been tested by hydraulic pressure with satisfactory results. It is to be fitted on board the vessel at this port.

Survey Fee ... £ 2 : 18. : } When applied for, 191 MONTHLY A/c. When received, 191

Wm Morrison & Co Engineer Surveyor to Lloyd's Register of British and Foreign Shipping.

Committee's Minute FRI. NOV. 20. 1914

Assigned

