

21 AUG 1924

REPORT ON BOILERS.

No. 12020

Received at London Office WED. JUL 23 1924

Report 192 When handed in at Local Office 19.7.24 192 Port of Middlesbrough

held at Stockton-on-Tees Date, First Survey 18th June Last Survey 16th July 1924

(Number of Visits 6) Tons { Gross
Net

he Name of vessel not known

Built at _____ By whom built _____ Yard No. _____ When built _____

By whom made _____ Engine No. _____ When made _____

Stockton By whom made Thos Riley Bros Ltd Boiler No. 5542 When made 1924

Power Owners Strath S.S. Co Ltd (J. L. Downing) Port belonging to Cardiff

TUBULAR BOILERS MAIN, AUXILIARY, OR DONKEY.

D. Calverley & Sons (Stay bars)

of Steel South Durham S. Co (Malleable): Steel bar of Scotland & (Letter for Record (S))

Surface of Boilers 745 $\frac{1}{2}$ Is forced draught fitted _____ Coal or Oil fired _____

ption of Boilers _____ Working Pressure 120

ulic pressure to 230 Date of test 16.7.24 No. of Certificate 6378 Can each boiler be worked separately _____

ate in each Boiler 27 1/2 $\frac{1}{2}$ No. and Description of safety valves to each boiler 2 Spring loaded

t of valves per boiler { per Rule 2 1/2 Pressure to which they are adjusted 120 Are they fitted with easing gear Yes
as fitted _____

y boilers, state whether steam from main boilers can enter the donkey boiler No See Reg. Ltr. 27/8/24.

between boilers or uptakes and bunkers or woodwork _____ Is oil fuel carried in the double bottom under boilers _____

between shell of boiler and tank top plating _____ Is the bottom of the boiler insulated _____

dia. of boilers 10'-0" Length 9'-0" Shell plates: Material Steel Tensile strength 28-32

5'-8" Are the shell plates welded or flanged No Description of riveting: circ. seams { end 2 Riv Lap
inter. _____

Built - 2 Riveted Diameter of rivet holes in { circ. seams 15/16 13/16 Pitch of rivets { 3" x 6"
long. seams 13/16 4 1/2"

Strength of circ. end seams { plate 68.66 Percentage of strength of circ. intermediate seam { plate _____
rivets 45.00 rivets _____

Strength of longitudinal joint { plate 82.00 Working pressure of shell by Rules 125 lbs
rivets 85.20
combined 92.4

tt straps { outer 8 3/4" x 17/32 No. and Description of Furnaces in each Boiler Two plain
inner 8 3/4" x 21/32

Steel Tensile strength 26-30 Smallest outside diameter 38"

part { top 65-5/8 Thickness of plates { crown 19/32 Description of longitudinal joint Weld
bottom 91 bottom 3/8 mean

stiffening rings on furnace or c.c. bottom none Working pressure of furnace by Rules 120 lbs

team space: Material Steel Tensile strength 26-30 Thickness 7/8" Pitch of stays 16 1/2" x 16 1/2"
17 1/2" x 13"

secured nuts + 8 1/2" dia x 3/8" long washers Working pressure by Rules 128 lbs

aterial { front Steel Tensile strength { 26-30 Thickness { 7/8" 5/8"
back Steel 26-30

stay tubes in nests 10 3/16" Pitch across wide water spaces 14" x 8 1/2" Working pressure { front 141
back 132

ustion chamber tops: Material Steel Tensile strength 28-32 Depth and thickness of girder _____

" x 1 1/4" Length as per Rule 26" Distance apart 9" No. and pitch of stays _____

8" Working pressure by Rules 127 Combustion chamber plates: Material Steel

26-30 Thickness: Sides 17/32 Back 17/32 Top 17/32 Bottom 23/32

ditto: Sides 9 1/4" x 8" Back 10" x 7 3/4" Top 9" x 8" Are stays fitted with nuts or riveted over nuts

re by Rules 120 Front plate at bottom: Material Steel Tensile strength 26-30

7/8" Lower back plate: Material Steel Tensile strength 26-30 Thickness 7/8"

at wide water space 14" x 7 3/4" Are stays fitted with nuts or riveted over nuts

re 245 Main stays: Material Steel Tensile strength 28-32

y of stay, 2 3/8" No. of threads per inch 6 Area supported by each stay 301.5

reads 2 3/8" Screw stays: Material Steel Tensile strength 26-30

essure by Rules 130 lbs No. of threads per inch 9 Area supported by each stay 77.5

turned off part, 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

per threads 1 3/8" No. of threads per inch 9 Area supported by each stay 77.5

Working pressure by Rules 130 Are the stays drilled at the outer ends no Margin stays: Diameter { At turned off part, ✓
 No. of threads per inch 9 Area supported by each stay 88 Working pressure by Rules 142
 Tubes: Material iron External diameter { Plain 3 1/4 Thickness Nº 10-459 No. of threads per inch 5/16
 Pitch of tubes 4 3/8" x 4 1/4" Working pressure by Rules 130 lbs + 206 lbs Manhole compensation: 8
 shell plate 20" x 16 Section of compensating ring 7 x 3/4 in. rail No. of rivets and diameter of rivet holes 36 @
 Outer row rivet pitch at ends 8 1/2" Depth of flange if manhole flanged ✓ Steam Dome: Material no
 Tensile strength _____ Thickness of shell _____ Description of longitudinal joint _____
 Diameter of rivet holes _____ Pitch of rivets _____ Percentage of strength of joint { Plate _____
 Internal diameter _____ Working pressure by Rules _____ Thickness of crown _____ Rivets _____
 stays _____ Inner radius of crown _____ Working pressure by Rules _____
 How connected to shell _____ Size of doubling plate under dome _____ Diameter of rivet
 of rivets in outer row in dome connection to shell _____

Type of Superheater _____ Manufacturers of { Tubes _____
 Number of elements _____ Material of tubes _____ Steel castings _____
 Material of headers _____ Tensile strength _____ Internal diameter and thickness of tubes _____
 the boiler be worked separately _____ Thickness _____ Can the superheater
 Area of each safety valve _____ Is a safety valve fitted to every part of the superheater which can be shut off from the boiler
 Rules _____ Are the safety valves fitted with easing gear _____ Working
 tubes _____, castings _____ Pressure to which the safety valves are adjusted _____ Hydraulic
 to free the superheater from water where necessary _____ and after assembly in place _____ Are drain cocks

Have all the requirements of Sections 14 to 23 inclusive for boilers been complied with _____

FOR

RILEY BROS. (BOILERMAKERS) LIMITED
 The foregoing is a correct description

O. H. Shields SECRETARY

Dates { During progress of work in shops - - } 1924 June 18. 20. 21 July 2. 11. 16 Are the approved plans of boiler and superheater forwarded hereunder
 of Survey { while building { During erection on board vessel - - } (If not state date of approval.)
 Total No. of visits 6

GENERAL REMARKS (State quality of workmanship, opinions as to class, &c.) This boiler has been by
special survey: is of good material and workmanship and on completion
tested by hydraulic pressure with satisfactory results

Survey Fee £ 4 : 19 : 0
 Travelling Expenses (if any) £ ✓

When applied for, MONTHLY A/c.
 When received, _____

Wm Morrison

Engineer Surveyor to Lloyd's Register

Committee's Minute TUES. 26 AUG 1924

Assigned _____



© 2019

Lloyd's Register
 Foundation