

Rpt. 5a.

NEWCASTLE-ON-TYNE

No. 68725

## REPORT ON BOILERS.

No. 91744

Received at London Office

JUE. 28. DEC. 1915

Date of writing Report

191

When handed in at Local Office

24/12/15

Port of

Middlesbrough

No. in Survey held at

Stockton-on-Tees

Date, First Survey

May 19

Last Survey

Dec. 23-1915

Reg. Book.

on the

S S Polly Bridge.

(Number of Visits

Gross

403

Tons

Net

163

Master

Built at

South Shields

By whom built

J. P. Rennoldson &amp; Sons

When built

1916

Engines made at

South Shields

By whom made

J. P. Rennoldson &amp; Sons Ltd

When made

1916

Boilers made at

Stockton

By whom made

Rennoldson &amp; Sons Ltd (No 4840)

When made

1915

Registered Horse Power

Owners

H. Keethan &amp; Sons Ltd

Port belonging to

Hull

MULTITUBULAR BOILERS—MAIN, AUXILIARY OR DONKEY.—Manufacturers of Steel

John Hume &amp; Sons

(Letter for record

(S)

Total Heating Surface of Boilers

1400 sq ft

Is forced draft fitted

No. and Description of

Boilers

One single ended

Working Pressure

130

Tested by hydraulic pressure to

260

Date of test 23/12/15

No. of Certificate

5596

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

Area of each valve

Pressure to which they are adjusted

Are they fitted with easing gear

In case of donkey boilers, state whether steam from main boilers can enter the donkey boiler

Smallest distance between boilers or uptakes and bunkers or woodwork

Inside

Mean dia. of boilers

12'-9"

Length 10'-3"

Material of shell plates

steel

Thickness

3/4"

Range of tensile strength

29 1/2 - 33

Are the shell plates welded or flanged

no

Descrip. of riveting: cir. seams

2 R. lap

long. seams

2 B-3 Riv

Diameter of rivet holes in long. seams

1 1/2"

Pitch of rivets

7"

Gap of plates or width of butt straps

13 x 1/2"

Per centages of strength of longitudinal joint

rivets 98.0

Working pressure of shell by

rules

132

Size of manhole in shell

19" x 15"

Size of compensating ring

7 x 3" An. riv

No. and Description of Furnaces in each

boiler

3 plain

Material

steel

Outside diameter

39"

Length of plain part

top 74 1/2"

Thickness of plates

Description of longitudinal joint

Weld

No. of strengthening rings

none

Working pressure of furnace by the rules

145

Combustion chamber

plates: Material

steel

Thickness: Sides

5/8"

Back

3/4"

Top

5/8"

Bottom

Pitch of stays to ditto: Sides 10" x 9"

Back 9" x 8 3/4"

Top 11" x 9"

If stays are fitted with nuts or riveted heads

nuts

Working pressure by rules

138

Material of stays

steel

Diameter at

smallest part

1 1/4"

Area supported by each stay

78.75

Working pressure by rules

147

End plates in steam space: Material

steel

Thickness

Pitch of stays

18" x 16"

How are stays secured

nuts &amp; washers

Working pressure by rules

134

Material of stays

steel

Diameter at smallest part

3 1/2"

Area supported by each stay

297

Working pressure by rules

130

Material of Front plates at bottom

steel

Thickness

29/32"

Material of

Lower back plate

steel

Thickness

29/32"

Greatest pitch of stays

14 1/2" x 8 3/4"

Working pressure of plate by rules

158

Diameter of tubes

3 1/2"

Pitch of tubes

4 3/4" x 4 3/4"

Material of tube plates

steel

Thickness: Front

29/32"

Back

Mean pitch of stays

10 1/2"

Pitch across wide

water spaces

14 1/2"

Working pressures by rules

140

Girders to Chamber tops: Material

steel

Depth and thickness of

girder at centre

8" x 1 1/2"

Length as per rule

31"

Distance apart

11"

Number and pitch of Stays in each

2 @ 9"

Working pressure by rules

136

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. 1139.

ATTACHED.

FOR The foregoing is a correct description,

RILEY BROS. (BOILERMAKERS) LIMITED.

Manufacturer.

SECRETARY

Dates of Survey: During progress of work in shops - 19/5 May 1928, Jun 2, Jul 13, 23, Sep 7, 8, Nov 5, 12/16. Is the approved plan of boiler forwarded herewith

yes

while building: During erection on board vessel - 23, 26, Dec. 2, 6, 7, 18, 21.

Total No. of visits

17

GENERAL REMARKS (State quality of workmanship, opinions as to class, etc.)

This boiler has been built under special survey: is of good material and workmanship and on completion was tested by hydraulic pressure with satisfactory results

Survey Fee

£ 4 - 13 - 0

When applied for

Monthly 1915

Travelling Expenses (if any) £

When received,

191

Committee's Minute

FRI. 12 MAY. 1916

Assigned

See minute Book p. 68725

Engineer Surveyor to Lloyd's Register of Shipping.

Lloyd's Register Foundation

W1641-0120