

REPORT ON BOILERS.

No. 19262.

Received at London Office

13 DEC 1950

Report 6th Dec. 1950. When handed in at Local Office 12th Dec. 1950. Port of MIDDLESBROUGH.

Survey held at Stockton-on-Tees. Date, First Survey 10th Feb. Last Survey 5th Dec. 1950.

on the M/T ISLAS GEORGAS. (Number of Visits 11.) Tons Gross Net

Built at By whom built Yard No. When built

By whom made Engine No. When made

Stockton. By whom made Stockton Chemical Engineers & Riley Boilers Ltd. Boiler No. 7210. When made 1950.

Power Owners Port belonging to

TUBULAR BOILERS—MAIN, AUXILIARY, OR DONKEY.

ers of Steel Colvilles Ltd.. (Letter for Record)

ing Surface of Boilers 1518 sq. ft. Is forced draught fitted Yes. Coal or Oil fired Oil

Description of Boilers 1 single ended multitubular. Working Pressure 150 lbs. per sq.

Are hydraulic pressure to 275 lbs. Date of test 5.12.50 No. of Certificate 7327. Can each boiler be worked separately

egate in each Boiler No. and Description of safety valves to each boiler

ch set of valves per boiler per Rule. Pressure to which they are adjusted. Are they fitted with easing gear.

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

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

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

end dia. of boilers 11'8" Length 11'4" Shell plates: Material steel. Tensile strength 29/33

13/16" Are the shell plates welded or flanged No. Description of riveting: circ. seams end D.R.L.

T.R.D.B.S. Diameter of rivet holes in circ. seams 1.3/16" Pitch of rivets 3.73"

of strength of circ. end seams plate 68.1 rivets 58.1 Percentage of strength of circ. intermediate seam plate rivets

of strength of longitudinal joint plate 85.6 rivets 97.2 Working pressure of shell by Rules 154 lbs per sq. inch.

5/8" combined. No. and Description of Furnaces in each Boiler 2 Morrison.

butt straps outer 5/8" inner 3/4" Tensile strength 26/30 tons per sq. in. Smallest outside diameter 3'7 1/2"

steel. Thickness of plates crown 15/32" Description of longitudinal joint welded.

main part top bottom Working pressure of furnace by Rules 155 lbs per sq. inch.

if stiffening rings on furnace or c.c. bottom. Working pressure of furnace by Rules 155 lbs per sq. inch.

n steam space: Material steel. Tensile strength 26/30 tons Thickness 27/32" Pitch of stays 15" c 12 1/2"

s secured double nuts and washers. Working pressure by Rules 167 lbs per sq. inch.

Material front steel. Tensile strength 26/30 tons per sq. in. Thickness 27/32"

back steel. Tensile strength 26/30 tons per sq. in. Thickness 13/16"

of stay tubes in nests 10.9/32" Pitch across wide water spaces 13" Working pressure front 161 lbs/sq. in.

back 152 lbs/sq. in. Depth and thickness of girder

combustion chamber tops: Material steel. Tensile strength 26/30 tons per sq. " No. and pitch of stays

1" x 27/32" Length as per Rule 2'6" Distance apart 7 1/2"

ded dogs. Working pressure by Rules 155 lbs/sq. in. Combustion chamber plates: Material steel

th 26/30 tons per sq. " Thickness: Sides 5/8" Back 21/32" Top 5/8" Bottom 5/8"

to ditto: Sides 10" x 8 1/2" Back 10" x 10" Top 10" x 7 1/2" Are stays fitted with nuts or riveted over nuts.

sure by Rules 150 lbs/sq. in. Front plate at bottom: Material steel. Tensile strength 26/30 tons per sq. "

27/32" Lower back plate: Material steel. Tensile strength 26/30 tons per sq. " Thickness 27/32"

at wide water space 13" Are stays fitted with nuts or riveted over nuts.

ure 151 lbs/sq. in. Main stays: Material steel. Tensile strength 28/32 tons per sq. inch.

ody of stay or threads 2 1/4" No. of threads per inch 6 TPI. Area supported by each stay 187.5 sq. in.

ure by Rules 185 lbs/sq. in. Screw stays: Material steel. Tensile strength 26/30 tons per sq. in.

urned off part or threads 1 1/2" No. of threads per inch 9 T.P.I. Area supported by each stay 100 sq. inch.

Working pressure by Rules 181 lbs/sq. in. the stays drilled at the outer ends. No. Margin stays: Diameter { At turned off part, or Over threads

No. of threads per inch 9 T.P.I. Area supported by each stay 132.25 sq. in. Working pressure by Rules 187 lbs/sq. in.

Tubes: Material H.R. weldless External diameter { Plain 2 1/8" ✓ Stays 2 1/2" ✓ Thickness { 10 W.G. ✓ 5/16" ✓ No. of threads per inch 9

Pitch of tubes 3 3/4" x 3 1/2" Working pressure by Rules 175 lbs/sq. in. Manhole compensation: Size

shell plate 21" x 17" Section of compensating ring 6 1/2" x 1" ✓ No. of rivets and diameter of rivet holes 52 rivet

Outer row rivet pitch at ends 6 1/2" ✓ Depth of flange if manhole flanged Steam Dome: Material none

Tensile strength Thickness of shell Description of longitudinal joint

Diameter of rivet holes Pitch of rivets Percentage of strength of joint { Plate Rivets

Internal diameter Working pressure by Rules Thickness of crown No. and

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 Steel forgings Steel castings

Number of elements Material of tubes Internal diameter and thickness of tubes

Material of headers Tensile strength Thickness Can the superheater

the boiler be worked separately Is a safety valve fitted to every part of the superheater which can be shut off from the boiler

Area of each safety valve Are the safety valves fitted with easing gear Working

Rules Pressure to which the safety valves are adjusted Hydraulic

tubes forgings and castings and after assembly in place Are

valves fitted to free the superheater from water where necessary

Have all the requirements of Sections 14 to 22 inclusive for boilers been complied with

The foregoing is a correct description
For and on behalf of
STOCKTON & CROMBIE ENGINEERS

1950
Dates of Survey { During progress of work in shops - - Feb. 10 Aug. 17.29 Sept. 28
while building { During erection on board vessel - - - Oct. 12.18.24. Nov. 2.14.30
Dec. 5. Are the approved plans of boiler and superheater forwarded herewith (If not state date of approval.)

Total No. of visits 11.

Is this Boiler a duplicate of a previous case If so, state Vessel's name and Report No.

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

This boiler has been constructed under Special Survey, or tested material and in accordance with the Rule Requirements and approved plan.

The materials and workmanship are good and on completion the boiler was hydraulically tested to 275 lbs per sq. inch and found satisfactory.

This boiler is being despatched to Sweden for Uddevallarvet Aktiebolag Ship No. 113

Survey Fee ... £ 25 : 6 : - } When applied for, 12.12.1950.

Travelling Expenses (if any) £ : : } When received 19.....

E. Norman Stuart
Engineer Surveyor to Lloyd's Register

FRI. 31 AUG 1951

Committee's Minute

Assigned See Mch. F.E. Rpt.