

REPORT ON BOILERS.

No. 9902

Received at London Office

23 JAN 1928

Date of writing Report

191

When handed in at Local Office

21st Jan. 1928

Port of

Belfast

No. in Survey held at

Belfast

Date, First Survey

See first Entry Machinery report

191

Reg. Book.

No 271 on the

Steel Sc. CHESAPEAKE

(Number of Visits)

Gross
Tons
Net

Master

Built at Belfast

By whom built

Workman Clark & Co. Ltd.

When built

1928

Engines made at

Belfast

By whom made

Workman Clark & Co. Ltd.

When made

1928

Boilers made at

Belfast

By whom made

Workman Clark & Co. Ltd.

When made

1928

Registered Horse Power

Owners

Anglo American Oil Co. Ltd.

Port belonging to

Belfast

MULTITUBULAR BOILERS

No 1. See plan.

MAIN, AUXILIARY OR DONKEY.

Manufacturers of Steel Wm Beardmore & Co. Ltd.

(Letter for record S.)

Total Heating Surface of Boilers

1818 sq ft

Is forced draft fitted

Yes

No. and Description of

Boilers are S. B. Cylindrical

Working Pressure

150 lbs.

Tested by hydraulic pressure to

275 lbs.

Date of test 4. 11. 27

No. of Certificate

913

Can each boiler be worked separately

Yes

Area of fire grate in each boiler

No. and Description of

safety valves to each boiler

Two special S.H. Spring loaded

Area of each valve

Pressure to which they are adjusted

150 lbs.

Are they fitted with easing gear

Yes

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

Yes

Smallest distance between boilers or uptakes and bunkers or woodwork

over 5'0"

Mean dia. of boilers

Length

11'-6"

Material of shell plates

Steel

Thickness

29"

Range of tensile strength

28-32 tons

Are the shell plates welded or flanged

No

Descrip. of riveting: cir. seams

double

long. seams

hebble d.f.s.

Diameter of rivet holes in long. seams

32"

Pitch of rivets

6 3/8"

Gap of plates or width of butt straps

13 5/8"

Per centages of strength of longitudinal joint

rivets 85.96

Working pressure of shell by

rules

152 lbs.

Size of manhole in shell

15" x 19"

Size of compensating ring

32 1/4" x 32 1/8" x 29"

No. and Description of Furnaces in each

boiler 3 main

Material

Steel

Outside diameter

38"

Length of plain part

top 85.78

bottom 85.78

Thickness of plates

crown 1 1/2"

bottom 1 1/2"

Description of longitudinal joint

welded

No. of strengthening rings

Working pressure of furnace by the rules

189 lbs.

Combustion chamber

plates: Material

Steel

Thickness: Sides

9/16"

Back

1 1/16"

Top

9/16"

Bottom

1 1/16"

Pitch of stays to ditto: Sides

8 1/2" x 7 1/2"

Back

8" x 7 1/4"

Top

9 1/2" x 7"

If stays are fitted with nuts or riveted heads

both

Working pressure by rules

smallest part

1 3/2"

Area supported by each stay

62 sq in

Working pressure by rules

163 lbs.

End plates in steam space: Material

Steel

Thickness

1 1/16"

Pitch of stays

17" x 19"

How are stays secured

double - nut

Working pressure by rules

160 lbs.

Material of stays

Steel

Diameter at smallest part

2 1/2"

Area supported by each stay

323 sq in

Working pressure by rules

170 lbs.

Material of Front plates at bottom

Steel

Thickness

7/8"

Material of

Lower back plate

Steel

Thickness

1 1/16"

Greatest pitch of stays

13 1/2" x 7 3/4"

Pitch of tubes

2 7/8" x 3 3/4"

Material of tube plates

Steel

Thickness: Front

7/8"

Back

3/4"

Mean pitch of stays

9 1/4"

Pitch across wide

water spaces

13 1/2" x 7 1/4"

Working pressures by rules

Front 160 lbs.

Back 155 lbs.

Girders to Chamber tops: Material

girder at centre

8"-1 1/2"

Length as per rule

31 1/16"

Distance apart

9 1/2"

Number and pitch of Stays in each

three

7"

Working pressure by rules

154 lbs.

Superheater or Steam chest: how connected to boiler

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

Yes

The foregoing is a correct description,

FOR WORKMAN, CLARK & CO., LIMITED

Manufacturer.

Dates of Survey
During progress of work in shops - -
while building
During erection on board vessel - -

Is the approved plan of boiler forwarded herewith

yes

Total No. of visits

GENERAL REMARKS

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

This Boiler was constructed under Special Survey. The materials & workmanship are sound. It has been efficiently installed on board the vessel & the safety valves were adjusted under steam.

Survey Fee

...

£

See mech.

Rpt.

When applied for,

191

Travelling Expenses (if any) £

When received,

191

Committee's Minute

TUES. 31 JAN 1928

Assigned

See P.B. rpt. attached

R. Lee Ames
Engineer Surveyor to Lloyd's Register of British and Foreign Shipping.

Lloyd's Register
Foundation

W1647-0017