

## REPORT ON BOILERS.

No. 69975.

Date of writing Report

19

When handed in at Local Office

21. 9. 45

Received at London Office

1- OCT 1945

No. in Survey held at  
Reg. Book.

ANNAN

Date, First Survey

Port of

Glasgow

21-12-44

Last Survey

13<sup>th</sup> Sept. 1945

(Number of Visits 20)

Gross Tons

Built at GREAT YARMOUTH

By whom built

CRABTREE (1931) LTD.

Yard No. 1841

When built 1945.

Boilers made at ANNAN

By whom made

COCHRAN &amp; CO. ANNAN LD.

Boiler No. 16460

When made 1945.

Owners

Port belonging to

## VERTICAL DONKEY BOILER—

No. One

Description

Cochran

Manufacturers of steel

Colvilles Ltd.

Made at Arman

By whom made

Cochran &amp; Co. Annan Id.

When made 1945

Working pressure 125

tested by hydraulic pressure to 238

Date of test 13:9:45

No. of Certificate 22008

Fire grate area

Oil fired

Description of safety valves

ordinary

No. of safety valves 2

Area of each 4.9"

Pressure to which they are adjusted

If fitted with easing gear

Yes If steam from main boilers can

enter the donkey boiler

-

Diameter of donkey boiler 7'0"

Length 14'0"

Material of shell plates S

Thickness 19/32" 23/32"

Range of tensile strength

28-32

Description of riveting long. seams

D.R. Lap

Diameter of rivet holes 31/32"

Whether punched or

drilled drilled

Pitch of rivets 2.962" 3.03"

Lap of plating 4"

Per centage of strength of joint

Rivets 68.9

Working pressure of shell by

rules 129.7

Thickness of shell crown plates 1" x 17/32"

Radius of do. 3'6"

No. of stays to do. 3

Diameter of stays

Diameter of

furnace—Top

Bottom 6'0"

Length of furnace

Thickness of furnace side plates 21/32"

Description of joint Seamless Working

pressure of furnace by rules 152

Thickness of Ogee ring 1"

Working pressure of Ogee ring by rules 133

Thickness of furnace

crown plates 21/32"

Radius of do. 3'0"

Stayed by Hemisphere

Diameter of uptake 16" x 20"

Thickness of uptake

plates 21/32"

Thickness of tube plates

front 1 1/16"

Mean pitch of stay tubes in nest 10.77"

Pitch in outer vertical rows 8"

Diameter of tube holes FRONT

stay 2 1/16"

BACK

stay 2 1/16"

Working pressure of tube plates by rules F. 126.2

Tubes: Material

S

External diameter

stay 2 1/16"

plain 2 1/16"

Thickness

stay 1 1/32"

plain 1 1/32"

No. of threads per inch 9

Pitch of tubes 4" x 3 3/4"

Working pressure by rules 175

Manhole compensation; Size of opening in shell plate 21" x 17"

Section of compensating

ring 7 1/2" x 1 1/32"

No. of rivets and diameter of rivet holes 40 @ 31/32"

Outer row pitch at ends 4 1/8"

The foregoing is a correct description,

Heating Surface 500 sq. ft.

FOR COCHRAN &amp; CO. ANNAN, LTD.

Dates

of Survey

while

building

During progress of

work in shops - 1944 Dec 21 1945 Jan 10 Feb 14 21 Mar 2 13 Apr 6 20 May 3 18 Jun 1 8 15 29 Jul 13 Aug 1 10 17

During erection on

board vessel - 1945 Oct 25 Nov 21 (1946) Feb 7 26 Apr 16 26 May 9 14 28 June 14

Total No. of visits

20

Drawing No.

30611

Is the approved plan of boiler forwarded herewith No  
Retained for Duplicate Cases.

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

The materials and workmanship are good.

The boiler has been constructed under Special Survey.

To the order of The Admiralty for a Steam Lighter Building by Messrs. Crabtree (1931) Ltd. Great Yarmouth.

London

The boiler has been securely fitted on board the vessel under Special Survey; the materials and workmanship are good and upon completion the boiler was examined under steam & safety valves adjusted to 125 lb.

J. E. Smith

Survey Fee ... £ 4 : 4 : 0

When applied for Nov 9/45

Travelling Expenses (if any) £ : : }

When received

Committee's Minute

GLASGOW

27 SEP 1945

Assigned

Deferred.

Engineer Surveyor to Lloyd's Register of Shipping.

FRI. 19 JUL 1946

See F.E. Machy apt.

Lloyd's Register Foundation

010924. 010932-0202