

REPORT ON MACHINERY.

No. 2913

Date of writing Report 14 Aug 1920 When handed in at Local Office 19 Port of New York
No. in Survey held at New York Date, First Survey 14 May Last Survey 20 June 1920
Reg. Book. on the Steam Trawler "John Catting" (Number of Visits 16)
Master Paisley Built at Paisley By whom built Bow Mc Lachlan & Co Tons { Gross 1918 Net 1918
Engines made at Paisley By whom made Bow Mc Lachlan & Co L when made 1918
Boilers made at Paisley By whom made Bow Mc Lachlan & Co L when made 1918
Registered Horse Power 87 Owners Jago Blum Fishing Co L Port belonging to ?
Nom. Horse Power as per Section 28 87 Is Refrigerating Machinery fitted for cargo purposes No Is Electric Light fitted No

ENGINES, &c.—Description of Engines Triple Expansion No. of Cylinders 3 No. of Cranks 3
Dia. of Cylinders 12½ x 21 x 35 Length of Stroke 26 Revs. per minute 110 Dia. of Screw shaft as per rule 7.56 Material of screw shaft Iron
Is the screw shaft fitted with a continuous liner the whole length of the stern tube Yes Is the after end of the liner made water tight in the propeller boss Yes If the liner is in more than one length are the joints burned ✓ If the liner does not fit tightly at the part between the bearings in the stern tube, is the space charged with a plastic material insoluble in water and non-corrosive ✓ If two liners are fitted, is the shaft lapped or protected between the liners ✓ Length of stern bush 34"
Dia. of Tunnel shaft as per rule 6.58 Dia. of Crank shaft journals as per rule 6.91 Dia. of Crank pin 7½ Size of Crank webs 14 x 4½ Dia. of thrust shaft under collars 7½ Dia. of screw 9.6 Pitch of Screw 11.1½ No. of Blades 4 State whether moveable No Total surface 35½
No. of Feed pumps 2 Diameter of ditto 2½ Stroke 12" Can one be overhauled while the other is at work Yes
No. of Bilge pumps 2 Diameter of ditto 2½ Stroke 12 Can one be overhauled while the other is at work Yes
No. of Donkey Engines 2 Sizes of Pumps 6" x 3" x 6" & 6" x 4" x 6" No. and size of Suctions connected to both Bilge and Donkey pumps
In Engine Room One 2" from 12" Ast & one 2" from 12" Suction In Holds, &c. One 2" from fore hold and 12" from slack well also separate suction to slack well and 7 bilges
No. of Bilge Injections 1 sizes 3½" Connected to condenser, or to circulating pump ✓ Is a separate Donkey Suction fitted in Engine room & size 4" or 5"
Are all the bilge suction pipes fitted with roses Yes Are the roses in Engine room always accessible Yes Are the sluices on Engine room bulkheads always accessible None
Are all connections with the sea direct on the skin of the ship Yes Are they Valves or Cocks Both
Are they fixed sufficiently high on the ship's side to be seen without lifting the stokehold plates Yes Are the Discharge Pipes above or below the deep water line Above
Are they each fitted with a Discharge Valve always accessible on the plating of the vessel Yes Are the Blow Off Cocks fitted with a spigot and brass covering plate Yes
What pipes are carried through the bunkers Forward Suction How are they protected Wood casing
Are all Pipes, Cocks, Valves, and Pumps in connection with the machinery and all boiler mountings accessible at all times Yes
Are the Bilge Suction Pipes, Cocks, and Valves arranged so as to prevent any communication between the sea and the bilges Yes
Is the Screw Shaft Tunnel watertight ✓ Is it fitted with a watertight door ✓ worked from ✓

OILERS, &c.—(Letter for record S) Manufacturers of Steel ✓

Total Heating Surface of Boilers 1619 Is Forced Draft fitted No No. and Description of Boilers 1 Single ended
Working Pressure 180 lb Tested by hydraulic pressure to 360 Date of test 15.3.18 No. of Certificate 2631
Can each boiler be worked separately ✓ Area of fire grate in each boiler 50 No. and Description of Safety Valves to each boiler 2 Spring loaded Area of each valve 4.9 Pressure to which they are adjusted 180 Are they fitted with easing gear Yes
Least distance between boilers or uptakes and bunkers or woodwork 7 Mean dia. of boilers 13.6 Length 10.6 Material of shell plates S
Thickness 1½ Range of tensile strength 28.32 Are the shell plates welded or flanged No Descrip. of riveting: cir. seams double
Long. seams TRUSS Diameter of rivet holes in long. seams 1½ Pitch of rivets 8 Lap of plates or width of butt straps 17"
Percentages of strength of longitudinal joint rivets 89.3 Working pressure of shell by rules 180 Size of manhole in shell 16" x 12"
Size of compensating ring 9" 1½ No. and Description of Furnaces in each boiler 3 plain Material S Outside diameter 40 9/16
Length of plain part top 8½ bottom 76 Thickness of plates crown 25 bottom 32 Description of longitudinal joint Welded No. of strengthening rings ✓
Working pressure of furnace by the rules 180 Combustion chamber plates: Material S Thickness: Sides 16 Back 32 Top 16 Bottom 24
Pitch of stays to ditto: Sides 9½ x 9½ Back 9 x 9 Top 9½ x 9½ If stays are fitted with nuts or riveted heads nut Working pressure by rules 181
Material of stays S Area at smallest part 2.07 Area supported by each stay 90.25 Working pressure by rules 206 End plates in steam space: Material S Thickness 1½ Pitch of stays 17 x 17 How are stays secured DN & W Working pressure by rules 181 Material of stays S
Area at smallest part 6.10 Area supported by each stay 295 Working pressure by rules 215 Material of Front plates at bottom S
Thickness 3½ Material of Lower back plate S Thickness 15 Greatest pitch of stays 14.9 Working pressure of plate by rules 219
Diameter of tubes 3½ Pitch of tubes 5 x 4.75 Material of tube plates S Thickness: Front 3½ Back 18 Mean pitch of stays 10"
Pitch across wide water spaces 14" Working pressures by rules 184 Girders to Chamber tops: Material S Depth and thickness of girder at centre 8½ x 1½ Length as per rule 32" Distance apart 9½ Number and pitch of stays in each 2.9½ wing 3
Working pressure by rules 197 Steam dome: description of joint to shell ✓ % of strength of joint ✓
Diameter ✓ Thickness of shell plates ✓ Material ✓ Description of longitudinal joint ✓ Diam. of rivet holes ✓
Pitch of rivets ✓ Working pressure of shell by rules ✓ Crown plates ✓ Thickness ✓ How stayed ✓
SUPERHEATER. Type ✓ Date of Approval of Plan ✓ Tested by Hydraulic Pressure to ✓
Date of Test ✓ Is a Safety Valve fitted to each Section of the Superheater which can be shut off from the Boiler ✓
Diameter of Safety Valve ✓ Pressure to which each is adjusted ✓ Is Easing Gear fitted ✓

009267 - 009277 - 0042

IS A DONKEY BOILER FITTED?

No

If so, is a report now forwarded? ☒

SPARE GEAR. State the articles supplied:—

4 top end bolts, and nuts 2
bottom end bolts, & nuts 1 Set of air feed and
piston valves 1 Set of piston studs 6 Condenser tubes
and 3 boiler tubes a set of donkey suction, and
delivery valves A quantity of assorted bolts, and nuts

The foregoing is a correct description,

Manufacturer.

Dates of Survey while building { During progress of work in shops - -
During erection on board vessel - - -
Total No. of visits

Is the approved plan of main boiler forwarded herewith

" " " donkey " " "

Dates of Examination of principal parts—Cylinders

Slides

Covers

Pistons

Rods

Connecting rods

Crank shaft

Thrust shaft

Tunnel shafts

Screw shaft

Propeller

Stern tube

Steam pipes tested

Engine and boiler seatings

Engines holding down bolts

Completion of pumping arrangements

Boilers fixed

Engines tried under steam

Completion of fitting sea connections

Stern tube

Screw shaft and propeller

Main boiler safety valves adjusted

181

Thickness of adjusting washers

S $\frac{3}{8}$ " P $\frac{1}{4}$ "

Material of Crank shaft

Iron

Identification Mark on Do.

Material of Thrust shaft

Identification Mark on Do.

Material of Tunnel shafts

Identification Marks on Do.

Material of Screw shafts

Iron

Identification Marks on Do.

Material of Steam Pipes

SD steel

Test pressure

☒

Is an installation fitted for burning oil fuel

no

Is the flash point of the oil to be used over 150°F.

☒

Have the requirements of Section 49 of the Rules been complied with

yes

Is this machinery duplicate of a previous case

If so, state name of vessel

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

The workmanship

throughout appears to be good, The machinery was built to plans, and specification jointly approved by this Society, and the British Corporation

Certificate (if required) to be sent to
The Surveyors are requested not to write on or below the space for Committee's Minute.

The amount of Entry Fee ... £ 10 : 10 :
Special ... £ : :
Donkey Boiler Fee ... £ : :
Travelling Expenses (if any) £ : :
When applied for, 19...
When received, 12-8 19-20

W. Johnstone

Engineer Surveyor to Lloyd's Register of Shipping.

Committee's Minute TUE. AUG. 24 1920

Assigned LMC 6.20

CERTIFICATE WRITTEN

Surveyor's Signature



© 2020

Lloyd's Register Foundation