

REPORT ON MACHINERY

No. 29434

THU. 20 JUL. 1916

Received at London Office

Date of writing Report 14-7-16 When handed in at Local Office 17.7.16 Port of Hull

No. in Survey held at Hull Date, First Survey 5-7-15 Last Survey 7-7-16 19
 Reg. Book. 357 on the steel screw trawler Resparko (Number of Visits 60) Tons { Gross 248
 Net 108

Master Beverley Built at Beverley By whom built Cook Wilton & Gemmell When built 1916-7

Engines made at Hull By whom made C. D. Holmes & Co. Ltd (19145) when made 1916-7

Boilers made at Hull By whom made C. D. Holmes & Co. Ltd when made 1916-7

Registered Horse Power 80 Owners G. F. Leight Port belonging to Grimby

Nom. Horse Power as per Section 28 80 Is Refrigerating Machinery fitted for cargo purposes no Is Electric Light fitted yes

ENGINES, &c.—Description of Engines Triple expansion No. of Cylinders Three No. of Cranks 3

Dia. of Cylinders 12 1/2"-22"-35" Length of Stroke 24" Revs. per minute 115 Dia. of Screw shaft 7 3/4" 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 yes

In the propeller boss yes If the liner is in more than one length are the joints burned yes 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 yes If two liners are fitted, is the shaft lapped or protected between the liners yes Length of stern bush 35 1/2"

Dia. of Tunnel shaft 6 1/2" Dia. of Crank shaft journals 6 9/32" Dia. of Crank pin 7" Size of Crank webs 13 1/2" x 4 1/2" Dia. of thrust shaft under collars 7" Dia. of screw 8-9" Pitch of Screw 10-9" No. of Blades 4 State whether moveable no Total surface 29 1/2"

No. of Feed pumps one Diameter of ditto 2 3/4" Stroke 14 1/4" Can one be overhauled while the other is at work yes

No. of Bilge pumps one Diameter of ditto 2 3/4" Stroke 14 1/4" Can one be overhauled while the other is at work yes

No. of Donkey Engines two 2 1/2" dia Sizes of Pumps 5 1/2", 3 1/2" x 5" dia No. and size of Suctions connected to both Bilge and Donkey pumps one 2" dia in each compartment

In Engine Room Two 2" dia all suctions also connected to engine

No. of Bilge Injections one sizes 3 1/2" Connected to condenser, or to circulating pump yes Is a separate Donkey Suction fitted in Engine room & size 2 1/2" dia

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 suctions How are they protected strong wooden casings

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

Dates of examination of completion of fitting of Sea Connections 31-8-15 of Stern Tube 31-8-15 Screw shaft and Propeller 31-8-15

Is the Screw Shaft Tunnel watertight yes Is it fitted with a watertight door yes Worked from yes

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

Total Heating Surface of Boilers 1402 Is Forced Draft fitted no No. and Description of Boilers one single ended

Working Pressure 195 lbs Tested by hydraulic pressure to 390 lbs Date of test 9-6-16 No. of Certificate 3141

Can each boiler be worked separately yes Area of fire grate in each boiler 43.2 sq ft No. and Description of Safety Valves to each boiler Two spring loaded Area of each valve 4.9 sq in Pressure to which they are adjusted 200 lbs Are they fitted with easing gear yes

Smallest distance between boilers or uptakes and bunkers or woodwork 6" lagged Mean dia. of boilers 162" Length 10'-6" Material of shell plates steel

Thickness 1 3/16" Range of tensile strength 28-32 tons Are the shell plates welded or flanged no Descrip. of riveting: cir. seams double

long. seams V.R.A.B. Diameter of rivet holes in long. seams 1 1/32" Pitch of rivets 8 7/16" Lap of plates or width of butt straps 16 7/8"

Per centages of strength of longitudinal joint 85.5 Working pressure of shell by rules 197 Size of manhole in shell 16" x 12"

Size of compensating ring 7" x 1 3/16" No. and Description of Furnaces in each boiler Three plain Material steel Outside diameter 40"

Length of plain part 7 3/4" Thickness of plates 3 1/32" Description of longitudinal joint welded No. of strengthening rings yes

Working pressure of furnace by the rules 197 Combustion chamber plates: Material steel Thickness: Sides 1 1/16" Back 2 3/32" Top 1 1/16" Bottom 1 1/16"

Pitch of stays to ditto: Sides 9 3/4" x 8" Back 9 3/4" x 8" Top 11" x 8" If stays are fitted with nuts or riveted heads nuts Working pressure by rules 200

Material of stays steel Diameter at smallest part 2.07" Area supported by each stay 89 sq in Working pressure by rules 209 End plates in steam space: are

Material steel Thickness 1 5/32" Pitch of stays 18" x 18" How are stays secured by nuts Working pressure by rules 195 Material of stays steel

Diameter at smallest part 6.83" Area supported by each stay 32.4 sq in Working pressure by rules 203 Material of Front plates at bottom steel

Thickness 7/8" Material of Lower back plate steel Thickness 3 1/32" Greatest pitch of stays 15" x 9 3/4" Working pressure of plate by rules 204

Diameter of tubes 3 1/2" Pitch of tubes 4 3/4" Material of tube plates steel Thickness: Front 7/8" + 3/16" double Back 7/8" Mean pitch of stays 9 1/2"

Pitch across wide water spaces 15" Working pressures by rules 250 Girders to Chamber tops: Material steel Depth and thickness of girder at centre 10 3/4" x 1 3/4" Length as per rule 35.8" Distance apart 11" Number and pitch of stays in each Three 8"

Working pressure by rules yes Superheater or Steam chest; how connected to boiler yes Can the superheater be shut off and the boiler worked separately yes Diameter yes Length yes Thickness of shell plates yes Material yes Description of longitudinal joint yes Diam. of rivet holes yes Pitch of rivets yes Working pressure of shell by rules yes Diameter of flue yes Material of flue plates yes Thickness yes

If stiffened with rings yes Distance between rings yes Working pressure by rules yes End plates: Thickness yes How stayed yes

Working pressure of end plates yes Area of safety valves to superheater yes Are they fitted with easing gear yes

W74-0043

Lo ✓

If so, is a report now forwarded?

Rpt. 13

Port of

No. in
Reg. Book
357

Owners

Yard No.

P. pro CHARLES D. HOLMES & CO., INC.

Arthur Holmes

Manufacturer.

Dates of Survey while building { During progress of work in shops -- } 1915: Jul 5, 12, 16, 21, Aug 6, 13, 19, 27, 31, Sep 15, 22, Oct 5, 19, 20, Dec 6, 8, 17, 22, 24 1916: Jan 5, 10
During erection on board vessel -- } 18, 25 Feb 8, 22, Mar 14, 16, 21, 23, 28, 29, 30, Apr 3, 11, 13, 18, 19, 20, 24, May 2, 5, 9, 15, 17, 18, 19, 20, 22, 23, 29
Total No. of visits 60
30, June 6, 9, 16, 17, 19, Jul 1, 3, 6, 7

Is the approved plan of main boiler forwarded herewith *Yes*
please return
by mail, please

Dates of Examination of principal parts—Cylinders 5-5-16 Slides 25-5-16 Covers 25-5-16 Pistons 20-5-16 Rods 20-5-16
Connecting rods 19-5-16 Crank shaft 20-5-16 Thrust shaft 24-12-15 Tunnel shafts ✓ Screw shaft 20-10-15 Propeller 20-10-15
Stern tube 27-8-15 Steam pipes tested 17-6-16 Engine and boiler seatings 31-8-15 Engines holding down bolts 6-6-16
Completion of pumping arrangements 7-7-16 Boilers fixed 1-7-16 Engines tried under steam 7-7-16
Main boiler safety valves adjusted 1-7-16 Thickness of adjusting washers $P \frac{5}{16}$ $\frac{1}{2}$ $\frac{3}{32}$
Material of Crank shaft Iron Identification Mark on Do. 1588 FLS Material of Thrust shaft Iron Identification Mark on Do. 746888
Material of Tunnel shafts ✓ Identification Marks on Do. ✓ Material of Screw shafts Iron Identification Marks on Do. 1526 FLS
Material of Steam Pipes solid drawn copper ✓ Test pressure 40 lbs ✓
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.

Is this machinery duplicate of a previous case yes ✓ If so, state name of person Ross, Riccio, Ristake, etc.

General Remarks (State quality of workmanship, opinions as to class, &c. *The machinery of this vessel has been*

constructed under special survey in accordance with the approved plans & the rules of this Society. The materials & workmanship are good. The boiler & steam pipes have been tested by hydraulic pressure as above & found sound & good. The machinery has been properly fitted & secured on board the vessel & on completion tried under steam & found satisfactory. The safety valves have been adjusted under steam & tested for accumulation which did not exceed 204 lbs. In my opinion the vessel is eligible for the record & L.R.C. 7.16

It is submitted that
this vessel is eligible for
THE RECORD + LMC 7.16.

The amount of Entry Fee ...	£ 1 : 0 :	} When applied for, 19-7-1916
Special ...	£ 12 : 0 :	
Donkey Boiler Fee ...	£ 1 : 0 :	
Travelling Expenses (if any) £ -	2 :	When received, 31/7/1916

Committee's Minute _____ FRI. 21 JUL 1916

Assigned

+ Lh 6.7.16

MACHINERY CERTIFICATE
WRITTEN.

© 2021

Lloyd's Register
Foundation