

# REPORT ON MACHINERY.

SAT. 8 JUL 1899

Port of Glasgow

Received at London Office 18

No. in Survey held at Glasgow  
Reg. Book.Date, first Survey 11 MayLast Survey 3 June 1899.(Number of Visits 5)

122 on the

S. S. OLIVE.Tons { Gross 102  
Net 42

Master

Built at OdenseBy whom built H. L. HansenWhen built 1874Engines made at KielBy whom made Gebrüder Howaldt.when made 1874Boilers made at GlasgowBy whom made Muir & Houstonwhen made 1899.Registered Horse Power 30Owners W. G. T. Pollexfen & Co.Port belonging to Sligo

Nom. Horse Power as per Section 28

Is Electric Light fitted

## ENGINES, &c.—Description of Engines

Diameter of Cylinders		Length of Stroke	Revolutions per minute	Diameter of Screw shaft	No. of Cranks
as per rule				as per rule	
Diameter of Tunnel shaft	as fitted	Diameter of Crank shaft journals	Diameter of Crank pin	Size of Crank webs	
Diameter of screw	Pitch of screw	No. of blades	State whether moveable	Total surface	
No. of Feed pumps	Diameter of ditto	Stroke	Can one be overhauled while the other is at work		
No. of Bilge pumps	Diameter of ditto	Stroke	Can one be overhauled while the other is at work		
No. of Donkey Engines	Sizes of Pumps	No. and size of Suctions connected to both Bilge and Donkey pumps			
In Engine Room		In Holds, &c.			
No. of bilge injections	sizes	Connected to condenser, or to circulating pump	Is a separate donkey suction fitted in Engine room & size		
Are all the bilge suction pipes fitted with roses		Are the roses in Engine room always accessible	Are the sluices on Engine room bulkheads always accessible		
Are all connections with the sea direct on the skin of the ship		Are they Valves or Cocks			
Are they fixed sufficiently high on the ship's side to be seen without lifting the stokehold plates		Are the discharge pipes above or below the deep water line			
Are they each fitted with a discharge valve always accessible on the plating of the vessel		Are the blow off cocks fitted with a spigot and brass covering plate			
What pipes are carried through the bunkers		How are they protected			
Are all pipes, cocks, valves, and pumps in connection with the machinery and all boiler mountings accessible at all times					
Are the bilge suction pipes, cocks, and valves arranged so as to prevent any communication between the sea and the bilges					
When were stern tube, propeller, screw shaft, and all connections examined in dry dock				Is the screw shaft tunnel watertight	
Is it fitted with a watertight door				worked from	

## BOILERS, &c.—

(Letter for record ☒)

Total Heating Surface of Boilers

600 sq. ft. Is forced draft fitted no.No. and Description of Boilers one single endedWorking Pressure 75 lbs Tested by hydraulic pressure to 150 lbs

Date of test 3/6/99 Can each boiler be worked separately ☒ Area of fire grate in each boiler ☒ No. and Description of safety valves to each boiler ☒

with easing gear ☒ Smallest distance between boilers or uptakes and bunkers or woodwork ☒ Mean diameter of boilers 8" 3"

Length 9' 6" Material of shell plates steel Thickness 1/2" Description of riveting: circum. seams double long. seams treble

Diameter of rivet holes in long. seams 15/16" Pitch of rivets 5" Lap of plates 8"

Per centages of strength of longitudinal joint 81.2 Working pressure of shell by rules 82 lbs Size of manhole in shell 16" x 12"

Size of compensating ring McNeil's No. and Description of Furnaces in each boiler one plain Material steel Outside diameter 42"

Length of plain part 43" Thickness of plates 1/2" Description of longitudinal joint welded No. of strengthening rings ☒

Working pressure of furnace by the rules 81 lbs Combustion chamber plates: Material steel Thickness: Sides 1/2" Back 7/16" Top 7/16" Bottom 1/2"

Pitch of stays to ditto: Sides 9 1/2" x 8" Back 8" x 8" Top 7 1/2" x 8" If stays are fitted with nuts or riveted heads nuts Working pressure by rules 92 lbs

Material of stays steel Area at smallest part .96" Area supported by each stay 64" Working pressure by rules 170 lbs End plates in steam space:

Material steel Thickness 5/8" Pitch of stays 15" x 13" How are stays secured nuts Working pressure by rules 94 lbs Material of stays steel

Area at smallest part 2.03" Area supported by each stay 195 sq. in. Working pressure by rules 104 lbs Material of Front plates at bottom steel

Thickness 5/8" Material of Lower back plate steel Thickness 5/8" Greatest pitch of stays 8" x 8" Working pressure of plate by rules 211 lbs

Diameter of tubes 3 1/4" Pitch of tubes 4 1/2" x 4 1/2" Material of tube plates steel Thickness: Front 5/8" Back 5/8" Mean pitch of stays 9"

Pitch across wide water spaces 13 1/2" Working pressures by rules 76 lbs Girders to Chamber tops: Material iron Depth and

thickness of girder at centre 5" x 2" - 1/2" Length as per rule 24" Distance apart 7 1/2" Number and pitch of Stays in each 2 - 8"

Working pressure by rules 78 lbs Superheater or Steam chest; how connected to boiler none 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 ☒



17157 gls

DONKEY BOILER— Description *None.*

Made at \_\_\_\_\_ By whom made \_\_\_\_\_ When made \_\_\_\_\_ Where fixed \_\_\_\_\_

Working pressure tested by hydraulic pressure to \_\_\_\_\_ No. of Certificate \_\_\_\_\_ Fire grate area \_\_\_\_\_ Description of safety valves \_\_\_\_\_

No. of safety valves \_\_\_\_\_ Area of each \_\_\_\_\_ Pressure to which they are adjusted \_\_\_\_\_ If fitted with easing gear \_\_\_\_\_ If steam from main boilers can enter the donkey boiler \_\_\_\_\_

Diameter of donkey boiler \_\_\_\_\_ Length \_\_\_\_\_ Material of shell plates \_\_\_\_\_ Thickness \_\_\_\_\_

Description of riveting long. seams \_\_\_\_\_ Diameter of rivet holes \_\_\_\_\_ Whether punched or drilled \_\_\_\_\_ Pitch of rivets \_\_\_\_\_

Lap of plating \_\_\_\_\_ Per centage of strength of joint \_\_\_\_\_ Rivets \_\_\_\_\_ Thickness of shell crown plates \_\_\_\_\_ Radius of do. \_\_\_\_\_ No. of Stays to do. \_\_\_\_\_

Dia. of stays \_\_\_\_\_ Diameter of furnace Top \_\_\_\_\_ Bottom \_\_\_\_\_ Length of furnace \_\_\_\_\_ Thickness of furnace plates \_\_\_\_\_ Description of joint \_\_\_\_\_ Thickness of furnace crown plates \_\_\_\_\_ Stayed by \_\_\_\_\_ Working pressure of shell by rules \_\_\_\_\_

Working pressure of furnace by rules \_\_\_\_\_ Diameter of uptake \_\_\_\_\_ Thickness of uptake plates \_\_\_\_\_ Thickness of water tubes \_\_\_\_\_

SPARE GEAR. State the articles supplied:—

The foregoing is a correct description,

*Main & Auxiliary Limited* Manufacturer.  
*Jas Stewart Esq*

Dates of Survey while building { During progress of work in shops - - - } 1899:— May. 11. 16. June. 1. 2. 3  
 { During erection on board vessel - - - }  
 Total No. of visits 5

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

ENGINES—Length of stern bush \_\_\_\_\_ Diameter of crank shaft journals \_\_\_\_\_ as per rule \_\_\_\_\_ Diameter of thrust shaft under collars \_\_\_\_\_

BOILERS—Range of tensile strength *24 to 32* Are they welded or flanged *neither* DONKEY BOILERS—No. ☒ Range of tensile strength \_\_\_\_\_Is the approved plan of main boiler forwarded herewith *yes*. Is the approved plan of donkey boiler forwarded herewith ☒

*This Boiler has been constructed under Special Survey & the material & workmanship are of good quality.*  
*Vessel & machinery not classed.*

*This Boiler has been constructed under special survey, but as it does not appear to be intended for a classed vessel, it is submitted that no further action need be taken*

*Rt to gls 59.**8/7/99*

The amount of Entry Fee.. £ : : When applied for,

Special .. .. £ 2 : 2 : { 7/7/99 18/99

Donkey Boiler Fee .. .. £ : : { 1/9/99 18/99

Travelling Expenses (if any) £ : : { 1/9/99 18/99

Engineer Surveyor to Lloyd's Register of British &amp; Foreign Shipping.

Committee's Minute

Assigned

*not for Comm*  
*(unclassed)*