

REPORT ON MACHINERY. 49483

No. _____ Port of London Received at London Office _____ 18
No. in Survey held at London Date, first Survey 11 Dec Last Survey 22 Dec 18 8
Reg. Book. _____ (Number of Visits _____)
on the _____ Tons _____
Master _____ Built at _____ By whom built _____ When built _____
Engines made at _____ By whom made _____ when made _____
Boilers made at _____ By whom made _____ when made _____
Registered Horse Power _____ Owners _____ Port belonging to _____

ENGINES, &c.—

Description of Engines _____
Diameter of Cylinders _____ Length of Stroke _____ No. of Rev. per minute _____ Point of Cut off, High Pressure _____ Low Pressure _____
Diameter of Screw shaft _____ Diam. of Tunnel shaft _____ Diam. of Crank shaft journals _____ Diam. 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 _____
Where do they pump from _____
No. of Donkey Engines _____ Size of Pumps _____ Where do they pump from _____
Are all the bilge suction pipes fitted with roses _____ Are the roses always accessible _____ Are the sluices on Engine room bulkheads always accessible _____
No. of bilge injections _____ and sizes _____ Are they connected to condenser, or to circulating pump _____
How are the pumps worked _____
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 accessible at all times _____
Are the pipes, cocks, and valves arranged so as to prevent an unintentional connection 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 _____ and fitted with a sluice door _____ worked from _____

BOILERS, &c.—

Number of Boilers _____ Description _____ Whether Steel or Iron _____
Working Pressure _____ Tested by hydraulic pressure to _____ Date of test _____
Description of superheating apparatus or steam chest _____
Can each boiler be worked separately _____ Can the superheater be shut off and the boiler worked separately _____
No. of square feet of fire grate surface in each boiler _____ Description of safety valves _____ No. to each boiler _____
Area of each valve _____ Are they fitted with easing gear _____ No. of safety valves to superheater _____ area of each valve _____
Are they fitted with easing gear _____ Smallest distance between boilers and bunkers or woodwork _____ Diameter of boilers _____
Length of boilers _____ description of riveting of shell long. seams _____ circum. seams _____ Thickness of shell plates _____
Diameter of rivet holes _____ whether punched or drilled _____ pitch of rivets _____ Lap of plating _____
Per centage of strength of longitudinal joint _____ working pressure of shell by rules _____ size of manholes in shell _____
Size of compensating rings _____ No. of Furnaces in each boiler _____
Outside diameter _____ length, top _____ bottom _____ thickness of plates _____ description of joint _____ if rings are fitted _____
Greatest length between rings _____ working pressure of furnace by the rules _____ combustion chamber plating, thickness, sides _____ back _____ top _____
Pitch of stays to ditto, sides _____ back _____ top _____ If stays are fitted with nuts or riveted heads _____ working pressure of plating by rules _____
Diameter of stays at smallest part _____ working pressure of ditto by rules _____ end plates in steam space, thickness _____
Pitch of stays to ditto _____ how stays are secured _____ working pressure by rules _____ diameter of stays at smallest part _____
working pressure by rules _____ Front plates at bottom, thickness _____ Back plates, thickness _____
Greatest pitch of stays _____ working pressure by rules _____ Diameter of tubes _____ pitch of tubes _____ thickness of tube _____
plates, front _____ back _____ how stayed _____ pitch of stays _____ width of water spaces _____
Diameter of Superheater or Steam chest _____ length _____ thickness of plates _____ description of longitudinal joint _____ diam. of rivet holes _____
Pitch of rivets _____ working pressure of shell by rules _____ diameter of flue _____ thickness of plates _____ If stiffened with rings _____
Distance between rings _____ working pressure by rules _____ end plates of superheater, or steam chest; thickness _____ how stayed _____
Superheater or steam chest; how connected to boiler _____

X. 49483 Jan

DONKEY BOILER— Description *Marine multitubular, flat sided*
Made at *Millwall* by whom made *East Ferry Road Engineering Co* when made *1888* where fixed *on deck*
Working pressure *50* tested by hydraulic pressure to *100 lbs* No. of Certificate *197* fire grate area *26 sq ft* description of safety valves *spring loaded* No. of safety valves *Pair 3"* area of each *707* if fitted with easing gear *yes* if steam from main boilers can enter the donkey boiler *No* diameter of donkey boiler *48 x 9.5* length *9.3* description of riveting *long double and single*
Thickness of shell plates *2 3/8* diameter of rivet holes *3/4* whether punched or drilled *drilled* pitch of rivets *long 2 1/2 and 3/4* lap of plating
per centage of strength of joint *65 7/8* thickness of crown plates stayed by
Diameter of furnace, top *3.6* bottom *length of furnace 6.6* thickness of plates *1/2"* description of joint *Single strap + rivets*
Thickness of furnace crown plates stayed by working pressure of shell by rules
Working pressure of furnace by rules *80* diameter of uptake thickness of plates thickness of water tubes

SPARE GEAR. State the articles supplied :—

The foregoing is a correct description,
EAST FERRY ROAD,
ENGINEERING WORKS COY. LD. *W. H. Haws* Manufacturer.

General Remarks (State quality of workmanship, opinions as to class, &c.)
This boiler is of good workmanship + material and suitable for a working pressure of 50 lbs per sq inch.
It has now been fitted aboard the Glen Line steamer Glenaron

The amount of Entry Fee .. £ : : received by me,
Special £ : :
Donkey Boiler Fee £ *2* : *2* : *0*
Certificate (if required) .. £ : : *14/11* 1890
To be sent as per margin.
(Travelling Expenses, if any, £)

Thos. L. Gray
Engineer Surveyor to Lloyd's Register of British & Foreign Shipping.

Committee's Minute TUES 21 MAY 1889 FRIDAY 29 NOV 1889

