

# REPORT ON MACHINERY.

REC'D NEW YORK Sept. 9 1918

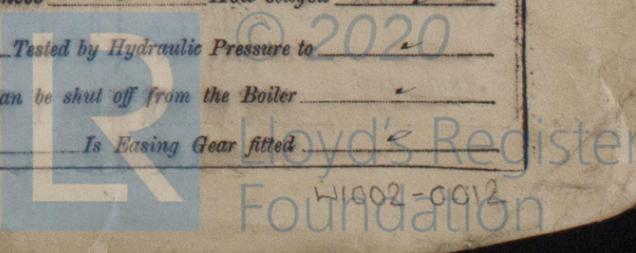
Received at London Office

Date of writing Report 17<sup>th</sup> Aug 1918 When handed in at Local Office 17<sup>th</sup> Aug 1918 Port of Philadelphia  
 No. in Survey held at Camden Date, First Survey 26<sup>th</sup> Oct 1916 Last Survey 16<sup>th</sup> Aug 1918  
 Reg. Book. on the S.S. "Winding Gulf" (Number of Visits 71)  
 Master          Built at Camden By whom built New York P. B. Corp (No 192) When built 1918  
 Engines made at Camden By whom made New York P. B. Corp (No 192) when made 1918  
 Boilers made at Do By whom made Do when made 1918  
 Registered Horse Power          Owners Emergency Fleet Corporation Port belonging to Camden N. J.  
 Nom. Horse Power as per Section 28 463 Is Refrigerating Machinery fitted for cargo purposes No Is Electric Light fitted Yes

**ENGINES, &c.—Description of Engines** Triple Expansion No. of Cylinders 3 No. of Cranks 3  
 Dia. of Cylinders 25" 4 1/2" 70" Length of Stroke 46" Revs. per minute 80 Dia. of Screw shaft 14" Material of screw shaft steel  
 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 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 5'-3"  
 Dia. of Tunnel shaft 12.89" Dia. of Crank shaft journals 13.4" Dia. of Crank pin 14" Size of Crank webs 26" Dia. of thrust shaft under collars 13 3/8" Dia. of screw 18-6" Pitch of Screw 15.2" No. of Blades 4 State whether moveable Yes Total surface 91 sq ft  
 No. of Feed pumps 2 Diameter of ditto 4" Stroke 20" Can one be overhauled while the other is at work Yes  
 No. of Bilge pumps 2 Diameter of ditto 4 1/2" Stroke 20" Can one be overhauled while the other is at work Yes  
 No. of Donkey Engines 6 Sizes of Pumps see over page No. and size of Suctions connected to both Bilge and Donkey pumps  
 In Engine Room & Blr Rm: 6-3 1/2" 1-2" in tunnel In Holds, &c. 2-3 1/2" in each hold  
1-3 1/2" tunnel well  
 No. of Bilge Injections 1 sizes 10" Connected to condenser, or to circulating pump Yes Is a separate Donkey Suction fitted in Engine room & size Yes-3 1/2"  
 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 Yes  
 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 None How are they protected Yes  
 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 Yes Is it fitted with a watertight door Yes worked from top platform

**BOILERS, &c.—(Letter for record (T))** Manufacturers of Steel Carnegie Steel Co  
 Total Heating Surface of Boilers 6624 sq ft Is Forced Draft fitted Yes No. and Description of Boilers 3 Single Ended  
 Working Pressure 195 lbs Tested by hydraulic pressure to 292 lbs Date of test 17.12.17 No. of Certificate 159  
 Can each boiler be worked separately Yes Area of fire grate in each boiler 51.66 sq ft No. and Description of Safety Valves to each boiler Double spring loaded Area of each valve 7.06 sq in Pressure to which they are adjusted 190 lbs Are they fitted with easing gear Yes  
 Smallest distance between boilers or uptakes and bunkers or woodwork 3'-4" Mean dia. of boilers 13'-10" Length 10'-6 1/2" Material of shell plates steel  
 Thickness 1 1/16" Range of tensile strength 28/32 tons Are the shell plates welded or flanged No Descrip. of riveting: cir. seams D. R.  
 long. seams T.R.D.B.S. Diameter of rivet holes in long. seams 1 7/16" Pitch of rivets 8 3/4" Lap of plates or width of butt straps 20 1/4"  
 Per centages of strength of longitudinal joint rivets 96.1 Working pressure of shell by rules 208 lbs Size of manhole in shell 16" x 12"  
 Size of compensating ring 37 x 32 x 1 1/16" No. and Description of Furnaces in each boiler 3 corrugated Material steel Outside diameter 3'-8 1/8"  
 Length of plain part top 19" Thickness of plates crown 16" Description of longitudinal joint weld No. of strengthening rings Yes  
 Working pressure of furnace by the rules 199 Combustion chamber plates: Material steel Thickness: Sides 19/32" Back 19/32" Top 19/32" Bottom 7/8"  
 Pitch of stays to ditto: Sides 6 1/8" x 6 1/4" Back 7" x 6 1/2" Top 7 1/2" x 6 1/4" If stays are fitted with nuts or riveted heads Nuts Working pressure by rules 247  
 Material of stays iron Area at smallest part 1.694 Area supported by each stay 48.75 Working pressure by rules 208 End plates in steam space: Material steel Thickness 1 5/16" Pitch of stays 17" x 17" How are stays secured D. Nuts Working pressure by rules 267 Material of stays steel  
 Area at smallest part 6.49 Area supported by each stay 28.9 Working pressure by rules 233 Material of Front plates at bottom steel  
 Thickness 1 1/16" Material of Lower back plate steel Thickness 1 1/16" Greatest pitch of stays 14" x 7" Working pressure of plate by rules 318  
 Diameter of tubes 2 1/2" Pitch of tubes 3 3/4" x 3 1/2" Material of tube plates steel Thickness: Front 1 1/16" Back 3/4" Mean pitch of stays plain tubes  
 Pitch across wide water spaces 13" Working pressures by rules 239 Girders to Chamber tops: Material steel Depth and thickness of girder at centre 8 1/4" x 20 1/8" Length as per rule 2.72 Distance apart 7 1/2" Number and pitch of stays in each 4 @ 6 1/4"  
 Working pressure by rules 236 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         

**UPERHEATER.** 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         



IS A DONKEY BOILER FITTED? no

If so, is a report now forwarded? ✓

Rpt. 13.  
Port of  
No. in Reg. Book  
Owners  
Yard No.

DESCRIPTION  
Two  
Marine  
Capacity of  
Where is  
Position of  
Positions of

If fuses a  
circuit  
If vessel is  
Are the fu  
Are all fu  
are pe  
Are all su  
Total num  
A  
A'  
B  
B'  
C  
D  
E

If are ligh  
Where are  
DESCRIPTION  
Main cable  
Branch cab  
Branch cab  
Leads to la  
Cargo light

DESCRIPTION  
Joints in c  
Paint  
Are all the  
positi  
Are there  
How are t

SPARE GEAR. State the articles supplied:—2 connecting rod top end bolts & nuts: 2 connecting rod bottom end bolts & nuts: 2 main bearing bolts: 1 set of coupling bolts: 1 set of feed & bilge pump valves: a quantity of assorted bolts & nuts: iron of various sizes: 1 tail shaft: 1 propeller blade: 25 condenser tubes: one set of spare brasses for valve stems: 1 set of air pump valves: 1 half set of follower bolts for each size piston

The foregoing is a correct description,

New York Shipbuilding Corporation Manufacturer.

Dates of Survey while building  
During progress of work in shops: 1916 Oct 26, Nov 1, Jan 18, 26, Feb 7, 27, Mar 6, 12, 27, Apr 12, 19, 24, May 7, 16, 23, 31, Jun 7, 13, 19, 27 up to Dec 1917  
During erection on board vessel: July 2, 8, 10, 12, 18, 23, Aug 8, 9, 14, 16.  
Total No. of visits: 71.

Is the approved plan of main boiler forwarded herewith yes  
" " " donkey " " " ✓

Dates of Examination of principal parts—Cylinders 27.12.17 Slides 15.4.18 Covers 15.4.18 Pistons 27.2.18 Rods 27.2.18  
Connecting rods 27.2.18 Crank shaft 24.12.17 Thrust shaft 18.4.18 Tunnel shafts 18.4.18 Screw shaft 28.3.18 Propeller 15.3.18  
Stern tube 22.3.18 Steam pipes tested 10.7.18 Engine and boiler seatings 4.5.18 Engines holding down bolts 2.7.18  
Completion of pumping arrangements 16.8.18 Boilers fixed 2.7.18 Engines tried under steam 9.8.18  
Completion of fitting sea connections 22.6.18 Stern tube 22.6.18 Screw shaft and propeller 22.6.18  
Main boiler safety valves adjusted 9.8.18 Thickness of adjusting washers lock nuts fitted  
Material of Crank shaft Steel Identification Mark on Do. 192 Material of Thrust shaft Steel Identification Mark on Do. 192  
Material of Tunnel shafts Steel Identification Marks on Do. 192 Material of Screw shafts Steel Identification Marks on Do. 192  
Material of Steam Pipes Copper Test pressure 400 lbs per sq in

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 vessel "Glen White"

General Remarks (State quality of workmanship, opinions as to class, &c. Donkey Engines: 12" x 8 1/2" x 18"  
12" x 8 1/2" x 18": 10" x 12" x 12" x 12": 6" x 7" x 8": 12" x 14" x 12": 4 1/2" x 3 3/4" x 4"

The machinery of this vessel has been built under special survey; the material and workmanship being good, and proved satisfactory on steam trial. It is submitted that this vessel be eligible for a record of + L. M. C. 8. 18 in the Register Book.

It is submitted that this vessel is eligible for THE RECORD. + L.M.C. 8.18 F.D.

MACHINERY CERTIFICATE WRITTEN 2-10-18

9-10-18  
A.T. Thomas

The amount of Entry Fee ... \$ 15: 00: } When applied for,  
Special ... \$ 215: 75: } 19  
Donkey Boiler Fee ... £ : : } When received,  
Travelling Expenses (if any) \$ 7: 00: } 21.9.18

A. T. Thomas, Engineer Surveyor to Lloyd's Register of Shipping.

Committee's Minute New York SEP 10 1918

Assigned + L.M.C. 8.18

MACHINERY CERTIFICATE WRITTEN 2-10-18



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