

REPORT ON MACHINERY.

No. 4967
14 1920

Received at London Office

Date of writing Report May 22nd. 1920 When handed in at Local Office

Port of Hong Kong

No. in Survey held at Hong Kong
Reg. Book.

Date, First Survey Aug. 3rd. 1919 Last Survey May 5th. 1920

(Number of Visits 32)

on the Steel Single Screw Steamer "KERAMIES" ex "WAR CORONET"

Gross 5126.09

Net 3338.29

When built 1920

Master Built at Hong Kong

By whom built Taikoo Dockyard & Eng. Co. Ltd.

Engines made at Hong Kong

By whom made Taikoo Dockyard & Engineering Co. Ltd. when made

1920

Boilers made at Hong Kong

By whom made Taikoo Dockyard & Engineering Co. Ltd. when made

1920

Registered Horse Power

Owners N.E. Ambatielos

Port belonging to Argostoli

Nom. Horse Power as per Section 28 516.4 517.

Is Refrigerating Machinery fitted for cargo purposes No

Is Electric Light fitted Yes

ENGINES, &c.—Description of Engines Triple Surface Condensing

No. of Cylinders 3

No. of Cranks 3

Dia. of Cylinders 27", 44", 73"

Length of Stroke 48

Revs. per minute 81

Dia. of Screw shaft as per rule 14.7"

Material of 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

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

Length of stern bush 5'-0"

Dia. of Tunnel shaft as per rule 13.33"

Dia. of Crank shaft journals as per rule 14"

Dia. of Crank pin 14.5"

Size of Crank webs 4x4x

Dia. of thrust shaft under

collars 14"

Dia. of screw 17.6"

Pitch of Screw 16.6"

No. of Blades 4

State whether moveable No

Total surface 98.2 sq. ft.

No. of Feed pumps 2

Diameter of ditto 4"

Stroke 24"

Can one be overhauled while the other is at work Yes

No. of Bilge pumps 2

Diameter of ditto 4"

Stroke 24"

Can one be overhauled while the other is at work Yes

No. of Donkey Engines 4

Cir. Bal. Sizes of Pump Gen. 7x9x18

No. and size of Suctions connected to both Bilge and Donkey pumps

In Engine Room 2 Port 3", Starb. 3" Bal. 10. x 14 x 24

In Engine Room 2 Port 3", Starb. 3"

Bal. 10. x 14 x 24

In Holds, &c. Fore hold P&S 3"

Fore Main hold P&S 3"

Aft Main hold P&S 3"

reserve Bunkers P&S 3"

Stokehold P&S 3"

Aft hold 3"

Tunnel Well 3"

No. of Bilge Injections 1

sizes 12"

Connected to condenser, or to circulating pump Cir. pp

Is a separate Donkey Suction fitted in Engine room & size Yes, 3"

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 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 Fore & Fore main hold bilge

How are they protected Limber boards

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 Upper Deck

BOILERS, &c.—(Letter for record)

Manufacturers of Steel Carnegie Steel Co.

Total Heating Surface of Boilers 7668

Is Forced Draft fitted Yes

No. and Description of Boilers 3 Single Ended Marine Type

Working Pressure 180 lbs.

Tested by hydraulic pressure to 360 lbs.

Date of test 20/1/20

No. of Certificate 480,481,482

Can each boiler be worked separately Yes

each boiler 3" Double spring

Area of fire grate in each boiler 63.3 sq. ft.

No. and Description of Safety Valves to

each boiler 3" Double spring

Area of each valve 9.62"

loaded

Pressure to which they are adjusted 180 lbs.

Are they fitted with easing gear Yes

Smallest distance between boilers or uptakes and bunkers or woodwork 15"

Thickens 1"

Range of tensile strength 28-32 Tons

Are the shell plates welded or flanged No

Descrip. of riveting: cir. seams Dbl. lap

long. seams Tre. butt

Diameter of rivet holes in long. seams 1.5/16"

Pitch of rivets 9"

Tap of plates or width of butt straps 19"

Per centages of strength of longitudinal joint

rivets 88.3 %

plate 85.6 %

Working pressure of shell by rules 181.5 lbs.

Size of manhole in shell None

Size of compensating ring 6"

No. and Description of Furnaces in each boiler 3 Deighton

Length of plain part top 8"

Thickness of plates crown 19/32"

Description of longitudinal joint Welded

No. of strengthening rings None

Working pressure of furnace by the rules 188.1

Pitch of stays to ditto: Sides 9"x10"

Back 8"x10"

Top 9"x10"

If stays are fitted with nuts or riveted heads Nuts & caulked.

Working pressure by rules 180 lbs.

Material of stay Steel

Area at smallest part 2.395"

Area supported by each stay 8.99-81

Working pressure by rules 180.9 lbs.

Material of stay Steel

Material Steel

Thickness 1.11/32"

Pitch of stays 21"

How are stays secured Nuts & washers

Working pressure by rules 182.2

Area at smallest part 8.29"

Area supported by each stay 473"

Working pressure by rules 182.2

Material of Front plates at bottom Steel

Thickness 3"

Material of Lower back plate Steel

Thickness 27/32"

Greatest pitch of stays 13 1/2 x 8 1/2

Working pressure of plate by rules 187.6 lbs.

Diameter of tube 2 1/2 x 4"

Pitch of tubes 3 1/2 x 4"

Material of tube plates Steel

Thickness: Front 31/32"

Back 1/2"

Pitch across wide water spaces 13 1/2"

Working pressures by rules 181 lbs.

Girders to Chamber tops: Material Steel

Depth and

thickness of girder at centre 10"x1 1/2" (2 off)

Length as per rule 35.9/16"

Distance apart 10 1/2"

Number and pitch of stays in each 3 - 9 1/2"

Working pressure by rule 187.6 lbs.

dome: description of joint to shell None

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

Lloyd's Register

Foundation

IS A DONKEY BOILER FITTED?

No

If so, is a report now forwarded?

SPARE GEAR. State the articles supplied:— See List attached.

The foregoing is a correct description,

R. H. H. H.

Manufacturer.

Dates of Survey while building
During progress of work in shops -- 1919 Aug. 3, 21, Sept. 16, 18 Oct. 3, 11, 16, 23, 30. Dec. 1, 4, 23.
During erection on board vessel --- 1920. Jan. 6, 12, 15, 20, 22, 28, Feb. 5, 7, 12, 16, 26, 28 Mar. 8, 11, 16, 17
31 Apr. 14, 23 May 5.
Total No. of visits 32

Is the approved plan of main boiler forwarded herewith

No

Dates of Examination of principal parts—Cylinders 23/10/19 Slides 1/12/19 Covers 1/12/19 Pistons 1/12/19 Rods 21/8/19
Connecting rods 21/8/19 Crank shaft 7/2/20 Thrust shaft 16/9/19 Tunnel shafts 1/12/19 Screw shaft 1/12/19 Propeller 1/12/19
Stern tube 1/12/19 Steam pipes tested 11/3/20 Engine and boiler seatings 12/2/20 Engines holding down bolts 26/2/20
Completion of pumping arrangements 16/3/20 Boilers fixed 16/2/20 Engines tried under steam 17/3/20
Completion of fitting sea connections 20/1/20 Stern tube 20/1/20 Screw shaft and propeller 22/1/20
Main boiler safety valves adjusted 16/3/20 Thickness of adjusting washers P.Br. 7/16" C.Br. 7/16" S.Br. 7/16"
Material of Crank shaft Steel Identification Mark on Do. 213 HKg. Material of Thrust shaft Steel Identification Mark on Do. 198 HKg.
Material of Tunnel shafts Steel Identification Marks on Do. 208 HKg. Material of Screw shafts Steel Identification Marks on Do. 207 HKg.
Material of Steam Pipes Steel Test pressure 600 lbs.

Is an installation fitted for burning oil fuel Yes Is the flash point of the oil to be used over 150°F. Yes
Have the requirements of Section 49 of the Rules been complied with Yes
Is this machinery duplicate of a previous case Yes If so, state name of vessel

General Remarks (State quality of workmanship, opinions as to class, &c. The workmanship is good and it recommended)

that the vessel be classed with Lloyd's Machinery Certificate and the record of L.M.C. 5,1920 be made in the Register Book.

Since this vessel was completed she has been sold to Greek Owners Mr. N. E. Ambatielos of Argostoli.

The approved Boiler plan of this vessel is now in London Office.

Wallsend-Howden oil fuel pressure system No.6872 fitted, also horizontal duplex transfer pump 8"x 5" 8", Separate piping arrangements from Double Bottom tanks, distinct from ballast pipes.

IDENTIFICATION MARKS ON BOILERS

No. 97 HKg.	No. 98 HKg.	No. 99 HKg.
LLOYD'S TEST	LLOYD'S TEST	LLOYD'S TEST
360 lbs.	360 lbs.	360 lbs.
W.P. 180 lbs.	W.P. 180 lbs.	W.P. 180 lbs.
20-1-20	20-1-20	20-1-20
T.S.M.	T.S.M.	T.S.M.

It is submitted that this vessel is eligible for THE RECORD. + L.M.C. 5.20. FD
Fitted for oil fuel 5.20. F.P. above 150°F.

The amount of Entry Fee ... \$ 30.00
Special Electric Light ... \$ 450.00
Donkey Boiler Fee ... \$ 50.00
Travelling Expenses (if any) \$ 360.00

When applied for

15/5 20

When received

19/5 20

Engineer Surveyor to Lloyd's Register of Shipping.

Committee's Minute FRI. JUL. 16 1920

Assigned

MACHINERY CERT.
WRITTEN

TUE. 18 DEC. 1923

FRI. MAR. 23 1923

FRI. DEC. 10 1920

FRI. JUL. 15 1921

TUE. 4 OCT. 1921

Lloyd's Register
Foundation