

REPORT ON BOILERS.

No. 5242

Received at London Office

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Date of writing Report Dec. 24th 21 When handed in at Local Office 101 Port of Hong Kong

No. in Survey held at Hong Kong Date, First Survey Jan. 4th. Last Survey Dec. 17th. 1921

Reg. Book. on the Steel Screw Steamer "PALUDINA" (Number of Visits 20) Gross 5818.86

Tons Net 3491.36

Master Built at Hong Kong By whom built Hong Kong & Whampoa Dock Co. Ltd. When built 1921.

Engines made at Hong Kong By whom made Hong Kong & Whampoa Dock Co., Ltd. When made 1921

Boilers made at Hong Kong By whom made Hong Kong & Whampoa Dock Co., Ltd. When made 1921

Registered Horse Power 517 Owners Anglo-Saxon Petroleum Co. Ltd. Port belonging to Hong Kong

MULTITUBULAR BOILERS—MAIN, AUXILIARY OR DONKEY.—Manufacturers of Steel Wm. Beardmore & Co.

(Letter for record E 18/9/20) Total Heating Surface of Boilers 1228.7 sq. ft. Is forced draft fitted No No. and Description of Boilers One Cylindrical Multitubular Working Pressure 120 lbs. Tested by hydraulic pressure to 230 lbs. Date of test 15/9/21

No. of Certificate 120 Can each boiler be worked separately Yes Area of fire grate in each boiler 33.3 sq. ft. No. and Description of safety valves to each boiler Two 2" spring loaded Area of each valve 3.1416 sq. in. Pressure to which they are adjusted 120 lbs.

Are they fitted with easing gear Yes In case of donkey boilers, state whether steam from main boilers can enter the donkey boiler No

Smallest distance between boilers or uptakes and bunkers or woodwork 5 ft. Up. Dk. Mean dia. of boilers 11'-6" Length 11'-3"

Material of shell plates Steel Thickness 3" Range of tensile strength 28-32 Tons Are the shell plates welded or flanged No

Descrip. of riveting: cir. seams double lap Long. seams Triple Butt Diameter of rivet holes in long. seams 15/16" Pitch of rivets 5, 11/16"

Top of plates or width of butt straps 14 3/4" Per centages of strength of longitudinal joint rivets 96.5% Working pressure of shell by rules 135 lbs. Size of manhole in shell 16" x 12" Size of compensating ring 30" x 34" x 3/4" plate 83.6%

No. and Description of Furnaces in each boiler Two Deighton Material Steel Outside diameter 44 1/4" Length of plain part top Thickness of plates crown 13/32" bottom

Description of longitudinal joint Welded No. of strengthening rings Working pressure of furnace by the rules 141 lbs. Combustion chamber plates: Material Steel Thickness: Sides 19/32" Back 19/32" Top 19/32" Bottom 3/4" Pitch of stays to ditto: Sides 7 1/8 x 8 3/8" Back 7 1/8 x 8 3/8"

Nuts on marginal & girder stays S. 129 lbs. Top 8 1/8 x 8 3/8" If stays are fitted with nuts or riveted heads remainder Working pressure by rules B. 127 Material of stays Steel Diameter at smallest part 1.23" Area supported by each stay S. 62.5 sq. in. riveted S. 162 lbs. T. 171 " Working pressure by rules B. 169 End plates in steam space: Material Steel Thickness 3/8"

Pitch of stays 16 1/2 x 18" How are stays secured Nuts & washers Working pressure by rules 122 lbs. Material of stays Steel Diameter at smallest part 2.16"

Area supported by each stay 298 sq. in. Working pressure by rules 132 lbs. Material of Front plates at bottom Steel Thickness 25/32" Material of Lower back plate Steel Thickness 11/16" Greatest pitch of stays 13" Working pressure of plate by rules B. 134 Diameter of tubes 3"

Pitch of tubes 4 1/8" x 4 1/4" Material of tube plates Steel Thickness: Front 25/32" Back 21/32" Mean pitch of stays 12 3/8" x 8 1/2" Pitch across wide water spaces 13 1/2" Working pressures by rules W. B. Space 149 Girders to Chamber tops: Material Steel Depth and thickness of girder at centre 7" x 3/4" double Length as per rule 32 3/4" Distance apart 8 1/4" Number and pitch of Stays in each Three 8 3/8"

Working pressure by rules 133 lbs. Superheater or Steam chest: how connected to boiler 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

The foregoing is a correct description.

R. H. Dym. Manufacturer.

Dates of Survey During progress of January 4th. to December 17th. 1921.

while building During erection on board vessel

Is the approved plan of boiler forwarded Yes

Total No. of visits 20

GENERAL REMARKS (State quality of workmanship, opinions as to class, &c.) The workmanship is good.

Fitted for coal or oil fuel, boiler fixed in upper deck.

Thickness of safety valve washers: 3/8".

IDENTIFICATION MARKS ON BOILER

No. 120 HKG.
LLOYD'S TEST
230 lbs.
W.P. 120 lbs.
15-9-21
T. S. M.

per Rpt. 4.

Survey Fee ... \$65.00

Travelling Expenses (if any) £

When applied for, 17/12 21

When received, 15.1.22

Engineer Surveyor to Lloyd's Register of British and Foreign Shipping.

Committee's Minute

1 RLMAR. 3 1922

Assigned

Lloyd's Register
Foundation