

pt. 5a.

# REPORT ON BOILERS.

No. 41698

Received at London Office  
 Date of writing Report 10. 2. 1922 When handed in at Local Office 10. 2. 1922 Port of Glasgow WFD 15 FEB 1922  
 No. in Survey held at Dumbarton  
 Reg. Book. on the S.S. "Chilka"  
 Date, First Survey 4. 11. 1919 Last Survey 1. 2. 1922  
 (Number of Visits 50) Gross 4360 Tons Net 2209  
 Built at Dumbarton By whom built Wm Denny & Bro. (1841) When built  
 Engines made at Dumbarton By whom made Wm Denny & Bro. (1855) When made 1922  
 Boilers made at Dumbarton By whom made Wm Denny & Bro. (1855) When made 1922  
 Registered Horse Power Owners Port belonging to

## MULTITUBULAR BOILERS - MAIN, AUXILIARY OR DONKEY. - Manufacturers of Steel Wm Beardmore & Co. Ltd.

Letter for record ) Total Heating Surface of Boilers 1254 sq ft Is forced draft fitted   
 Boilers 1 Single ended Working Pressure 215 Tested by hydraulic pressure to 377 Date of test 15. 4. 21  
 No. of Certificate 10791 Can each boiler be worked separately  Area of fire grate in each boiler 39.87 sq ft No. and Description of  
 Safety valves to each boiler 1 pair direct Spring Area of each valve 4.19 sq in Pressure to which they are adjusted 210  
 Are they fitted with easing gear  In case of donkey boilers, state whether steam from main boilers can enter the donkey boiler  
 Smallest distance between boilers or uptakes and bunkers or woodwork 2'-0" Mean dia. of boilers 12'-0" Length 10' 0"  
 Material of shell plates steel Thickness 3/16 Range of tensile strength 28 to 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 1/32 Pitch of rivets 8 3/4  
 Width of plates or width of butt straps 8 5/16 Per centages of strength of longitudinal joint rivets 83.4 plate 86.07 Working pressure of shell by  
 Rules 217 Size of manhole in shell 17" x 13" Size of compensating ring 34" x 34" x 1 1/16 No. and Description of Furnaces in each  
 Boiler 2 Monson Material steel Outside diameter 46 1/4 Length of plain part top Thickness of plates crown 2 21 bottom 32  
 Description of longitudinal joint weld No. of strengthening rings Working pressure of furnace by the rules 230 Combustion chamber  
 Plates: Material steel Thickness: Sides 3/8 Back 5/8 Top 3/8 Bottom 23/32 Pitch of stays to ditto: Sides 7 3/8 x 8 3/4 Back 8 x 7 3/4  
 If stays are fitted with nuts or riveted heads nuts Working pressure by rules 218 Material of stays steel Area at  
 Smallest part 1.69 Area supported by each stay 62 sq in Working pressure by rules 217 End plates in steam space: Material steel Thickness 1 3/32  
 Pitch of stays 17 x 16 How are stays secured Nuts outside Working pressure by rules 218 Material of stays steel Area at smallest part 5.939  
 Area supported by each stay 306 sq in Working pressure by rules 215 Material of Front plates at bottom steel Thickness 27/32 Material of  
 Lower back plate steel Thickness 7/8 Greatest pitch of stays 13 1/2 Working pressure of plate by rules 240 Diameter of tubes 2 1/2  
 Pitch of tubes 3 3/4 x 3 3/4 Material of tube plates steel Thickness: Front 27/32 Back 13/16 Mean pitch of stays 9 3/8 Pitch across wide  
 Inter spaces 1/32 with 1/2" shoulder Working pressures by rules 252 Girders to Chamber tops: Material steel Depth and thickness of  
 Girder at centre 8 x 3/4 double Length as per rule 27 1/2 Distance apart 8 3/8 Number and pitch of Stays in each (3) 7 3/8  
 Working pressure by rules 215 Steam dome: description of joint to shell None % 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

SUPERHEATER. Type none Date of Approval of Plan Tested by Hydraulic Pressure to  
 Is a Safety Valve fitted to each Section of the Superheater which can be shut off from the Boiler  
 Pressure to which each is adjusted Is Easing Gear fitted

WILLIAM DENNY & BROTHERS, LTD. The foregoing is a correct description,  
 Wm Denny & Bro. Manufacturer.

See attached Machinery Report Is the approved plan of boiler forwarded herewith   
 Total No. of visits 50

GENERAL REMARKS (State quality of workmanship, opinions as to class, &c.) This boiler has been built under  
 special survey the materials and workmanship are of good  
 description, it has been well fitted on board the above vessel  
 fitted for burning oil fuel & can be used in conjunction with  
 the main boiler

Survey Fee ... £  
 Travelling Expenses (if any) £ See machy Rept  
 When applied for charged  
 When received on receipt

GLASGOW 14 FEB 1922

A. McKeand © 2020  
 Engineer Surveyor to Lloyd's Register of Shipping.

Committee's Minute  
 Signed See accompanying machinery report.



W158-0026