

# REPORT ON BOILERS.

No. 40685

THU JAN 18 1921

Received at London Office

Date of writing Report 5.1.1921 When handed in at Local Office 5.1.1921 Port of Glasgow  
 No. in Survey held at Glasgow Date, First Survey 17.9.1918 Last Survey 30.12.1920  
 Reg. Book. on the Single ended Boilers SS MATHURA (Number of Visits 65) } Gross  
 } Net  
 Master Built at Glasgow By whom built C Connell & Co When built 1920  
 Engines made at Manchester By whom made Inchcolm & Vickers & Co When made 1920  
 Boilers made at Glasgow By whom made Do Rowan & Co Ltd (No 658) When made 1920  
 Registered Horse Power Owners J & J Brocklebank Ltd Port belonging to Liverpool

**MULTITUBULAR BOILERS—MAIN, AUXILIARY OR DONKEY.**—Manufacturers of Steel W Beardmore & Co Ltd  
 (Letter for record R) **Total Heating Surface of Boilers** 6680 sq ft Is forced draft fitted No No. and Description of Boilers 2 Single ended Working Pressure 200 lb Tested by hydraulic pressure to 350 lb Date of test 22.9.20  
15495 No. of Certificate 15501 Can each boiler be worked separately Yes Area of fire grate in each boiler 70 sq ft No. and Description of safety valves to each boiler 2 Spring loaded Area of each valve 7.07 Pressure to which they are adjusted 205 lb  
 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 18" Int Mean dia. of boilers 17-6" Length 12-0"  
 Material of shell plates Steel Thickness 7/16" & 29/32" Range of tensile strength 30 to 34 tons Are the shell plates welded or flanged No  
 Descrip. of riveting: cir. seams do Lap long. seams TR DBS Diameter of rivet holes in long. seams 1 1/2" Pitch of rivets 10 1/4"  
 Lap of plates or width of butt straps 22 1/4" Per centages of strength of longitudinal joint rivets 88.2 Working pressure of shell by rules 200 Size of manhole in shell 19 1/2" x 15 1/2" Size of compensating ring 3-0 1/2" x 2-8 1/2" x 1 1/4" No. and Description of Furnaces in each boiler 4 Cornish type Material Steel Outside diameter 3-10 1/4" Length of plain part top - bottom - Thickness of plates crown 5" bottom 3 1/8"  
 Description of longitudinal joint weld No. of strengthening rings - Working pressure of furnace by the rules 217 Combustion chamber plates: Material Steel Thickness: Sides 23" Back 21" Top 23" Bottom 7" Pitch of stays to ditto: Sides 9 3/4" x 9 3/8" Back 9" x 7 1/2"  
 Top 9 3/4" x 9 3/8" If stays are fitted with nuts or riveted heads Int Working pressure by rules 200 Material of stays Iron Area at smallest part 2.07 sq ft Area supported by each stay 89 sq in Working pressure by rules 202 End plates in steam space: Material Steel Thickness 7/32"  
 Pitch of stays 18 1/2" x 18" How are stays secured do Working pressure by rules 200 Material of stays Steel Area at smallest part 7.06 sq ft  
 Area supported by each stay 341 sq in Working pressure by rules 210 Material of Front plates at bottom Steel Thickness 7/8" Material of Lower back plate Steel Thickness 27/32" Greatest pitch of stays 13 3/8" Working pressure of plate by rules 201 Diameter of tubes 3"  
 Pitch of tubes 4 1/4" x 4 1/8" Material of tube plates Steel Thickness: Front 1" Back 13/16" Mean pitch of stays 10 1/2" Pitch across wide water spaces 13 7/8" Working pressures by rules 210 Girders to Chamber tops: Material Steel Depth and thickness of girder at centre 11 1/2" x 7 1/2" (2) Length as per rule 40 11/32" Distance apart 9 3/4" Number and pitch of Stays in each (3) 9 1/8"  
 Working pressure by rules 210 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

**UPERHEATER.** Type None 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 \_\_\_\_\_

The foregoing is a correct description,  
Dand Rowan & Co Ltd Manufacturer.  
 Is the approved plan of boiler forwarded herewith \_\_\_\_\_  
 Total No. of visits \_\_\_\_\_

Dates of Survey } During progress of work in shops - - } See Machy Rpt attached.  
 while building } During erection on board vessel - - - }

**GENERAL REMARKS** (State quality of workmanship, opinions as to class, &c.) The boilers have been built under Special Survey, Materials and workmanship are good. The boilers have been well fitted to the vessel.

Survey Fee ... £ See Machy Rpt : } When applied for, ..... 19...  
 Travelling Expenses (if any) £ : } When received, ..... 19...

Committee's Minute See attached machinery report.  
 Assigned \_\_\_\_\_

W. A. Bastholm 22.9.20  
 Engineer Surveyor to Lloyd's Register of Shipping.

