

# REPORT ON BOILERS.

Mil. Rpt.

No. 6005

9 FEB 1944

Received at London Office

Date of writing Report May 25th 1943 When handed in at London Office May 22nd 1943 Port of MontrealNo. in Reg. Book. Survey held at Montreal. Date, First Survey 23rd March, 1943 Survey 18 19on the S/S "MANITOU PARK"(Number of Visits 18)Gross  
Tons  
NetBuilt at Pictou, N.S. By whom built Foundation Maritime Limited Yard No. 6 When built 1943Engines made at By whom made Dominion Bridge Company Engine No. B1147 P1 When made ---Boilers made at Lachine, P.Q. By whom made Limited Boiler No. 1147 S1 When made 1943Nominal Horse Power 269 Owners --- Port belonging to ---

## MULTITUBULAR BOILERS—MAIN, AUXILIARY, OR DONKEY

Manufacturers of Steel Bethlehem Steel, Steel Co. of Canada, Trenton Steel Co., Dom. Foundries & Steel (Enter for Record S)Total Heating Surface of Boilers 2 boilers 3854 Sq. Ft. Is forced draught fitted Yes Coal or Oil fired CoalNo. and Description of Boilers 2 Multitubular Scotch Boilers Working Pressure 200 lbs./Sq. In.Tested by hydraulic pressure to 350 lbs./Sq. In. Date of test 11.5.43 No. of Certificate 7442 Can each boiler be worked separately YesArea of Firegrate in each boiler 43.25 Sq. Ft. No. and Description of Safety valves to each boiler One twin Cockburn improved high lift 2 1/4" ea.Area of each set of valves per boiler { per Rule 6.72 Sq. In. as fitted 7.952 Sq. In. Pressure to which they are adjusted 200 lbs./In. Are they fitted with easing gear YesIn 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 --- Is oil fuel carried in the double bottom under boilers ---Smallest distance between shell of boiler and tank top plating --- Is the bottom of the boiler insulated ---Largest internal diameter of boilers 13'-6" Length 11'-6" Shell plates: Material O.H. Steel Tensile strength 29-33 tonsThickness 1 9/32" Are the shell plates Welded flanged No Description of riveting: circ. seams { end Welded (Union Melt) inter. ---Long. seams Welded (Union Melt) Diameter of rivet holes in { circ. seams --- long. seams --- Pitch of rivets { ---Percentage of strength of circ. end seams { plate --- rivets --- Percentage of strength of circ. intermediate seam { plate --- rivets ---Percentage of strength of longitudinal joint { plate --- rivets --- combined ---Thickness of butt straps { outer None inner None No. and Description of Furnaces in each Boiler Three Morrison CorrugatedMaterial O.H. Steel Tensile strength 26-30 tons Smallest outside diameter 38 1/2" 3'-5 1/8"Length of plain part { top --- bottom --- Thickness of plates { crown 9/16" bottom 16" Description of longitudinal joint Lap Weld.Dimensions of stiffening rings on furnace or c.c. bottom ---End plates in steam space: Material O.H. Steel Tensile strength 26-30 tons Thickness 1 3/16" Pitch of stays 17 1/2" x 18 1/2"How are stays secured Inside and Outside NutsTube plates: Material { front O.H. Steel back O.H. Steel Tensile strength { 26-30 tons Thickness { 29/32" 13/16"Lean pitch of stay tubes in nests 10 3/8" Pitch across wide water spaces 14" x 8 1/4"Girders to combustion chamber tops: Material O.H. Steel Tensile strength 28-32 tons Depth and Thickness of girdercentre 7 3/4" x 7/8" double Length as per Rule 2'-9 15/32" Distance apart 8" centre to centre No. and pitch of stayseach 2-10 3/4" Combustion chamber plates: Material O.H. SteelTensile strength 26-30 tons Thickness: Sides 23/32" Back 23/32" Top 23/32" Bottom 23/32"Pitch of stays to ditto: Sides 11" x 7 3/4" Back 8 3/8" x 10 1/2" Top 10 3/4" x 8" Are stays fitted with nuts or riveted over Welded washers & welded overBottom plate at bottom: Material O.H. Steel Tensile strength 26-30 tonsThickness 29/32" Lower back plate: Material O.H. Steel Tensile strength 26-30 tons Thickness 29/32"Pitch of stays at wide water space 14 3/8" x 10 1/2" Are stays fitted with nuts or riveted over Welded washers & welded overMain stays: Material O.H. Steel Tensile strength 28-32 tonsDiameter { At body of stay --- or --- Over threads 3 1/4" and 2 1/4" No. of threads per inch 6crew stays: Material O.H. Steel Tensile strength 26-30 tonsDiameter { At turned off part --- or --- Over threads 2" and 1 3/4" No. of threads per inch 9



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Are the stays drilled at the outer ends No Margin stays: Diameter { At turned off part, 2" or Over threads. 2"

No. of threads per inch 9

Tubes: Material O.H. Steel External diameter { Plain 3" Stay 3" Thickness { 8 L S G 5/16" & 1/4" No. of threads per inch 9

Pitch of tubes 4 1/8" x 4 3/16" Manhole compensation: Size of opening in shell plate --- Section of compensating ring --- No. of rivets and diameter of rivet holes ---

Outer row rivet pitch at ends --- Depth of flange if manhole flanged --- Steam Dome: Material ---

Tensile strength --- Thickness of shell --- Description of longitudinal joint ---

Diameter of rivet holes --- Pitch of rivets --- Percentage of strength of joint { Plate --- Rivets ---

Internal diameter --- Thickness of crown --- No. and diameter of stays --- Inner radius of crown ---

How connected to shell --- Size of doubling plate under dome --- Diameter of rivet holes and pitch of rivets in outer row in dome connection to shell ---

Type of Superheater Smoke Tube Manufacturers of { Tubes National Tube Co., Ellwood City, Pa. Steel forgings --- Steel castings --- 13 B W G

Number of elements 48 Material of tubes O.H. Seamless Steel Internal diameter and thickness of tubes .69 .095

Material of headers O.H. Seamless Tube Tensile strength --- Thickness 1 1/8" Can the superheater be shut off and the boiler be worked separately --- Is a safety valve fitted to every part of the superheater which can be shut off from the boiler ---

Area of each safety valve --- Are the safety valves fitted with easing gear --- Hydraulic test pressure: ---

Pressure to which the safety valves are adjusted --- and after assembly in place --- Are drain cocks or tubes --- forgings and castings ---

valves fitted to free the superheater from water where necessary ---

Have all the requirements of Sections 14 to 22 inclusive for boilers been complied with ---

The foregoing is a correct description,  
DOMINION BRIDGE CO. LIMITED Manufacturer.  
*John J. Hall*

Dates of Survey { During progress of work in shops -- } March 23, 24, 27, 30. April 1, 2, 5, 6, 10, 12, 19, 26, 28. May 4, 6, 11, 12, 14. Are the approved plans of boiler and superheater forwarded herewith (If not state date of approval.) ---

while building { During erection on board vessel -- } --- Total No. of visits ---

Is this Boiler a duplicate of a previous case --- If so, state Vessel's name and Report No. S/S "ROCKWOOD PARK" RPT. NO. 5740

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

These BOILERS have been constructed under Special Survey and in accordance with the Approved Plans

The materials and workmanship are good. The shell longitudinal and circumferential end seams are welded by the Union Melt Process.

The BOILERS were tested hydrostatically at 350 lbs. per square inch pressure and found tight.

Survey Fee ... 200.00 When applied for, Oct. 29 19 43

Travelling Expenses (if any) 12.50 When received, 19 .

Committee's Minute See App. for rpt. 4731

Assigned ---

For S.S.O.F. see Kensington Park (744.4699)