

## REPORT ON STEAM RECIPROCATING ENGINE MACHINERY.

Received at London Office

129 DEC 1942

Date of writing Report **Oct. 15th, 1942** When handed in at Local Office **Oct. 15th, 1942** Port of **Vancouver, B. C.**  
 No. in Survey held at **Vancouver, B. C.** Date, First Survey **Aug. 6th, 1942** Last Survey **October 9th, 1942**  
 Reg. Book. (Number of Visits **18**)  
 on the **Steel Single Screw Steamer "FORT SLAVE"** Tons **Gross 7133.59**  
**Net 4256.40**  
 Built at **Vancouver, B. C.** By whom built **West Coast Shipbuilders, Ltd.** Yard No. **107** When built **1942**  
 Engines made at **Toronto** By whom made **John Inglis & Son** Engine No. **84** When made **1942**  
 Boilers made at **Vancouver, B. C.** By whom made **Vancouver Iron Works, Ltd.** Boiler No. **243**  
**245** When made **1942**  
**247**  
 Registered Horse Power **229** Owners **Minister of Munitions & Supply of Canada.** Port belonging to  
 Nom. Horse Power as per Rule **504** Is Refrigerating Machinery fitted for cargo purposes **No** Is Electric Light fitted **Yes**  
 Trade for which Vessel is intended **General Cargo**

ENGINES, &c.—Description of Engines **Triple Expansion. Superheat to 575°F.** Revs. per minute **80**  
 Dia of Cylinders **24½" x 37" x 70"** Length of Stroke **48"** No. of Cylinders **3** No. of Cranks **3**  
 Crank shaft, dia. of journals as per Rule **13.99"** Crank pin dia. **14½"** Mid. length breadth **--** Thickness parallel to axis **9" & 9½" L.P.**  
 as fitted **14½"** Crank webs **--** Mid. length thickness **--** Thickness around eye-hole **(7½" Pin)**  
 Intermediate Shafts, diameter as per Rule **13.33"** Thrust shaft, diameter at collars as per Rule **13.99"** as fitted **14.25"**  
 as fitted **13.5"** Tube Shafts, diameter as per Rule **--** Screw Shaft, diameter as per Rule **14.87"** as fitted **15.25"** Is the **tube** shaft fitted with a continuous liner **Yes**  
 as fitted **--** as fitted **--** as per Rule **.75"** Thickness between bushes as per Rule **.565"** as fitted **.68"** Is the after end of the liner made watertight in the  
 propeller boss **Yes** If the liner is in more than one length are the junctions made by fusion through the whole thickness of the liner **Solid**  
 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 **Tight fit**  
 If two liners are fitted, is the shaft lapped or protected between the liners **--** Is an approved Oil Gland or other appliance fitted at the after end of the tube  
 shaft **No** If so, state type **--** Length of Bearing in Stern Bush next to and supporting propeller **61"**  
 Propeller, dia. **18'-6"** Pitch **16'-0"** No. of Blades **4** Material **Bronze** whether Moveable **Solid** Total Developed Surface **117** sq. ft.  
 Feed Pumps worked from the Main Engines, No. **None** Diameter **--** Stroke **--** Can one be overhauled while the other is at work **--**  
 Bilge Pumps worked from the Main Engines, No. **Two** Diameter **4½"** Stroke **26"** Can one be overhauled while the other is at work **Yes**  
 Feed {No. and size **Two 8"x10½"x22"** Pumps connected to the {No. and size **Four (One) 10"x12"x10" (One) 9"x6"x10" Two Rams**  
 Pumps {How driven **Steam Worthington Simplex type** Main Bilge Line {How driven **Duplex Steam Duplex Steam M.E.**  
 Ballast Pumps, No. and size **(One) 10"x12"x10" (Duplex)** Lubricating Oil Pumps, including Spare Pump, No. and size **None**  
 Are two independent means arranged for circulating water through the Oil Cooler **--** Suctions, connected to both Main Bilge Pumps and Auxiliary **bd**  
 Bilge Pumps: In Engine and Boiler Room **1-3" Dia. Port 1-3" Dia. Star bd in Blr. Rm. 1-3" Dia. Port 1-3" Dia. Star bd**  
 in Pump Room **1-2½" Dia. in Thrust Recess. 1-4" Dia. to F.P. 1-3" Dia. P&S to Nos. 1-2-3-4 & 5**  
 Holds. **1-4" Dia. to A.P.**

Main Water Circulating Pump Direct Bilge Suctions, No. and size **(One)- 9"** Independent Power Pump Direct Suctions to the Engine Room Bilges,  
 No. and size **One 5" Dia. Star bd Side** Are all the Bilge Suction Pipes in holds and tunnel well fitted with strum-boxes **Yes**  
 Are the Bilge Suctions in the Machinery Space led from easily accessible mud-boxes, placed above the level of the working floor, with straight tail pipes to the bilges **Yes**  
 Are all Sea Connections fitted direct on the skin of the ship **Yes. Main Injection** Are they fitted with Valves or Cocks **Valves**  
 Are they fixed sufficiently high on the ship's side to be seen without lifting the stokehold plates **Yes** Are the Overboard Discharges above or below the deep water line **Below**  
 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 pass through the bunkers **Steel Air Pipes to No. 4 D.B. Tanks** How are they protected **Steel Straps welded across frames**  
 What pipes pass through the deep tanks **Bilge Suctions. No. 7 D.B. Air Pipes** Have they been tested as per Rule **Yes**  
 Are all Pipes, Cocks, Valves, and Pumps in connection with the machinery and all boiler mountings accessible at all times **Yes**  
 Is the arrangement of Valves and their connections such as to prevent the possibility of water passing from the sea or from water tanks into the cargo or machinery spaces, or from one  
 compartment to another **Yes** Is the Shaft Tunnel watertight **Yes** Is it fitted with a watertight door **No** worked from **--**

MAIN BOILERS, &c.—(Letter for record **S**) Total Heating Surface of Boilers **7140 Sq. Ft.**  
 Which Boilers are fitted with Forced Draft **All Three** Which Boilers are fitted with Superheaters **All Three**  
 No. and Description of Boilers **3 Single ended Multitubular** Working Pressure **220 lbs. per sq. inch.**  
 IS A REPORT ON MAIN BOILERS NOW FORWARDED? **Yes**  
 IS A DONKEY BOILER FITTED? **No** If so, is a report now forwarded? **--**  
 Can the donkey boiler be used for domestic purposes only **--**  
 PLANS. Are approved plans forwarded herewith for Shafting **App'd. Plans** Main Boilers **U.K.** Auxiliary Boilers **--** Donkey Boilers **--**  
 Superheaters **Approved Plans in U.K.** General Pumping Arrangements **--** Oil fuel Burning Piping Arrangements **--**

## SPARE GEAR.

Has the spare gear required by the Rules been supplied **Yes**  
 State the principal additional spare gear supplied

As per List forwarded with Vancouver Report No. 5718 - S.S. "FORT ST. JAMES"

The foregoing is a correct description  
 WEST COAST SHIPBUILDERS LTD.

*W. M. Lane*  
 General Manager

Manufacturer.



© 2021

Lloyd's Register  
 Foundation

009976-009985-0190



During progress of work in shops - - See Toronto Report No. 879  
Dates of Survey while building { During erection on board vessel - - - 1942.- Aug. 6,11. Sept. 1,3,8,14,18,21,24,25,27,28,30. Oct. 3,5,6,8,9.  
Total No. of visits 18

Dates of Examination of principal parts - Cylinders Slides Covers  
Pistons Piston Rods Connecting rods  
Crank shaft See Toronto Report No. 879. Thrust shaft September 25th, 1942 Intermediate shafts September 18th, 1942  
Tube shaft Screw shaft August 11th, 1942 Propeller August 11th, 1942  
Stern tube August 6th, 1942 Engine and boiler seatings September 14<sup>th</sup> 1942 Engines holding down bolts September 14th, 1942  
Completion of fitting sea connections September 14th, 1942.  
Completion of pumping arrangements October 6th, 1942 Boilers fixed September 14th, 1942 Engines tried under steam October 1st, 1942  
Main boiler safety valves adjusted September 27th, 1942 Thickness of adjusting washers 1942 P.Blr. 19/32 31/64 C.Blr. 29/64 29/64 Starb.Blr. 15/32 3/64  
Crank shaft material O.H. Steel Lloyd's 1076 Identification Mark JKH 16-1-42 Thrust shaft material O.H. Steel Lloyd's 4199 Identification Mark J.M.B. 13-1-42  
Intermediate shafts, material O.H. Steel Lloyd's 6947 AS 21-3-42 6872 AS 1-3-42 Identification Mark  
Screw shaft, material O.H. Steel Lloyd's 5355 6836 AS 7-5-42 6735 AS 1-5-42 Identification Mark  
Is an installation fitted for burning oil fuel No Is the flash point of the oil to be used over 150°F. --  
Have the requirements of the Rules for the use of oil as fuel been complied with --  
Is the vessel (not being an oil tanker) fitted for carrying oil as cargo No If so, have the requirements of the Rules been complied with --  
If the notation for Ice Strengthening is desired, state whether the requirements in this respect have been complied with --  
Is this machinery duplicate of a previous case Yes If so, state name of vessel S.S. "FORT ST. JAMES" (Ver. Rpt. No. 5718)  
General Remarks (State quality of workmanship, opinions as to class, &c.

The machinery of this Vessel has been constructed under Special Survey of the Toronto Surveyors, and installed on board under Special Survey in accordance with the approved plans, New York letters and otherwise in conformity with the Society's Rules. The materials and workmanship are good and the tests required by the Rules have been satisfactorily carried out. The whole installation has been examined and tested under full working conditions on sea trials and afterwards part opened out, examined and found satisfactory. The machinery has also been surveyed during construction and installation on behalf of Wartime Merchant Shipping, Ltd., to ensure that the terms of the specifications have been fully complied with and this work has been satisfactorily carried out.

The machinery of this Vessel is eligible in our opinion to be classed in the Register Book with Notation of \* L.M.C. 10,42 Screw Shaft C.L. 3 S.E. Blrs. 220 lbs. per sq. inch F.D.

Toronto Fees charged in Toronto Rpt. No.879.

The amount of Entry Fee	£	:	:	When applied for,
Special (Ver.)	£	\$133.00	:	15th Oct. 1942
Donkey Boiler Fee	£	:	:	When received,
Travelling Expenses (if any)	£	\$ 20.00	:	19

Engineer Surveyor to Lloyd's Register of Shipping.

Committee's Minute

Assigned

TUE 5 JAN 1943

to L.M.C. 10.42  
22, K



© 2021

Lloyd's Register  
Foundation