

9 FEB 1944

Index. No. 375
(For London Office only).

Lloyd's Register of Shipping.

SURVEYS FOR FREEBOARD.

(COMPUTATION FOR STEAMER, SAILING SHIP, TANKER.)

Ship's Name	Official Number	Nationality and Port of Registry	Gross Tonnage	Date of Build	Port of Survey
"MANITOU PARK"	174811	CANADIAN MONTREAL	2877.8	1943	Pictou, Nova Scotia
Moulded Dimensions: Length 310.44 ft. Breadth 46.33 ft. Depth 25.16 ft.					Date of Survey during construction
Moulded displacement at moulded draught = 85 per cent. of moulded depth (21.39 ft) 6690 tons					Surveyor's Signature <i>J. H. Nain</i>
Coefficient of fineness for use with Tables .761					Particulars of Classification + 100 A1 (contemplated)

Depth for Freeboard (D).	Depth correction.	Round of Beam correction.
Moulded depth ... 25.16	(a) Where D is greater than Table depth (D - Table depth) R = (25.19 - 20.70) 2.388 + 10.72"	Moulded Breadth (B) 46.33 ft.
Stringer plate .40"03	(b) Where D is less than Table depth (if allowed) (Table depth - D) R = 4.49	Standard Round of Beam = $\frac{B \times 12}{50} = 11.12$ inches
Sheathing on exposed deck $T \left(\frac{L-S}{L} \right) =$	If restricted by superstructures	Ship's Round of Beam = 11 inches
Depth for Freeboard (D) = 25.19		Difference .12 inches
		Restricted to
		Correction = $\frac{\text{Diff}^n}{4} \times \left(1 - \frac{S_1}{L} \right) = \frac{.12}{4} \times \frac{53.79}{46.33} = .02$

DEDUCTION FOR SUPERSTRUCTURES.

	Mean Covered Length (S)	Equivalent Enclosed Length (S ₁)	Height	Height Correction	Effective Length (E)	
Poop enclosed ...	31.21	31.21	7.75		31.21	Standard Height of Superstructure 6.604
" overhang ...	2.00	1.00			1.00	" " R.Q.D.
R.Q.D. enclosed ...	--	--			--	Deduction for complete superstructure 36.03
" overhang ...	--	--			--	Percentage covered $\frac{S}{L} = 47.17$
Bridge enclosed ...	76.0	76.0	9.0		76.0	" $\frac{S_1}{L} = 46.21$
" overhang aft ...	4.0	3.0			3.0	" $\frac{E}{L} = 46.21$
" overhang forward ...	2.0	1.0			1.0	Percentage from Table, Line A.
F'cle enclosed ...	31.23	31.23	7.0		31.23	(corrected for absence of forecastle (if required))
" overhang ...	None	--			--	Percentage from Table, Line B.
Trunk aft ...	--	--			--	(corrected for absence of forecastle (if required))
" forward ...	--	--			--	Interpolation for bridge less than 2L (if required)
Tonnage opening aft ...	--	--			--	Deduction = 36.03 x .3278 = 11.81 ins.
" " forward ...	--	--			--	
Total ...	146.44	143.44			143.44	

SHEER CORRECTION.

Station	Standard Ordinate	S M	Product	Actual Ordinate	Effective Ordinate	S M	Product	
A.P. ...	41.04	1	41.04	18.5	18.50	1	18.50	Mean actual sheer aft = < 1.00
1/4 L from A.P. ...	18.26	4	73.04	1.6	1.60	4	6.40	Mean actual sheer forward = < 1.00
1/2 L " ...	4.51	2	9.02	--	--	2	--	Mean standard sheer aft
Amidships ...	--	4	--	--	--	4	--	Mean standard sheer forward
3/4 L from F.P. ...	9.03	2	18.06	--	--	2	--	Length of enclosed superstructure forward of amidships = > .10
1/4 L " ...	36.53	4	146.12	14.8	14.80	4	59.20	" " aft of " = > .10
F.P. ...	82.08	1	82.08	66.0	66.00	1	66.00	
Total ...			369.36				150.10	
Correction = $\frac{\text{Difference between sums of products}}{18} \left(\frac{75-S}{2L} \right) = \frac{219.26}{18} \times .5142 = + 6.26$ ins.								
If limited on account of midship superstructure.								
If limited to maximum allowance of 1 1/2 ins. per 100 ft.								

Deduction for Tropical Freeboard.	Deduction for Fresh Extreme Water.	TABULAR FREEBOARD corrected for Flush Deck (if required)
Addition for Winter and Winter North Atlantic Freeboard.	Displacement in salt water at summer load water line 5	Correction for coefficient .68 + .761 = 1.441
Depth to Freeboard Deck = 25.19	20 ft. - 6253 tons	1.36 1.36 -
Summer freeboard = 4.50	22 ft. - 6605 tons	Depth Correction ... 10.72
Moulded draught (d) = 20.69	20 ft. - 6950 tons	Deduction for superstructures ... 11.81
Deduction for Tropical freeboard and addition for Winter freeboard = 5 1/2	22 ft. - 29.25	Sheer correction ... 6.26
Addition for Winter North Atlantic Freeboard (if required) = 5 1/2 + 2 = 7 1/2	Deduction = 40 T = 6.55	Round of Beam correction02
	40 x 29.21 = 5.61 = 5 1/2	Correction for Thickness of Deck amidships ...
		Other corrections, scantlings, etc. ...
		17.00 11.81 + 5.19
		Summer Freeboard = 53.94

SUMMER FREEBOARD amidships from Centre of Disc to top of Deck Line, Steel, Deck: -

Tropical Fresh Water Line above Centre of Disc ...	10 3/4	Tropical Fresh Water Freeboard ...	3 7/8
Fresh Water Line " " ...	5 1/2	Fresh Water " " ...	4 0 1/2
Tropical Line " " ...	5 1/2	Tropical " " ...	4 0 3/4
Winter Line below " " ...	5 1/2	Winter " " ...	4 1 1/2
Winter North Atlantic Line " " ...	7 1/4	Winter North Atlantic " " ...	5 1 1/2

A new form should be prepared if any alterations that affect the freeboard have been made. If no such alterations have been made, the Surveyor should endorse the form on this side with his signature and the date.

Trade of ship.....

Names of sister ships.....

Builder's name and yard number.....

Owners.....

Fee £.....

Tonnage		Gross		Net		Deadweight		Cargo		Stores		Fuel		Water		Ballast		Other	
100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100
200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300
400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400
500	500	500	500	500	500	500	500	500	500	500	500	500	500	500	500	500	500	500	500
600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700
800	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800	800
900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000



© 2021

Lloyd's Register
Foundation