

Lloyd's Register of Shipping.

SURVEYS FOR FREEBOARD.

Computation of Freeboard for Steamer, Sailing Ship, Tanker

having

(Type of Superstructures.)

Ship's Name "NEPTUNUS"

Nationality and Port of Registry

Official Number

Gross Tonnage

Date of Build

Port of Survey

Date of Survey 24.10.32

Name of Surveyor

Particulars of Classification +100 A1

Moulded Dimensions: Length 45.29 m. Breadth 7.74 m. Depth 3.46 m.
813 m³

Moulded displacement at moulded draught = 85 per cent. of moulded depth

Coefficient of fineness for use with Tables 789

Depth for Freeboard (D)	Depth correction	Round of Beam correction
Moulded depth ...	(a) Where D is greater than Table depth (D-Table depth) R =	Moulded Breadth (B)
Tringer plate ...	+ 43 %	Standard Round of Beam = $\frac{B \times 12}{50}$ =
Heating on exposed deck	(b) Where D is less than Table depth (if allowed) (Table depth-D) R =	Ship's Round of Beam =
$T \left(\frac{L-S}{L} \right) =$	If restricted by superstructures	Difference
Depth for Freeboard (D) = 3.470		Restricted to
		Correction = $\frac{\text{Diff}}{4} \times \left(1 - \frac{S_1}{L} \right) = - 11 \frac{m}{m}$

DEDUCTION FOR SUPERSTRUCTURES.

	Mean Covered Length (S)	Equivalent Enclosed Length (S ₁)	Height	Height Correction	Effective Length (E)	
Poop enclosed ...						Standard Height of Superstructure
" overhang ...						" " R.Q.D.
R.Q.D. enclosed ...						Deduction for complete superstructure 530
" overhang ...						Percentage covered $\frac{S}{L} =$
Bridge enclosed ...						" " $\frac{S_1}{L} =$
" overhang aft ...						" " $\frac{E}{L} = 39.48 \%$
" overhang forward						Percentage from Table, Line A Timber 62.44 %
F ¹ cle enclosed ...						(corrected for absence of forecastle (if required))
" overhang ...						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 = 530 x .6244 = - 331 %
" " forward						
Total ...						

SHEER CORRECTION.

Station	Standard Ordinate	S	M	Product	Actual Ordinate	Effective Ordinate	S	M	Product
P. ...		1					1		
L from A.P. ...		4					4		
" ...		2					2		
midships ...		4					4		
L from F.P. ...		2					2		
" ...		4					4		
P. ...		1					1		
Total ...									

Mean actual sheer aft =

Mean standard sheer aft =

Mean actual sheer forward =

Mean standard sheer forward =

Length of enclosed superstructure forward of amidships =

" " aft of " =

Correction = $\frac{\text{Difference between sums of products}}{18} \left(75 - \frac{S}{2L} \right) = 41.1$

If limited on account of midship superstructure.

If limited to maximum allowance of 1 1/2 ins. per 100 ft.

Deduction for Tropical Freeboard.

Addition for Winter and Winter North Atlantic Freeboard.

Depth to Freeboard Deck = 3.47 m.

Summer freeboard = 12"

Moulded draught (d) = 3.35

Deduction for Fresh Water.

Displacement in salt water at summer load water line

$\Delta = 946 \text{ m}^3$

Tons per inch immersion at summer load water line

T = 8 m³

Deduction = $\frac{\Delta}{40 T}$ inches

= 8 %

TABULAR FREEBOARD corrected for Flush Deck (if required)

Correction for coefficient

	+	-
Depth Correction ...	43	-
Deduction for superstructures ...	-	331
Sheer correction ...	-	-
Round of Beam correction ...	-	11
Correction for Thickness of Deck amidships ...	-	-
Other corrections, scantlings, etc. ...	-	-
	43	342

Summer Freeboard = 120 %

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

	36 cm Timber	28 cm "	27 cm "	11 cm "	13 cm "
Timber Tropical Fresh Water Line above Centre of Disc ...					
" Fresh Water Line " " ...					
" Tropical Line " " ...					
" Winter Line below above ...					
" Winter North Atlantic Line " below ...					

Summer line above centre of disc

MARKING FORM

29 APR 1932

Lloyd's Register Foundation