Equivalent Depth as Oil Tanker

Length and Lad 64·96'

Rpt. C.11 (Comp.).

③

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
Willem Barendsz				

Port of Survey _____

Date of Survey 13.6.49

Surveyor's Signature _____

Particulars of Classification

Moulded Dimensions : Length 552·46'' Breadth 64·00' Depth 40·27'

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

Coefficient of fineness for use with Tables 852·840

DEPTH FOR FREEBOARD (D).

Moulded depth ... ... 40·27

Stringer plate 06

Sheathing on exposed deck

$T\left(\dfrac{L-S}{L}\right) =$ 27

Depth for Freeboard (D) = 40·35

DEPTH CORRECTION.

(a) Where D is greater than Table depth
(D—Table depth) R =

$\dfrac{(40·35 - 36·83)3}{3·52} = +10·56$

(b) Where D is less than Table depth (if allowed)
(Table depth—D) R =

3·44   +10·32

If restricted by superstructures

ROUND OF BEAM CORRECTION.

Moulded Breadth (B)

Standard Round of Beam = $\dfrac{B \times 12}{50}$ =

Ship's Round of Beam = Standard

Difference

Restricted to

Correction = $\dfrac{Diff^{ce}}{4} \times \left(1 - \dfrac{S_1}{L}\right)$ = NIL.

DEDUCTION FOR SUPERSTRUCTURES.

	Mean Covered Length (S)	Equivalent Enclosed Length (S₁)	Height	Height Correction	Effective Length (E)
Poop enclosed					
„ overhang					
R.Q.D. enclosed					
„ overhang ...					
Bridge enclosed					
„ overhang aft ...					
„ overhang forward ...					
F'cle enclosed					
„ overhang ...					
Trunk aft					
„ forward ...					
Tonnage opening aft ...					
„ „ forward...					
Total					

Standard Height of Superstructure 7·50'

„ „ R.Q.D. _____

Deduction for complete superstructure 42·00''

Percentage covered $\dfrac{S}{L}$ =

„ „ $\dfrac{S_1}{L}$ = } 40%

„ „ $\dfrac{E}{L}$ =

Percentage from Table, Line A. Tanker 31·00
(corrected for absence of forecastle (if required))

Percentage from Table, Line B.
(corrected for absence of forecastle (if required))

Interpolation for bridge less than ·2L (if required)

Deduction = 42·00 × ·31 = 13·02

SHEER CORRECTION.

Station	Standard Ordinate	S M	Product	Actual Ordinate	Effective Ordinate	S M	Product
A.P.		1		S		1	
⅙L from A.P. ...		4		T		4	
⅔L „ ...		2		A		2	
Amidships ...		4		N		4	
⅔L from F.P. ...		2		D		2	
⅙L „ ...		4		A		4	
F.P.		1		R		1	
Total ...				D			

Mean actual sheer aft
―――――――――――――― =
Mean standard sheer aft

Mean actual sheer forward
―――――――――――――――― =
Mean standard sheer forward

Length of enclosed superstructure
――――――――――――――――――― forward of amidships =
L

„ „ aft of „ =

Correction = $\dfrac{\text{Difference between sums of products}}{18}\left(·75 - \dfrac{S}{2L}\right) = $ NIL.

If limited on account of midship superstructure.

If limited to maximum allowance of 1½ ins. per 100 ft.

Deduction for Tropical Freeboard.
Addition for Winter and Winter North Atlantic Freeboard.

Ft.

Depth to Freeboard Deck = 40·27

Summer freeboard = 9·11

Moulded draught (d) = 31·26

Deduction for Tropical freeboard and addition for

Winter freeboard = $\dfrac{d}{4}$ inches =

Addition for Winter North Atlantic Freeboard (if required)=

Deduction for Fresh Water.

Displacement in salt water at summer load water line

Δ =

Tons per inch immersion at summer load water line

T =

Deduction = $\dfrac{\Delta}{40\,T}$ inches
=

TABULAR FREEBOARD corrected for Flush Deck (if required)   99·12

Correction for coefficient $\dfrac{852 \times 65}{50} = \dfrac{1·32}{1·32}$ 110·75

	+	−
Depth Correction	10·33	
Deduction for superstructures ...		13·02
Sheer correction		
Round of Beam correction ...		
Correction for Thickness of Deck amidships ...		
Other corrections, scantlings, etc.	52	2·70
	10·56	13·02

+2·46

Summer Freeboard = 109·19   108·08
9·04
1·00'

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

Tropical Fresh Water Line above Centre of Disc	Tropical Fresh Water Freeboard ... ...
Fresh Water Line „ „	Fresh Water ... ...
Tropical Line „ „	Tropical ... ...
Winter Line below „ „	Winter ... ...
Winter North Atlantic Line „ „	Winter North Atlantic ... ...

010405 - 010415 - 0210

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.

$$D = 31.25 + \frac{98.63}{12} + \frac{(D-36.83)3}{12}$$

$$12D = 375.00 + 98.63 + 3D - 110.49$$

$$9D = 363.14$$

$$D = 40.35$$

$$
\begin{array}{r}
375.00 \\
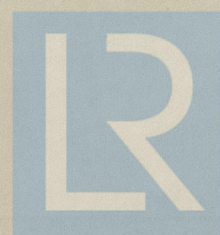98.63 \\
\hline
473.63 \\
110.49 \\
\hline
363.14
\end{array}
$$

Trade of ship

Names of sister ships

Builder's name and yard number

Owners

Fee £