

# Lloyd's Register of Shipping.

## SURVEYS FOR FREEBOARD.

4 MAY 1934  
Index No. 24844  
(For London Office only.)

Computation of Freeboard for Steamer, Sailing Ship, Tanker				Port of Survey <u>Frederikstad</u>	
having <u>Poop, Bridge &amp; Stile</u>				Date of Survey <u>4/10/32</u>	
(Type of Superstructures.)					
Ship's Name	Nationality and Port of Registry	Official Number	Gross Tonnage	Date of Build	Name of Surveyor
<u>GIMLE</u>	<u>Norwegian</u> <u>Arendal</u>		<u>1271</u>	<u>1916/12</u>	
Moulded Dimensions: Length <u>237.0</u> Breadth <u>36.25</u> Depth <u>18.0</u>				Particulars of Classification <u>+ 100 A.1.</u>	
Moulded displacement at moulded draught = 85 per cent. of moulded depth <u>2890</u> tons					
Coefficient of fineness for use with Tables <u>.770</u>					

<b>Depth for Freeboard (D)</b> Moulded depth ... .. Stringer plate ... .. Sheathing on exposed deck $T \left( \frac{L-S}{L} \right) =$ Depth for Freeboard (D) = <u>18.04</u>	<b>Depth correction</b> (a) Where D is greater than Table depth (D - Table depth) R = <u>+ 4.08"</u> (b) Where D is less than Table depth (if allowed) (Table depth - D) R = If restricted by superstructures	<b>Round of Beam correction</b> Moulded Breadth (B) Standard Round of Beam = $\frac{B \times 12}{50} =$ Ship's Round of Beam = Difference Restricted to Correction = $\frac{\text{Diff}}{4} \times \left( 1 - \frac{S_1}{L} \right) =$ <u>- .04</u>
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### DEDUCTION FOR SUPERSTRUCTURES.

	Mean Covered Length (S)	Equivalent Enclosed Length (S <sub>1</sub> )	Height	Height Correction	Effective Length (E)	
Poop enclosed ...						Standard Height of Superstructure
" overhang ...						" " R.Q.D.
R.Q.D. enclosed ...						Deduction for complete superstructure <u>29.70</u>
" overhang ...						Percentage covered $\frac{S}{L} =$
Bridge enclosed ...						" " $\frac{S_1}{L} =$
" overhang aft ...						" " $\frac{E}{L} =$ <u>43.00%</u>
" overhang forward ...						Percentage from Table, Line A. (corrected for absence of forecastle (if required))
F'cle enclosed ...						Percentage from Table, <u>Line B. TIMBER</u> <u>64.87%</u> (corrected for absence of forecastle (if required))
" overhang ...						Interpolation for bridge less than 2L (if required)
Trunk aft ...						Deduction = <u>29.70</u> $\times$ <u>.6487</u> = <u>- 19.27</u>
" forward ...						
Tonnage opening aft ...						
" " forward						
Total ...						

### SHEER CORRECTION.

Station	Standard Ordinate	S	M	Product	Actual Ordinate	Effective Ordinate	S	M	Product	
A.P. ...		1					1			Mean actual sheer aft =
$\frac{1}{6}$ L from A.P. ...		4					4			Mean actual sheer forward =
$\frac{2}{6}$ L " ...		2					2			Mean standard sheer forward =
Amidships ...		4					4			Length of enclosed superstructure forward of amidships =
$\frac{2}{6}$ L from F.P. ...		2					2			" " aft of " =
$\frac{1}{6}$ L " ...		4					4			
F.P. ...		1					1			
Total ...										

Correction =  $\frac{\text{Difference between sums of products}}{18} \left( .75 - \frac{S}{2L} \right) =$  + .25

If limited on account of midship superstructure.

If limited to maximum allowance of  $1\frac{1}{2}$  ins. per 100 ft.

<b>Deduction for Tropical Freeboard.</b> <b>Addition for Winter and Winter North Atlantic Freeboard.</b> Depth to Freeboard Deck = <u>18.04</u> Ft. Summer freeboard = <u>1.39</u> Moulded draught (d) = <u>16.65</u> Deduction for Tropical freeboard and addition for Winter freeboard = $\frac{d}{4}$ inches = <u>4.16</u> = <u>4 1/4</u> Addition for Winter North Atlantic Freeboard (if required) = $\frac{d}{3} = 5.55 = 5\frac{1}{2} = 140$	<b>Deduction for Fresh Water.</b> Displacement in salt water at summer load water line $\Delta = 3199$ Tons per inch immersion at summer load water line $T = 17.8$ Deduction = $\frac{\Delta}{40T}$ inches = <u>4.49</u> = <u>4 1/2</u> = <u>114</u>	<b>TABULAR FREEBOARD</b> corrected for Flush Deck (if required) Correction for coefficient <table border="1"> <tr> <th></th> <th>+</th> <th>-</th> </tr> <tr> <td>Depth Correction ...</td> <td><u>4.08</u></td> <td><u>✓</u></td> </tr> <tr> <td>Deduction for superstructures ...</td> <td><u>19.27</u></td> <td><u>✓</u></td> </tr> <tr> <td>Sheer correction ...</td> <td><u>.25</u></td> <td><u>✓</u></td> </tr> <tr> <td>Round of Beam correction ...</td> <td><u>.04</u></td> <td><u>✓</u></td> </tr> <tr> <td>Correction for Thickness of Deck amidships ...</td> <td><u>✓</u></td> <td><u>✓</u></td> </tr> <tr> <td>Other corrections, scantlings, etc. ...</td> <td><u>✓</u></td> <td><u>✓</u></td> </tr> </table> 4.33 19.31 -14.98 Summer Freeboard = <u>16.75</u>		+	-	Depth Correction ...	<u>4.08</u>	<u>✓</u>	Deduction for superstructures ...	<u>19.27</u>	<u>✓</u>	Sheer correction ...	<u>.25</u>	<u>✓</u>	Round of Beam correction ...	<u>.04</u>	<u>✓</u>	Correction for Thickness of Deck amidships ...	<u>✓</u>	<u>✓</u>	Other corrections, scantlings, etc. ...	<u>✓</u>	<u>✓</u>	<u>29.76</u> <u>31.73</u>
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TIMBER SUMMER FREEBOARD amidships from Centre of Disc to top of Deck Line, Wood, Steel, Deck:—			
Timber	Tropical Fresh Water Line above Centre of Disc	Fresh Water Line	Tropical Line
17	= 432		
12 3/4	= 324		
12 1/2	= 318		
2 3/4	= 70		
4	= 102		
8 1/4	= 210		
Steel	Deck	Deck	Deck
1' 4 3/4"	= 425		
0' 8"	= 203		
1' 0 1/4"	= 311		
1' 0 1/2"	= 317		
1' 10 1/4"	= 565		
2' 5"	= 737		