

# Lloyd's Register of Shipping.

## SURVEYS FOR FREEBOARD-STEAMERS.

Ship's Name. <i>"Yalene"</i>	Port of Registry and Nationality. <i>Holland</i> <i>British</i>	Official Number. <i>153895</i>	Gross Tonnage. <i>about</i> <i>2800</i>	Date of Build. <i>1930</i>	Particulars of Classification. <i>+ 100 A1</i>
Number in Register Book _____					

Moulded dimensions *315* × *45.25* × *22.25*  
 Moulded displacement at a moulded draught of 85 per cent. of moulded depth *5490*  
 Coefficient of fineness for use with tables *.713*

### DEPTH FOR FREEBOARD.

Moulded depth	...	...	...	...	<i>22.25</i>
Stringer plate	<i>mean thickness</i>	...	...	...	<i>.04</i>
Sheathing in wells	$T \left( \frac{L-S}{L} \right) = \frac{2.5 \times 3174}{12}$	...	...	...	<i>.07</i>
Depth D =	...	...	...	...	<i>22.36</i>

*at marking = 22-3 1/2*  
*str 22-4 1/4*

### CORRECTION FOR LENGTH.

(a) When D is greater than  $\frac{L}{15}$   
 $(D - \frac{L}{15}) \times R = (22.36 - 21.00) \times 2.423 = + 3.30$   
 (b) When D is less than  $\frac{L}{15}$  (if allowed).  
 $(\frac{L}{15} - D) \times R = \dots$   
 If restricted by height of superstructures ...

### SUPERSTRUCTURES.

Standard height *6.65*

	Mean Covered Length S.	Equivalent Enclosed Length S <sub>1</sub> .	Height.	Correction for Height.	Effective Length.
Poop enclosed	<i>13.54</i>	<i>13.54</i>	<i>8.5</i>		
overhang	<i>3.17</i>	<i>1.59</i>			<i>15.13</i>
R.Q.D. enclosed					
overhang					
Bridge enclosed	<i>141.17</i>	<i>141.17</i>	<i>8.5</i>		
overhang aft	<i>2.83</i>	<i>2.12</i>			<i>143.29</i>
overhang forward					
F'cle enclosed	<i>50.29</i>	<i>50.29</i>	<i>7.5</i>		<i>50.29</i>
overhang					
Trunks forward					
aft					
Tonnage opening	<i>4.00</i>	<i>3.15</i>			<i>3.15</i>

TOTAL = *215.00* *211.86* *211.86*  
 Length of ship (L) = *315.00* *315.00* *315.00*  
 % Covered ... = *68.26* *67.26%* *67.26%*  
 Corresponding %, corrected for absence of forecastle if required } A = *58.34* } Correction for Bridge less than 2L if required }  
 Allowance ... = *36.33* × *.5834* = *-21.19"*

### SHEER.

Station.	Actual Sheer.	Standard Sheer.	Allowed Sheer.	S. M.	Products.
A.P. 1	<i>42.00</i>	<i>41.50</i>	<i>42.00</i>	<i>1</i>	<i>42.00</i>
2	<i>23.00</i>		<i>23.00</i>	<i>4</i>	<i>92.00</i>
3			<i>10.22</i>	<i>2</i>	<i>20.44</i>
4			<i>2.56</i>	<i>4</i>	<i>10.24</i>
5			<i>0.00</i>	<i>2</i>	<i>0.00</i>
6	<i>46.25</i>		<i>20.56</i>	<i>2</i>	<i>41.12</i>
F.P. 7	<i>84.00</i>	<i>83.00</i>	<i>84.00</i>	<i>4</i>	<i>336.00</i>

If excess sheer forward and deficient sheer aft:—

Actual sheer aft = *Deficient (see over)*  
 Standard sheer aft =  
 Actual sheer forward = *Deficient*  
 Standard sheer forward =

Mean effective sheer ... = *20.64*  
 Standard sheer .05L + 5 = *20.75*  
 Difference (Df) = *.11*  
 Allowance =  $Df \times \left( \frac{.75 - \frac{S}{2L}}{.75} \right) = .11 \times .409 = + .05$   
 If limited on account of amidship superstructure ... =  
 If limited on account of excess sheer (1 1/2 in. per 100 ft.) ... =

Length of enclosed superstructure L  
 Forward of amidships =  
 Aft of amidships =

### ROUND OF BEAM.

Standard	...	<i>10.86</i>
Ship	...	<i>11.00</i>
Difference	...	<i>.14</i>
Restricted to	...	
Allowance = $\frac{\text{Difference}}{4} \times \left( 1 - \frac{S}{L} \right) = .035 \times .33 = -.01$		

### TABULAR FREEBOARD (corrected for flush deck if required) =

Corrected for Coefficient <i>.713</i> $\frac{+.68}{1.36} = 1.024 \times 47.15 =$	<i>47.15</i>
	<i>48.30</i>
Correction for Length ...	<i>3.30</i>
Superstructures ...	<i>21.19</i>
Sheer ...	<i>.05</i>
Round of beam ...	<i>.01</i>
Thickness of deck ...	
Scantlings, etc. ...	
Statutory deck line ...	
	<i>3.35</i> <i>21.20</i> <i>-17.85</i>

Summer Freeboard = *30.45*

FREEBOARD recommended amidships from centre of Disc to top of Statutory Deck Line, Wood (Steel) Deck:—

Fresh Water Line	above centre of Disc	...
Indian Summer Line	"	...
Winter Line	below	...
Winter North Atlantic Line	"	...

*1906 file* } S *2' - 7 3/4*  
 } W *2 - 11 1/4*

Difference

