

LLOYD'S REGISTER OF SHIPPING

UNITED WITH THE BRITISH CORPORATION REGISTER

SURVEYS FOR FREEBOARD.

(COMPUTATION FOR STEAMER, SAILING SHIP, TANKER.)

NAM FENG

Ship's Name <i>EX</i> <i>KAPONGA</i>	Official Number <i>182692</i>	Nationality and Port of Registry <i>AUCKLAND</i> <i>HONGKONG</i>	Gross Tonnage <i>2772</i>	Date of Build <i>1949</i>	Port of Survey
Moulded Dimensions: Length <i>300.625</i> Breadth <i>46.00</i> Depth <i>23.25</i>					Date of Survey <i>12.4.55</i>
Moulded displacement at moulded draught = 85 per cent. of moulded depth tons (excluding bossing) <i>5540</i>					Surveyor's Signature
Coefficient of fineness for use with Tables. <i>.709</i>					Particulars of Classification <i>+100 A1</i> ✓

DEPTH FOR FREEBOARD (D).	DEPTH CORRECTION.	ROUND OF BEAM CORRECTION.
Moulded depth <i>23.25</i>	(a) Where D is greater than Table depth (D-Table depth) R = <i>+4.49</i> ✓	Moulded Breadth (B) <i>46.00</i>
Stringer plate <i>.03</i>	(b) Where D is less than Table depth (if allowed) (Table depth-D) R =	Standard Round of Beam = $\frac{B \times 12}{50} =$ <i>11.04</i>
Sheathing on exposed deck $T \left(\frac{L-S}{L} \right) =$	If restricted by superstructures	Ship's Round of Beam = <i>9.00</i>
Depth for Freeboard (D) = <i>23.28</i>		Difference <i>2.04</i>
		Restricted to
		Correction = $\frac{\text{Diff}^c}{4} \times \left(1 - \frac{S_1}{L} \right) =$ <i>+29</i>

DEDUCTION FOR SUPERSTRUCTURES.

	Mean Covered Length (S)	Equivalent Enclosed Length (S ₁)	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	<i>133.34</i>	<i>132.38</i>			<i>132.38</i>

Standard Height of Superstructure	<i>6.51</i>
" " R.Q.D.	✓
Deduction for complete superstructure	<i>35.37</i>
Percentage covered $\frac{S}{L} =$	<i>44.36</i>
" " $\frac{S_1}{L} =$	<i>44.04</i> ✓
" " $\frac{E}{L} =$	
Percentage from Table, Line A. <i>TIMBER</i>	<i>66.52</i> ✓
(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 = <i>35.37 + 66.52 =</i>	<i>23.17</i> ✓

SHEER CORRECTION.

Station	Standard Ordinate	S	M	Product	Actual Ordinate	Effective Ordinate	S	M	Product
A.P.		1					1		
$\frac{1}{8}L$ from A.P.		4					4		
$\frac{2}{8}L$ "		2					2		
Amidships		4					4		
$\frac{3}{8}L$ from F.P.		2					2		
$\frac{4}{8}L$ "		4					4		
F.P.		1					1		
Total				<i>360.66</i>					<i>364.50</i>

Correction = $\frac{\text{Difference between sums of products}}{18} \left(.75 - \frac{S}{2L} \right) =$
If limited on account of midship superstructure.

Mean actual sheer aft =	<i>EXCESS</i> ✓
Mean standard sheer aft =	
Mean actual sheer forward =	<i>EXCESS</i> ✓
Mean standard sheer forward =	
Length of enclosed superstructure forward of amidships = $\frac{S}{L}$	<i>7.12</i> ✓
" " aft of " = $\frac{S}{L}$	<i>7.12</i> ✓

-12 ✓
If limited to maximum allowance of $1\frac{1}{2}$ ins. per 100 ft.

Deduction for Tropical Freeboard.	Deduction for Fresh Water.	TABULAR FREEBOARD corrected for Flush Deck (if required)
Addition for Winter and Winter North Atlantic Freeboard.		Correction for coefficient <i>1.389</i> <i>1.36</i>
Depth to Freeboard Deck = <i>23.28</i>	Displacement in salt water at summer load water line	Depth Correction <i>4.49</i> ✓
Summer freeboard = <i>2.42</i>	$\Delta =$	Deduction for superstructures <i>23.17</i> ✓
Moulded draught (d) = <i>20.86</i> ✓	Tons per inch immersion at summer load water line	Sheer correction <i>.12</i> ✓
Keel allowance =	T =	Round of Beam correction <i>.29</i> ✓
<i>TIMBER</i> Extreme draught =	Deduction = $\frac{\Delta}{40 T}$ inches	Correction for Thickness of Deck amidships <i>12.4</i> ✓
Deduction for Tropical freeboard and addition for	<i>5.4</i> ✓	Other corrections, scantlings, etc.
Winter freeboard = <i>5.22 = 5.4</i> ✓		<i>7.78</i> <i>23.29</i> <i>-16.61</i>
<i>TIMBER</i> Addition for Winter North Atlantic Freeboard (if required) = <i>6.95 = 7</i> ✓		Summer Freeboard = <i>28.98</i>

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

<i>TIMBER</i>	Tropical Fresh Water Line above Centre of Disc	<i>22.34</i>
"	Fresh Water Line	<i>17.2</i>
"	Tropical Line	<i>17.2</i>
"	Winter Line	<i>5.4</i>
"	Winter North Atlantic Line	<i>7</i>
"	SUMMER LINE ABOVE.	<i>12.4</i>

Tropical Fresh Water Freeboard	<i>2.5</i>
Fresh Water	<i>1.11.4</i>
Tropical	<i>1.11.4</i>
Winter	<i>3.0</i>
Winter North Atlantic	<i>4.0.4</i>