PRELIMINARY.

Rpt. C.11 (Comp.).

Index No. ..... (For London Office only.)

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
HAWTHORN LESLIE'S YARD N° 700.				

Port of Survey .....

Date ~~of Survey~~ 26-5-48

Surveyor's Signature .....

Particulars of Classification 100 A1 Carrying Volumes of Petroleum

Moulded Dimensions: Length ~~430·83~~ 431·00 ✓ Breadth 61·00 ✓ Depth 31·00 ✓

To centre of Rudder Stock.

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

Coefficient of fineness for use with Tables .775 (as per Builders.) ✓

DEPTH FOR FREEBOARD (D).

Moulded depth ... ... 31·00

Stringer plate ... ~~·76+·05~~ ... ·07

Sheathing on exposed deck

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

Depth for Freeboard (D) = 31·07

DEPTH CORRECTION.

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

$(31·07 - 28·72)\,3 = +7·05$ ~~2·35~~ 2 ✓

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

If restricted by superstructures ✓

ROUND OF BEAM CORRECTION.

Moulded Breadth (B) 61·00 ✓

Standard Round of Beam = $\frac{B\times12}{50}$ = 14·64" ✓

Ship's Round of Beam = ~~15·00~~ 14·75" ✓

Difference + ~~·36~~ ·11 ✓ +·11"

Restricted to ~~·36~~ ·5699

Correction = $\frac{\text{Diff}^{e}}{4}\times\left(1-\frac{S_1}{L}\right)$ = ~~·36~~ / 4 × 5709 = ~~·05~~ ·02

DEDUCTION FOR SUPERSTRUCTURES.

	Mean Covered Length (S)	Equivalent Enclosed Length (S_1)	Height	Height Correction	Effective Length (E)
	108·17	108·17			108·17
Poop enclosed Equivalent ...	~~107·66~~ ✓	~~107·66~~ ✓	8·00 ✓	✓	~~107·66~~ ✓
„ overhang ... " ...	0·17 ✓	·08 ✓			·08
R.Q.D. enclosed	·33 ✓	·16			·16
„ overhang	35·09 ✓	·09			·09
Bridge enclosed Equivalent ...	~~35·17~~ ✓	35·17 ✓	8·00 ✓	✓	35·17 ✓
„ overhang aft ...	3·50 ✓	2·63 ✓			2·63 ✓
„ overhang forward ...	0·33 ✓	·16 ✓			·16 ✓
F'cle enclosed	35·17 ✓	35·17 ✓	8·00 ✓	✓	35·17 ✓
„ overhang	4·00 ✓	4·00 ✓			4·00 ✓
Trunk aft					
„ forward					
Tonnage opening aft ...					
„ „ forward ...	186·59 ✓	185·38 ✓			185·38 ✓
Total	~~186·00~~ ✓	~~184·87~~ ✓			~~184·87~~ ✓

Standard Height of Superstructure 7·50 ✓

„ „ R.Q.D. ..... ✓

Deduction for complete superstructure 42·00 ✓

Percentage covered $\frac{S}{L}$ = 43·17·29

„ „ $\frac{S_1}{L}$ = } ~~42·91~~ 43·01

„ „ $\frac{E}{L}$ = }

Percentage from Table, Line ~~A~~. Tanker ~~3391~~ 34·01 ✓

(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 × ~~·3391~~ ·3401 = 14 ~~·24~~ ·28

SHEER CORRECTION.

Station	Standard Ordinate	SM	Product	Actual Ordinate	Effective Ordinate	SM	Product
A.P. CR. OF RUDDER STOCK	~~53·08~~ ·10	1	~~53·08~~ ·10	~~52·00~~ 54·50 ✓	~~52·00~~ 54·50 ✓	1	~~52·00~~ 54·50
⅛L from A.P. ...	23·63	4	~~94·48~~ ·52	~~24·00~~ 24·30 ✓	24·00 ✓ ~~·00~~ ·30	4	~~96·00~~ 97·20
⅜L „ ...	5·84	2	11·68	~~6·00~~ 6·10 ✓	6·00 ✓ ~~·00~~ ·10	2	12·00 ·20
Amidships ...	—	4	—	—	—	4	—
⅜L from F.P. ...	11·68	2	23·36	~~12·00~~ 11·90 ✓	~~12·00~~ 11·90 ✓	2	~~24·00~~ 23·80
⅛L „ ...	~~47·245~~ ·26	4	~~188·98~~ 189·04	~~48·00~~ 47·90 ✓	~~48·00~~ 47·90 ✓	4	192·00 191·60
F.P.	106·17	1	106·17	~~105·00~~ 108·00 ✓	~~105·00~~ 108·00 ✓	1	~~105·00~~ 108·00
Total ...	·20		~~477·75~~ ·90 ✓				~~481·00~~ 487·30

Mean actual sheer aft / Mean standard sheer aft = Excess ✓

Mean actual sheer forward / Mean standard sheer forward = Excess ✓

Length of enclosed superstructure / L forward of amidships = } Tanker.

„ „ aft of „ = }

Correction = $\frac{\text{Difference between sums of products}}{18}\left(\cdot75-\frac{S}{2L}\right)$ = 9·40 ~~3·25~~ / 18 (·75 − ~~·2158~~ ·2164) = ~~·10~~ ·28 ✓

~~·5342~~ ·5336

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 Freebroad.

Ft.

Depth to Freeboard Deck = 31·07 ✓

Summer freeboard = 5·65 ~~52~~

Moulded draught (d) = 25·42 ~~25~~

Deduction for Tropical freeboard and addition for Winter freeboard = $\frac{d}{4}$ inches = 6·35 ~~6~~ = 6¼" ✓

Addition for Winter North Atlantic Freeboard (if required) = 6·35 ~~6~~ + 4·31 ~~7~~ = 10·66 = 10¾" ✓

Deduction for Fresh Water.

Displacement in salt water at summer load water line △ =

Tons per inch immersion at summer load water line T =

Deduction = $\frac{\triangle}{40\,T}$ inches = $\frac{d}{4}$ = 6¼" ✓

TABULAR FREEBOARD ~~corrected for Flush Deck (if required)~~

Correction for coefficient $\frac{\cdot775+\cdot68}{1·36}$ = $\frac{1·455}{1·36}$

	+	−
Depth Correction	~~7·05~~ 7·03 ✓	— ·28 ✓
Deduction for superstructures	—	14·24
Sheer correction	—	·10
Round of Beam correction	—	~~·05~~ ·02
Correction for Thickness of Deck amidships ...	—	—
Other corrections, scantlings, etc.	—	·58
	~~7·05~~ 7·03	~~14·39~~ 14·24

70 ~~·12~~ ·16 ✓

75 ~~·07~~ ·07 ✓

A.R. 28.5.48

·56

− ~~7·34~~ 7·24

Summer Freeboard = ~~67·67~~ 67·51

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

Tropical Fresh Water Line above Centre of Disc	... 12½" ✓	Tropical Fresh Water Freeboard	5'-7¾½"	5'-7½"
Fresh Water Line „ „	... 6¼" ✓	Fresh Water „	4'-7¾¼" ✓	4'-7"
Tropical Line „ „	... 6¼" ✓	Tropical „	5'-1½¼" ✓	5'-1¼"
Winter Line below „	... 6¼" ✓	Winter „	5'-1½¼" ✓	5'-1¼"
Winter North Atlantic Line „ „	... 10¾" ✓	Winter North Atlantic „	6'-8¾¼" ✓	6'-1¾"
			6'-6½¼" ✓	6'-6¼"

5m T 11/41. McC.

Yd No 700.

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.

Poop. Length at mide

C of R. Stock to AP	=	0.83 ✓	1.00
AP to FRO	=	1.00 ✓	1.00
FR 0 — 9	=	18.00 ✓	18.00
" 9 — 40	=	77.50 ✓	77.50
" 40 — Poop fore	=	7.00 ✓	7.50
		104.33 ✓	105.00
2/3 × 4.75		3.33 ✓	3.17
		107.66 equivalent length ✓	108.17

Othang at mide = 3.50, 3.17, 0.33 equivalent Othang

Bridge length at mide = 31.92, 32.00

2/3 × 4.75 ✓ = 3.17 ✓

35.17 equivalent length ✓

35.09

Forward Othang at mide = 3.50, 3.17 ✓, 0.33 Forward Othang

Forecastle length

FR 8H — 90 = 13.5 ✓

FR 90 — FP = 21.67 ✓

35.17 equivalent length ✓

Trade of ship .....

Names of sister ships .....

Builder's name and yard number .....

Owners .....

Fee £ ..... : ..... : .....