

No

yes

No. 8857

Last Survey 11th December 1934

Machinery. Aft. Single Screw

Full Scantling

State Type of Erections Fertile, Bridg, Long Poop

CLASS + 100A1

State if with freeboard }
as condition of Class } *no*

Built at Kawasaki Dockyard, Kobe

Length from fore part of stem to after part of stern } L 500
post on summer L.W.L. See Sec. 3 (1a) }

Launched 11th Oct 1934 Yard No. 584

Breadth (*greatest moulded*) B 65

Builders ^{Inc.} Kawasaki Dockyard Co. Ltd.

Depth, at middle of length from top of keel to top of beam at side of uppermost continuous deck. See Sec. 3 (1c) } D 37.01

Owners Gino Shoji Kab. Kaisha.

1st Longitudinal Number (L x D).....= 18533

Managers —
(Where necessary to be entered in Reg. Book.)

Framing Depth "d," at *Engrin Room.*
middle of length. See } 22.0
 Sec. 3 (1d)

Residence

Proportions—*Depth to Length*—Uppermost con- } 13.49

Port of Registry **NAKAMAIZURU**

Do. Long Bridge to top) 11-16

If surveyed while building, afloat, or in dry dock

Draught Moulded 28.85

While Building

010309-010316-0112 1/3

2m, 8, 28. T.

PILLARS AND DECKS.

	INCHES IN SHIP.	Any Departure from Approved Plans to be Noted.		INCHES IN SHIP.	Any Departure from Approved Plans to be Noted.
PILLARS, No. of Rows.....	<i>Two Long</i>		Stringer Plate, breadth and thickness in way of <i>Bridge Prop.</i>	<i>51" .40'</i>	
" in 'tween Decks, Size and Spacing.....	<i>Bulkheads as per app'd plan.</i>		Thickness of Plating abreast Deck openings in way of <i>Wells</i>	<i>.32</i>	
" " " " "			Thickness of Plating abreast Deck openings in way of <i>Bridge Prop.</i>	<i>.38</i>	
" in Holds " "			Thickness of Plating within line of openings...	<i>.32</i> <i>Find</i>	
" " " " "			If Sheathed, material and thickness	<i>.30</i> <i>app.</i>	
Centre Line Bulkhead.			Third Deck.		
Stiffeners and Spacing.....			Stringer Plate, breadth and thickness.....		
Plating, thickness of			If Plated, state thickness.....		
STRINGERS AND DECKS.			Fourth Deck.		
Uppermost Continuous Deck.			Stringer Plate, breadth and thickness.....		
Stringer Plate, breadth and thickness in Wells	<i>72" x .79</i>		If Plated, state thickness		
" " " " in way of Bridge	<i>.95</i>		Poop Deck.		
" Angle in Wells	<i>180 180 20</i> <i>app'd 7.7 x .79</i>		Stringer Plate, breadth and thickness	<i>68 1/2 x .68</i>	
Thickness of Plating abreast Deck openings in way of Wells	<i>.76</i>		Plating, Sheathing, material and thickness ...	<i>58 1/2</i> <i>1 1/8" transverse</i> <i>2" ST. in rooms</i>	
Thickness of Plating abreast Deck openings in way of Bridge	<i>.76</i>		Bridge Deck.		
Thickness of Plating within line of openings...			Stringer Plate, breadth and thickness.....	<i>44 x .44</i>	
If Sheathed, material and thickness			Plating, Sheathing, material and thickness ...	<i>.38</i> <i>1 1/8" transverse</i> <i>2" ST. in rooms</i>	
Second Deck. <i>Find.</i>			Forecastle Deck.		
Stringer Plate, breadth and thickness in Wells...	<i>48" x .36</i>		Stringer Plate, breadth and thickness.....	<i>36" x .40</i>	
			Plating, Sheathing, material and thickness ...	<i>.38</i>	

SHELL PLATING.

SCANTLINGS.						RIVETING.							
STRAKES.	AS IN VESSEL.				ANY DEPARTURE FROM APPROVED PLANS TO BE NOTED.	EDGES.			BUTTS.				
	AMIDSHIPS.		FORWARD.	AFT.		State if jogged?	SINGLE OR DOUBLE.	RIVETS.		NO. OF ROWS OF RIVETS.	RIVETS.		STRAPPED OR LAPPED.
	Breadth.	Thickness.	Thickness.	Thickness.				Diam.	Spacing cr. to cr.		Diam.	Spacing cr. to cr.	
FLAT PLATE KEEL	56	1.08	.83	.90		Double	1 1/8	4 1/2	5	1 1/8	5 1/2	Lapped	
„ DBLG. (if any)													
BOTTOM PLATING, No. of Strakes ...4.....)		.78	60	56	See app'd. Shell Expansion	Double	1	4	5	1	4 1/2	Lapped	
BILGE PLATING, No. of Strakes1.....)		.75	56	56	ditto	Double	1	4	5	1	4 1/2	Lapped	
SIDE PLATING, No. of Strakes4.....)		.70	50 x 56	50, 52 x 54	ditto	Double 3 beams visible	7/8	3 1/2	4	7/8	3 1/2	Lapped	
UPPER DECK, Sheer-strake in Wells.....)	52 1/2	1.13	.50	.50		Double	1 1/8	4 1/2	5	1 1/8	5 1/2	Lapped	
UPPER DECK, Sheer-strake in Bridge ...)		1.13				Double	1 1/8	4 1/2	5	1 1/8	5 1/2	Lapped	
STRAKE BELOW Sheer-strake in Wells.....)	52 1/2	.96	.50	.50		Double	1 1/8	4 1/2	5	1 1/8	5 1/2	Lapped	
STRAKE BELOW Sheer-strake in Bridge ...)		.96				Double	1 1/8	4 1/2	5	1 1/8	5 1/2	Lapped	
POOP SIDE PLATING68 - .50		Double	7/8	3 1/2	4 to 3	7/8	3 1/2 to 3 3/8	Lapped	
BRIDGE SIDE PLATING50				Double	3/4	3	2	3/4	2 5/8	Lapped	
FORECASTLE SIDE PLATING			.50			Single	3/4	3	2	3/4	2 5/8	Lapped	

WATERTIGHT BULKHEADS.

Total No. of W.T. BULKHEADS in Vessel—
 Extending to Upper Deck (Sec. 3 c) *from after Peak Bulkhead*
as per app'd plan for O.T. Bulkheads.
 As per Rule *Eight*

	Plating Thickness.	STIFFENERS.			
		VERTICAL.		HORIZONTAL.	
		Scantlings.	Spacing.	Scantlings.	Spacing.
MIDSHIP BULKH'D, Upper tween decks					
" " Second "					
" " Third "					
" " Holds					
COLLISION " (in Hold)	<i>.34 - .54</i>	<i>300.90.10</i>	<i>15" E 24"</i>	<i>16 expansion trans</i>	
AFTER PEAK " "	<i>.32 - .52</i>	<i>184.75.95</i>	<i>24"</i>	<i>14" stringer</i>	

FORGINGS and CASTINGS.

	Casting or Forging.	Scantlings.	Maker's Name.	Any departure from approved plans to be noted.
KEEL, Bar				
STEM	<i>Casting</i>		<i>Kawasaki</i>	
STERN FRAME { Propeller Post			<i>Sharyo & Co.</i>	
{ Rudder "	<i>Casting</i>		<i>ditto</i>	
RUDDER—A x D.....	<i>557</i>			
Speed of Vessel.....	<i>16 knots</i>			
RUDDER mainpiece at head ...	<i>Casting</i>		<i>ditto</i>	
" " heel ...				
" how constructed	<i>Cast Steel frame</i>			
" double or single plate	<i>double</i>			
" coupling, vertical or horizontal.....	<i>horizontal</i>			

STEEL. Manufacturer's Name or Trade Mark of the Steel used in the construction of the Vessel (state process of manufacture) *from hearth process*
Kawasaki Dockyard Co. Ltd.; Nippon Kokan Kabushiki Kaisha; Nippon Seitetsu Kaisha.
 Has the Steel been tested as required by the Rules? *yes.*

EQUIPMENT No. 52956												LETTER	ANCHORS. four		
Number of Certificate.	Anchors.	WEIGHT, EX. STOCK			WEIGHT OF STOCK			TEST, PER CERTIFICATE.				WEIGHT REQUIRED BY TABLE 53.	Description of Anchor.	Makers.	Where and when tested and Superintendent.
		Cwts.	qrs.	lbs.	Cwts.	qrs.	lbs.	Tons.	cwts.	qrs.	lbs.				
870	1st Bower ...	95	1	2				65	9	0	6	90	Stocken	Japan Oil Works Ltd.	honoran 13.7.34 y.s.
866	2nd " ...	94	0	10				65	4	1	25			honoran	" 23.6.34 y.s.
864	3rd " ...	81	2	12				59	10	0	0				" 2.6.34 y.s.
	Collective weight.	270	3	24								287½			" 22.6.34 y.s.
868	Stream	35	0	17				32	9	3	12				

HAWSERS AND WARPS.

CHAIN CABLES.										HAWSERS AND WARPS.									
Number of Certificate.	Length and size supplied.		Test per Certificate.		WEIGHT OF CHAIN CABLE.			Length and size per Table 53.		Description.	Makers of Cables.	Where and when tested, and Superintendent.	Material.	Length and size supplied.		Breaking Test of Steel Wire.	Length and size per Table 53.		
	Length.	Diam.	Statu-tory.	Break-ing.	Supplied.	Per Rule.		Length.	Diam.					Length.	Ins.	Tons.	Length.	Ins.	
2027	182 1/2	2 5/8	120.9	14 1/2	554 3 23			300	2 5/8	Steel	Osaka Chain Works	Osaka, 10, 11, 12/7/34 y.s.	TOWLINE	130	6	117.49	120	5	
2028	182 1/2	2 5/8	120.9	14 1/2	569 2 30							" 6, 9, 13/7/34 y.s.	HAWSERS & WARPS	120	2 3/4	24.52	100	2 3/4	
					1124-2-13									120	2 3/4	24.52	100	2 3/4	
2030	45 1/4	1 1/2	40.5	58.7	82.3 0			120	1 1/2	Steel	Osaka	Osaka 21/7/34 y.s.		120	8	hauled	100	8	
2031	75 1/2	1 1/2	40.5	58.7	87.0 23							Osaka 24/7/34 y.s.		120	8	hauled	100	8	

Steering Gear, Steam
Boats
Ceiling in Holds, thickness and material
Cargo Hatchways.-(Upper Deck)
Size of No. 1 Hatchway (Forward)
Number of Shifting Beams and/or Fore and Afters

Electro-hydraulic
One lifeboat 29.72 x 8.69 x 3.87
One lifeboat 24.04 x 7.41 x 2.95
One lifeboat 24.86 x 6.56 x 2.33
2 1/2" Pine
One com on Poop Deck 30" x 44, 401
18 x 44, Poop Deck.
No. 1 - 7 in. ; Poop Deck - two

Steering Gear,
Steering Chains, Size and Test
Cargo Battens, thickness, material and spacing
Thickness of Hatches

Automatic
Tide gauge & mooring launch.
Windlass
6" x 2" Pine 6" apart
No. 1. 38" Steel; After Hatch 2 1/2" wood.

Builder's Signature

GENERAL DECLARATION. It should be stated (a) whether the vessel is fitted for the carriage and burning of oil used as fuel yes (b) whether the vessel, not being an oil tanker, is fitted for carrying oil as cargo - The positions in which oil is carried as fuel or cargo should be indicated, together with the flash point.

This vessel has been built in accordance with the approved plans and instructions, as well as with the Rules. The materials and workmanship are satisfactory; the former have been tested as required by the Rules.

The double bottom tanks, deep fuel tanks, settling tanks, peak tanks, wells & cofferdams, cargo tanks, reserve fuel tanks, weatherdecks, bulkheads, scuppers & tarpaulins have been tested as required by the Rules.

Section 20 of the Rules has been complied with and oil fuel (F.P. above 150°F) is to be carried in deep tanks, double bottom tanks and forward reserve fuel tank.

In my opinion the vessel is entitled to the notations:- "Carrying Petroleum in Bulk"; "Lloyd's A & S.P."; "Wireless Telegraphy"; "Electric Light"; "Longitudinal Framing"

Checked from sister ship "TOA MARU"

The amount of Entry Fee £ 12 0 0
Special Survey Fee.... £ 864 19 4 1/2
Travelling Expenses, if any £ 33 00

Fees applied for, Dec 17th 1934
Received by me, Dec 19th 1934

I am of opinion the Vessel should be Classed +100A1 "Carrying Petroleum in Bulk"

State whether the Vessel has been built under Special Survey yes
Signature
Surveyor to Lloyd's Register of Shipping.

Certificate to be sent to Builders Date of issue 25/1/35

Committee's Minute
Character assigned

FRI. 25 JAN 1935
+100A1
Carrying petroleum in bulk

Lloyd's Assoc. + Lmb. 12.34 325.1786
Oil. Inf. C.

Ackd Rob. Be.
CO. for note re "Toa Maru"
Kob. Be. 29/12/34

0112 2/3

GENERAL REMARKS—(The Surveyor should state the Number of Report and Name of any Sister Vessel. Plans showing Vessel as built should be forwarded and a List of the Plans should be embodied.)

The following plans and documents accompany this report:-
Midship Section, and, Profile & Decks (as built).
Steel Advice notes, forging & casting certificates.
This vessel is a sister ship to HETOA MARU, Kobe Report No. 8656, with a few modifications.

Rpt. 1*.

PARTICULARS OF LONGITUDINAL FRAMING.

FRAMING.	AMIDSHIPS.			ENDS.			AMIDSHIPS.			ENDS.			RIVETING.			
	In Ship.			In Ship.			Per Rule or as approved.			Per Rule or as approved.			Rivets in Longitudinal Frames. Diam. Spacing.	Spacing of Rivets on each side of Transverses and Bulkheads. Inches.	Rivets in Brackets to Bulkheads.	
	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.			Number.	Diameter. Inches.
Framing of $L, L \& C$																
Frames in Bridge 'tween Decks ...																
Frames from Uppermost Continuous Deck																
No. 1	8	3 1/2	45										7/8	5 1/4	11	7/8
" 2	8	3 1/2	45										7/8	5 1/4	11	7/8

Particulars of Drop Test of Cast Steel Anchors, viz. Weight, Surveyor's Initials, Number of Certificate, Date of Test.

1st Bower	58.2.1	y. Shimoda	19/5 - 13/7/34
2nd "	59.0.12	ditto	19/5 - 23/6/34
3rd "	50.1.15	ditto	5/5 - 2/6/34

PARTICULARS FOR RECORD in the REGISTER BOOK.—Length of Poop 161.5 ft., R.Q.D. ft., Bridge 37 ft., Forecastle 36 ft. (in feet and tenths). When the Poop is joined to the B.D., this should be distinctly stated.

No. and Material of Decks (this information is to be given as it should appear in the Register Book) 1 Deck (steel) and 2nd Dk (steel) also oil.

Official No. 39886 ; Signal Letters J.W.T.I. Is bottom of Vessel coated with cement in fore tank only.

particulars of composition

PARTICULARS OF WATER BALLAST.—

Where Fitted.	*Length. Feet.	Water Capacity. Tons.	Where Fitted.	*Length. Feet.	Water Capacity. Tons.
Double bottom, aft,			Fore peak tank,	26.8	22
Double bottom, under Engines and Boilers,			After peak tank,	21.0	9
Double bottom, if under Engines only, frames 16 to 54	99.8	462.2	Deep tank, aft,	21.0	141
Double bottom, if under Boilers only, Cofferdam Space			Deep tank, forward,	49.5	44
Double bottom, forward,			Other tanks, if fitted,		
Cofferdam space are included in the length as well as the length of the double bottom, but not included in capacity.			(If necessary, furnish further information by sketch.)		
Total capacity of double bottom			*The wells are not to be included in the lengths of the tanks.		

Order for Special Survey No. 46

Date 25th July 1935

Dates of Surveys held while building

Nov 1933: 30
Feb 1934: 1
Mar 1934: 7
April 1934: 13, 26
May 1934: 2, 8, 21
June 1934: 7, 14, 25, 27
July 1934: 4, 9, 16, 17, 18, 20, 24, 25, 31
Aug 1934: 2, 8, 10, 15, 29, 31
Sept 1934: 3, 6, 7, 8, 10, 11, 13, 14, 17, 19, 20, 22, 25, 26, 28, 29
Oct 1934: 3, 4, 5, 6, 8, 9, 11, 19, 29, 31.

Nov 1934: 5, 22, 27, 28,
Dec 1934: 31.

Lloyd's Register
Foundation
Total No. of Visits 58

This vessel is a sister ship to HETOA MARU, Kobe Report No. 8656, with a few modifications.

Rpt. 1*.

PARTICULARS OF LONGITUDINAL FRAMING.

FRAMING.			AMIDSHIPS.			ENDS.			AMIDSHIPS.			ENDS.			RIVETING.					
			In Ship.			In Ship.			Per Rule or as approved.			Per Rule or as approved.			Rivets in Longitudinal Frames.		Spacing of Rivets on each side of Transverses and Bulkheads.		Rivets in Brackets to Bulkheads.	
			Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Ins.	Diam.	Speng.	Inches.	Number.	Diameter.	
																			Inches.	
Framing of \angle , \square or \square			and millimeter																	
Frames in Bridge 'tween Decks...																				
Frames from Uppermost Continuous Deck			No. 1	8	3 1/2	45									7/8	5 1/4		11	7/8	
			" 2	8	3 1/2	45								7/8	5 1/4		11	7/8		
			" 3	8	3 1/2	45								7/8	5 1/4		11	7/8		
B.S. 1904 C			" 4	9	3 1/2	47 1/2								7/8	5 1/4		12	7/8		
			" 5	10	3 1/2	47 1/2								7/8	5 1/4		13	7/8		
			" 6	10	3 1/2	57 1/2								7/8	5 1/4		13	7/8		
			" 7	10	3 1/2	57 1/2								7/8	5 1/4		13	7/8		
			" 8	250	90	11/16								7/8	5 1/4		13	7/8		
Japan Eng ^g Standard C			" 9	300	90	10/16								7/8	5 1/4		15	7/8		
			" 10	300	90	10/16								7/8	5 1/4		15	7/8		
			" 11	300	90	12/16			300	90	10/16			7/8	5 1/4		15	7/8		
			" 12	300	90	12/16			300	90	10/16			7/8	5 1/4		15	7/8		
B.S. 1904 C			" 13	12	3 1/2	60/60								7/8	5 1/4		15	7/8		
			" 14	12	3 1/2	60/60								7/8	5 1/4		15	7/8		
			" 15																	
			" 16																	
Spacing of Longitudinal Frames			Amidships			30"														
			At Ends			-														
Double Bottoms			Tank Top Longitudinals			17 x 4 x 4 1/2 (1924) BES									7/8 5 1/4		3 1/8" apart for 10 Rivets each side			
			Bottom			90 x 90 x 12 back bar 3-11" each side of bulkhead			appt as fitted.								4" throughout foremost oil compartments.			
Spacing of Longitudinals			Amidships			32 1/2"														
			At Ends...																	
Transverses.															Rivets in Lugs to Shell Diam. Speng					
In Bridge 'tween Decks			Depth and Thickness			Transverse Framing														
			Face Angles																	
			Lugs to Shell*																	
In Upper 'tween Decks.			Depth and Thickness			48" x 46									7/8 4 3/8		Note			
Bottom.			Face Angles			10 3 1/2 17/32											Side Transverses supported by two horizontal ties - see appt midship section.			
			Lugs to Shell*			{ 150 150 12 L 90 90 13 back bar.														
In Hold.			Depth and Thickness			39 x 46														
			Face Angles			9 x 3 1/2 x 47 1/2														
			Lugs to Shell*			{ 150 x 150 x 12 L 90 x 90 x 13 back bar.														
			Brackets			{ Top 39 x 46 Bottom 44 x 46														
Spacing of Transverse Frames						9'-10 1/2"														
ART Longitudinal			Bridge Deck			Transverse														
			Upper			9 3 1/2 47 1/2			Transverse Framing			appt as fitted			32 1/2"			Transverse		
			Second			-											Beams.		32" x 46"	
			Third			-													9 x 3 1/2 x 52 1/2	
																			approved as fitted.	