

IRON SHIP.

No. 12701 Survey held at Newcastle Date, First Survey 20th Febry Last Survey 9th Nov 1877

On the S. S. "Merissa" Master C. Williams

TONNAGE under Tonnage Deck 1891.08 ONE, OR TWO DECKED, THREE DECKED VESSEL.
 Ditto of Third, Spar, or Awning Deck
 Ditto of Poop, or Raised Quarter
 Ditto of Houses on Deck
 Ditto of Forecastle
 Gross Tonnage 1999.59
 Less Crew Space 60.55
 Less Engine Room 639.87
 Register Tonnage as cut on Beam 1299.17

HALF BREADTH (moulded) 17.25
 DEPTH from upper part of Keel to top of Upper Deck Beams 26.20
 GIRTH of Half Midship Frame (as per Rule) 39.33
 1st NUMBER 8328
 1st NUMBER, if a THREE-DECKED VESSEL 8328
 LENGTH 284.5
 2nd NUMBER 21559
 PROPORTIONS—Breadths to Length 85 8/12
 Depths to Length—Upper Deck to Keel 10 5/11
 Main Deck ditto 15 5/16

Built at Newcastle
 When built 1877 Launched Sep 22 77
 By whom built Palmer Ship & Iron Co
 Owners John Fenwick & Son
 Port belonging to London
 Destined Voyage Genoa
 Surveyed while Building, Afloat, or in Dry Dock.

LENGTH on deck as per Rule 284 Feet. 6 Inches. BREADTH—Moulded 34 Feet. 6 Inches. DEPTH top of Floors to Upper Deck Beams 24 Feet. 3 Inches. Do. do. Main Deck Beams 17 Feet. 6 Inches. Power of Engines 260 Horse. No. of Decks with flat laid Two No. of Tiers of Beams Three

Dimensions of Ship per Register, length, 286.0 breadth, 34.7 depth, 24.2

	Inches in Ship.	Inches per Rule.
KEEL, depth and thickness	$9\frac{1}{2} \times 2\frac{1}{2}$	$9\frac{1}{2} \times 2\frac{1}{2}$
STEM, moulding and thickness	$9 \times 2\frac{1}{2}$	$9 \times 2\frac{1}{2}$
STERN-POST for Rudder do. do.	9×5	9×5
for Propeller	24	24
Distance of Frames from moulding edge to moulding edge, all fore and aft	24	24
FRAMES, Angle Iron, for $\frac{3}{4}$ length amidships	$5 \times 3 \times 8$	$5 \times 3 \times 8$
Do. for $\frac{1}{2}$ at each end	$5 \times 3 \times 7$	$5 \times 3 \times 7$
REVERSED FRAMES, Angle Iron	$3 \times 3 \times 7$	$3 \times 3 \times 7$
FLOORS, depth and thickness of Floor Plate at mid line for half length amidships	$23\frac{1}{2} \times 9$	$23\frac{1}{2} \times 9$
thickness at the ends of vessel	10	10
depth at $\frac{3}{4}$ the half-bdth. as per Rule	10	10
height extended at the Bilges	10	10
BEAMS, Upper, Spar, or Awning Deck	7×7	7×7
Single or double Angle Iron, Plate or Tee Bulb Iron	$3 \times 3 \times 6$	$3 \times 3 \times 6$
Single or double Angle Iron on Upper edge	4×8	4×8
Average space	4×8	4×8
BEAMS, Main, or Middle Deck	$6 \times 3 \times 8$	$6 \times 3 \times 8$
Single or double Angle Iron, Plate or Tee Bulb Iron	$9\frac{1}{2} \times 9$	$9\frac{1}{2} \times 9$
Single or double Angle Iron, on Upper Edge	$4 \times 4 \times 8$	$4 \times 4 \times 8$
Average space	$10\frac{1}{2}$	$10\frac{1}{2}$
BEAMS, Lower Deck, Hold, or Orlop	$9\frac{1}{2} \times 9$	$9\frac{1}{2} \times 9$
Single or double Angle Iron, Plate or Tee Bulb Iron	$4 \times 4 \times 8$	$4 \times 4 \times 8$
Single or double Angle Iron on Upper Edge	$10\frac{1}{2}$	$10\frac{1}{2}$
Average space	$10\frac{1}{2}$	$10\frac{1}{2}$
KEELSONS Centre line, single or double plate, box, or Intercoastal, Plates	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Rider Plate	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Bulk Plate to Intercoastal Keelson	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Angle Irons	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Double Angle Iron Side Keelson	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Side Intercoastal Plate	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
do. Angle Irons	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Attached to outside plating with angle iron	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
BILGE Angle Irons	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
do. Bulk Iron	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
do. Intercoastal plates riveted to plating for length	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
BILGE STRINGER Angle Irons	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
Intercoastal plates riveted to plating for half length	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$
SIDE STRINGER Angle Irons	$5\frac{1}{2} \times 4 \times 9$	$5\frac{1}{2} \times 4 \times 9$

	Inches in Ship.	16ths in Ship.	Inches per Rule.	16ths per Rule.
Flat Keel Plates, breadth and thickness	36	12	36	12
PLATES in Garboard Strakes, breadth and thickness from Garboard to upper part of Bilges	9×10	10	9×10	10
of doubling at Bilge, or increased thickness, and length applied	10×11	11	10×11	11
fm up. part of Bilge to lr. edge of Sh'rstrake	40	13	40	13
Main Sheerstrake, breadth and thickness	40	13	40	13
of d'bling at Sh'rstrake, & length applied from Mn. to Up. or Spar Dk. Sh'rstrake.	40	13	40	13
Up. or Spar Dk. Sh'rstrake, breadth & thickness	$16\frac{3}{4} \times 11\frac{1}{2}$	$11\frac{1}{2}$	$16\frac{3}{4} \times 11\frac{1}{2}$	$11\frac{1}{2}$
Butt Straps to outside plating, breadth & thickness	10	10	10	10
Lengths of Plating	10	10	10	10
Shifts of Plating, and Stringers	4	4	4	4
Gunwale Plate on ends of Awning, Spar, or Upper Deck Beams, breadth and thickness	60	9	60	9
Angle Iron on ditto	4.4×9	9	4.4×9	9
Tie Plates fore and aft, outside Hatchways	14	9	14	9
Diagonal Tie Plates on Beams No. of Pairs	14	9	14	9
Planksheer material and scantling	10	10	10	10
Waterways do. do.	10	10	10	10
Flat of Upper Deck do. do.	10	10	10	10
How fastened to Beams	10	10	10	10
Stringer Plate on ends of Main or Middle Deck Beams, breadth and thickness	41	10	41	10
Is the Stringer Plate attached to the outside plating?	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>
Angle Irons on ditto, No. 2	4.4×9	9	4.4×9	9
Tie Plates, outside Hatchways	10	10	10	10
Diagonal Tie Plates on Beams, No. of pairs	10	10	10	10
Waterways materials and scantlings	10	10	10	10
Flat of Middle Deck do. do.	$6\frac{1}{6}$	10	$6\frac{1}{6}$	10
How fastened to Beams	37	9	37	9
Stringer Plates on ends of Lower Deck, Hold or Orlop Beams	37	9	37	9
Is the Stringer Plate attached to the outside plating?	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>
Angle Irons on ditto, No. 2	4.4×9	9	4.4×9	9
Stringer or Tie Plates, outside Hatchways	10	10	10	10
Flat of Lower Deck	10	10	10	10
Ceiling betwixt Decks, thickness and material	$2\frac{1}{2}$	$2\frac{1}{2}$	$2\frac{1}{2}$	$2\frac{1}{2}$
in hold do.	$2\frac{1}{2}$	$2\frac{1}{2}$	$2\frac{1}{2}$	$2\frac{1}{2}$
Main piece of Rudder, diameter at head	$6\frac{3}{4}$	$6\frac{3}{4}$	$6\frac{3}{4}$	$6\frac{3}{4}$
do. at heel	$3\frac{1}{2}$	$3\frac{1}{2}$	$3\frac{1}{2}$	$3\frac{1}{2}$
Can the Rudder be unshipped afloat?	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>
Bulkheads No. 5 Thickness of	$6\frac{1}{6}$	$6\frac{1}{6}$	$6\frac{1}{6}$	$6\frac{1}{6}$
Height up 2.5 upper deck, or to main deck	2.5	2.5	2.5	2.5
How secured to sides of ship	2.5	2.5	2.5	2.5
Size of Vertical Angle Irons	3.3	3.3	3.3	3.3
and distance apart	30	30	30	30
Are the outside Plates doubled two spaces of Frames in length?	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>	<u>Yes</u>

Transoms, material. Knight-heads. Hawse Timbers. Iron
 Windlass Iron patent Pall Bitt Iron

The FRAMES extend in one length from Keel to Gunwale Riveted through plates with $\frac{7}{8}$ in. Rivets, about $\frac{3}{4}$ apart.
 The REVERSED ANGLE IRONS on floors and frames extend from middle line to Main Dth Stringer and to Upper Dth alternately
 KEELSONS. Are the various lengths of Plates and Angle Irons properly connected? Yes And butts properly shifted? Yes

PLATING. Garboard, double riveted to Keel, with rivets $\frac{1}{8}$ in. diameter, averaging $5\frac{1}{2}$ ins. from centre to centre.
 Edges of Garboards and to upper part of Bilge, worked clencher, double riveted; with rivets $\frac{7}{8}$ in. diameter, averaging $3\frac{3}{8}$ ins. from centre to centre.
 Butts from Keel to turn of Bilge, worked carvel, double riveted; with rivets $\frac{7}{8}$ in. diameter averaging $3\frac{3}{8}$ ins. from centre to centre.
 Butts of 3 Strakes at Bilge for $\frac{1}{2}$ length, treble riveted with Butt Straps $\frac{1}{16}$ thicker than the plates they connect.
 Edges from bilge to Main Sheerstrake, worked clencher, double or single riveted; with rivets $\frac{7}{8}$ in. diameter, averaging $3\frac{3}{8}$ ins. from cr. to cr.
 Butts from Bilge to Main Sheerstrake, worked carvel, double riveted; with rivets $\frac{7}{8}$ in. diameter, averaging $3\frac{3}{8}$ ins. from cr. to cr.
 Edges of Main Sheerstrake, double or single riveted. Upper Sheerstrake, double or single riveted.
 Butts of Main Sheerstrake, treble riveted for $\frac{1}{2}$ length amidships. Butts of Upper or Spar Sheerstrake, treble riveted length amidships.
 Butts of Main Stringer Plate, treble riveted for $\frac{1}{2}$ length amidships. Butts of Upper or Spar Stringer Plate, treble riveted for $\frac{1}{2}$ length.
 Breadth of laps of plating in double riveting 6 times Breadth of laps of plating in single riveting ✓

Butt Straps of Keelsons, Stringer and Tie Plates, treble, double or single Riveted? Treble and double
 Waterway, how secured to Beams by rivets (Explain by Sketch, if necessary.)
 Beams of the various Decks, how secured to the sides? Rivets riveted to frame No. of Breasthooks, 5 Crutches, 5
 What description of Iron is used for Frames, Beams, Keelsons, Tie, and Stringer Plates, Outside Plating, &c.? Palmer Ship & Iron Co
 Manufacturer's name or trade mark, Palmer Ship & Iron Co

The above is a correct description.
 Builder's Signature, W. M. Overly Surveyor's Signature, W. M. Overly
 Surveyor to Lloyd's Register of British and Foreign Shipping.

Do any rivets break into or through the seams or butts of the plating? a few

Lloyd M C. 11.77 2 Dr 9 TB Lion DR
A & P

This vessel appears eligible to be classed as recommended for 100% E.I. Lloyd's Register Foundation