

# IRON SHIPS.

No. 8507 Survey held at Sunderland Date 28th August 1865

on the "Valler Rover"

Master Wm Moore

Tonnage under tonnage deck 107.51

Built at Sunderland

When built 1865

Launched Aug 24th

Ditto of poop or spar deck

By whom built Wm Duxford

Owners Thos Anderson

Ditto of engine room

Total Register tonnage 107.51

Port belonging to Sunderland

Destined Voyage London

Surveyed while Building, Afloat, or in Dry Dock while Building and afloat

Length aloft 84 Feet. Extreme Breadth 19 Feet. Depth from top of Upper Deck Beam to top of Floor 9 Feet. Power of Engines 9 Horse. No. of Decks One

(Dimensions of Ship per Register, length 114.5 breadth 19.55 depth 9.7)

	Inches in Ship.	Inches required per Rule.
Keel, if bar iron, depth and thickness.....	<u>6 x 1 1/2</u>	<u>6 x 1 1/2</u>
„ if plate iron, breadth and thickness ....	<u>6 x 1 1/2</u>	<u>6 x 1 1/2</u>
Stem, if bar iron, moulding and thickness ....	<u>6 x 1 1/2</u>	<u>6 x 1 1/2</u>
„ if plate iron, breadth and thickness ....	<u>6 x 1 1/2</u>	<u>6 x 1 1/2</u>
Stern-post, if bar iron, moulding and thickness	<u>6 x 1 1/2</u>	<u>6 x 1 1/2</u>
„ if plate iron, breadth and thickness	<u>6 x 1 1/2</u>	<u>6 x 1 1/2</u>
Distance of Frames from moulding edge to moulding edge, all fore and aft .....	<u>21</u>	<u>21</u>
Frames, Size of Angle Iron, single or double ..	<u>2 1/2</u>	<u>2 1/2</u>
Reversed Iron, & to every frame	<u>2 1/2</u>	<u>2 1/2</u>
Floors, depth and thickness of Floor Plate at mid line .....	<u>12</u>	<u>5 1/6</u>
„ Ditto ditto at Bilge Keelson	<u>12</u>	<u>5 1/6</u>
„ Size of Reversed Angle Iron, and No. at top of Floor Plate	<u>2 1/2</u>	<u>2 1/2</u>
Beams, Deck (No. <u>2 1/2</u> ) double Angle Iron, Plate, Tee, or Bulb Iron .....	<u>6</u>	<u>6 1/6</u>
„ double or single Angle Iron, on edge....	<u>2 1/2</u>	<u>2 1/2</u>
„ average space between .....	<u>3 1/2</u>	<u>3 1/2</u>
„ Hold, or Lower Deck (No. <u>1</u> ) double Angle, Tee, Plate, or Bulb Iron	<u>6</u>	<u>6 1/6</u>
„ double or single Angle Iron on edge....	<u>2 1/2</u>	<u>2 1/2</u>
„ average space between .....	<u>3 1/2</u>	<u>3 1/2</u>
„ Paddle, sided and moulded, thick-ness of Plate .....	<u>3 1/2</u>	<u>3 1/2</u>
„ Engine .....	<u>3 1/2</u>	<u>3 1/2</u>
Keelson, single or double plate, box, or intercostal	<u>12</u>	<u>5 1/6</u>
„ Size of Plates .....	<u>12</u>	<u>5 1/6</u>
„ Size of Angle Irons .....	<u>12</u>	<u>5 1/6</u>
„ Side, single or double, plate, box, or intercostal	<u>12</u>	<u>5 1/6</u>
„ Bilge (No. <u>1</u> ) at each Bilge, single, or double, plate, or box	<u>12</u>	<u>5 1/6</u>

	Inches in Ship.	16ths. In Ship.	Inches required per Rule.	16ths required per Rule.
Plates in Garboard Strakes, breadth and thickness .....	<u>6 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>
Ditto from Garboard to upper part of Bilges..	<u>6 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>
„ from upper part of Bilge to a perpendicular height from upper side of Keel of 3/4ths the entire depth of Hold .....	<u>5 1/6</u>	<u>5 1/6</u>	<u>5 1/6</u>	<u>5 1/6</u>
„ from 3/4ths depth of Hold to lower edge of Sheerstrake .....	<u>5 1/6</u>	<u>5 1/6</u>	<u>5 1/6</u>	<u>5 1/6</u>
„ Sheerstrake, breadth and thickness <u>2 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>	<u>6 1/6</u>
Butt Straps to outside plating, breadth and thickness .....	<u>7</u>	<u>7 1/6</u>	<u>6 3/4</u>	<u>7 1/6</u>
Gunwale Plate or Stringer on ends of Upper Deck Beams, breadth and thickness	<u>10 1/2</u>	<u>5</u>	<u>12 1/8</u>	<u>5</u>
Angle Iron on ditto .....	<u>3 1/2</u>	<u>1</u>	<u>3 1/2</u>	<u>1</u>
Stringer or Tie Plates fore and aft, on Upper Deck Beams, outside Hatchways ..	<u>7</u>	<u>5</u>	<u>4 1/2</u>	<u>5</u>
Diagonal Tie Plates on 5 pairs ditto .....	<u>7</u>	<u>5</u>	<u>4 1/2</u>	<u>5</u>
Planksheer, materials and scantlings .....	<u>7</u>	<u>5</u>	<u>4 1/2</u>	<u>5</u>
Waterway ditto ditto <u>Quarter</u> ...	<u>7</u>	<u>5</u>	<u>4 1/2</u>	<u>5</u>
Flat of Upper Deck, thickness and material..	<u>3 1/2</u>	<u>5</u>	<u>2 1/2</u>	<u>5</u>
„ how fastened to Beams..	<u>3 1/2</u>	<u>5</u>	<u>2 1/2</u>	<u>5</u>
Ceiling between Decks and in Hold, thickness and material .....	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>
Clamps or Spirketting ditto .....	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>
Stringer Plates on ends of Hold or Lower Deck Beams, breadth and thickness	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>
Stringer or Tie Plates fore and aft outside Hatchways, on Hold or Lower Deck Beams .....	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>	<u>1 1/4</u>
Stringers in Hold .....	<u>3 1/2</u>	<u>5</u>	<u>3 1/2</u>	<u>5</u>
Flat of Lower Deck, thickness and material..	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
Main piece of Rudder, diameter at head ....	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
„ „ „ at heel ....	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
(Can the Rudder be unshipped afloat <u>Yes</u> )	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
Bulkheads, N°. <u>1</u> Thickness of <u>2 1/6</u>	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
„ Height up <u>To Deck</u>	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
„ how secured to the sides of the ship <u>between frames</u>	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>
„ size of vertical angle irons <u>2 1/2</u> and their distance apart <u>20</u>	<u>3</u>	<u>5</u>	<u>3</u>	<u>5</u>

Transoms, material Iron or, if none, in what manner compensated for.

Knight-heads, and Hawse Timbers None

The Frames extend in one length from Keel to Funnel rivetted through plates with (5/16 in.) rivets, about (2 1/2) apart.

The reverse angle irons on the floors extend in one length across the middle line from above the bilge on one side to ditto on the other on alternate ribs

Keelson, how are the various lengths of plates or angle irons connected? With the angle irons properly shifted

Plates, Garboard, double or rivetted to keel, double or at upper edge, with rivets (7/8 in.) diameter, averaging (2 1/2 in.) apart.

„ Edges from Garboards to upper part of bilge, worked clencher, double or single rivetted; with rivets (5/16 in.) diameter, averaging (2 1/2 in.) apart.

„ Butts from Keel to turn of bilge, worked carvel with butt straps (7/16) thick, double or single rivetted; with rivets (5/16 in.) diameter, averaging (2 1/2 in.) apart.

„ Edges from bilge to sheerstrake, worked carvel with a lining piece ( ) thick, or clencher, double or single rivetted; with rivets (5/16 in.) diameter, averaging (2 1/2 in.) apart.

„ Edges of Sheerstrake, double or single rivetted? At upper edge and At lower edge and

„ Butts from bilge to planksheers, worked carvel with butt straps (6 x 5/16) thick, double or single rivetted; with rivets (5/16 in.) diameter, averaging (2 1/2 in.) apart. Breadth of laps in double rivetting (3 1/2) Breadth of laps in single rivetting (2 1/2)

Butt Straps of Keelsons, Stringer and Tie Plates, double or single rivetted?

Planksheer, how secured to the plating of the sides { Explain by sketch }

Waterway „ „ planksheer and to the Beams { if necessary. }

Deck Beams, how secured to the side? Ends turned down, and rivetted to the frames

Hold or Lower Deck ditto

Paddle „ „ No. of breasthooks Three crutches Three

What description of Iron is used for the Frames, Beams, Keelsons, Tie and Stringer Plates, Outside Plating, &c.?

Manufacturer's name or trade mark Shott's Bridge Iron Co. & Co. Ld.

We certify that the above is a correct description of the several particulars therein given.

Builder's Signature William Duxford

Surveyor's Signature Thomas Anderson

IRON 438-0424

42 44 2m

**Workmanship.** Are the lands or laps of the clenched work in all cases in breadth at least five and a half times the diameter of the rivets in double rivetted edges and butts, and at least three and a quarter times the diameter of the rivets where single rivetting is admitted? *Yes*

Do the edges of the carvel work and of the butts lay close together throughout their length without requiring any making good of deficiencies? *They do*

Do the fillings between the ribs and plates fill in solid with single pieces? or are they in short lengths of various thicknesses? *Solid with single pieces*

Do the holes for rivetting plate to frames, butt straps, or plate to plate, &c., conform well to each other? *They do* and are the rivet holes well and sufficiently countersunk in the outer plate? *They are*

Are there any rivets which either break into or have been put through the seams or butts of the plating? *very few*

Her Masts, Bowsprit, Yards, &c., are *Sea Pine in good* condition, and sufficient in size and length. (If they are of Iron or Steel give the Scantlings of Plating, Angle Irons, &c., and further explain by a Sketch showing how the lower Masts and Bowsprit are constructed, showing the number of Plates and Angle Irons, mode of rivetting, quality of Materials, and if stamped with Maker's name.

She has SAILS.			CABLES, &c.			ANCHORS, and their weights.		
N <sup>o</sup> .				Fathoms.	Inches.	Tested to Tons.	N <sup>o</sup> .	Weight.
1	Fore Sails,	Chain	.....	150	15 1/6	15.17.20	2	15.2.0
1	Fore Top Sails,	Hempen Stream Cable	.....	75	4 1/2		2	15.2.0
2	Fore Topmast Stay Sails,	Hawser	.....	50	5 1/2			
1	Main Sails,	Towlines	.....	75	6		1	2.3.18
2	Main Top Sails,	Warp	.....	75	3 1/2			
and	<i>others as usual</i>	All of <i>good</i> quality.					1	1.0.0
Her Standing and Running Rigging			<i>Wire &amp; Hemp</i>	sufficient in size and			<i>good</i> in quality.	
She has			<i>One</i>	Long Boat and				
The present state of the Windlass is			<i>firm</i>	Capstan <i>winch</i> and Rudder			<i>8</i> Pumps <i>2 Metal good</i>	

Order for Special Survey	DATES of	1st. On the several parts of the frame, when in place, and before the plating was wrought	<i>Built under Special Survey from 3<sup>d</sup> April 1865 to the present date</i>
No. <i>1679</i>	Surveys held	2nd. On the plating during the progress of rivetting	
Date <i>March 29/65</i>	while building	3rd. When the beams were in and fastened, and before the decks were laid	
Order for Ordinary Survey	as per	4th. When the ship was complete, and before the plating was finally coated	
No. _____	Section 18.	5th. After the ship was launched	
Date _____			

State if she has a Spar Deck *No* Poop *No* or Forecastle *No*

**General Remarks,**

The Garboard Stake is a little below the Rule in thickness, and a plate 8x8 1/2 has been introduced on the top of middle line keelson sanctioned by the Committee as compensation.

The testing certificates of Anchors and Chains, have been produced, issued from the Sunderland public testing machine and signed by Mr. John Thompson

*James Shaw*

In what manner are the surfaces preserved from oxidation? Inside *Portland Cement to Pipes, and Red Paint above*  
Ditto ditto Outside *Percock's composition, and Paint*

I am of opinion this Vessel should be Classed *A. 1.*  
The amount of the Fee .....£ 2: .. is received by me,  
Special .....£ 5: 7: ..  
Certificate (if required) .....£ ..

Committee's Minute *1<sup>st</sup> September 1865.*

Character assigned *B* *(A & C P)*

*Thomas Lawrence*  
*Senior Master*

*I concur in the above recommendation*  
*31 Aug 1865*

*Lloyd's Register Foundation*