

IRON SHIPS.

Compared with the Rules and Table for 2^d grade

No. _____ Survey held London Date Dec^r 1860 to July 16th 1861
 on the S.S. Baron Hambro Master Riches
 Tonnage Gross 494 Engine Room 130 Register 364 Built at Deptford
 When Built 1861 By whom built Ch^r. Langley Owners Langley & Co
 Laid down Jan^r 28th 1860
 Port belonging to _____ Destined Voyage _____
 Surveyed Afloat or in Dry Dock On the building ship and in Dry Dock, Deptford

Length aloft	Feet. Inches.		Extreme Breadth	Feet. Inches.		Depth from top of Upper Deck		Feet. Inches.		Power of Engines	Horse No.
180			25			15				80 H.P.	

Distance of Frames or Ribs from moulding edge to moulding edge, all fore and aft	Inches in Ship.		Inches required per Rule.		Stem, if bar iron, moulding and thickness	Inches. In Ship.	16ths. In Ship.	Inches. required per Rule.	16ths. required per Rule.
18			18		Stem, if bar iron, moulding and thickness				
Floors, Size of Angle Iron, and No. at bottom of Floor Plate	3	4	9/16	3 1/2	if plate iron, breadth and thickness	7	1 1/2	6 1/2	2 1/2
depth and thickness of Floor Plate at mid line	19	x	7/16	1 1/2	Stern-post, if bar iron, moulding and thickness	7	5	6 1/2	2 1/2
depth and thickness of Floor Plate at Bilge Keelson	4			4	Propeller, if plate iron, breadth and thickness	8	5	6 1/2	2 1/2
Size of Reversed Angle Iron, and No. at top of Floor Plate	2 3/4	2 3/4	6/16	2 1/2	Keel, if bar iron, depth and thickness	Sketch		6 1/2	2 1/2
Frames, Size of Angle Iron, single or double	3	4	6/16	3 1/2	if plate iron, breadth and thickness				
Reversed Iron, into every frame	2 3/4	2 3/4	6/16	2 1/2	Garboard Plates, thickness			9/16	9/16
every other frame	2 3/4	2 3/4	6/16	2 1/2	From Garboard to upper part of Bilge			8/16	8/16
Beams, Deck (No. 28) double Angle Iron or Bulb Iron with double Angle Iron on top	7	x	8/16	6 1/4	From upper part of Bilge to Sheerstrakes			7/16	7/16
depth & thickness of plate amidships	7	x	8/16	6 1/4	Sheerstrakes			8/16	8/16
double or single Angle Iron, on lower edge	2 1/2	2 1/2	5/16	2 1/2	Breadth & thickness of Butt			8/16	8/16
average space between	3	gut.		3	Straps to outside plating			9/16	9/16
if wood (No.) sided & moulded					side plating to main deck			6/16	6/16
Hold, or Lower Deck (No.)					Planksheers				
4 double Angle Iron or Bulb Iron with double Angle Iron on top	6	x	3 x 7/8		Gunwale Plate or Stringer on ends of Up. Dk Beams			20	7/16 18 3/4 7/16
depth & thickness of plate amidships					Angle Iron on ditto			3 1/2 x 3 1/2	3 1/2 2 3/4 x 6/16
double or single Angle Iron, on lower edge	3	x	3 x 6/16		Waterway angle iron			3 x 3	6/16
average space between					Deck			3	3
if wood (No.) sided & moulded					Ceiling in Hold			2	to bilges
Paddle, wood, sided and moulded or if Iron, size of Plate					Ceiling betwixt Decks				
Engine					Beam Clamps				
Keelson, wood, sided & moulded, iron, size of plate, if Box, give sketch & dimensions			See sketch		Shelf				
Side or Bilge	3 1/2	3 1/2	6/16 3 1/2 2 3/4 6/16		Stringer Plates on ends of Hold or Lower Dk Beams			20	x 7/16 18 3/4 7/16
Number					Ceiling between Decks				

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

Knight-heads Iron Plates Bulkheads, No. 3 and one to cabin floor. Thickness of 5/16

Hawse Timbers and Chocks are they free from defects? Yes how secured to the sides of the ship By frame, broad lines and brackets

The Frames or Ribs extend in one length from middle line to gunwale rivetted through plates with (3/8 in.) rivets, about (6 to 7) apart.

The reverse angle irons on the floors extend in one length across the middle line from bulb plate to 6" above the solid beam stringer

Keelson, how are the various lengths of plates or angle irons connected? skirted, and by Butt straps double rivetted

Plates, Garboard, double or single rivetted to keel & at upper edge, with rivets (3/8 in.) diameter averaging (3 1/2 in.) from centre to centre of rivet.

Edges from Garboards to upper part of bilge, worked carvel with a lining piece (1/2 in.) thick, or clencher, double or single rivetted; rivets (3/8 in.) diameter, averaging (3 ins.) from centre to centre of rivets.

Butts from Keel to turn of bilge, worked carvel with a lining piece (9/16 in.) thick, double or single rivetted; rivets (3/8 in.) diameter, averaging (3 ins.) from centre to centre of rivets. Do the lining pieces lap over and rivet through the lands of the strake below? no.

Edges from bilge to planksheer, worked carvel with a lining piece (1/2 in.) thick, double or single rivetted; rivets (3/8 in.) diameter, averaging (2 3/4 in.) from centre to centre of rivets. Do the lining pieces lap over and rivet through the lands of the strake below? no.

Butts from bilge to planksheers, worked carvel with a lining piece (1/2 in.) thick, or clencher, double or single rivetted; rivets (3/8 in.) diameter averaging (3 ins.) from centre to centre of rivets. Breadth of laps in double rivetting (3 1/2 in.) Breadth of laps in single rivetting (2 1/2 in.)

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

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

Side trussing breadth and thickness of plates how secured?

Deck trussing Or diagonal plates from side to side, 3 pairs of 9" x 8/16

Deck Beams, how secured to the side? Iron rivetted to frame and by the Deck stringer

Hold or Lower Deck " " " " " "

Paddle " " " " " "

No. of breasthooks crutches how are pointers compensated? All fore & aft ties are connected

What description of iron is used for the angle iron and plate iron in the vessel? Shelton Bar Comp^d Staffordshire Builder's Signature Chas Langley

2506 Ln

Workmanship. Are the lands or laps of the clenchwork in all cases in breadth at least five times the diameter of the rivets in double rivetted edges and butts, and at least three 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? yes
 Do the fillings between the ribs and plates fill in solid with single pieces, or are they in short lengths of various thicknesses? solid
 Do the holes for rivetting plate to frames, lining pieces, or plate to plate, &c., conform well to each other? yes and are the rivet holes well and sufficiently countersunk in the outer plate? yes.
 Are there any rivets which either break into or have been put through the seams or butts of the plating? A few in the ends of butts

Her Masts, Yards, &c., are in _____ condition, and sufficient in size and length.

She has SAILS.		CABLES, &c.		ANCHORS, and their weights.	
N ^o .			Fathoms. Inches.		N ^o . Wei. in c.
/	Fore Sails, <i>Fore Stay sail</i>	Chain	200 14	Bower,	1 15.0.0
/	Fore Top Sails, <i>fore top guller sail</i>	Hempen Stream Cable	90 8"	Stream,	1 17.0.0
/	Fore Topmast Stay Sails,	Hawser	90 5"		1 20.0.0
/	Main Sails,	Towlines		Kedge,	2 3.0.0
/	Main Top Sails, and <i>1 Side 19 aff to the hull</i>	Warp			
		All of <u>good</u> quality.			

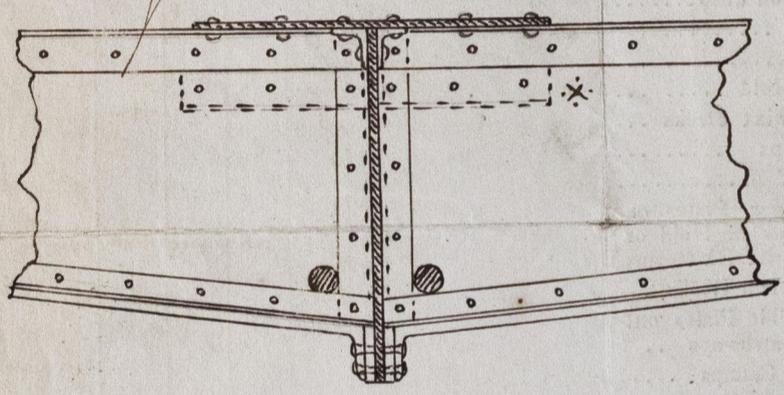
Her Standing and Running Rigging hump sufficient in size and new good in quality.

She has _____ Long Boat and _____
 The present state of the Windlass is good Capstan _____ and Rudder good Pumps 2 down

General Remarks, Statement and Date of Repairs, extent of corrosion (if any) both internally and externally, and condition of rivets.

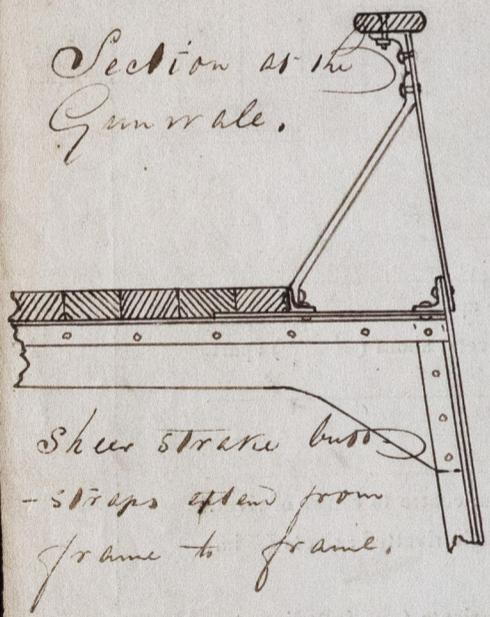
DATES of Surveys held while building, as per Section 17. {
 1st. On the several parts of the frame, when in place, and before the plating was wrought
 2nd. On the plating during the progress of rivetting
 3rd. When the beams were in and fastened, and before the decks were laid
 4th. When the ship was complete, and before the plating was finally coated
 5th. After the ship was launched
 } During the period of building

Section at middle line for hull and keelson.



*Vertical middle plate 2" x 2" x 8/16
 Side plates to hull 7" x 7/8
 Fore & aft plate on top of floors 2" x 2" x 8/16
 " " " angle iron on top of hull plate 3 1/2" x 1/2"
 * Pieces of angle iron through hull plate 2 3/4" x 2 3/4" x 1/2"*

Section at the Gunwale.



Sheer strake bolted - strips extend from frame to frame.

In what manner are the surfaces preserved from oxidation? By roll lead, paint and Portland Cement

I am of opinion this Vessel should be classed G.A.

The amount of the Fee£ 5 : - : - is received by me,
 Special£ 24 : 14 : - }
 Certificate (if required)£ : : - }

Committee's Minute 9th August 1861

Character assigned 1 year 9 years

J. P. Light
J. H. Ritchie