

# IRON SHIP.

No. 1040 Survey held at Port Glasgow & Greenock, Date, First Survey 4<sup>th</sup> Feb'y. Last Survey 27<sup>th</sup> Sept 1881  
On the Iron S. S. "LANNINGTON" Master J. L. Burkill

TONNAGE under Tonnage Deck 1823.96 ONE, OR TWO DECKED, THREE DECKED VESSEL.  
 Ditto of Third, Spar, or Awning Deck. 38.57 SPAR, OR AWNING DECKED VESSEL.  
 Ditto of Poop, or Raised Qr. Dk. 7.76 HALF BREADTH (moulded)... 18.50  
 Ditto of Houses on Deck 32.39 DEPTH from upper part of Keel to top of Upper Deck Beams 26.00  
 Ditto of Forecastle 51.76 GIRTH of Half Midship Frame (as per Rule) 41.00  
 Coal Bunker 3.84 1st NUMBER 85.50  
 Gross Tonnage 1958.31 1st NUMBER, if a 3-DECKED VESSEL, deduct 7 feet 7  
 Less Crew Space 54.74 LENGTH 273.5  
 1903.57 2nd NUMBER 2146.9  
 Less Engine Room 626.66 PROPORTIONS—Breadths to Length 7.39  
 Register Tonnage as cut on Beam 1276.91 Depths to Length—Upper Deck to Keel 10.5  
 Main Deck ditto 14.7

Built at Port Glasgow  
 When built 1881 Launched 24<sup>th</sup> Aug/81  
 By whom built Messrs R. Duncan & Co.  
 Owners Messrs Renton & Co.  
 Port belonging to Glasgow  
 Destined Voyage Melbourne via London  
 If Surveyed while Building, Afloat, or in Dry Dock.  
 While Building and afloat.

LENGTH on deck as per Rule	Feet. Inches.	BREADTH—Moulded	Feet. Inches.	DEPTH top of Floors to Upper Deck Beams Do. do. Main Deck Beams	Feet. Inches.	Power of Engines	Horse.	Nº. of Decks with flat laid	Nº. of Tiers of Beams
273	6	37	0	23	0	200	2	2	
Dimensions of Ship per Register, length, 274.05 breadth, 37. depth, 23.2									
KEEL, depth and thickness	Side bars 10 x 1		10 x 1		Flat Keel Plates, breadth and thickness ... 36 12 36 12				
STEM, moulding and thickness	10 x 2 1/2		9 x 2 1/2		PLATES in Garboard Strakes, breadth and thickness from Garboard to upper part of Bilges ... 10 10				
STERN-POST for Rudder do. do.	10 x 4 3/4		9 x 5		" of doubling at Bilge, or increased thickness, and length applied ... 11.10 11.10				
" " for Propeller	10 x 5 3/8		9 x 5		" fm up. part of Bilge to lr. edge of Sh'rstrake. ... 40 13 40 13				
Distance of Frames from moulding edge to moulding edge, all fore and aft	24		24		" Main Sheerstrake, breadth and thickness of d'bling at Sh'rstrake, & length applied from Mn. to Upr. or Spar Dk. Sh'rstrake. ... 11 1/4 x 10 11 1/4				
FRAMES, Angle Iron, for 3/4 length amidships	5 3 8		5 3 8		" Up. or Spar Dk Sh'rstrake, brdth & thickness Butt Straps to outside plating, breadth & thickness Lengths of Plating ... 13 x 2 1/4 16 3/4 x 11 12 1/4 11 1/4 x 10 11 1/4				
Do. for 1/2 at each end	" 7 " 7		" 7 " 7		Shifts of Plating, and Stringers at least 2 ft. spaces. 2 ft. spaces				
REVERSED FRAMES, Angle Iron	3 1/2 2 8		3 1/2 3 8		Gunwale Plate on ends of Awning Spar, or Upper Deck Beams, breadth and thickness ... 39 9 39 9				
FLOORS, depth and thickness of Floor Plate at mid line for half length amidships	36 x 6		36 x 6		Angle Iron on ditto ... 4 x 4 x 9/16 4 x 4 x 9/16				
thickness at the ends of vessel on alternate frames except in way of engine and boiler space	" " " "		" " " "		Tie Plates fore and aft, outside Hatchways ...				
depth at 3/4 the half-bdth. as per Rule	" " " "		" " " "		Diagonal Tie Plates on Beams No. of Pairs ...				
height extended at the Bilges	" " " "		" " " "		Planksheer material and scantling ...				
BEAMS, Upper, Spar, or Awning Deck Single or d'ble Ang. Iron, Plate or Tee Bulb Iron	6 3 8		6 3 8		Waterways do. do. ...				
Single or double Angle Iron on Upper edge	" " " "		" " " "		Flat of Upper Deck do. do. ... 6/16 thick 4 ins				
Average space ... 24 in. 8.	" " " "		" " " "		How fastened to Beams ...				
BEAMS, Main, or Middle Deck Single or d'ble Ang. Iron, Plate or Tee Bulb Iron	6 3 9		6 3 9		Stringer Plate on ends of Main or Middle Deck Beams, breadth and thickness ... 39 10 39 10				
Single or double Angle Iron, on Upper Edge	" " " "		" " " "		Is the Stringer Plate attached to the outside plating? ... 300				
Average space ... 24 in. 9.	" " " "		" " " "		Angle Irons on ditto, No. 2 ... 4 x 4 x 9/16 4 x 4 x 9/16				
BEAMS, Lower Deck, Hold, or Orlop Single or double Ang. Iron, Plate or Tee Bulb Iron	" " " "		" " " "		Tie Plates, outside Hatchways ...				
Single or double Angle Iron on Upper Edge	" " " "		" " " "		Diagonal Tie Plates on Beams, No. of pairs ...				
Average space ... in lieu	" " " "		" " " "		Waterways materials and scantlings ...				
KEELSONS Centre line, single or double plate, box, or intercostal, Plates	46 x 10		46 x 10		Flat of Middle Deck do. do. ... Iron 9/16 thick 3 1/2 in				
" Rider Plate	42 x 8		42 x 8		How fastened to Beams ...				
" Bulb Plate to Intercostal Keelson	" " " "		" " " "		Stringer Plates on ends of Lower Deck, Hold or Orlop Beams ...				
" Angle Irons to Centre Plate	4 4 9		4 4 9		Is the Stringer Plate attached to the outside plating? ...				
" Double Angle Iron Side Keelson	" " " "		" " " "		Angle Irons on ditto, No. ...				
" Side Intercostal Plates	" " " "		" " " "		Stringer or Tie Plates, outside Hatchways ...				
" do. Angle Irons to ditto	3 3 7		3 3 7		Flat of Lower Deck ...				
" Attached to outside plating with angle iron	" " " "		" " " "		Ceiling betwixt Decks, thickness and material ... 2 White pine Sparring 2 1/2 Red pine 1 1/2				
BILGE Angle Irons	5 1/2 4 9		5 1/2 4 9		Main piece of Rudder, diameter at head ... 7 1/2 6 3/4				
" do. Bulb Iron	3 1/2 3 8		3 1/2 3 8		do. at heel ... 3 1/2 3 1/2				
" do. Intercostal plates riveted to plating for whole length	19 x 8		19 x 8		Can the Rudder be unshipped afloat? ... 300				
BILGE STRINGER Angle Irons	5 1/2 4 9		5 1/2 4 9		Bulkheads No. 5 Thickness of ...				
Intercostal plates riveted to plating for whole length	3 1/2 3 8		3 1/2 3 8		" Height up as per profile drawing ...				
SIDE STRINGER Angle Irons	19 x 8		19 x 8		" How secured to sides of ship between double frames ...				
Transoms, material. Knight-heads. Hawse Timbers. Plates & angles.	" " " "		" " " "		" Size of Vertical Angle Irons 3 1/2 x 3 x 9/16 and distance apart 30 ins. ...				
Windlass Iron. (Kapiers Patent)	" " " "		" " " "		" Are the outside Plates doubled two spaces of Frames in length? ... 300				

The FRAMES extend in one length from flanged plate to flanged plate & from thence to gunwale riveted through plates with 7/8 in. Rivets, about 7 apart.  
 The REVERSED ANGLE IRONS on floors and frames extend from middle line to upper deck, and to main deck alternately.  
 KEELSONS. Are the various lengths of Plates and Angle Irons properly connected? 300. And butts properly shifted? 300.  
 PLATING. Garboard, double riveted to Keel, with rivets 1/8 in. diameter, averaging 5 7/8 ins. from centre to centre.  
 Edges of Garboards and to upper part of Bilge, worked clencher, double riveted; with rivets 7/8 in. diameter, averaging 3 3/8 ins. from centre to centre.  
 Butts from Keel to turn of Bilge, worked carvel, double riveted; with rivets 7/8 in. diameter averaging 3 1/2 ins. from centre to centre.  
 Butts of three Strakes at Bilge for half length, treble riveted with Butt Straps 7/16 thicker than the plates they connect.  
 Edges from bilge to Main Sheerstrake, worked clencher, double or single riveted; with rivets 7/8 in. diameter, averaging 3 3/8 ins. from cr. to cr.  
 Butts from Bilge to Main Sheerstrake, worked carvel, double riveted; with rivets 7/8 in. diameter, averaging 3 1/2 ins. from cr. to cr.  
 Edges of Main Sheerstrake, double or single riveted. as reqd. Upper Sheerstrake, double or single riveted.  
 Butts of Main Sheerstrake, treble riveted for 1/2 length amidships. Butts of Upper or Spar Sheerstrake, treble riveted - length amidships.  
 Butts of Main Stringer Plate, treble riveted for 1/2 length amidships. Butts of Upper or Spar Stringer Plate, treble riveted for 1/2 length.  
 Breadth of laps of plating in double riveting 5/4 Breadth of laps of plating in single riveting 2 3/4  
 Butt Straps of Keelsons, Stringer and Tie Plates, treble, double or single Riveted? Treble or double as reqd.  
 Waterway, how secured to Beams none fitted (Explain by Sketch, if necessary.) and beams to prevent panning  
 Beams of the various Decks, how secured to the sides? By solid welded flanges. No. of Breasthooks, 3 Crutches, 3  
 What description of Iron is used for Frames, Beams, Keelsons, Tie, and Stringer Plates, Outside Plating, &c.? good.  
 Manufacturer's name or trade mark, Plates from Mithon Park & Sherrin; Angle, Masind & Co. Glasgow; Crutches, ...  
 The above is a correct description.  
 Builder's Signature, J. L. Burkill Surveyor's Signature, J. L. Burkill  
 Surveyor to Lloyd's Register of British and Foreign Shipping.

**Workmanship.** Are the butts of plating planed or otherwise fitted? *planed and hand fitted*  
 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.*  
 Are the fillings between the ribs and plates solid single pieces? *yes.*  
 Do the holes for riveting plate to frames, butt straps, or plate to plate, &c., conform well to each other? *yes.*  
 Are the rivet holes well and sufficiently countersunk in the plate and punched from the faying surfaces? *yes.*  
 Do any rivets break into or through the seams or butts of the plating? *In a few cases at the butts only.*

Masts, Bowsprit, Yards, &c., are *Iron & wood* in *good* condition, and sufficient in size and length. If of Iron or Steel give the number of Plates and Angle Irons, mode of riveting, quality of Materials, and if stamped with Maker's name. *yes.*  
 State also Length and Diameter of Lower Masts and Bowsprit *Rig 2 masted topsail schooner. (pole masts.)*

*Fore mast 80 feet, at deck 26 x 4 1/2; at head 17 x 5 1/2.*  
*Main - 48 - 25 x 6 1/2.*  
*Seams double riveted, butts treble riveted and straps increased 1/16.*

NUMBER for EQUIPMENT		Fathoms.	Inches.	Test per Certificate.	Inches per Rule.	Machine where Tested & Suprntd.	ANCHORS.	N <sup>o</sup> .	Weight. CB. Stock.	Test per Certificate.	W'ght req'd per Rule.	Machine where Tested & Suprntd.
SAILS.	CABLES, &c.											
	Chain ...	135	1 1/2	59 1/2	240... 1 1/2	Chester	Bower Anchors	6352	32.3.8	30.15.0.0	32.0.0.0	
Fore Sails,	Iron Str'm Chain	135	5			A. S. Jack						
Fore Top Sails,	Ditto do.	45	1 1/2	22 1/2	75... 1 1/2			6351	31.3.22	30.2.0.0		
Fore Topmast Stay Sails,	Hmpn Strm Cbl	90	4	Steel wire	90... 4		Stream	6354	10.2.10	12.10.3.0	10.2.0.0	
Main Sails,	Hawser ...	90	7 1/2		90... 4 1/2		Kedge	6355	5.0.8	4.9.0.0	5.1.0.0	
Main Top Sails,	Towlines ...	90	9 1/2		90... 9 1/2		Ditto	6356	2.2.6	5.1.1.0	2.2.0.0	
and Spare sails	Warp ...	90	4 1/2	and others								
	quality good											

Standing and Running Rigging *wire & Stempin* sufficient in size and *good* in quality. She has *2* Long Boats and *2* others.  
 The Windlass is *efficient* Capstan *-* and Rudder *efficient* Pumps *efficient*.  
 Engine Room Skylights.—How constructed? *Seal framing on iron Comings* How secured in ordinary weather? *by iron bars & pins.*  
 What arrangements for deadlights in bad weather? *Solid teak deadlights fitted with bulls eyes.*  
 Coal Bunker Openings.—How constructed? *by plate & angles* How are lids secured? *hatches by bars.* Height above deck? *18 ins*  
 Scuppers, &c.—What arrangements for clearing upper deck of water, in case of shipping a sea? *Before bridge deck and abaft bridge deck*  
*Bulwark plating omitted for several feet and guard rails fitted; also Scuppers & freeing ports fitted where required.*  
 Cargo Hatchways.—How formed? *by plate Comings.*  
 State size Main Hatch *23.10 x 14.3* Forehatch *10.1 x 7.11* Quarterhatch *20.0 x 12.1, after Hatch 9.11 x 8.8*  
 If of extraordinary size, state how framed and secured? *Iron decks. (at m. H. 2 full depth web plates at each deck.*  
 What arrangement for shifting beams? *double angle iron on Comings. (also strong fore & afters in each hatchway at each deck.*  
 Hatches, If strong and efficient? *yes and 3" Solid.*

Order for Special Survey No. *994*  
 Date *20. Novemr 1880*  
 Order for Ordinary Survey No. *✓*  
 Date *✓*  
 No. *164* in builder's yard.  
 DATES of Surveys held while building as per Section 18.  
 1st. On the several parts of the frame, when in place, and before the plating was wrought *Specially surveyed 1881.—February 1, 3, 10, 23, 28.*  
 2nd. On the plating during the process of riveting *March 18, 21, 23, April 6, 11, 22, May 5, 10, 12, 18, 24, 31.*  
 3rd. When the beams were in and fastened, and before the decks were laid... *June 9, 29, July 18, 28, August 2, 8, 11, 14, 20, 25, 30, Septemr 1.*  
 4th. When the ship was complete, and before the plating was finally coated or cemented... *7, 11, 19, 21, 23, 24.*  
 5th. After the ship was launched and equipped

**General Remarks** (State quality of workmanship, &c.) *Workmanship and Materials good.*  
*This iron screw steamer has been constructed in accordance with the Rules and the accompanying tracings three in N. 9, submitted and approved please see Sect's Letters dated 26<sup>th</sup> Nov & 14<sup>th</sup> Decr 1880.*

*She has two complete iron decks, cellular bottom, top-gallant fore-castle and bridge deck.*  
*Two web frames on each side in way of engine space have been extended to the upper deck and the whole of the reversed frames in way of the engine & boiler space.*  
*The compartments of cellular bottom tested by a head of water to the height of load line and found tight.*

*3" Decked Rile*  
 How are the surfaces preserved from oxidation? Inside *Cemented to upper part of belges and coated with paint above.* Outside *Coated with paint.*  
 I am of opinion this Vessel should be Classed *100 A. 1. ✕*

The amount of the Entry Fee ... £ 5 : 0 : 0 is received by me, *J. L. Dimmett*  
 Special ... £ 42 : 12 : 0 *Sept 1881*  
 Certificate ... 0 : 0 : 0  
 (Travelling Expenses, if any, £ *599.12.10*)

Committee's Minute *Friday, October, 7th 1881.*  
 Character assigned *100 A. 1.*  
*It is submitted that this vessel appears eligible to be classed as recommended 100 A. 1. 2 Iron Decks*  
 Lloyd's Register of British and Foreign Shipping  
 Foundation

The Surveyors are requested not to write on or below the space for Committee's Minute.

PAR  
 To. of Report  
 No. in Register  
 Double bottom  
 Double bottom  
 Double bottom  
 Fore peak tank  
 Tidship deep t  
 (If necess

4000-225/80.)