

No 5 17368 Iron.

# LLOYD'S REGISTER OF BRITISH AND FOREIGN SHIPPING.

## ENGINEER SURVEYOR'S REPORT ON MACHINERY.

### ENGINES.

Rev 20/11/76

Report (if any) on Hull of Vessel. Port Genoa No. 229

Description Compound Diagonal Inverted  
 Made by J. & W. Dudgeon  
 When 1871 At London  
 Diameter of cylinders  $\frac{33"}{55"} \times \frac{33"}{55"}$  Length of stroke 22" 1/2  
 No. of revolutions per minute 80 to 85  
 Point of cut off 3/4 of stroke in high pres. cyl.  
 Diameter of screw shaft 8" 1/2  
 Diameter of crank shaft journals 8" 1/2  
 Diameter of screw, or of paddle wheel 10 feet  
 Pitch of screw 15" 6"  
 No. of blades, 3 Total surface  
 No. of bilge pumps 2 and sizes 5" dia x 11" stroke  
 Do they pump from each compartment Yes

Are all the bilge suction pipes fitted with roses Yes  
 No. of feed pumps 2 and sizes 5" dia x 11" stroke  
 What gauges are there attached to the engines and boilers ... } 2 pressure gauges in stoke hold  
 } 2 " " " Engine room  
 } 1 vacuum " " "  
 Description and size of }  
 Donkey Pumps ... } 3 1/4 dia x 5" stroke  
 Where do they pump from } Bilge, sea & Condenser  
 No. of bilge injections one and sizes 4" diameter  
 Are they connected to air, or circulating pumps = with air pump  
 Is there a hand pump in the engine room No  
 Can it be worked by the main engines No  
 Is there a deck hose of sufficient length to reach to any part of the vessel } Yes

### MAIN BOILERS.

Number 2 Description Lat. Tubular, fire & aft.  
 Made by J. & W. Dudgeon  
 When 1871 At London  
 Working pressure 45 lbs per square inch  
 Tested by hydraulic pressure to see original certificate Date  
 Description of super-heating apparatus } two horizontal tubes 4" dia  
 } and 4" long, with a central flue 1 1/2" dia  
 Can each boiler be worked separately Yes

Can the super-heater be shut off and the boilers worked separately } No  
 Description and area of safety valves on each boiler } Common dead weight  
 } 18" square area  
 No. of square feet of fire-grate surface in each boiler } 42 square feet  
 Are there separate blow off and brine cocks on each boiler, independent of those on the vessel's skin } Yes  
 Are all pipes, cocks, roses, and pumps in connection with the machinery accessible at all times. } Yes

### DONKEY BOILER.

Description Circ. Vert. with internal fire box & 2 cross water tubes  
 Where fixed Main deck  
 Working pressure 30 lbs per square inch

Tested by hydraulic pressure to see original certificate, Date  
 Description and area of safety valves Common lever  
 No. of square feet of fire grate 2" 1/4 area  
9' 6" square feet

### PIPES, COCKS, AND CONNECTIONS.

Are all connections with the sea direct on the skin of the ship } Some are and the others on cast iron sockets  
 Are they Kingston valves or common cocks ... } Both  
 Are they fixed sufficiently high on the ship's side to be seen without lifting the stoke hold plates } Yes in Engine room  
 } No " " stoke hold  
 Are the discharge pipes above or below the deep water line } Above  
 Are they each fitted with a discharge valve on the plating of the vessel } Yes

What pipes are carried through the bunkers Donkey dis charge  
 How are they protected = Wrought iron casing  
 When were the stern tube, propeller, screw shaft, and all connections examined in dry dock } Now  
 Are the pipes, cocks, and valves arranged so as to prevent an unintentional connection between the sea and the bilge } Yes  
 Is the screw shaft-tunnel water tight and fitted with a sluice door on bulkhead } Yes

Manufacturer.

I hereby certify that the whole of the above are correct particulars of the Machinery and Boilers of the Iron (~~or Wood~~) Screw (~~or Paddle~~) Steam Vessel L. Italia late Stato Plateja owned by R. Piaggio e Figli of the Port of Genoa of 1155 Tons Register, and 280 Registered Horse Power, and that they have been carefully inspected and examined by me at Genoa and found to be at this date, viz., 14<sup>th</sup> Nov<sup>r</sup> 1876 in good order and safe working condition.

Francis W. ...  
 Engineer Surveyor to Lloyd's Register of Shipping.