

EXHAUST GAS
REPORT ON BOILERS.

No. 1760

Received at London Office.

Writing Report 19 When handed in at Local Office FEB 25 1954 19 Port of Kobe

Survey held at Yamano, Japan Date, First Survey 14th July, 1953 Last Survey 28th November 1953

on the Steel Single Screw Motor Vessel "OMUROSAN MARU" (Number of Visits 12) Gross 13102.72 Tons Net 7773.17

Yamano, Japan By whom built Mitsui Shipbuilding Engineering Co. Ltd. Yard No. 573 When built Nov. 53

made at Yamano, Japan By whom made Mitsui Shipbuilding Engineering Co. Ltd. Engine No. 494 When made Nov. 53

made at Yamano, Japan By whom made Mitsui Shipbuilding Engineering Co. Ltd. Boiler No. 365 When made Nov. 53

Mitsui Senpaku K. K. Port belonging to Tokyo

FICAL BOILER.

at Yamano By whom made Mitsui S.B.E. Co. Ltd. Boiler No. 365 When made Nov. 53 Where fixed Peep deck

Manufacturers of Steel Plate: Japan Steel Works, Ltd. Muroran Works; Tube: Sumitomo Metal Ind. Tube Works, Amagasaki

Heating Surface of Boiler 252.9 M² Is forced draught fitted No Coal or Oil fired Exhaust gas

and Description of Boilers 1 Vertical Tube type Working Pressure 12.5 kg/cm²

l by hydraulic pressure to 22.5 kg/cm² Date of test 18-9-53 No. of Certificate B.501

of fire grate in each Boiler - No. and description of safety valves to each boiler 1 Set Duplex Spring Loaded safety valves

of each set of valves per boiler { per Rule 56.5 cm² Pressure to which they are adjusted 12.75 kg/cm² Are they fitted with easing gear yes

whether steam from main boilers can enter the donkey boiler - Smallest distance between boiler or uptake and bunkers

odwork - Is oil fuel carried in the double bottom under boiler No Smallest distance between base of boiler and tank top plating

1100 mm Is the base of the boiler insulated No Largest internal dia. of boiler 2500 mm Height 4050 mm

plates: Material O. H. Steel Tensile strength 51.5 kg/mm² Thickness 19 mm

the shell plates welded or flanged Riveted If fusion welded, state name of welding firm -

all the requirements of the Rules for Class I vessels been complied with - Description of riveting: circ. seams { end lap joints Double riveted

seams { butt joint Dia. of rivet holes in { circ. seams 26.5 mm Pitch of rivets { 84.18 mm Percentage of strength of circ. seams { plate 60.5 rivets 53.9

ongitudinal joint { plate 80.5 rivets 81.5 Thickness of butt straps { outer 19 mm inner 19 mm Shell Crown: Whether complete hemisphere, dished partial

rical, or flat - Material - Tensile strength - Thickness -

ius. - Description of Furnace: Plain, spherical, or dished crown - Material -

ile strength - Thickness - External diameter { top - bottom - Length as per Rule -

h of support stays circumferentially - and vertically - Are stays fitted with nuts or riveted over -

meter of stays over thread - Radius of spherical or dished furnace crown -

ckness of Ogee Ring - Diameter as per Rule { D - d -

mbustion Chamber: Material - Tensile strength - Thickness of top plate -

lius if dished - Thickness of back plate - Diameter if circular -

gth as per Rule - Pitch of stays -

stays fitted with nuts or riveted over - Diameter of stays over thread -

be Plates: Material { Top O. H. Steel Tensile strength { 47.2 kg/cm² Thickness { 2.5 mm Mean pitch of stay tubes in nests 25.5 mm

comprising shell, dia. as per Rule { front - back - Pitch in outer vertical rows { - Dia. of tube holes TOP FRONT { stay 66 mm BOT BACK { stay 60 mm plain 63 mm plain 60 mm

each alternate tube in outer vertical rows a stay tube yes

orders to Combustion Chamber Tops: Material - Tensile strength -

pth and thickness of girder at centre - Length as per Rule -

stance apart - No. and pitch of stays in each -

Crown Stays: Material..... Tensile strength..... Diameter { at body of stay,.....
No. of threads per inch..... Screw Stays: Material..... Tensile strength.....
Diameter { at turned off part,..... No. of threads per inch..... Are the stays drilled at the outer ends.....
or over threads.....

Tubes: Material..... O. H. Steel..... External diameter { plain..... 60 MM..... Thickness { 8 MM..... 6.5 MM.....
No. of threads per inch..... 10..... Pitch of tubes..... 85 x 85 MM..... 3.5 MM.....

Manhole Compensation: Size of opening in shell plate..... 305 x 405 MM..... Section of compensating ring..... T-flange type..... No. of rivets and d
of rivet holes..... 36, 26.5 MM..... Outer row rivet pitch at ends..... 133 MM (about)..... Depth of flange if manhole flanged..... 75 MM.....

Uptake: External diameter..... 930 MM..... Thickness of uptake plate..... 6 MM.....

Cross Tubes: No..... External diameters {..... Thickness of plates.....

Have all the requirements of Sections 14 to 22 inclusive for boilers been complied with..... yes.....

MITSUBISHI SHIPBUILDING & ENGINEERING CO., LTD., TAMANO WORKS.

Senior Managing Director

Dates of Survey while building..... During progress of work in shops..... 1953 - JUL 14 AUG 5 SEP 14 18 29..... Is the approved plan of boiler forwarded herewith..... 20-6-53
During erection on board vessel..... 1953 - NOV 7 28..... (If not state date of approval.)
Total No. of visits..... 12

Is this Boiler a duplicate of a previous case..... No..... If so, state Vessel's name and Report No.....

GENERAL REMARKS (State quality of workmanship, opinions as to class, &c.).....

The exhaust gas boiler has been constructed under Special Survey in accordance with the Rules, approved plans and Secretary's letters. Materials and the workmanship are sound and good. The exhaust gas boiler has been examined under steam and the safety valves adjusted to 12.5 Kg/cm² and found satisfactory.

Survey Fee ... £ 700.400 When applied for FEB. 25. 1954 19
Travelling Expenses (if any) £ (See Rpt. 1) When received 19

Date FRIDAY - 2 APR 1954

Committee's Minute See Rpt. 46

Engineer Surveyor to Lloyd's Register of Shipping.

Lloyd's Register Foundation

STEEL.

Has the Steel been tested as required by the Rules?