

REPORT ON OIL ENGINE MACHINERY.

No 33044

FEB 24 1941

Received at London Office

Date of writing Report

19

When handed in at Local Office

15th Feb 1941 Port of

Sunderland.

No. in Survey held at
Reg. Book.

Date, First Survey

and 9th 40 Last Survey 14 Feb 1941

Number of Visits 105.

Single
on the ~~Fun~~
Triple
Screw vessel**"ANTAR"**Tons Gross 5222
Net 3034.Built at Sunderland

By whom built

Wm. Leasford & Sons Ld.

Yard No. 668

When built 1941

Engines made at Sunderland

By whom made

Wm. Leasford & Sons Ld.

Engine No. 668

When made 1941.

Donkey Boilers made at Aman

By whom made

Stockton Chem. Engrs. & Riley Bros Ld.

Boiler No.

When made 1941.

Brake Horse Power 2500

Owners

New Egypt & Levant Shipping Co Ld.

Port belonging to

London.

Nom. Horse Power as per Rule 516.

Is Refrigerating Machinery fitted for cargo purposes

No.

Is Electric Light fitted

Yes.

Trade for which vessel is intended

23⁵/₈91⁵/₁₆

OIL ENGINES, &c.

Type of Engines

Opposed piston airless injection 2 or 4 stroke cycle 2Single or double acting Single

Maximum pressure in cylinders

548 lbs/sq. in.

Diameter of cylinders

600 mm

Length of stroke

Upper 980 mm

No. of cylinders

3

No. of cranks

3 Triple

Mean Indicated Pressure

88 lbs/sq. in.

Span of bearings, adjacent to the Crank, measured from inner edge to inner edge

940 mm

Is there a bearing between each crank

Between each 3 throws

Revolutions per minute

108 mmFlywheel dia. F. 2300 mmWeight F. 5 3/4 tonsMeans of ignition Compression

Kind of fuel used

255 mm

Crank Shaft.

Solid forged

Semi built

All built

dia. of journals

418 mm

Crank pin dia.

450 mm

Crank Webs

308 mm

Mid. length breadth

650 mm

Thickness parallel to axis

200 mm

Flywheel Shaft, diameter

418 mm

as fitted

Intermediate Shafts, diameter

450 mm

as fitted

Thrust Shaft, diameter at collars

365 mm

as fitted

418 mm

as fitted

450 mm

Tube Shaft, diameter

341 mm

as per Rule

Screw Shaft, diameter

392 mm

as per Rule

389 mm

Is the tube

screw

shaft fitted with a continuous liner

Yes.

Bronze Liners, thickness in way of bushes

18.0 mm

as per Rule

21.5 mm

Thickness between bushes

13.5 mm

as per Rule

16.45 mm

Is the after end of the liner made watertight in the

propeller bossYes.

If the liner is in more than one length are the junctions made by fusion through the whole thickness of the liner

Yes.

If the liner does not fit tightly at the part between the bearings in the stern tube, is the space charged with a plastic material insoluble in water and non-corrosive

one length.

If two liners are fitted, is the shaft lapped or protected between the liners

Yes.

Is an approved Oil Gland or other appliance fitted at the after end of the tube

Yes.

shaft

no.

If so, state type

Yes.

Propeller, dia.

15'-9"

Pitch

11'-6"

No. of blades

4.

Material

Brass

whether Movable

no.

Total Developed Surface

90

sq. feet

Method of reversing Engines

Hand lever

Is a governor or other arrangement fitted to prevent racing of the engine

Yes.

Means of lubrication

Hand forcedYes.

Are the cylinders fitted with safety valves

Yes.

Are the exhaust pipes and silencers water cooled or lagged with

non-conducting materialYes.

Cooling Water Pumps, No. 1

1 Engine drivenSteam driven

Is the sea suction provided with an efficient strainer which can be cleared within the vessel

Yes.(F.W. Cooling)

Bilge Pumps worked from the Main Engines, No.

none

Diameter

2 @ 5 1/2" x 6" x 15" Simplex

Stroke

Can one be overhauled while the other is at workYes.

Pumps connected to the Main Bilge Line

No. and Size2 @ 5 1/2" x 6" x 15" Simplex

How driven

SteamBallast Pump.

Is the cooling water led to the bilges

no.

If so, state what special arrangements are made to deal with this water in addition to the ordinary bilge pumping arrangements

Ballast Pumps, No. and size

1 @ 10 1/2" x 12" x 24" (Simplex)Power Driven Lubricating Oil Pumps, including Spare Pump, No. and size4 @ 3" x 4" E.R.1 @ 3" Tunnel Well.In Pump Room

Are two independent means arranged for circulating water through the Oil Cooler

Yes.Suctions, connected to both Main Bilge Pumps and Auxiliary Bilge

Pumps, No. and size:—In Machinery Spaces

N°1. 3" φ rs.N°2. 3 1/2" φ rs.N°3 (Keupdand) 3 1/2" φ rs.N°4. 3" φ rs.N°5 1 @ 3 1/2" (aft.)

Independent Power Pump Direct Suctions to the Engine Room Bilges, No. and size

1 @ 8" (Ballast pump)1 @ 5" (En. Sr. pumps)

Are all the Bilge Suction pipes in Holds and Tunnel Well fitted with strum-boxes

Yes.

Are the Bilge Suctions in the Machinery Spaces

Yes.

Are all Sea Connections fitted direct on the skin of the ship

Yes.

Are they fitted with Valves or Cocks

Both.

Are they fixed sufficiently high on the ship's side to be seen without lifting the platform plates

Yes.

Are the Overboard Discharges above or below the deep water line

Below.

Are they each fitted with a Discharge Valve always accessible on the plating of the vessel

Yes.

Are the Blow Off Cocks fitted with a spigot and brass covering plate

Yes.

What pipes pass through the bunkers

noneDr. bilge SuctionsYes.

How are they protected

Yes.

What pipes pass through the deep tanks

Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.

Are all Pipes, Cocks, Valves, and Pumps in connection with the machinery and all boiler mountings accessible at all times

Is the arrangement of valves and their connections such as to prevent the possibility of water passing from the sea or from water tanks into the cargo or machinery spaces, or from one

Yes.

Is the Shaft Tunnel watertight

Yes.

Is it fitted with a watertight door

Yes.

worked from

E.R. topfrating.

If a wood vessel, what means are provided to prevent leakage of either fuel oil or of lubricating oil from saturating the woodwork

Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.

Main Air Compressors, No.

Two.

No. of stages

Three

Diameters

11 1/2", 11 1/2" x 9 1/2", 2 3/4"

Stroke

6 1/2"

Driven by

Steam engine11 1/2" x 6 1/2"

Auxiliary Air Compressors, No.

Yes.

No. of stages

Yes.

Diameters

Yes.

Stroke

Yes.

Driven by

Yes.Yes.Yes.

Small Auxiliary Air Compressors, No.

Yes.

No. of stages

Yes.

Diameters

Yes.

Stroke

Yes.

Driven by

Yes.Yes.

What provision is made for first Charging the Air Receivers

(Steam driven Compressors)Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.

Scavenging Air Pumps, No.

One

Diameter

1400 mm

Stroke

610 mm

Driven by

Levers fromMain engine.Yes.Yes.Yes.

Auxiliary Engines crank shafts, diameter

as per Ruleas fittedYes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.

Have the Auxiliary Engines been constructed under special survey

Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.Yes.

