

REPORT ON OIL ENGINE MACHINERY.

No. 24192

7 SEP 1950

Received at London Office

Date of writing Report 26 AUGUST 1950

When handed in at Local Office 30 AUGUST 1950

Port of

GREENOCK

No. in Survey held at
Reg. Book.

GREENOCK

Date, First Survey 27 AUGUST 1949

Last Survey 13 AUGUST 1950

Number of Visits 49

Single
on the Twin
Triple
Quadruple

Screw vessel

BRITISH PEER

Tons

Gross 816.1

Net 494.6

Built at PORT GLASGOW

By whom built

LITHGOWS L^o

Yard No. 1043

When built 1950

Engines made at GREENOCK

By whom made

JOHN G. KINCAID & CO L^o

Engine No. K209

When made 1950

Donkey Boilers made at do

By whom made

do

Boiler No. K209

When made 1950

Brake Horse Power 3200

Owners

BRITISH TANKER CO L^o

Port belonging to

LONDON

H.N. Power as per Rule 625

NAP-489

Is Refrigerating Machinery fitted for cargo purposes No

Is Electric Light fitted YES

Trade for which vessel is intended

OPEN SEA SERVICE

OIL TANKER

OIL ENGINES, &c. — Type of Engines

DIESEL (UNDER PISTON SUPPLY)

2 or 4 stroke cycle 4

Single or double acting Single

Maximum pressure in cylinders 650 lb

Diameter of cylinders 29 1/2"

Length of stroke 59 1/2"

No. of cylinders 6

No. of cranks 6

Mean Indicated Pressure 115

Ahead Firing Order in Cylinders 156324

Span of bearings, adjacent to the crank, measured

from inner edge to inner edge 98 1/2"

Is there a bearing between each crank YES

Revolutions per minute 115

Flywheel dia. 248 1/2"

Weight 2499 kg

Moment of inertia of flywheel (lbs. in² or Kg. cm²) 23.53 x 10⁶

Means of ignition Compression

Kind of fuel used Diesel

Crank Shaft, Solid forged
Semi built
All builtdia. of journals as per Rule 4 1/2"
as fitted 505 1/2"

Crank pin dia. 505 1/2"

Crank webs

Mid. length breadth 98 1/2"
Mid. length thickness 310 1/2"Thickness parallel to axis 310 1/2"
Thickness around eye hole 298 1/2"

Flywheel Shaft, diameter

as per Rule 4 1/2"
as fitted 4 1/2"

Intermediate Shafts, diameter

as per Rule 4 1/2"
as fitted 17"

Thrust Shaft, diameter at collars

as fitted 4 1/2"
as per Rule 4 1/2"

Tube Shaft, diameter

as per Rule 4 1/2"
as fitted 4 1/2"

Screw Shaft, diameter

as per Rule 4 1/2"
as fitted 16"

Is the (tube/screw) shaft fitted with a continuous liner YES

Bronze Liners, thickness in way of bushes

as per Rule 13/16"

Thickness between bushes

as per Rule 13/16"

Is the after end of the liner made watertight in the

propeller boss YES

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 YES

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

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

end of tube shaft No

If so, state type

Length of bearing in Stern Bush next to and supporting propeller 5' 4"

Propeller, dia. 16' 0"

Pitch 10' 9"

No. of blades 4

Material Bronze

whether moveable No

Total developed surface 88 sq. feet

Moment of inertia of propeller (lbs. in² or Kg. cm²) 106.2 x 10⁶

Kind of damper, if fitted None

Method of reversing Engines Direct

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

Lubrication Forced

Thickness of cylinder liners 53 lb

Are the cylinders fitted with safety valves YES

Are the exhaust pipes and silencers water cooled

lagged with non-conducting material lagged

If the exhaust is led overboard near the waterline, what means are arranged to prevent water from being syphoned

back to the engine YES

Cooling Water Pumps, No. 2

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

Large Pumps worked from the Main Engines, No. None

Diameter

Stroke

Can one be overhauled while the other is at work

Pumps connected to the Main Bilge Line

No. and size

One 170 tons/hr

Two 100 tons/hr

How driven

Steam

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

Blast Pumps, No. and size One 170 tons/hr

Power Driven Lubricating Oil Pumps, including spare pump, No. and size

2 { 1 IME 100 tons/hr

1 Standby 100 tons/hr

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

Suctions, connected to both main bilge pumps and auxiliary

pumps, No. and size:—In machinery spaces Three 2 1/2"

In pump room M10 2' 2 1/2"

F08 1' 2 1/2"

holds, &c. Two 2 1/2"

Independent Power Pump Direct Suctions to the engine room bilges, No. and size Two 6"

Are all the bilge suction pipes in holds and tunnel well fitted with strum-boxes YES

Are the bilge suction in the machinery spaces led from easily

accessible mud-boxes, placed above the level of the working floor, with straight tail pipes to the bilges 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

efficiently 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 Above

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

At pipes pass through the bunkers

How are they protected

At pipes pass through the deep tanks

Have they been tested as per Rule

Are all pipes, cocks, valves and pumps in connection with the machinery and all boiler mountings accessible at all times YES

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 compartment to another YES

Is the shaft tunnel watertight NONE

Is it fitted with a watertight door

worked from

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

Air Compressors, No. 1

No. of stages

diameters

stroke

driven by

Auxiliary Air Compressors, No. Two

No. of stages

Two

diameters 9 1/4" x 4"

stroke 7 1/2"

driven by 5th Eng.

All Auxiliary Air Compressors, No. 1

No. of stages

diameters

stroke

driven by

Is provision is made for first charging the air receivers

Steam driven compressors as above

Reversing Air Pumps, No. None

diameter

stroke

driven by

Auxiliary Engines crank shafts, diameter

as per Rule

No

Position

ER platform

Have the auxiliary engines been constructed under special survey

Is a report sent herewith

IPS Cert N° 22380-22382

415 4' N° 75395

000-2100-9100

