

REPORT ON ELECTRIC FITTINGS.

(OTHER THAN FOR THE PROPULSION OF THE VESSEL)

Received at London Office THU 24 APR 1924

Date of writing Report 10 When handed in at Local Office Apr 23rd 1924 Port of Bristol

No. in Survey held at Portishead Date, First Survey Feb 2nd Last Survey Mar 10th 1924
Reg. Book. 78721 ~~28853~~ on the S.S. "NORTHQUAY" (Number of Visits.....)

Built at Hardenwood By whom built W. Schepers De Merwede Yard No. 1920
of Van Velsit Tons { Gross 930
Net 347

Manor Line Ltd (C. Angle & Coys) Port belonging to London

Electric Light Installation fitted by _____ Contract No. _____ When fitted _____

of Distribution Gal. Roping & Lead Covered Cable
of supply for Lighting 110 volts, Heating _____ volts, Power _____ volts

or Alternating Current, Lighting Direct Power _____
ating current system, state frequency of periods per second _____

Automatic Governor been tested and found efficient when the whole load is suddenly thrown on or off yes

tors, do they comply with the requirements regarding overload yes, are they compound wound yes
over compounded 5 per cent. _____, if not compound wound state distance between each generator _____

ore than one generator is fitted are they arranged to run in parallel one only, is an adjustable regulating resistance fitted in
h each shunt field No

terminals accessible and clearly marked yes, are they so spaced or shielded that they cannot be accidentally earthed,
circuited yes Are the lubricating arrangements of the generators as per Rule yes

n of Generators Front of Engines,
entilation in way of the generators satisfactory yes, are they clear of all inflammable material yes

ted near unprotected woodwork or other combustible material, state distance of same horizontally from or vertically above the generators
and _____, are the generators protected from mechanical injury and damage from water, steam or oil yes

axis of rotation fore and aft yes
ng, are the bedplates and frames of the generating plant efficiently earthed yes are the prime movers and
pective generators in metallic contact yes

Switch Boards, where placed Along side Generators

If the generators and main switchboard are not placed in the same compartment, is each generator provided with
n each insulated pole as near as possible to the terminals of the generator, additional to that provided on the main switchboard _____

boards, are they placed in accessible positions, free from inflammable gases and acid fumes yes

rotected from mechanical injury and damage from water, steam or oil yes, if situated near unprotected
rk or other combustible material, state distance of same horizontally from or vertically above the switchboards _____ and _____

constructed wholly of durable, incombustible non-absorbent materials yes, is all insulation of high dielectric strength and of
ntly high insulation resistance yes, if semi-insulating material is used, are all conducting parts connected to one pole
d from the slab with mica or micanite and the slab similarly insulated from its framework _____, and is the
ffectively earthed yes. Are the following fittings as per Rule, viz.:— spacing or shielding of live parts

_____ , accessibility of all parts yes, absence of fuses on back of board yes, proportion of omnibus
yes, individual fuses to voltmeter, pilot or earth lamp yes, connections of switches yes

switchgear, description of switchgear for each generator and each outgoing circuit, and arrangement of equalizer switches

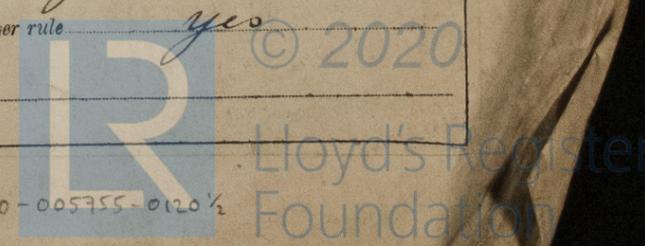
One 3 way Double Pole Main Switchboard

struments on main switchboard 1 ammeters 1 voltmeters _____ synchronising device for paralleling purposes.

Earth Testing, state what means are provided at the main switchboard for indicating the state of the insulation of the system _____

Switches, Circuit Breakers and Fusible Cut-outs, do these comply with the requirements of the Rules yes

Section and Distribution Boards, is the construction, protection, insulation, material, and position of these as per rule yes



Insulation of Cables, state type of cables, single or twin *Single* are the cables insulated and protected as per Tables III or IV of the Rules *yes*

Fall of Pressure, state maximum between bus bars and any point of the installation under maximum load *110V*

Cable Sockets and other connections, are the ends of all cables having a sectional area of 0.007 square inch and above provided with soldering sockets *yes*

Paper Insulated Cables, If cables are paper covered, is the dielectric at the exposed ends of the conductor protected from moisture by being suitably sealed with insulating compound

Cable Runs, are the cables fixed as far as possible in accessible positions not exposed to drip or accumulation of water or oil, or to high temperature from boilers, steam pipes, uptakes or other hot objects, or to avoidable risk of mechanical damage *along Main Bulward*

Support and Protection of Cables, state how the cables are supported and protected *Gal Iron Conduit clipped to Ship Plates*

If cables are run in wood casings, are the casings and caps secured by screws *—*, are the cap screws of brass *—*, are the cables run in separate grooves *—*. If armoured and lead covered cables are secured by metal clips, are the clips spaced as per Table VI *yes*

Refrigerated Chambers, if lights are fitted, are the cables and fittings in accordance with the special requirements *—*

Joints in Cables, state if any, and how made, insulated, and protected *None*

Watertight Glands and Deck Tubes, are all cables passing through decks and watertight bulkheads provided with deck tubes or watertight glands *yes*

Bushes in Beams and Non-watertight Positions, where unarmoured cables pass through beams and non-watertight partitions, are the holes efficiently bushed *yes* state the material of which the bushes are made *Fibre*

Earthing Connections, state what earthing connections are fitted and their respective sectional areas

Alternative Lighting, are the groups of lights in the propelling machinery space arranged as per Rule *yes*

Emergency Supply, state position and method of control of the emergency supply and how the generator is driven

Navigation Lamps, are these separately wired *yes*, controlled by separate switch and separate fuses *yes*

are the fuses double pole *yes*, are the switches and fuses grouped in a position accessible only to the officers on watch *yes*

has each navigation lamp an automatic indicator as per Rule *—*, are separate screens provided for the use of oil and electric side lights *yes*

are separate oil lanterns provided for the mast head lights and side lights *yes*

Fittings, are all fittings on weather decks, in stokeholds and engine rooms and wherever exposed to drip or condensed moisture, watertight *yes*

are any fittings placed in spaces in which goods are liable to be stacked in close proximity to them; if so, how are they protected *None*

are any fittings placed in spaces where inflammable or explosive dust or gases are liable to be present, if so, how are they protected *No*

how are the cables led

where are the controlling switches situated

Searchlight Lamps, No. of *—*, whether fixed or portable *—*, are their fittings as per Rule

Arc Lamps, other than searchlight lamps, No. of *—*, are their live parts insulated from the frame or case *—*, are their fittings as per Rule

Motors, are their working parts readily accessible *—*, are the coils self-contained and readily removable for replacement

are the brushes, brush holders, terminals and lubricating arrangements as per Rule *—*, are the motors placed in well-ventilated compartments in which inflammable gases cannot accumulate and clear of all inflammable material

are they protected from mechanical injury and damage from water, steam or oil *—* are their axis of rotation fore and aft

if situated near unprotected woodwork or other combustible material, are the motors of the totally enclosed, pipe ventilated, forced draught, drip or flame proof type

if not of this type, state distance of the combustible material horizontally or vertically above the motors *—* and

Control Gear and Resistances, are the generator field and motor speed regulators, starters and controllers constructed as per Rule

Lightning Conductors, where lightning conductors are required, are these fitted as per Rule

Ships carrying Oil having a Flash Point less than 150° F. Have the special requirements of the Rules been complied with regarding switches, joint boxes, section and distribution boards, protection of cables, method of distribution, lead of cables, lights and fittings *yes*

If portable lamps for use in dangerous spaces are supplied, are they of a type approved by the Home Office

PARTICULARS OF GENERATING PLANT.

Table with columns: DESCRIPTION OF GENERATOR, No. of, RATED AT (Kilowatts, Volts, Ampères, Rots. per Min.), DRIVEN BY, WHERE DRIVEN BY AN INTERNAL COMBUSTION ENGINE (Fuel Used, Flash Point of Fuel). Includes entries for MAIN, AUXILIARY, EMERGENCY, and ROTARY TRANSFORMER.

LIGHTING AND HEATING CONDUCTORS.

Table with columns: Ref. No., DESCRIPTION, No. of Conductors, Effective Area of each Conductor, Sq. Ins., COMPOSITION OF STRAND (No., Diameter), Total Maximum Current, Ampères, Approximate Length (Lead and Return) Feet, Insulated with, HOW PROTECTED. Lists various lighting fixtures like MAIN GENERATOR, SEARCHLIGHT, MASTHEAD LIGHT, etc.

MOTOR CONDUCTORS.

Table with columns: Ref. No., DESCRIPTION, No. of Motors, Effective Area of each Conductor, Sq. Ins., COMPOSITION OF STRAND (No., Diameter), Total Maximum Current, Ampères, Approximate Length (Lead and Return) Feet, Insulated with, HOW PROTECTED. Lists various pumps and motors like BALLAST PUMP, MAIN BILGE LINE PUMPS, etc.

All Conductors are of annealed copper conforming to British Standard Specification No. 7.

The Insulated Conductors are guaranteed to withstand the immersion and resistance tests specified in the Rules.

The foregoing is a correct description.

C. CAMPBELL & WOOD, LTD.

Electrical Engineers.

Date

Jan 30th 1924

C. Campbell

COMPASSES.

Distance between electric generators or motors and standard compass

50 feet

Distance between electric generators or motors and steering compass

" "

The nearest cables to the compasses are as follows:-

A cable carrying $\frac{1}{2}$ Ampères 3 feet from standard compass 9 feet from steering compass.

A cable carrying 1 Ampères 10 feet from standard compass 10 feet from steering compass.

A cable carrying Ampères feet from standard compass feet from steering compass.

Have the compasses been adjusted with and without the electric installation at work at full power With full power & without

Has the effect of switching on and off circuits, motors and other electro-magnetic apparatus within the vicinity of the compasses been noted Yes

The maximum deviation due to electric currents was found to be nil degrees on course in the case of the standard

compass, and nil degrees on course in the case of the steering compass.

Builder's Signature.

Date

Is this installation a duplicate of a previous case If so, state name of vessel

General Remarks (State quality of workmanship, opinions as to class, &c.)

The machine examined under working conditions & found satisfactory

This installation of electric lights has been examined in its completed condition & found to be in order

To complete the survey an automatic indicator requires to be fitted for the navigation lights.

Total Capacity of Generators 1 Kilowatts

The amount of Fee ... £ 5 : 0 : 0 When applied for, April 19 24

Travelling Expenses (if any) £ 4 : 10 : 0 When received, See debit book

R.W. Coomber & Wm. W. Currie
Surveyor to Lloyd's Register of Shipping.

Committee's Minute

Assigned

Im. 4.22—Transfer.
(The Surveyors are requested not to write on or alter the pages for Committee's Minutes.)



© 2020

Lloyd's Register Foundation