

# THE SUNDERLAND FORGE & ENGINEERING COMPANY, LIMITED.



## TEST OF DIRECT CURRENT GENERATOR, Size 13"

and ENGINE, Size

For MESSRS.

R. AND W. HAWTHORN LESLIE & CO. LTD. Order 2365.

ENG. N<sup>o</sup> 3937

OUTPUT PLATE  
STAMPED

110 Volts 146 Amps 16 K.W. 390 Revs.

Continuous Rating Compound Wound, No. F. 5250 Date 1938

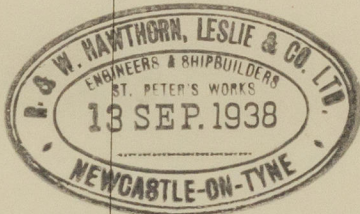
Engine No.

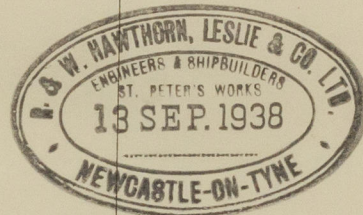
Steam Pressure

lbs. per sq. inch.

### READINGS DURING TEST.

M.V. "DAPHNELLA"

Time	Speed R.P.M.	LINE		SHUNT		Stm. Pres. lbs./sq. in.	DATE OF TEST	Remarks	
		Volts	Amps.	Volts	Amps.		18-2-38.		
<u>TEMPERATURE RUN.</u>									
-45	391	110	147	85½	4.09		Temperatures taken(a)		
-15	391	110	147	87	4.1				
-45	392	110	147	90	4.2				
0-15	391	110	147	91	4.2				
0-45	391	110	147	92	4.19				
1-15	391	110	147	94	4.2				
1-45	390	110	147	94	4.2				
2-15	390	110	147	94	4.23				
2-45	390	110	147	94	4.25				
<u>25% OVERLOAD.</u>									
-30	390	110	184	95	4.35	Temperatures taken(b)			
-0	391	110	184	95	4.32				
-30	391	110	185	95	4.29				
-0	392	110	185	95	4.3				
-30	391	110	185	95	4.3				
	391	110	147	86	4.00				
	407	110	0	86	3.98				
<u>TEST ON SPARE ARMATURE F.5233.</u>									
11-30	390	110	146	88	4.12				
1-30	390	110	146	88	4.05				
TEMPERATURE RISE OF ARMATURE = 47°F.						<u>DIESEL DRIVEN</u>			
TEMPERATURE RISE OF COMMUTATOR = 35°F.						<u>GENERATOR</u>			
						<u>ENG. N<sup>o</sup> 3937</u>			



Temperatures taken(a)

Temperatures taken(b)

Full Load.

No Load.

DIESEL DRIVEN

GENERATOR

ENG. N<sup>o</sup> 3937

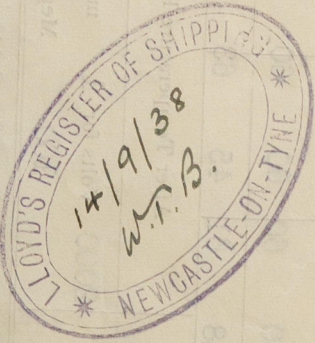
Temperatures taken by thermometers	Armature		Commutator		Shunt Coils		Series Coils		Interpole Coils	
	A	B	A	B	A	B	A	B	A	B
Maximum Temperature recorded	117	145	95	115	108	121	105	123		
Air Temperature	60	60	60	60	60	60	60	60		
Temperature Rise in Degrees F.	57	85	35	55	48	61	45	63		
Before Temperature Run					After Temperature Run					
High Pressure Test on Generator	2000 Volts for 1 min.					2000 Volts for 1 min.				
Insulation Resistance of Generator	45 Megohms					100 Megohms				

Date 9-3-38

Date

Signed JUD. 002659-002666-0144

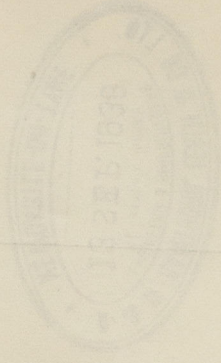




TEMPERATURE  
DIRECT DRIVE

bad LUT  
bad on

temperature taken (p)



Date of Test 18-3-38

hrs. per. test

Continued Reading Company Motor No. 2530 Date 1838

Revs

330

Order 3392

TEST OF DIRECT CURRENT GENERATOR, size 13"

THE SUNDERLAND LOBCE & ENGINEERING  
COMPANY, LIMITED.

TEST ON DRIVING ADJUDICATE

General Remarks

size, ANDING line  
E. AND A. HANCOCK LIMITED & CO. LTD. Order 3392



© 2020

Lloyd's Register  
Foundation

HC/JCI

res  
sub  
for

REMARKS.

High VOLT

COMMUTAT

"

Field

TEMPERAT

Arm

Com

Field

all load  
25% load  
No load

all load

13% load  
all load

13% load

OG OF RU

USTOMER

ing CONT

P., KKKK

its 110

FILE OF A  
DY. 13