

W1158-0195

Date 5-9-1934

HARLAND AND WOLFF, LIMITED.

10/20 H  
TEST of MOTOR or DYNAMO

Made 30-8-34 (Date) Tested by

SHIP No. JOB 500/2262 For 924 G

Purpose Main F.W. Circulating P. Maker H & W Ltd Maker's No. 2499

DUTY: Volts 220 R.P.M. 1500/1200 BHP. 16 Time Rating Continuous

Amperes 62 at 1500 RPM  
40 " 1200 " " Rotation C-Clock Comm End

| TIME | Line<br>Volts | TEMPERATURE   |             | R.P.M. | MOTOR FIELD VOLTS |       |  |  |
|------|---------------|---------------|-------------|--------|-------------------|-------|--|--|
|      |               | MOTOR<br>Amps | GEN<br>Amps |        | Amps              | VOLTS |  |  |
|      | 220           | 62.6          | 48          | 1500   | 65                | 95    |  |  |

REMARKS  
Temperature Limits 63°F  
(SHOULD INCLUDE NOTES ON COMMUTATION)

Windings to sheet no 267M.

Motor no 2499 was coupled back to back to Main F.W. Circ P motor no 2498 running as generator for Hopkinson test.

Commutation Sparkless up to 25% overload.



Temperature Fahrenheit after 6 hours run at 62 Amps. 1500 RPM. as motor

|         | ARMATURE |       |       | MAGNET         |                 |                | EXHAUST<br>AIR | YOKE |
|---------|----------|-------|-------|----------------|-----------------|----------------|----------------|------|
|         | Core     | Wndg. | Comm. | Shunt<br>Coils | Series<br>Coils | Inter<br>Coils |                |      |
| Machine |          | 119   | 115   | 95             | 93              | 102            | 85             | 83   |
| Air     |          | 70    | 70    | 70             | 70              | 70             | 70             | 70   |
| Rise °F |          | 49    | 45    | 25             | 23              | 32             | 15             | 13   |

Bearings In Order

Balance at 1740 R.P.M. In Order

Endplay -

Mech. Air Gap 45 mils

Insulation Test of entire machine  
Hot Cold By 1000 -Volt Megger 40 megohms  
Pressure withstood 2000 volts  
for 5 minutes

Setting of Overload device  
Controller N.V. Coil holds under all working conditions