Hi-Speed Industrial Service
7030 Ryburn Dr
Millington, Tn 38053
901-873-5300

AC Inspection as Found

American Kraft Paper
1701 Jefferson Parkway
White Hall, AR 71602

FolderID: 104811
FormID: 24949741

AC Inspection - Rev. 2

Location:	MOTOR SHOP LR
Serial Number:	JA8356949
Description:	350 HP GENERAL ELECTRIC

Hi-Speed Job Number:	104811
Manufacturer:	GE
Product Number:	5K826630A9
Serial Number:	JA8356949
HP/kW:	350 (HP)
RPM:	880 (RPM)
Frame:	8266S
Voltage:	2300
Current:	87 (Amps)
Phase:	Three
Hz:	60 (Hz)
Service Factor:	1.15
# of Leads:	3
J-box Included:	None
Coupling/Sheave:	None
Bearing RTDs:	No
Stator RTDs:	No
Repair Stage:	Final
Rewind:	No
Shaft Machined Fit Repairs Required:	Yes
Bearing Housing Machined Fit Repairs Required:	Yes
Winding Type :	Form Coil
Bearing Type:	Rolling Element

Priorities Found: **3 - High** **8 - Good**

Overall Condition

1.	Report Date	**06/30/2025**	
2.	Nameplate Picture		P37

3. Photos of all six sides of the machine.






	4.	Describe the Overall Condition of the Equipment as Received ***Dirty but serviceable***	
	5.	Is this a UL Listed Motor	**(NO) NO**
	6.	Is the motor water cooled or can be pressure checked before teardown	**(NO) NO**
Initial Mechanical/Electrical			
●	7.	Does Shaft Turn Freely?	**(Y) Yes**
●	8.	Does the shaft require T.I.R in Lathe to identify additional repairs?	**(YES) YES**
	9.	Does Shaft Have Visible Damage?	**(No) No**
	10.	Assembled Shaft Runout ***Unable to perform due to DE bearing journal out of tolerance***	**Inches**
	11.	Assembled Shaft End Play	**0 inches**

	12.	Air Gap Variation <10%		
●	13.	Lead Condition	**(P) Pass**	P70

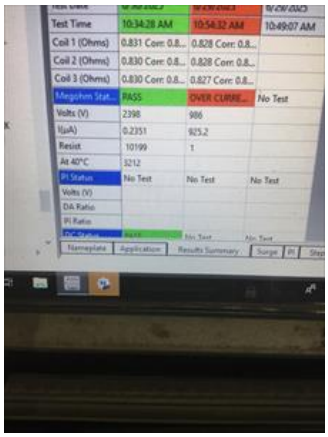
	14.	Lead Length	**21 Inches**	
●	15.	Does it have Lugs?, If so what is the Stud Size?	**(YES) YES**	
	16.	Lead Numbers	**1-3**	
	17.	Are the Leads insulated with Chico or other material	**(NO) NO**	
	18.	Frame Condition	**pass**	
	19.	Fan Condition	**(N) NA**	
	20.	Does motor have internal fan?	**(NO) NO**	
	21.	Heater Quantity, Ratings		

Quantity	Volts/Watts	Pass/Fail

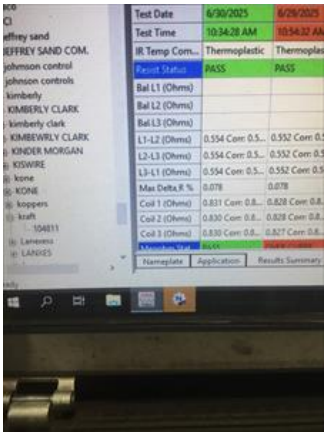
	22.	Broken or Missing Components	**connection box missing**

Initial Electrical Inspection

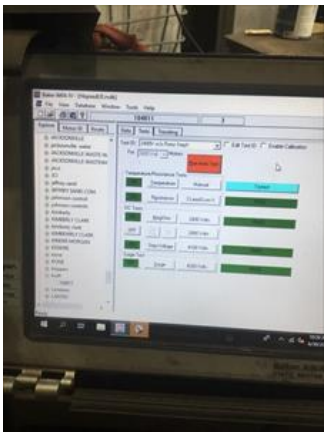
	23.	Insulation Resistance/Megger	**Megohms**	P8

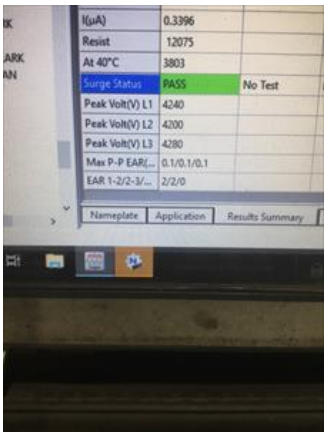


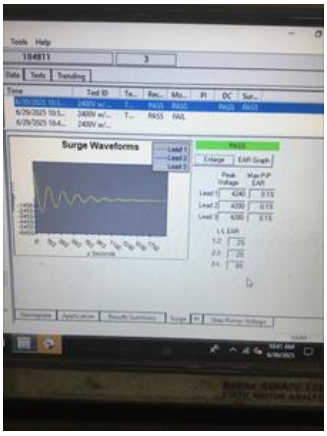
24.	Winding Resistance			P16
	1-2	1-3	2-3	



25.	Perform Surge Test	**(P) Pass**	P59







26.	Number of Stator Slots	**94**
27.	Stator Condition	**pass**
28.	Stator Thermistors/Ohms	
29.	Stator Overloads/Ohms	

Mechanical Inspection

30.	Drive End Bearing Brand	**FAG**
31.	Drive End Bearing Number-	**6319 2Z**

32.	Drive End Bearing Qty.	**1**	
33.	Drive End Bearing Type	**(Ball) Ball Bearing**	P50

34.	Drive End Lubrication Type	**(Grease) Grease Lubricated**	
35.	Drive End Bearing Insulation or Grounding Device?	**none**	
36.	Drive End Wavy Washer/Snap-Ring Other Retention Device?	**none**	
37.	Drive End Bearing Condition	**filled with contaminated grease**	P82

38.	Opposite Drive End Bearing Brand	**FAG**	
39.	Opposite Drive End Bearing Number-	**6319**	
40.	Opposite Drive End Bearing Qty.	**1**	
41.	Opposite Drive End Bearing Type	**(Ball) Ball Bearing**	P108

42.	Opposite Drive End Lubrication Type	**(Grease) Grease Lubricated**	
43.	Opposite Drive End Bearing Insulation or Grounding Device?	**none**	
44.	Opposite Drive End Wavy Washer/Snap-Ring Other Retention Device?	**none**	
45.	Opposite Drive End Bearing Condition	**filled with contaminated grease**	
46.	Drive End Seal		
47.	Opposite Drive End Seal		

Rotor Inspection

48.	Rotor Type/Material	**(Aluminum Bar) Aluminum Barred Rotor**	
49.	Growler Test	**(Pass) Pass**	
50.	Number of Rotor Bars	**118**	
51.	Rotor Condition	**pass**	P40

52.	List the Parts needed for the Repair Below ***2) 63192Z/C3***		
53.	Signature of Technician that Disassembled Motor	**Terrence Holland**	

Mechanical Fits- Rotor

54.	Shaft Runout			**inches**
	Unable to perform due o bad shaft journal.			
55.	Rotor Runout			
	Drive End Bearing Fit	Rotor Body	Opposite Drive End Bearing	
56.	Coupling Fit Closest to Bearing Housing			
	0 Degrees	90 Degrees	120 Degrees	
57.	Coupling Fit Closest to the end of the Shaft			
	0 Degrees	60 Degrees	120 Degrees	
58.	Drive End Bearing Shaft Fit			
	0 Degrees	60 Degrees	120 Degrees	
	3.7393	**3.7394**	**3.7395**	
59.	Drive End Bearing Shaft Fit Condition			**(F) Fail**
60.	Opposite Drive End Bearing Shaft Fit			
	0 Degrees	60 Degrees	120 Degrees	
	3.7402	**3.7403**	**3.7404**	
61.	Opposite Drive End Bearing Shaft Fit Condition			**(P) Pass**
62.	Shaft Air Seal Fits			
	Drive End Air Seal	Opposite Drive End Air Seal		

Mechanical Fits- Bearing Housings

63.	Drive End - Endbell Bearing Fit			
	0 Degrees	60 Degrees	120 Degrees	
	7.8755	**7.8756**	**7.8754**	
64.	Drive End - Endbell Bearing Fit Condition			**(F) Fail**
65.	Opposite Drive End - Endbell Bearing Fit			
	0 Degrees	60 Degrees	120 Degrees	
	7.8755	**7.8755**	**7.8757**	
66.	Opposite Drive End - Endbell Bearing Fit Condition			**(F) Fail**
67.	Bearing Cap Condition			
	Drive End Bearing Cap	Opposite Drive End Bearing Cap		
	pass	**pass**		
68.	End Bell Air Seal Fits			
	Drive End Air Seal	Opposite Drive End Air Seal		
69.	List Machine Work Needed Below			
	Sleeve both end bell housing fits. ***Repair DE shaft bearing journal***			
70.	Technician			**Terrence Holland**

Co-sign: DM

Root Cause of Failure

71. Failure locations

Both bearings filled with water logged contaminated grease.
DE end shaft bearing journal way out of tolerance.
Stator megged low. Placed in oven to re-evaluate.

72. Root cause of failure

Water contamination in stator and bearings.

Dynamic Balance Report

73. Rotor Weight and Balance Grade

Rotor Weight	Balance Grade

74. Initial Balance Readings P11

Drive End	Opposite Drive End
.61	**1.25**

75. Final Balance Readings P27

Drive End	Opposite Drive End
.09	**.50**

76. Technician **Terrence Holland**

Rewind

77. THERMAL DETECTION EQUIPMENT FINAL TESTING - RTD'S/KLIXONS/THERMISTORS

Mechanical Fits- Rotor - Post Repair

78. Shaft Runout Post Repair **inches**

79. Rotor Runout Post Repair

Drive End Bearing Fit	Rotor Body	Opposite Drive End Bearing

80. Coupling Fit Closest to Bearing Housing Post Repair

0 Degrees	90 Degrees	120 Degrees

81. Coupling Fit Closest to the end of the Shaft Post Repair

0 Degrees	60 Degrees	120 Degrees

82. Drive End Bearing Shaft Fit Post Repair P49

0 Degrees	60 Degrees	120 Degrees
3.741	**3.7409**	**3.7409**

83. Opposite Drive End Bearing Shaft Fit Post Repair

0 Degrees	60 Degrees	120 Degrees

84. Shaft Air Seal Fits Post Repair

Drive End Air Seal	Opposite Drive End Air Seal

85. Shaft Repair Sign-off **Gary**

.

Mechanical Fits- Bearing Housings - Post Repair

86. Drive End - Endbell Bearing Fit Post Repair P5

0 Degrees	60 Degrees	120 Degrees
7.8745	**7.8745**	**7.8745**

87. Opposite Drive End - Endbell Bearing Fit Post Repair P19

0 Degrees	60 Degrees	120 Degrees
7.8751	**7.8751**	**7.8751**

88. Bearing Cap Condition Post Repair

Drive End Bearing Cap	Opposite Drive End Bearing Cap

89. End Bell Air Seal Fits Post Repair

Drive End Air Seal	Opposite Drive End Air Seal

90. End Bell Repair Sign-off **Gary**

Assembly

91. QC Check All Parts for Cleanliness Prior to Assembly **Terrence Holland**

See item elow

92. Photograph All Major Components prior to assembly P20

93.	Was a Insulated bearing or end bell tested?	**(P) Pass**	
94.	Final Insulation Resistance Test	**10 Gigohms**	
95.	Assembled Shaft Endplay	**0 inches**	
96.	Assembled Shaft Runout	**0.002 inches**	
97.	Test Run Voltage		P54
	Volts	Volts	Volts

98.	Test Run Amperage		P65
	Amps	Amps	Amps

99.	Motor RPM	**899.4**

100. Drive End Vibration Readings - Inches Per Second

Horizontal	Vertical	Axial
0.03	**0.03**	**0.05**

101. Opposite Drive End Vibration Readings - Inches Per Second

Horizontal	Vertical	Axial
0.03	**0.02**	**0.04**

102. Ambient Temperature - Fahrenheit

103. Drive End Bearing Temps - Fahrenheit

5 Minutes	10 Minutes	15 Minutes

104. Opposite Drive End Bearing Temps - Fahrenheit

5 Minutes	10 Minutes	15 Minutes

105. Stator Temperatures- Fahrenheit

5 Minutes	10 Minutes	15 Minutes

106. Document Final Condition with Pictures after paint **see item below**

107. Final Pics and QC Review **Terrnce Holland** P137

Co sign: DM