

# Motor Shop Repairs

# Job Number 98592

Prepared for Union Pacific-Vine St 10945

1020 N. Vine Street North Liittle Rock AR

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

> FolderID: 98592 FormID: 11352164

# **AC Recondition Repair Report**

Union Pacific-Vine St 10945 1020 N. Vine Street North Liittle Rock, AR

Priorities Found: 4 - High

10 - Good

Thomas Found.		
General		
1.	Job Number	98592
2.	Report Date	8/13/2021
3.	Customer	UNION PACIFIC
Name Plate Information		
4.	Manufacturer	CENTURY



























5.	Model	6-3555152-14
6.	Serial Number	BF3 68296
7.	Horsepower	
8.	KW	
9.	Volts	460
10.	Amps	84.6
11.	RPM	1775
12.	Frame	365T
13.	Enclosure	DP
14.	Cycles	60
15.	Phase	3
16.	Service Factor	1.15
17.	Motor Mount Position	
Initial	Inspection	
18.	Number of Leads	6
19.	Lead Length	
20.	Lead Size	
21.	Lead Condition	
22.	Lead Markings	

23.	Lug Size, Condition, and Type	
24.	Winding RTD's	
25.	Winding Rtd's Condition	
26.	Shaft Run Out	0.001
27.	Does Shaft Turn Freely	
28.	Does Shaft Have Visible Damage	no
29.	Bearing Rtd's	
30.	Bearing Rtd's Condition	
31.	Contamination	
	Yes	





32.	Frame Condition	
33.	Fan Condition	(NA) Not Applicable
34.	Broken or missing components	
Initial	Electric Test	
35.	Resistance to Ground	
36.	Winding Resistance 1-2	
37.	Winding Resistance 2-3	
38.	Winding Resistance 1-3	
39.	Resistive Imbalance	
40.	Hi-Pot	
<b>4</b> 1.	Surge Test	(F) Fail



42. Stator Condition pass

### 43. Failure Location

## **Initial Rotor Inspection**

44. Rotor Type squirrel cage laminate



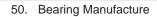




45.	Air Gap <10% Variation	
46.	Number of Rotor Bars	48
47.	Number of Broken Rotor Bars	0
48.	Growler Test	(P) Pass
49.	Rotor Condition	(P) Pass



# **Mechanical Inspection**



NSK

51. Bearing DE Size

6314





52. Bearing DE Type

regular ball bearing





53. DE Bearing Qty.

1

### 54. Bearing ODE Size





55. Bearing ODE Type

regular ball bearing





56.	ODE Bearing Qty.	1
57.	Insulated Bearing	no
58.	Lubrication Type	grease
59.	Grease Condition	(F) Fail





60.	Bearing Retainers	(NA) Not Applicable	
61.	Shaft Grounding Device	(NA) Not Applicable	
62.	DE Seal	(NA) Not Applicable	
63.	DE Seal Type/Size		
64.	ODE Seal	(NA) Not Applicable	
65.	ODE Seal Type/Size		
Root	Root Cause of Failure		
66.	Component Failure	windings	
67.	Cause of Failure		
	Windings shorted		
68.	Comments		
	Rewind stator windings. Re-sleeve D.E &. O.D.E housing fits		
69.	Service Technician	Terrence. Holland	
	900 B		

## **Machine Fit Inspection Report**

70.	Shaft Run Out	(P) Pass
71.	Initial Shaft Run Out	0.001 "
72.	Final Shaft Run Out	п
73.	DE Bearing Shaft Fit	(P) Pass
74.	DE Initial Shaft Bearing Fit Size 1	2.7562 "
75.	DE Initial Shaft Bearing Fit Size 2	2.756 "
76.	DE Initial Shaft Bearing Fit Size 3	2.756 "
77.	DE Finial Shaft Bearing Fit Size 1	
78.	DE Finial Shaft Bearing Fit Size 2	
79.	DE Finial Shaft Bearing Fit Size 3	
80.	ODE Bearing Shaft Fit	(P) Pass
81.	ODE Initial Shaft Bearing Fit Size 1	2.3628 "
82.	ODE Initial Shaft Bearing Fit Size 2	2.3627 "
83.	ODE Initial Shaft Bearing Fit Size 3	2.3627 "
84.	ODE Finial Shaft Bearing Fit Size 1	
85.	ODE Finial Shaft Bearing Fit Size 2	
86.	ODE Finial Shaft Bearing Fit Size 3	
87.	DE Air Seal Shaft Fit	
88.	DE Initial Air Seal Shaft Size	
89.	DE Final Air Seal Shaft Size	
90.	ODE Air Seal Shaft Fit	
91.	ODE Initial Air Seal Shaft Size	
92.	ODE Final Air Seal Shaft Size	
93.	DE Endbell Fit	(F) Fail
94.	DE Initial Endbell Fit Size 1	5.907 "
95.	DE Initial Endbell Fit Size 2	5.9069 "
96.	DE Initial Endbell Fit Size 3	5.907 "
97.	DE Final Endbell Fit Size 1	5.906 "



98. DE Finial Endbell Fit Size 2	5.906 "
99. DE Final Endbell Fit Size 3	5.906 "
100. DE Endbell Fit Insulated	(NA) Not Applicable
101. DE Endbell Air Seal Fit	
102. Initial Endbell Air Seal Fit Size	
103. Finial Endbell Air Seal Fit Size	
● 104. ODE Endbell Fit	(F) Fail

105. ODE Initial Endbell Fit Size 1	4.3321 "
106. ODE Initial Endbell Fit Size 2	4.3318 "
107. ODE Initial Endbell Fit Size 3	4.332 "
108. ODE Final Endbell Fit Size 1	4.331 "



109. ODE Final Endbell Fit Size 2	4.331 "
110. ODE Final Endbell Fit Size 3	4.331 "
111. ODE Endbell Fit Insulated	(NA) Not Applicable
112. ODE Endbell Air Seal Fit	
113. ODE Initial Endbell Seal Fit Size	
114. ODE Finial Endbell Seal Fit Size	
115. Foot Flatness	
■ 116. Foot Condition	(P) Pass
● 117. Flange Condition	(NA) Not Applicable
118. Service Technician	Terrence. Holland

Lener Hollond

## **Balancing Report**

119. Balance Type



- 120. Balance Operating Speed
- 121. Start Left End

122. Start Right End	
123. Balancing Specification	
124. Finish Left End	
125. Finish Right End	
126. Service Technician	
Assembly and Final Test	
127. Meggar Testing Reading	2000 Mohm
128. Surge Test	(P) Pass
129. Hi-Pot	
130. Winding Resistance 1-2	
131. Winding Resistance 2-3	
132. Winding Resistance 1-3	
133. Test Run Voltage Phase A	
134. Test Run Amps A	Amps



135. Test Run Voltage Phase B	
136. Test Run Amps B	
137. Test Run Voltage Phase C	
138. Test Run Amps C	
139. DE Horizontal Vibration Reading	
140. DE Vertical Vibration Reading	
141. DE Axial Vibration Reading	
142. ODE Horizontal Vibration Reading	
143. ODE Vertical Vibration Reading	
144. ODE Axial Vibration Reading	
145. Ambient Temp at start of Test Run	
146. Temp at 5 minutes	
147. Temp at 10 minutes	
148. Temp at 15 minutes	
149. Temp at 20 minutes	
150. Temp at 25 minutes	
151. Temp at 30 minutes	
152. Temp at 35 minutes	
153. Temp at 40 minutes	
154. Temp at 45 minutes	

155.	Temp at 50 minutes	
156.	Temp at 55 minutes	
157.	Temp at 60 minutes	
158.	Motor Paint	(P) Pass



159. Service Technician



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- 1. APPLICABILITY. The sale of any and all goods and/or services by Mock, Inc. d/b/a Hi-Speed Industrial Service ("Hi-Speed") shall be specifically conditioned upon and subject to the following terms and conditions which are incorporated by reference into any contracts and purchase orders with Hi-Speed, and which shall form and become a part of any agreement related thereto. Buyer's acceptance of any offer or quotation made by Hi-Speed for sale of any goods or services is expressly made subject to the terms and conditions set forth herein and to be so effective, Buyer need not sign or approve these Terms and Conditions to be bound hereunder provided a copy of same is provided to Buyer through any means. None of the terms and conditions contained herein may be added to, expanded, changed, modified, superseded or otherwise altered except as revised in writing and duly executed by Hi-Speed, and all orders received by Hi-Speed shall be governed only by the terms and conditions contained herein, notwithstanding any terms, conditions or provisions of any purchase order, release order, authorization or any other form issued by the Buyer. Hi-Speed hereby objects to any additional, modified, changed, deleted, altered or other terms and conditions not contained herein and notifies Buyer that any such terms or provisions are expressly rejected by Hi-Speed.
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- 8. WARRANTIES. Hi-Speed warrants that all goods shall conform in all material aspects to the goods identified in the quotation to Buyer and/or purchase order, and Hi-Speed makes to Buyer the manufacturer's express warranty for any goods sold to Buyer, which is offered by the manufacturer at the time of acceptance of any quotation by Buyer. This warranty is conditioned upon the installation, operation, and maintenance of the goods in accordance with the manufacturer's recommendations and/or standard industry practice and the goods at all times being operated or used under normal operating conditions for which they were designed. Hi-Speed, at its sole option, will repair or

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- 10. <u>SEVERABILITY.</u> The partial or complete invalidity of any provision of these Standard Terms and Conditions shall not affect the enforceability of the remainder of these Standard Terms and Conditions. If any provision is found to be invalid or unenforceable, that portion shall be modified to make it enforceable or shall be stricken and the remainder of these Standard Terms and Conditions shall enforced.
- 11. **GOVERNING LAW AND JURISDICTION.** Any controversy arising out of any quotation, the purchase order, the goods sold or delivered, repair or replacement thereof, or any services provided pursuant to any quotation or any purchase order, or these Standard Terms and Conditions shall be governed by the laws of the state of Tennessee without regard to any choice of law provisions and any cause of action related in any manner thereto shall be brought only in the state or federal courts of Shelby County, Tennessee.
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- 14. <u>NONWAIVER.</u> No course of dealing or failure of either party to strictly enforce any term, right, or condition of these Standard Terms and Conditions will be construed as a waiver of such term, right or condition. Any waiver by Hi-Speed will only be in writing and will waive no succeeding breach of a term, right or condition.
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