

#### **Job Information**

Job #: 94111 Date: April 13, 2018

Priority: — Authorized OT: No Authorized by:

#### **Customer Information**

Name: Rhein chemise Reason:

Contact: Motor#: PO#:

Application: – Special notes:

### **Name Plate Information**

Manufacturer: Louis Allis Enclosure: Open Drop Proof Enclosure Type image

(ODP)

Serial#: COGX Model#: 7352744001

Service Factor: 1.15 Frame: 365U

Horsepower/kW: 50 Rated RPM: 1775

Rated Amps: 122/61 Rated Voltage: 220/440

Phase: 3 Cycles: 60

No

Nameplate DE ODE F1 F2 Top



Special design:







Fax 901-873-5301



# **Mechanical Inspection**

Inspect bolt holes and fasteners. Validate correct fasteners.

Does the shaft turn freely?: Yes Contaminant(s): Grease

Shaft rotation: Bi-directional Contaminant(s) Amt: None

Shaft grounding device No Contaminant Image:

present?:

Type of grounding device:

Shaft runout(TIR-Inbound):

Bearings DE: Worn Bearings DE make: SKF

Insulated: No Bearing DE Size: 6313 2rs/C3 GJN

Bearings ODE: Worn Bearings ODE make: SKF

Bearing Type: Ball Bearing ODE Size: 6313 2rs/C3 GJN

Bearings Retainer: Yes Thermal Protection: Yes

Retainer condition: — Thermal Protection Type: —

Bearing Type Image



Bearing Make Image



Bearing Retainer Image



Thermal Protection



## **Mechanical Inspection (Continued)**

Lubrication Type: Grease Thermal Protection device DE: -

Lubrication brand inbound: Unknown Thermal Protection device ODE: —

Lubrication brand outbound: Unknown

Grease Amt DE: Full Grease Cond. DE: Hard

Grease Amt ODE: Full Grease Cond. ODE: Gritty

Seals DE type: Slinger

Seals DE size:

Seals DE (inbound) condition:

Seals Image 2:

Seals ODE size:

Seals ODE type:

Seals ODE (inbound) condition

Shaft damage cause: None Shaft Image:

Slinger



# **Mechanical Inspection (Continued)**

Brg. Image:



Water jacket: Ok Fan: Ok Frame cond.: Good



Motor Mount Position: Horizontal/Foot mount Endbell type: Single piece

Missing parts? Endbell Image:

☐ J-Box cover ☐ O-rings ☐ J-Box

☐ HH cover ☐ Glands ☐ None

Other missing parts





## **Mechanical Inspection (Continued)**

Air Gap Meaurements (N/A on Single Piece Endbell)

Does Air Gap Meet Customer or EASA spec(<10% variation)?

DE @ 0 ODE @ 0

DE @ 90 ODE @ 90

DE @ 180 ODE @ 180

DE @ 270 ODE @ 270

## **AC Electrical Inspection**

Number of leads: 9 Terminal Markings:

Length of leads: 6" REF: NEMA Stds. MG 1-2009, Rev. 1-2010, 2.41-Terminal

Markings Identified By Color:

Size of leads: 1-Blue 5-Black P1-No color assigned

2-White 6-No color assigned P2-Brown

3-Orange 7-No color assigned
4-Yellow 8-Red

Lead condition: Good 4-Yellow 8-Red

Connections As Received: Lug type:

Lug Condition: — Terminal Lugs

Lug size:

Lug Attachment: —





# **AC Electrical Inspection (Continued)**

Rotor Type: Cast Aluminum

Rotor Condition: Ok

Num rotor bars:

Num broken bars:

Rotor



#### **Rotor Test Results**

Visual: Pass Growler: Pass Single phase: Pass

Stator type: Factory If other, stator type:

Stator condition: Ok If other, stator condition:

Failure location: In slot If other, stator failure:

Stator Image: Failure Image:







## **AC Electrical Inspection (Continued)**

Winding color: Like new Winding image Winding Thermal Protection: Yes

Winding condition: Solid

Winding Thermal Protection DE:

Winding Thermal Protection ODE:

Stator test results: Salvageable

Megs incoming: Good Surge incoming: Good Hi-pot incoming: Good

**Winding Resistance Incoming** 

Phases A to B Phases B to C Phases C to A Resistive imbalance

Incoming 0.135 0.135 0.135 0.2

Leads/jumpers: Ok Lead jumper Image:

If other, leads/jumpers:





### Conclusion

**Component Failure** 

#### **Cause of Failure**

Housing fits/contamination.

#### Comments

Both end bell housing fits were worn causing excessive bearing play. Also the motor had a excessive amount of grease contamination inside the stator windings. Motor tested bad initially, but after washing and baking the stator, the readings cleared up. Recommend re sleeve on both housing fits.

Service Tech name: Terrence Holland

Service Tech signature: