

## Servo Motor Troubleshooting Inspection Report

Technician		Cell#	
Serial Number		Date	
Model			
<b>Servo Motor Type and size</b>			
Type		Size	
Servo Motor Axis	Axis	Non Axis Servo Motor	
<b>Why is the Servo Motor being replaced?</b>			
1a. What alarms are generated?		1b. Does the alarm reset?	Yes No
1c. When does the alarm occur?		1d. Have you submitted a video of the original issue to service?	Yes No
1e. Have you submitted an error report?		Yes No	
2. Is the Motor physically damaged?		Yes No	
3. Other - Describe the issue:			
<b>Mandatory Troubleshooting</b>			
4a. What is the incoming voltage to the machine? Measure the incoming voltage at the main circuit breaker and record the measured values below.			
<i>L1-L2</i>	<i>L2-L3</i>	<i>L1-L3</i>	<i>L1-GND</i>
<i>L2-GND</i>	<i>L3-GND</i>		
4b. What is the main transformer tap setting.			
5a. What was the measured DC BUSS output voltage?			
5b. Does the DC Buss gauge in diagnostic match the actual measured DC BUSS voltages?			
6. Power OFF. Wait for the Vector Drive to fully discharge. Disconnect all the cables from the Motor. With a Multimeter set to Ohms measure and fill out the readings below (for chassis point, use one of the screw heads from the power connector):			
<i>A-Phase pin to GND (Chassis)</i>	<i>B-Phase pin to GND (Chassis)</i>	<i>C-Phase pin to GND (Chassis)</i>	
7. For servo motors used for Spindle applications. Did you check Y/D wiring? Is this correct?			
			Yes No
8. Are there shorts on the Servo Amplifier that drives this motor? Does the cable have continuity			
			Yes No
9. Did you inspect the axis servo amp command cable to make sure that the pins and connectors are in good condition?			
			Yes No
10. Are there shorts on the power cable between chassis and phase to Phase? Does the cable have continuity?			
			Yes No
11. Are there shorts present between the Vector Drive to chassis?			
			Yes No
12. What Axis is this servo motor used ?			
13. Is there a ferrite filter installed on all the encoder cable at the Maincon end for the axis being troubleshot?			
			Yes No
14. Are there ferrite filters installed on all the output cables from the servo amps?			
			Yes No
15. Are there ferrite filters installed on the output cables of the drive and REGEN cable?			
			Yes No
16. For servo motors equipped with Brake, did you measure the 24Vdc at the I/O PCB?			
			Yes No
17. Did you inspect the Motors encoder connector at the Maincon and Motor end?			
			Yes No
18. Did you inspect the Motors Encoder cable for broken or pinched insulation? Does the cable have continuity?			
			Yes No
19. Are there any encoder pins pushed into the motors body?			
			Yes No
20. When rotated by hand, does the motor shaft rotate smoothly? (applies only for non-brake motors)			
			Yes No
21. Is there humming present?			
			Yes No
22. For axis humming have you reviewed the axis humming troubleshooting guide? Have you reviewed the ballscrew troubleshooting guide			
		Yes No	Yes No
23. Did you download and install the latest configuration files for the machine?			
			Yes No
24. Was the troubleshooting information in the Haas Service Page useful and complete?			
			Yes No
<b>Notes/ Observations:</b>			

Attach this report, an error report, and any relevant documentation to a service notification in the Haas Service App.