

Figure 1

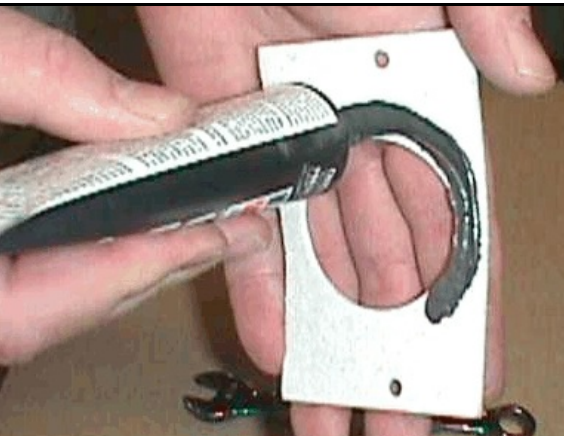


Figure 2



Figure 3

OVERVIEW

With one season of field service experience three service items have been noteworthy and should be completed during the next unit service.

Feed System Gasket and Attachment Nuts: Feed system attachment in past EF units had been accomplished with wing nuts. We have noted that the nuts tightened by hand may not be sufficient to properly secure the feed drive. If the drive become loose the feed gasket may fail and allow saw dust to fall into the cabinet. To correct this we have available 10-24 washer locking nuts to replace the wing nuts. Replacement of the feed gasket should include gluing the gasket to the bottom of the feed hopper using silicone sealant.

- 1) Remove the units rear panels to gain access to the feed drive. Empty the hopper of fuel. Loosen and remove the wing nuts. Lower the feed drive from the hopper (**Figure 1**). Remove old gasket.
- 2) Apply automotive type silicone gasket material around feed drive hole (**Figure 2**).
- 3) Press silicone applied gasket side to bottom of hopper (**Figure 3**).
- 4) Carefully install feed drive so as to not damage gasket. Install new lock nuts and tighten with 3/8 wrench (**Figure 4**).

Note: silicone gasket material should squeeze out from edges both inside hopper and out. Remove excess silicone.

**** Prior to re-installing back panels complete the following services ****

Sensor and Switch Harness Connections: These digital components connect to the main circuit board through the main wiring harness. The connections utilize industry standard pin and sockets.

Operating at low DC voltage these connections are subject to vibration, dust, and moisture. To minimize the loss of contact these three connections should be coated with a small amount of



Figure 4



Figure 5

“Silicone Di-Electric Compound”. This non-hardening silicone will keep moisture and dust from effecting the connection along with minimizing vibration. Available at auto parts and electronic stores a small tube will service many units.

- 1) Carefully pull the harness connection end connector from each of the two sensors and switch board (**Figure 5**).
- 2) Apply a small amount of di-electric lube to the bottom of the connector allowing the lube to push into each pin opening.
- 3) Apply a small amount to pin area on receiver and plug harness back into original connection.

Checking Harness for Proper Slack: During unit assembly the harness is routed through the cabinet and bundled to keep wiring away from hot surfaces. The bundles may cause the harness connections to be pulled during servicing and allow for a poor connection. Check the harness and confirm there is at least ½" play when moving the bundle or harness up (**Figure 6**).

- 1) Check all harness connections to make certain there is adequate slack. If additional slack is needed carefully pull additional wire from bundles.

Cleaning Cabinet and Re-assembly: Vacuum or sweep saw dust from cabinet prior to assembly of the rear access panels. Dust in the heat exchange area can cause smells during operation.

NOTE: CHECK FAN BLADE AFTER ASSEMBLING REAR PANEL TO CONFIRM NO INTERFERENCE FROM FAN SHROUD.

Upon completion carefully reinstall upper rear panel and confirm the fan blade is not hitting the fan shroud prior to powering up unit (**Figure 8**).

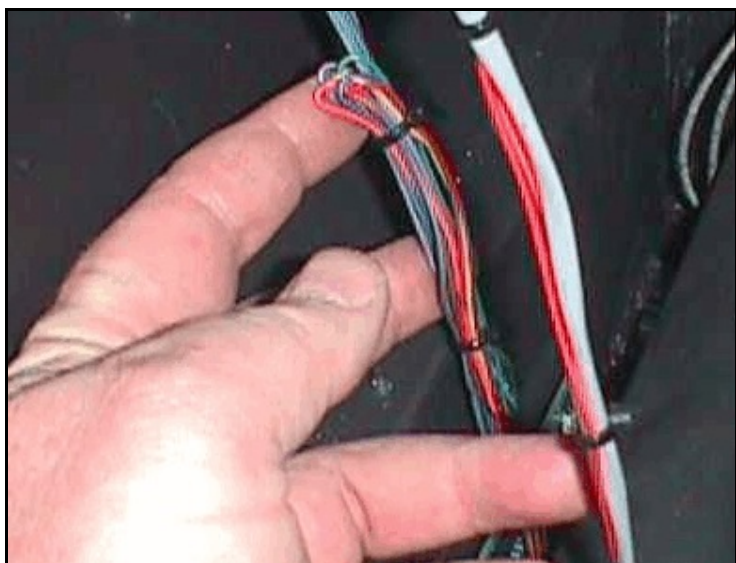


Figure 6



Figure 7

After completing the installation of the rear panel and tightening all the phillips screws. Plug the heater back into AC power and test run by running fan motor on “Fan” setting for 2 minutes and then running on “Clean” for 30 seconds. Run unit through a beginning start up by pressing “Low” and allowing fan and ignitor to start up. If all appears to activate reinstall unit.

Additional information is available on line@
www.sierraproductsinc.net/pages/customer_service

Technical Customer Service - 909-399-3355x14