## Dean Flatbottom Retrofit Kit, 826-2006

This kit provides a number of enhancements for the Dean flatbottom fryer:

- Extensions for the blower, pump motor and heater tape wiring harnesses, which move those wires away from the heat of the blower housing.
- A new lever, micro switch, mounting bracket and wiring harness for the drain flush, which allow the door of the fryer to be closed while the drain is activated.
- A probe retainer and spring, which ensure the temperature probe is properly positioned in the frypot.
- A new coupling for the filter pan return hose, which allows the hose to drain completely and prevents contact with the blower housing.
- A new filter pan lid and filter leaf extension nipple; the new lid is embossed to allow freer movement of the drain hose's quick-disconnect. The lid's oil entry points have also been redesigned to prevent spillage. A redesigned quick-disconnect, which fits the hand better, is also included.
- A sticker for mounting outside the door with the Frymaster Call Center number.

**NOTE:** Supplemental tools needed to install this kit:

- Drill (if cordless, two charged batteries)
- Pin pusher (provided in kit)

| In Kit 826-2006 |          |                                  |
|-----------------|----------|----------------------------------|
| Part #          | Quantity | Description                      |
| 819-6008        | 1        | Instructions                     |
| 802-2208        | 1        | Label                            |
| 106-3658        | 1        | Pump harness extension           |
| 106-3254        | 3        | Harness extension                |
| 823-4553        | 1        | Lid                              |
| 106-3660        | 1        | Suction line plumbing            |
| 106-3683        | 1        | Right flush valve drain assembly |
| 106-3661        | 1        | Left flush valve drain assembly  |
| 813-0867        | 1        | Filter leaf nipple               |
| 823-4547        | 1        | Handle                           |
| 809-0810        | 20       | Wire clamp                       |
| 809-0361        | 20       | #8 drill-tip 1/2 screws          |
| 807-1948        | 8        | Tie wraps                        |
| 210-1433        | 4        | Probe clamp                      |
| 809-0107        | 10       | Screw, 8x32 3/8                  |
| 810-2758        | 1        | Quick-disconnect                 |
| 807-0268        | 9        | Terminal bombtail                |
| 200-6135        | 1        | Drain flush bracket              |
| 807-3593        | 1        | Power cord                       |
| 807-0157        | 1        | 6-pin male connector             |
| 807-0158        | 1        | 6-pin female connector           |
| 807-1062        | 1        | 3-pin male connector             |
| 807-2360        | 1        | 3-pin female connector           |
| 823-4548        | 4        | Probe retainer                   |
| 200-4725        | 4        | Probe guard                      |
| 810-2164        | 4        | Spring                           |
| 806-4855        | 1        | Pin Pusher                       |



**Figure 1**: Removing a one-piece back requires disconnecting the oil return lines at the arrows. The gas manifold should also be removed.

## Follow these instructions to install Kit 826-2006:

- 1. Remove filter pan.
- 2. Remove power from the unit and allow it to cool.
- 3. Pull the fryer from under the hood.
- 4. Remove gas manifold.
- 5. Remove all back panels behind the filter system. Remove lower panels on all other units. Earlier fryers have one-piece backs. On these, some oil return lines will have to be disconnected to remove the back. **See figure 1**. Remove tab on back of fryer prior to removing the back to protect the heater tape on the oil-return line.
- 6. Remove blowers over the filter by removing four screws, which secure them to the back of the fryer. **See figure 2.**
- 7. Inspect therouting of all wiring for the blower, pump motor and heater

tape. Units made since early November have new routings, however, they will require additional P-clamps and the longer harness extensions. **See figure 3.** 

- 8. On units which require wire rerouting, inspect all wiring harnesses for damage from contact with the blower housing. Repair damaged harnesses with splices and bombtails.
- 9. Disconnect the three-pin pump motor harness from the control box (left side as viewed from the back of the fryer). Route the pump motor harness between the frypots, securing it with a P-clamp where it exits the bridge. Place the three-pin plug on the extension, ensuring the color-coded wiring matches the existing plug, and route the harness along the back of the cabinet. Attach it with P-clamps to ensure it cannot come in contact with the blower housing. A complete rerouting of the wires is show below in **figure 6**.
- 10. Use P-clamps to secure the external power cord that enters control box at the left. Ensure it aligns with notches in the fryer back. See figure 4.



**Figure 2:** The screws, which secure the blower and flue assembly to the back of the fryer, are marked with arrows.



**Figure 3**: The routing for a blower harness on a new unit is shown. Units with less than two P-clamps should have an additional clamp added and the longer extension added.



**Figure 4:** Wires are shown secured with a wire tie on the left side of the fryer (viewed from rear), keeping the harnesses away from the blower housing.

11. Secure the heater tape harness that exits from the left control box to the cabinet floor, ensuring it cannot come in contact with the blower housing. See figure 5. On some older units this cord may be shorter and cross atop an interior gas line, which puts it too near the blower housing. In these instances and if any damage is visible on the wire, cut the wire a few inches removed from the control box and above the damaged area. Use bombtails to connect the provided power cord. Route this longer harness to the outlet box at the rear of the cabinet, securing it with P-clamps to ensure it can't contact the blower housing. See figure 6.



**Figure 5**: P-clamps should be installed near the control box, which ensures the heat tape wiring is held away from the blower housing.



**Figure 6:** A complete rerouting of the wire harnesses is shown with the blowers in place. The heater tape harness was extended. Extension harnesses were added to the blower harness on the left and to the pump harness. All harnesses are clamped down, keeping them clear of the blower housing.

- 12. Remove the clip holding the drain-flush lever to the drain-flush valve actuator. Remove the actuator and its bracket
- 13. Position the new micro-switch equipped bracket on the valve and loosely tighten.
  See figure 7. Some will have the valve stem mounted opposite of the one shown in figure 7. Brackets and microswitchs are provided in the kit for mounting on either side. See figures 8, 9.
- 14. Move to the front of the fryer and disconnect the wiring to the micro switch on the drain flush handle-mounting bracket and remove the bracket and actuator rod. Remove and retain the blue handle covering on the actuator rod.



**Figure 7:** The new micro-switch equipped bracket is shown attached to a drain-flush valve with a left side stem.

- 15. Place the new bracket on the new drain-flush actuator rod and bolt into place. Place the blue handle covering on the new rod.
- 16. Attach the rod to the valve actuator. Tighten the bracket. See figure 10.



**Figure 8:** Flush valve actuators and microswitches are shown for left and right-hand mounting. The parts are not interchangeable. The flush handle should be pulled forward to open the drain and activate the pump.

- 17. Pull the lever, ensuring the micro-switch engages and the handle doesn't protrude beyond the plane of the fryer door when fully extended. Bend the handle, if necessary, to clear the drain nut.
- 18. Connect the extension to the micro-switch harness and route to the new micro switch. Attach the harness to the rear of the bridge with a P-clamp.



**Figure 9:** The stops on the flush-handle actuators are opposite. The handles are not interchangeable. The left-side handle is shown on the left above.



**Figure 10:** The new bracket for the drain-flush is shown bolted into place. The blue handle is retained from the original drain-flush rod.

- 19. Remove the existing swivel and nipples from the input port of the filter pump.
- 20. Position the new elbow and nipple. The nipple must face straight forward, which forces the oil return hose to curve away from the blower when the filter pan is placed in the fryer cabinet. See figure 11.
- 21. Secure all harnesses and related wires against the left interior cabinet wall with wire ties, ensuring they cannot contact the blower housing or flue.
- 22. Replace the left-side (rear view) blower. Route the blower harness away from the housing, securing with wire ties. See figure 4.
- 23. Replace the right side blower. Route the blower harness forward and under the blower motor. Add the extension and route the harness to the rear of the cabinet, securing it in two places with P-clamps at it is routed to the control box. Ensure it is not touching the blower housing. See figure 6.
- 24. Use P-clips to secure the external power cord entering the control box, ensuring it is routed away from the blower housing.

- 25. Remove the lid from the filter pan and discard.
- 26. Remove the existing vertical stem from the filter leaf and replace with the new stem.
- 27. Position the new filter pan lid.
- 28. Replace the quick-disconnect on the oil return line. See figure 12. Slide the pan into position and ensure the quick-disconnect snaps readily onto the new stem and slides under the bridge without contact between the filter hose quick-disconnect and the bottom of the bridge.
- 29. Replace the backs on the fryers, reconnecting oil return lines and replace gas manifolds.
- 30. Return the fryer to the hood and reconnect to power.
- 31. Start the fryer and allow the oil to reach approximately 200°F. Turn the fryer off.
- 32. Drain the frypots, one at a time into the filter pan. With the drain open and the frypot empty, ensure the drain valve is not partially blocked by a drain manifold. See figure 13. Adjust the placement of the drain manifold, if necessary, to clear the valve.
- 33. With the frypot still empty, remove the probe guard and discard. Inspect for probe brackets, which secure the hi-limit and temperature probe in place. Newer units will have a bracket attached to a stud in the frypot. See figure 14.



**Figure 11:** The new, shorter oil return nipple and elbow are shown in place. The nipple must face straight forward, ensuring the filter hose curves away from the blower housing when the filter pan is in place under the fryer.

- 34. Remove the yoke holding the temperature probe in place and position the spring provided on the probe. **See figure 15.** Replace the yoke.
- 35. Older units will require the placement of the provided bracket and the spring. Install where needed by slipping it onto the existing studs. The hi-limit rests behind the bracket and the temperature probe is angled down at the proper angle. **See figures 15 and 16**.
- 36. Attach the provided probe guard. See figure 17.
- 37. Pump the oil back to the frypot.
- 38. Place the provided Frymaster Call Center sticker on the exterior of the left cabinet door over the filter system of the left-hand cabinet door of a non-filter system. See figure 18.



Figure 12: The new quickdisconnect is cut away to allow easier handling and to take advantage of the emboss in the filter pan lid.



**Figure 13:** Inspect for manifold plumbing blocking a drain valve by shining a flashlight down the drain. The manifold plumbing rests on Orings and can be pulled from the valve. 819-6008 12/03



Figure 14: The hi-limit and temperature probe are attached with a bracket to a stud in newer frypots.



**Figure 15**: Position the provided spring over the temperature probe shaft as shown above.



**Figure 16:** On units without a probe bracket, position the provided bracket on the frypot studs and secure the temperature probe as shown. The hi-limit can rest behind the bracket.



**Figure 17:** A new probe guard is provided and should be installed over the factory-installed probe bracket or the stud-mounted bracket.



Figure 18: Place the service phone number sticker as shown for filter system units.

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