

# AUTOFRY OFS Oil Filtration System Operator's Manual



# **AUTOFRY A Patented Product of**

Motion Technology, Inc. 10 Forbes Road Northborough, MA. 01532

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#### Motion Technology, Inc. Limited Warranty

#### **Nature of Warranty**

This equipment is warranted to be free of manufacturing defects in workmanship and materials of construction for one (1) full year beginning from the date of original retail purchase and subject to the limitations set forth below. The controls package consisting of the main circuit board and keypad are warranted for three (3) years (parts only, excludes labor). Any part found to be defective during the warranty period will be replaced with new or rebuilt replacement parts free of charge by Motion Technology, Inc. (MTI). Shipping charges are the responsibility of the purchaser. Service labor is included for a period of one (1) full year beginning from the date of original retail purchase when performed by an authorized MTI service company or designated agent based on straight time rates for work performed during normal working hours. This labor coverage is limited to a fifty (50) mile radius (each way) and/or 1-hour travel time to a customer's location. Any and all other service travel charges will be the responsibility of the customer.

#### **Scope of Warranty**

This warranty is extended to the original purchaser for products purchased and retained in the 50 states of the U.S.A. and District of Columbia. This warranty shall not be effective unless the equipment was purchased from a dealer or other person authorized by MTI to sell its equipment and it is not transferable.

#### **Exclusions from Coverage**

This warranty does not cover any damage to the equipment resulting from accident, misuse, abuse or negligence, failure to follow operating, cleaning and periodic maintenance instructions, mishandling, alteration, failure to install in strict conformity with local fire and building codes and regulations, ordinary wear and tear resulting from use, failure to change filters using only manufacturers' supplied at the recommended intervals, or if the installation does not comply with set-up and installation instructions or any other circumstance beyond the control of MTI.

The equipment shall not have been previously altered, repaired or serviced by anyone other than a service facility authorized by MTI to render such service.

#### **How to Obtain Service**

Notification of a defect in the material or workmanship of the equipment shall be to the MTI Factory Service Department at the number shown below or the dealer from whom you purchased the equipment. We want you to be a satisfied customer. If a problem does come up that cannot be resolved to your satisfaction, please let us know. Write to Service Manager, Motion Technology, Inc., 10 Forbes Road, Northborough, MA 01532. Please be sure to include the model number, serial number and the date of original purchase.

## Exclusion of Incidental or Consequential Damage

Repair or replacement under this warranty is the purchaser's sole and exclusive remedy. Neither MTI nor the dealer from whom you are purchasing this equipment will be responsible for any and all incidental or consequential damages resulting from the use of the equipment or from a breach of any expressed or implied warranty on this equipment. These warranties are in lieu of all other warranties, expressed or implied, including, but not limited to the implied warranties of merchantability or fitness for a particular purpose.

#### **Legal rights of Warranty**

Retain this warranty. It gives the purchaser specific legal rights. The purchaser may also have other rights which vary from state to state. MTI suggests that the dealer's dated bill of sale be retained as evidence of the date of purchase. Some states do not allow the exclusion or limitations on how long an implied warranty lasts, so the above limitations or exclusions may not apply to all purchasers.

Technical Service / Support: (800) 348-2976 x. 112.

#### **General Notes:**

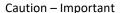
These operating instructions contain important information about the handling of the OFS oil filtration system. Read this information carefully before using. Keep this manual available for more information. The OFS is an oil filtration system designed for the cleaning of frying oil. Frying will contaminate the oil with burned particles. With the OFS, the oil can be filtered underneath the AutoFry and then pumped back into the oil vat. Filtering with the OFS prolongs the lifetime of the oil. We recommend filtering once or twice per day. The OFS carbon pad filter should be changed after every use or every other use, depending on the pollution of the oil. Used carbon pads should be disposed according to local regulations.



#### Safety Symbols:









Risk of Electric Shock



Danger of Slipping



Danger of Burning





Caution - Hot



Operation Instruction

#### Designated Use:

- The OFS is designed for use in the AutoFry MTI-40E in commercial kitchens.
- Follow safety instructions! Filtration is only possible if the oil is liquid.
- The OFS should only be used by suitably trained staff.



#### Non-Designated Use:



- The nonobservance of the contents described in this manual can lead to damage or malfunction of the OFS. 🔨
- The OFS is NOT approved for cleaning / filtering of liquids other than frying oil.
- Do NOT use or store the OFS outside. It will be damaged by rain or humidity.



- Do NOT touch the power cord with wet hands!
- Do NOT jam or bend the power cord. (A)
- Do NOT turn the AutoFry on while filtering! 🛕 🔼
- The pump / motor assembly is not to be cleaned with jet water or steam. A
- No water should come in contact with the frying oil.
- Do NOT run the pump dry as it will cause rapid wear of the gears and bearings, reduced pump performance and shortened pump life.  $\triangle$

#### Important Information:



MTI-40E's with OFS systems are tested with oil prior to leaving the factory. There may be oil present in the lines.







#### **CAUTION:**

Always wear protective clothing and eyewear when working with hot oil. There is a risk of burns from hot oil.

#### IMPORTANT!



This oil filtration system is not intended for use with solid oil.



#### **CAUTION:**

Ensure that the AutoFry is turned **OFF** prior to filtering or draining the oil vat(s).



There is a risk of fire due to a low or no oil condition.



**NEVER** operate the filtration system without oil.



**NEVER** use the filtration system to pump water. Water will damage the pump assembly enough to require a replacement.



#### **IMPORTANT**

Ensure the OFS Vat is empty prior to draining the oil to avoid potential overflow! Closely monitor your progress / oil level when filtering or replenishing your oil.

Filter the oil as often as needed to maintain a quality food product.

Change the oil as often as needed to maintain a quality food product.

Older oil has a reduced flash point.





Older oil is prone to surge boiling. 🔔





#### **OFS Breakdown:**

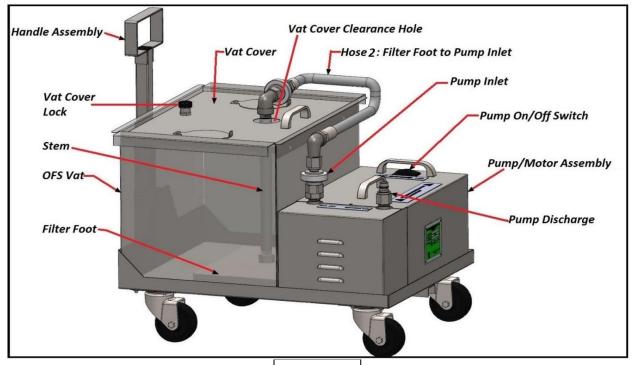


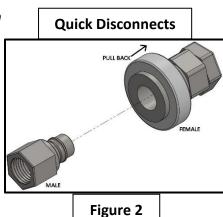
Figure 1

Figure 1 shows the OFS fully assembled. To disassemble follow these steps.

- Disconnect the hose 2 from the top of the filter foot stem by pulling back on the white (round) female quick disconnect. Figure 2.
   When reconnecting, pull back on the female quick disconnect and be sure the male end is firmly seated
- 2. Turn the *vat cover lock* and lift to remove the *vat cover*. You will need to maneuver the *stem* through the *vat cover clearance hole*.

before releasing. The two should lock together.

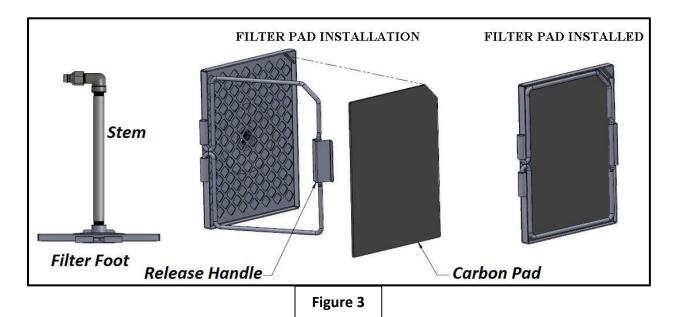
3. Lift the stem and filter foot out of the OFS vat.



#### Changing the Carbon Pad Filter:

Once the stem and filter foot have been removed from the OFS vat;

- 1. Turn the release handle on the filter foot to open and remove the carbon pad filter. Figure 3.
- 2. Install a new carbon pad by aligning the notch of the filter with notch on the filter foot.
- 3. Close the release handle.
- 4. Reverse the steps on page 5 to reinstall the filter foot and stem back into the OFS vat.



The Carbon pad filter should be replaced after each filtration or as needed.



To reorder carbon pad filters: Call 1-800-348-2976 x.154

Or order online at:

www.autofrywebstore.com

P.N. 48-0035 – 30 piece case of carbon pad filters.

#### **Valve Information:**

Pull down the front panel below the main AutoFry door to access the OFS replenishment valve and the OFS System ON / OFF switch. Figure 4.

#### Replenishment Valve:

This valve determines whether oil is replenished to the left or right AutoFry oil vat.

# THIS VALVE MUST BE RETURNED TO OFF AFTER REPLENISHING OIL!



Figure 5.



Figure 4

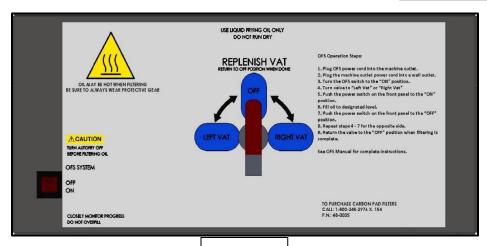


Figure 5

Open the lower AutoFry doors to access the drain valves. Figure 6.

#### Drain Valves: 🐃

These valves are used to drain the oil from the AutoFry oil vats. Turn valve handle down to open.

Figure 6 shows the drain valves in the closed position.

# THESE VALVES MUST REMAIN CLOSED ANYTIME OTHER THAN DRAINING!



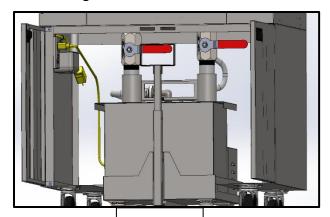
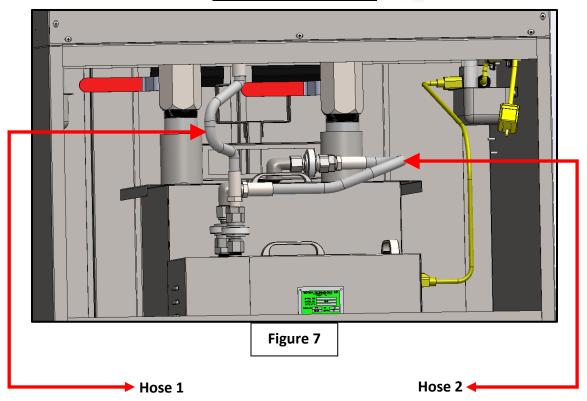


Figure 6

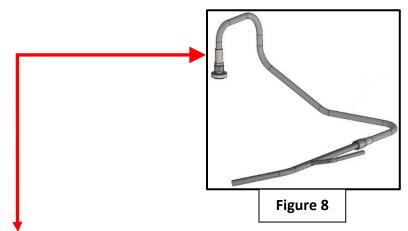
#### **Hose Connections:**



**Hose 1** – Connected to the bottom of the AutoFry and connects to the pump discharge fitting. This hose will remain attached to the AutoFry when removing the OFS.

**Hose 2** – Connects the filter foot stem to the pump inlet fitting.

Disconnect this hose from the stem when changing the carbon pad filter.



**Discharge Wand Assembly** – Connects to the pump discharge fitting when disposing of old oil. Can also be used to manually pump oil into the AutoFry through the front door. This allows you to pump oil throughout the AutoFry vat to flush out built up sediment in the AutoFry vat. Should be stored in a safe place when not in use.

#### Preparing the OFS System: "



- 1. Completely clean the OFS before its first use to remove any oil or debris from the factory. Use warm soapy water followed by a clear water rinse. Thoroughly dry all parts.
- 2. Ensure that there is a carbon pad filter installed in the filter foot. Figure 3.

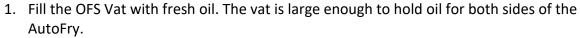


3. Ensure that the OFS Vat is empty; otherwise there will be a risk of overflow.



- 4. Ensure the hose from the filter foot to the pump inlet is firmly connected on both ends.
- 5. Ensure the hose from the AutoFry to the pump discharge is firmly connected.
- 6. Ensure that the power cord from the OFS to the machine outlet is firmly seated on both ends and the pump on / off switch is in the ON position.
- 7. Ensure that the ON / OFF Switch behind the valve access door is in the OFF position.
- 8. Ensure that the power cord from the machine outlet is plugged into a 110AC Grounded wall outlet.
- 9. Ensure the splash guards are inserted into the cutouts on the vat cover.

#### Filling the AutoFry with Fresh Oil:





#### BE SURE THE AUTOFRY IS TURNED OFF UNTIL IT IS FILLED WITH OIL!

- 2. Be sure both AutoFry oil vats are clean and empty.
- 3. Ensure both drain valves are closed. 🛕 🛦





- 4. Turn the main valve to "Left Vat" or "Right Vat" (whichever you want filled first).
- 5. Flip the ON / OFF switch to the left of the valve to the ON position to begin pumping.
- 6. When the lower (cold) fill line is reached, flip the ON / OFF switch to the OFF position.
- 7. Turn the valve to the opposite side vat.
- 8. Flip the ON / OFF switch to the ON position to begin pumping.
- 9. When the lower (cold) fill line is reached, flip the ON / OFF switch to the off position.
- 10. Return the valve to the "OFF" position.



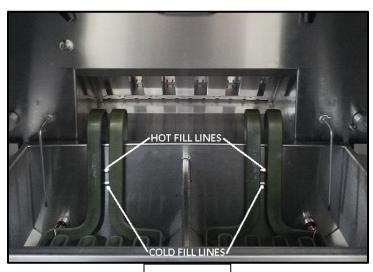


Figure 9

#### Filtering Oil in the AutoFry:







#### \*\*BE SURE TO ALWAYS WEAR PROTECTIVE GEAR\*\*

1. Make sure the OFS Vat is clean and empty to avoid overflow.





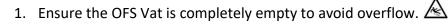
#### BE SURE THE AUTOFRY IS TURNED OFF UNTIL IT IS FILLED WITH OIL!

- 2. Ensure the splash guards are inserted into the cutouts in the vat cover to avoid leaking.
- 3. Slowly open the drain valves and let the oil completely drain into the OFS Vat.



- 4. Close the drain valves. 🔔
- 5. Turn the main valve to "Left Vat" or "Right Vat" (whichever you want filled first).
- 6. Flip the ON / OFF switch to the left of the valve to the ON position to begin pumping.
- 7. When the upper (hot) fill line is reached, flip the ON / OFF switch to the OFF position.
- 8. Turn the valve to the opposite side vat.
- 9. Flip the ON / OFF switch to the ON position to begin pumping.
- 10. When the upper (hot) fill line is reached, flip the ON / OFF switch to the off position.
- 11. Return the valve to the "OFF" position.

#### Disposal of Old Oil:

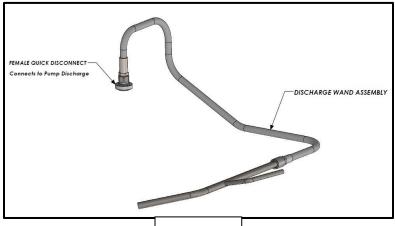






#### BE SURE THE AUTOFRY IS TURNED OFF UNTIL IT IS FILLED WITH OIL!

- 2. Unplug the OFS from the machine outlet.
- 3. Ensure the splash guards are inserted in the cutouts of the vat cover to avoid leaking.
- 4. Slowly open the drain valves and let the oil completely drain into the OFS Vat.
- 5. Close the drain valves. 1
- 6. Carefully lift the splash guards up and start to remove the OFS from underneath the AutoFry.
- 7. Disconnect the hose to the pump discharge fitting. This hose will remain attached to the AutoFry.
- 8. Completely remove the OFS and turn the pump ON /OFF switch to the OFF position.
- 9. If the disposal requires transportation to a remote location, use extreme caution to avoid spilling.
- 10. Firmly connect the discharge wand to the pump discharge fitting.



- Figure 10
- 11. With the pump switch in the OFF position, plug the power cord into a 110AC Grounded outlet.
- 12. Hold the discharge wand into a suitable container with enough free space to hold the volume of oil to be disposed of.
- 13. Move the pump ON / OFF switch to the ON position and allow all of the oil to pump from the oil tank.
- 14. Flip the pump ON / OFF switch to the OFF position.

#### Cleaning & Maintenance:

The OFS should be cleaned during every carbon pad change.



The OFS should only be cleaned when cool. DO NOT clean when hot. 🚾 俎





**NEVER** soak or spray the pump / motor assembly with liquid or damage to the pump / motor will result. 1

Spray cleaner on a rag and wipe the outside of the pump / motor housing while it is unplugged.

#### The following should be completely cleaned:



- OFS Vat
- 2. Vat Cover
- 3. Filter Foot
- 4. Stem
- 5. Outside of the pump / motor assembly
- 6. Quick Disconnect Fittings



Figure 11

All parts should be cleaned with warm soapy water followed by a clear water rinse.

Thoroughly dry all parts.

Install a new carbon pad filter. See page 5.

Reassemble and install OFS underneath AutoFry.

#### Waste Disposal:

Packaging Disposal: The packaging should either be recycled or kept carefully. **Filter Disposal:** Used filters must be disposed of in the country specific way.

Device Disposal: If the OFS reaches its end of life, it must be disposed of accordingly.

Motion Technology, Inc. supports the European Parliament Directive 2002/96/EC for recycling of waste electrical and electronic equipment (WEEE).

When your AUTOFRY has reached the end of its life DO NOT DISPOSE OF IT IN THE MUNICIPAL WASTE. Most of the materials used in its construction can be recycled. Return to your distributor for preparation and recycling.

Problem Pump won't power on	Probable Cause Solution - Check / replace cord and/or o	Solution Check / replace cord and/or outlet.	Notes Number one cause of a pump not
	- Poor/loose connection to AutoFry outlet Pump switch has failed AutoFry outlet has failed OFS switch has failed Pump outlet has failed Pump motor has failed.	- Try plugging the pump directly into the wall outlet and check for power Plug AutoFry outlet into wall and check for voltage at AutoFry outlet when OFS switch is held in.	powering on is a burnt-out motor as a result of the pump being clogged.
Oil flow slow and/or inconsistent	<ul> <li>Oil too cold.</li> <li>Clogged carbon filter pad.</li> <li>Clogged filter foot.</li> <li>Dirty/loose quick disconnect fittings.</li> <li>Clogged hose.</li> </ul>	<ul> <li>Filter oil above 200°F but lower than 300°F.</li> <li>Always use a new carbon filter pad when filtering oil.</li> <li>Remove and clean filter foot.</li> <li>Clean / replace all quick disconnect fittings.</li> <li>Run hot water through wand hose and filter foot to pump inlet hose.</li> </ul>	It is imperative that the carbon filter pad is changed before every filtration.  Try cleaning the entire oil vat, fill with clean oil and operate without a carbon filter pad. If oil flows correctly, the carbon pad was likely the issue. If there is still an issue, there is likely a clog in a hose or the filter foot.
Pump turns on but there is no oil flowing	<ul> <li>Oil too cold.</li> <li>Clogged carbon filter pad.</li> <li>Clogged filter foot.</li> <li>Dirty/loose quick disconnect fittings.</li> <li>Clogged hose.</li> </ul>	<ul> <li>Filter oil above 200°F but lower than 300°F.</li> <li>Always use a new carbon filter pad when filtering oil.</li> <li>Remove and clean filter foot.</li> <li>Clean / replace all quick disconnect fittings.</li> <li>Run hot water through wand hose and filter foot to pump inlet hose.</li> </ul>	It is imperative that the carbon filter pad is changed before every filtration.  Try cleaning the entire oil vat, fill with clean oil and operate without a carbon filter pad. If oil flows correctly, the carbon pad was likely the issue. If there is still an issue, there is likely a clog in a hose or the filter foot.
Pump turns on when plugged into a wall outlet but doesn't turn on when plugged into AutoFry outlet	<ul> <li>Cord from outlet to wall is loose or not connected.</li> <li>OFS switch behind valve panel is not in the ON position.</li> <li>OFS switch or AutoFry outlet has failed.</li> </ul>	- Confirm cord connection is good. - Check voltage at AutoFry outlet when OFS switch is held in.	