TECHNICAL DOCUMENT

Panasonic UF-744 Toner Cartridges

DOC-0184

OVERVIEW

These instructions cover the disassembly of the Panasonic UF-744 toner cartridge. The Panasonic UF-744 Laser engine is a 5 PPM, 400 DPI engine that uses an all in one cartridge. The Panasonic cartridge looks similar to the Pitney Bowes, 9800 and 9820 cartridges but are not directly inter-changeable. Each style of cartridge has it's own unique tab system, If the tabs are re-arranged, the cartridges should then be inter-changeable. This toner cartridge is rated for 9,000 pages at 5% coverage. The Panasonic part number for this cartridge is the UG-3309, the Pitney Bowes # is 810-4. The tabs are located on the leading edge of the cartridge. Slot #1 is used for Panasonic, slot #2 is used for Pitney Bowes.

The purpose of this disassembly is to vacuum out toner that will have spilled inside the cartridge during shipping and/or rough handling, to clean the debris cavity and to fill the toner supply housing with new toner. The disassembly can also be used to examine the internal parts of the cartridge for possible damage should the printing of the cartridge be poor and not correctable by other means.

This procedure should be read in it’s entirety before proceeding with the actual recycling process.

REQUIRED TOOLS

The tools needed to successfully and safely recharge toner cartridges are as follows:

1. Toner approved vacuum. The ATRIX HCTV shop vac style toner vac, or the ATRIX AAA/Omega-S portable toner vacuums.
   Some type of approved toner vacuuming system is important because toner consists of very fine particles that will pass right through a normal vacuum filter, and blow out the exhaust.
2. A small screw driver (Common Style)
3. A Phillips head screwdriver with removable tips
4. Needle Nose Pliers

SUPPLIES REQUIRED

1. 744 black toner 350g

2. Toner Magnet cloths
3. Felt Wand
4. lint-free synthetic cotton 4"x 4" pads
5. 99% pure Isopropyl Alcohol
6. Can of clean compressed air
7. Kynar drum padding powder
8. Strong adhesive tape for a seal (See Text)

PREPARE WORK AREA

1. Before proceeding with the following procedure you should have a work area available with approximately 4' x 3' clear space. It should be covered with some disposable paper since toner will spill on this area. It is recommended that brown craft paper be used and taped to the work area. This will hold the paper in place when trying to vacuum toner from the paper.
2. A garbage can with a strong plastic liner should be adjacent to the work area to empty used toner. It should be at least 2' deep to prevent toner from clouding up and over the top of the bag during disposal.
3. Have a few rags available and some disposable paper towels. TM-1 Toner Magnets are perfect for this.
4. The work area should be capable of being ventilated, if by accident toner becomes dispersed into the air. An exhaust fan in one window is recommended for ventilation.

   If the circulation of air in the work area room is combined with other rooms in the building, toner dust may be carried into the other rooms. A separate and isolated HVAC system is recommended for the work area room.

DISASSEMBLY

1. Vacuum exterior cartridge. Turn the cartridge so that the arrow on the cartridge is pointing toward you, and the handles are facing away. Remove the two screws one located on each side of the cartridge just in front of the handles. **NOTE:** The handles can be either green, or black.
2. Pry the waste chamber up near the screw holes so that the waste chamber can be rotated away from you. The waste chamber must be rotated far enough to allow the slot to slip off the drum axle.
3. Remove the wiper blade in the waste chamber section by removing the two screws on each end of the blade.

   WARNING: Be very careful not to bend or otherwise damage the small thin Recovery Blade located next to the Wiper Blade. If this blade is bent down lower than the height of the wiper blade, toner will accumulate on top of the blade and spill into the printer. If the blade does get bent, it may be possible to carefully bend the blade up equal to or slightly higher than the Wiper Blade. Make sure that the edge of this blade is even across it's entire length.

4. Clean the rubber wiper blade using a lint free cloth or a Toner Magnet This blade removes excess toner from the drum and must be free of any foreign matter. Be careful not to damage this blade. Lightly coat this blade with Kynar Drum Padding Powder mode.
5. Vacuum the waste chamber clean, and replace the wiper blade. Place the waste chamber aside
6. Remove the Primary Corona Wire Assembly by lifting it off the main body of the toner supply section.

   NOTE: The corona assembly is not attached securely after the waste chamber is removed. Be careful not to let the corona wire assembly damage the drum. Since the end user is not able to clean the corona wire, you must take great care to make sure you clean the wire and contact thoroughly. To do this you must remove the grid off the assembly by gently pressing in from the sides, and lifting up. Be very careful not to damage the grid, if it does become bent, make sure you straighten it out before replacing.

SEPARATE DEBRIS CAVITY, AND DRUM

1. To remove the OPC drum from the cartridge, pry the spacers off the metal axle rod on both sides of the drum. Then lift the OPC drum out of the cartridge by the axle.

NOTE: The center of the OPC drum in this cartridge has a bar magnet mounted on the axle which helps in the delivery of the toner on the magnetic roller. The seal tab (or left) side of the cartridge has a "D" shaped axle rod and a thin metal washer with a cotter pin. This cotter pin and the flat side of the axle holds bar magnet in place so that the Magnetic roller gets the necessary help.

2. Remove the OPC Drum being extremely careful not to scratch it. Vacuum any toner and debris from drum being careful not to let the vacuum hose come in contact with the drum surface. Do not polish or wipe the drum with a dry cloth since this may scratch the drum.

3. Blow off any remaining dust from the Drum using compressed clean air. If there is any matter on the drum that must be cleaned off, use 99% pure Isopropyl alcohol (FR-8 Film Remover) and a soft lint free cotton pad to lightly wipe the drum surface, then blow off the Drum using compressed clean air.

CAUTION: Be very careful not to tilt or shake the can while spraying, as the propellant may spray out and possibly ruin the drum. Always handle the OPC Drum with the utmost caution, since if damaged it is costly to replace.

4. Place the OPC Drum in a soft lint free cloth and then into a dark colored bag or cover from bright light by some other suitable means. Again, do not rub or wipe the OPC Drum with a dry cloth as this may scratch its surface.

5. The spacers that gap the OPC and the magnetic roller surfaces rest on the magnetic roller and should be simply lifted off prior to vacuuming this area. Be sure that you thoroughly clean the spacers. The magnetic delivery roller assembly may be completely detached from the toner hopper for more thorough cleaning if desired by removing four screws. There are two screws one on each end of the magnetic roller housing that must be removed. There are also two screws underneath that need to be removed to allow the whole assembly to be released.

6. To seal the hopper a plastic wedge with felt both on the top and bottom, must be pryed up and out, and the tail of the seal pulled under the brown mag roller felt. Replace the wedge to secure the tail of the seal before reassemble. It is not necessary to remove the doctor blade.

7. It is not recommend that the gear assembly on the toner hopper be dismantled as it is very difficult to reassemble. There are only four gears, but if removed, they are very hard to re-attach to their proper shafts. Finally the hopper fill cap is located on the left end of the hopper and can be pryed off to refill the cartridge.

Re-Assemble Toner Supply Housing, Photo Conductive Drum And Debris Cavity

1. Coat the OPC Drum with the Kynar, and replace the OPC Drum, Replace the drum into the debris cavity being extremely careful not to scratch or damage the drum. Make sure that the cotter pin is facing down and is in it's slot. Re-install the spacers on the drum axle shaft. Remember, the D-shaped spacer fits on the left. 5.2) Re-install the Primary Corona wire assembly so that the plastic tabs lock into the supply chamber, and the electrical contacts are on the right

2. Re-attach the Waste Chamber by reversing step 3.2, Install the two screws.

3. Replace the felt wand

Recommended Supplies

Microsoft OLE DB Provider for ODBC Drivers error '80004005'

[Microsoft][ODBC Microsoft Access Driver]General error Unable to open registry key 'Temporary (volatile) Jet DSN for process 0x2de8 Thread 0x3c78 DBC 0x3f3b014 Jet'.

/script/catSearch.asp, line 58