

# CFlux 1

Cyclone Dust Collector
Operating Instructions



# Producer:

Laguna Tools Inc 744 Refuge Way, Suite 200 Grand Prairie, Texas 75050 USA

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# **EC DECLARATION OF CONFORMITY**

According to the following EC Directives
- Machinery Directive : 2006/42/EC



The undersigned, Stephen Stoppenbrink, representing Laguna Tools Inc.

744 Refuge Way, Suite 200, Grand Prairie, Texas 75050 USA, manufacturer, declares that the machine described hereafter:

# DUST COLLECTOR MODEL:

AFLUX12 (230V/50Hz)

BFLUX1 (230V/50Hz)

CFLUX3 (415V/50Hz)

PFLUX3 (415V/50Hz)

CFLUX1 (230V/50HZ)

PFLUX1 (230V/50HZ)

Provided that it is used and maintained in accordance with the generally accepted codes of good practice and the recommendations of the instructions manual, meets the essential safety and health requirements of the Machinery Directive.

The person who compile technical file established within the EU:

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The TCF (No. SF-2018001-A1 / SF-2018002-A1) is archived in CEPROM S.A. located in Str. Fântânele, nr.FN (Platforma Industrială), 440240 Satu Mare, Romania

For the most specific risks of this machine, safety and compliance with the essential requirements of the Directive has been based on elements of:

- EN ISO 12100:2010 / Safety of machinery General principles for design Risk assessment and risk reduction (ISO 12100:2010)
- EN 60204-1: 2006+A1:2009+AC:2010 / Safety of machinery Electrical equipment of machines- Part 1: General requirements- Industrial electrical device.

Date: August 04, 2022

Authorized Signature: Authorized Signature: Position: Chief Executive Officer

Place: Laguna Tools Inc.

744 Refuge Way, Suite 200, Grand Prairie, Texas 75050,

<u>USA</u>

# **EN - English**

Operating Instructions (translation of the original instructions)

#### Dear Woodworker,

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Thank you for your purchase and welcome to the Laguna Tools group of discerning woodworkers. We understand that you have a choice of where to purchase your machines and appreciate the confidence you have in the Laguna Tools brand. Every machine manufactured by Laguna Tools has been carefully designed and well thought through from a woodworker's perspective. Through hands-on experience, Laguna Tools is constantly working hard to make innovative, precision products. Products that inspire you to create works of art, are a joy to run and work on, and encourage your performance.

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# 1. Declaration of conformity

We declare that this product is in compliance with the directive and the standard mentioned on the previous page of this manual.

# 1.1 Warranty

IGM Tools & Machinery strives to always deliver high-quality machinery. The warranty is governed by the valid terms and conditions of IGM Tools & Machinery available at www.igmtools.com.

### 2. Specifications

Z. opecinications	
Motor	1100 W (1.5Hp)
Power	230V / 50Hz / 1PH
Recommended Breaker	9A @ 230V
Airflow (traditional method)	1786m3/hour (1051cfm)
Airflow (realistic method)	1224m3/hour (720cfm)
Max. Static Pressure	256mm in water
Fan Diameter	340mm
Inlet Diameter	1x 150mm or 2 x 100mm
Switch	High frequency remote control switch
Noise Level	82 dB(A) @ 3 m
Drum Collection	95 Litre octagonal drum
Packing Size (WxDxH)	1150 x 720 x 1225mm

Weight	105 kg
Shipping Weight	140 kg

Filter	
Filtering Area:	4,5 m2
Cartridge Filter diameter	400mm diameter x 500mm height
Filtration Size	99.7% @1 Micron
Drum Collection Bag Layflat Size	960 x 1200 mm
Filter Collection Bag Layflat Size	660 x 620 mm

# 3. General Safety Rules and Instructions

### 3.1 Important Safety Instructions

Read and understand all warnings and operating instructions before using this equipment. Failure to follow all instructions listed below, may result in electric shock, fire, and/or serious personal injury or property damage.

Woodworking can be dangerous if safe and proper operating procedures are not followed. As with all machinery, there are certain hazards involved with the operation of the product. Using the machine with respect and caution will considerably lessen the possibility of personal injury. However, if normal safety precautions are overlooked or ignored, personal injury to the operator may result. Safety equipment such as guards, push sticks, hold-downs, feather boards, goggles, dust masks and hearing protection can reduce your potential for injury. But even the best guard won't make up for poor judgment, carelessness or inattention. Always use common sense and exercise caution in the workshop. If a procedure feels dangerous, don't try it. Figure out an alternative procedure that feels safer. REMEMBER: Your personal safety is your responsibility.

This machine was designed for certain applications only. We strongly recommend that this machine not be modified and/or used for any application other than that for which it was designed. If you have any questions relative to a particular application, do not use the machine until you have first contacted the manufacturer to determine if it can or should be performed on the product.

If you have any questions relative to its application do not use the product until you have contacted the manufacturer and we have advised you.

When using an electrical appliance, basic precautions should always be followed, including the following:

READ ALL INSTRUCTIONS BEFORE USING (THIS APPLIANCE) To reduce the risk of fire, electric shock, or injury:

- Do not leave appliance when plugged in. Unplug from outlet when not in use and before servicing.
- · Do not use outdoors or on wet surfaces.
- Do not allow to be used as a toy. Close attention is necessary when used by or near children.
- · Use only as described in this manual. Use only manufacturer's recommended attachments.
- Do not use with damaged cord or plug. If appliance is not working as it should, has been dropped, damaged, left outdoors, or dropped into water, return it to a service centre.
- Do not pull or carry by cord, use cord as a handle, close a door on cord, or pull cord around sharp edges or corners. Do not run appliance over cord. Keep cord away from heated surfaces.
- Do not unplug by pulling on cord. To unplug, grasp the plug, not the cord.
- · Do not handle plug or appliance with wet hands.

- Do not put any object into openings. Do not use with any opening blocked; keep free of dust, lint, hair, and anything that may reduce air flow.
- Keep hair, loose clothing, fingers, and all parts of body away from openings and moving parts.
- Turn off all controls before unplugging.
- · Use extra care when cleaning on stairs.
- Do not use to pick up flammable or combustible liquids, such as gasoline, or use in areas where they may be present.
- · Connect to a properly grounded outlet only. See Grounding Instructions

#### SAVE THESE INSTRUCTIONS

- Read and understand the warnings posted on the machine and in this manual. Failure to comply with all of these warnings may cause serious injury.
- Replace the warning labels if they become obscured or removed.
- This 3HP Portable Cyclone Dust Collector is designed and intended for use by properly trained and experienced personnel only. If you are not familiar with the proper and safe operation of this type of dust collector, do not use until proper training and knowledge have been obtained.
- Do not use this machine for other than its intended use. If used for other purposes, LAGUNA TOOLS INC., disclaims any real or implied warranty and holds itself harmless from any injury that may result from that use.
- Always wear approved safety glasses/face shields while using this machine.
- Before operating this dust collector, remove tie, rings, watches and other jewelry, and roll sleeves up past the elbows. Remove all loose clothing and confine long hair. Non-slip footwear or anti-skid floor strips are recommended. Do not wear gloves.
- Wear ear protectors (plugs or muffs) during extended periods of operation.
- Some dust created by power sanding, sawing, grinding, drilling and other construction activities contain chemicals known to cause cancer, birth defects or other reproductive harm. Some examples of these chemicals are:
  - Lead from lead based paint.
  - Crystalline silica from bricks, cement and masonry products.
  - Arsenic and chromium from chemically treated lumber.

Your risk of exposure varies, depending on how often you do this type of work. To reduce your exposure to these chemicals, work in a well-ventilated area and work with approved safety equipment, such as face or dust masks that are specifically designed to filter out microscopic particles.

- Do not operate this machine while tired or under the influence of drugs, alcohol or any medication.
- Make certain the switch is in the OFF position before connecting the machine to the power source.
- Make certain the machine is properly grounded.
- Make all machine adjustments or maintenance with the machine unplugged from the power source.
- Form a habit of checking to see that all extra equipment such as adjusting keys, wrenches, scrap, stock, and cleaning rags are removed away from the machine before turning on.
- Keep safety guards in place at all times when the machine is in use. If removed for maintenance purposes, use extreme caution and replace the guards immediately when maintenance is complete.
- Make sure the dust collector is on a flat even surface and the wheels locked in place before use.
- Check damaged parts. Before further use of the machine, a guard or other part that is damaged should be carefully checked to determine that it will operate properly and perform its intended function. Check for alignment of moving parts, binding of moving parts, breakage of parts, mounting and any other conditions that may affect its operation. A guard or other part that is damaged should be properly repaired or replaced.

- Provide for adequate space surrounding work area and non-glare, overhead lighting.
- Keep the floor around the machine clean and free of scrap material, oil and grease.
- Keep visitors a safe distance from the work area. Keep children away.
- Make your workshop child proof with padlocks, master switches or by removing starter keys.
- Give your work undivided attention. Looking around, carrying on a conversation and "horse-play" are careless acts that can result in serious injury.
- Maintain a balanced stance at all times so that you do not fall or lean against the dust collector. Do not overreach or use excessive force to perform any machine operation.
- Use the right tool at the correct speed and feed rate. Do not force a tool or attachment to do a job for which it was not designed. The right tool will do the job better and safer.
- Use recommended accessories; improper accessories may be hazardous
- Maintain machinery with care. Follow instructions for lubricating and changing accessories.
- Turn off the machine before cleaning. Use a brush or compressed air to remove dust or debris do not use your hands.
- Do not stand on the machine. Serious injury could occur if the machine tips over.
- Never leave the machine running unattended. Turn the power off and do not leave the machine until it comes to a complete stop.
- Never operate or run the machine without closing the drum up against the lid. Failure to do so will result in the machine amperage increasing and may trip your circuit.

### 3.2 General safety rules

WARNING: FAILURE TO FOLLOW THESE RULES MAY RESULT IN SERIOUS PERSONAL INJURY.

**CHECK DAMAGED PARTS.** Before further use of the unit, properly repair or replace any part that is damaged.

FOR YOUR OWN SAFETY, READ AND UNDERSTAND THE INSTRUCTION MANUAL BEFORE OPERATING THE MACHINE.

Learn the unit's application and limitations as well as the specific hazards peculiar to it.

**KEEP WORK AREA CLEAN.** Cluttered areas and benches invite accidents

**DON'T USE IN DANGEROUS ENVIRONMENT.** Don't use this unit in damp or wet locations, or expose it to rain. Keep work area well-lighted.

**KEEP CHILDREN AND VISITORS AWAY.** All children and visitors should be kept a safe distance from work area.

**DISCONNECT UNIT** before servicing.

**CHECK DAMAGED PARTS.** Before further use of the unit, properly repair or replace any part that is damaged.

FAILURE TO FOLLOW THESE RULES MAY RESULT IN SERIOUS INJURY.

# 3.3 Additional Safety Instructions

# Additional safety for dust collectors

**Intended use.** This dust collector is only intended for collecting wood dust and chips from woodworking machines. Do not use this dust collector to collect metal, dirt, pebbles, drywall, asbestos, lead paint, silica, liquids, aerosols, or any flammable, combustible, or hazardous materials.

**Hazardous dust.** Dust created while using machinery may cause cancer, birth defects, or long-term respiratory damage. Be aware of dust hazards

associated with each work piece material, and always wear a NIOSH-approved respirator to reduce your risk.

**Dust allergies.** Dust from certain woods may cause an allergic reaction in people and animals. Make sure you know what type of wood dust you will be exposed to in case there is a possibility of an allergic reaction.

**Wear respirator.** Fine dust that is too small to be caught in the filter will be blown into the ambient air during operation. Always wear a NIOSH-approved respirator during operation and for a short time after to reduce your risk of permanent respiratory damage.

**Emptying dust.** When emptying dust from the collection container, wear a respirator and safety glasses. Empty dust away from ignition sources and into an approved container.

**Disconnecting power supply.** Turn the switch off, disconnect the dust collector from the power supply, and allow the impeller to come to a complete stop before leaving the machine unattended or doing any service, cleaning, maintenance, or adjustments.

**Suspended dust particles and ignition sources.** Do not operate the dust collector in areas were explosion risks are high. Areas of high risk include, but are not limited to, areas near pilot lights, open flames, or other ignition sources.

**Fire suppression.** Only operate the dust collector in locations that contain a fire suppression system or have a fire extinguisher nearby.

**Impeller hazards.** Do not place your hands or tools near the open inlet during operation for any reason. The powerful suction could easily cause accidental contact with the impeller, which will cause serious personal injury or damage to the machine. Always keep small animals and children away from open dust collection inlets.

**Avoiding sparks.** Do not allow steel or rocks to strike the impeller—this may produce sparks. Sparks can smolder in wood dust for a long time before a fire is detected. If you accidentally cut Into wood containing tramp metal (nails, staples, spikes, etc.), immediately turn off the dust collector, disconnect it from power, and wait for the impeller to stop—then empty the collection container into an approved airtight metal container.

**Operating location.** To reduce respiratory exposure to fine dust, locate permanently installed dust collectors away from the working area, or in another room that is equipped with a smoke detector. Do not operate the dust collector in rainy or wet locations—exposure to water may create a shock hazard or decrease the life of the machine.

**Static electricity.** Plastic dust lines generate high amounts of static electricity as dust chips pass through them. Although rare, sparks caused by static electricity can cause explosions or fire. To reduce this risk, make sure all dust lines are thoroughly grounded by using a grounding wire.

Regular cleaning. Regularly check/empty the collection bags or drum to avoid the buildup of fine dust that can increase the risk of fire. Make sure to regularly clean the surrounding area where the machine is operated—excessive dust buildup on overhead lights, heaters, electrical panels, or other heat sources will increase the risk of fire.

Warning: If precautions are not heeded, it may result in minor injury and/or possible machine damage.

Warning: If precautions are not heeded, it may result in serious injury or possibly even death.

# SAVE THESE INSTRUCTIONS. Refer to them often and use them to instruct others.

# 3.4 Motor Specifications

Your machine is wired for 230 volts, 50 HZ alternating current. Before connecting the machine to the power source, make sure the switch is in the "OFF" position.

# 3.5 Grounding Instructions

# DANGER: THIS MACHINE MUST BE GROUNDED WHILE IN USE TO PROTECT THE OPERATOR FROM ELECTRIC SHOCK.

1. This appliance must be connected to a grounded metal, permanent wiring system; or an equipment-grounding conductor must be run with the circuit conductors and connected to the equipment-grounding terminal or lead on the appliance.

The installer, such as a qualified electrician, cut (or bend over) and insulate the grounding conductor from a field wiring supply cable.

In the event of certain types of malfunctions or breakdowns, grounding provides a path of least resistance for electric current—in order to reduce the risk of electric shock.

Improper connection of the equipment-grounding wire can result in a risk of electric shock. The wire with green insulation (with or without yellow stripes) is the equipment-grounding wire. If repair or replacement of the power cord or plug is necessary, do not connect the equipment-grounding wire to a live (current carrying) terminal. Check with a qualified electrician or service personnel if you do not understand these grounding requirements, or if you are in doubt about whether the tool is properly grounded. If you ever notice that a cord or plug is damaged or worn, disconnect it from power, and immediately replace it with a new one.

# **Full Load Amperage**

Amp draw at 230V (prewired) 9 A

### **Electrical Circuit Requirements**

You should use a separate electrical circuit for the Laguna CFlux. The circuit should be protected by a 16A circuit breaker with a tripping characteristic C (16/3 / C). The power cable of the machine is factory fitted with 230V industrial plug. The machine must be connected to an appropriate industrial socket or the machine can be connected to a terminal board and the wiring corresponding to the recommended fuse.

# ATTENTION! WIRING MAY BE CARRIED OUT BY A QUALIFIED ELECTRICIAN ONLY.

Recommended circuit breaker: 16A (16/3/C), tripping characteristic C.

WARNING: MAKE SURE THE SOCKET IS EARTHED. IF YOU ARE NOT SURE, HAVE THE SOCKET CHECKED BY A QUALIFIED ELECTRICIAN.

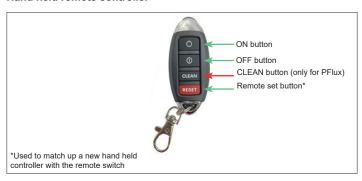
### 4. Parts Description

4.1 Functional Description

### High frequency remote control switch

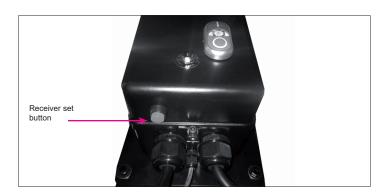


# Hand held remote controller



# PROGRAMMING THE REMOTE CONTROL

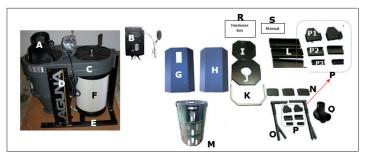
- 1. Confirm the machine is connected to a working outlet before programming the remote control.
- 2. Press and hold the Receiver "set" button on the bottom of the ON/OFF control box until you hear beeping.
- 3. Press the remote control "Reset" button simultaneously with the receiver "set" button until you hear beeping. Release both buttons to complete the set up.



# 5. Assembly 5.1 Unpacking

Your 1,5HP Mobile Dust Cyclone comes packed in a single box. Before attempting to assemble this machine, follow these directions for unpacking:

- 1. Carefully cut the banding straps and remove them from the box.
- 2.Cut along the tape line at the top of the box.
- 3.Remove all parts from the top of the foam and set aside.
- 4.Remove the foam packing material from the top of the machine and set aside for further use, during assembly.
- 5.Cut the cardboard box (top to bottom) in the four corners for easy removal of the box.
- 6.Carefully take out the machine components from the box and set aside.
- 7.Using the diagram below, ensure that all parts are present and in good condition.



# Description

- A. Motor
- B. Switch and remote control
- C. Dust chute
- D. Top upright supports (3)
- E. Base frame
- F. Canister filter
- G. Octagon drum front panel
- H. Octagon drum back panel
- I. Octagon drum base panel
- J. Octagon drum lid
- K. Octagon drum foot pedal
- L. Lower upright supports (3)
- M. Drum insert
- N. Upright support reinforcement plate (3)
- O. Foot pedal bar (left & right)
- P. Foot pedal assembly fittings
- P1. Lower triangular support plate (2)
- P2. Foot pedal bar support (2)
- P3. Lower support plate (2)
- Q. Inlet adapter
- R. Hardware box (Casters, hardware)
- S. Operating and Parts Manual

Report any missing or damaged parts to your dealer or distributor. Prior to tool assembly and use, read this manual thoroughly to familiarize yourself with proper assembly, maintenance and safety procedures.

# 5.2 General Tool Assembly

This step requires two adults. This 3HP Mobile Dust Cyclone is heavy, be careful when lifting and handling it! Failure to comply may cause serious injury and/or damage to the machine and/or property!

### **Tools Required**

10 mm wrench / 12 mm wrench / 14 mm wrench Phillips screwdriver. 4 mm hex wrench / 5 mm hex wrench To assemble your dust cyclone, follow these steps:

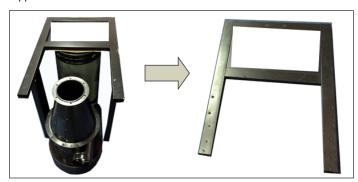
For your own safety, do not connect the machine to the power source until the machine is completely assembled. Please also make sure that you read and understand the entire instruction manual.

### **ASSEMBLY TIME ESTIMATE 4-5 hours**

Step 1: Place the empty, top, foam packing insert (which contained the individual parts) upside-down on the floor. Place the main unit into the styrofoam insert upside-down. Make sure the unit is centered properly and resting solidly in the foam insert for the next steps.



Step 2: Remove the base which has been bolted to the (3) top upright supports.



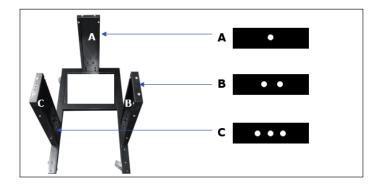
Step 3: Turn base upside-down and attach the (4) 3" casters to the underside of the base using (16) 5/16" x 3/4" hex bolts and (16) 5/16" x 18 flat washers.



Step 4. Turn the base over with it standing on the (4) 4" casters and secure the three lower upright support panels using (6) 3/8" x 3/4" hex bolts and (6) 3/8" x 7/8" flat washers.

Each lower upright support panel is identified for its specific location.

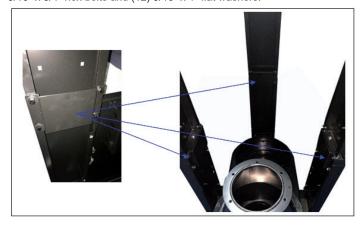
- A shown with one dot is located on the canister side.
- B shown with two dots is located on the front side
- C shown with three dots is located on the opposite end.



Step 5: Secure the base with (3) lower upright support panels to the unit using (6) 5/16" x 3/4" hex bolts and (6) 5/16" x 1" flat washers.



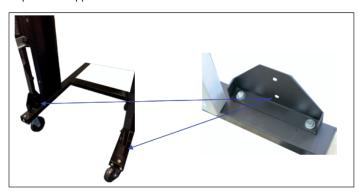
Step 6. Secure the (3) upright support reinforcement plates using (12) 5/16" x 3/4" hex bolts and (12) 5/16" x 1" flat washers.



Step 7: With the help of another person, lift the unit up carefully and rotate to the right-side-up with the motor on top and the wheels at the bottom.



Step 8. Secure the lower triangular support plate to the base using (2) 5/16" x 3/4" hex bolts and (2) 5/16" x 1" flat washers. Follow the same steps for the opposite side.



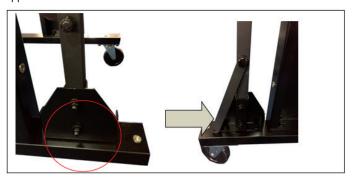
Step 9. Slide the Foot pedal bar into the opening on the lower upright support panel. Make sure the end of the bar is on the inside of the triangular support plate. Follow the same steps for the opposite side.



Step 10. Secure the foot pedal support to the lower upright support panel using (4) 5/16" x 1/2" carriage bolts, (8) 5/16" x 1" flat washers and (4) 5/16" hex nuts. Next secure the foot pedal bar to this support using (4) 5/16" x 1-3/4" hex bolts, (8)5/16" x 1" flat washers and (4) 5/16" hex nuts. Follow the same steps for the opposite side.



Step 11: Secure the base of the foot pedal bar to the triangular support plate by holding the lower support plate vertically up against the foot pedal bar using (2)  $5/16^{\circ}$  x  $3/4^{\circ}$  hex bolts, (4)  $5/16^{\circ}$  x  $3/4^{\circ}$  flat washers and (2)  $5/16^{\circ}$  hex nuts from the inside out. Follow the same steps for the opposite side.



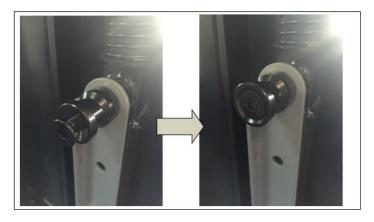
Step 12. Attach the two ends of the Octagon foot pedal to the nut on the foot peddle bar.



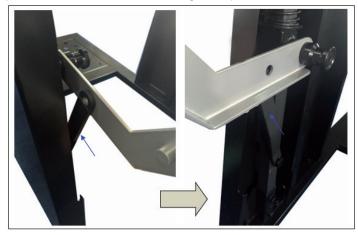
Step 13. Secure the topping to the nut on the foot pedal bar. Follow this step on the opposite side.



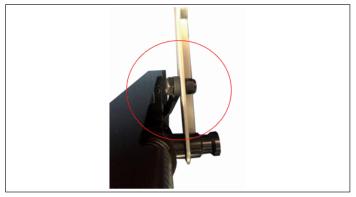
Step 14: Secure the topping with (2) M8 x 30mm hex bolts.



Step 15. Align the bolt hole on the movable supporting brace on the foot pedal bar with the bolt hole on the octagon foot pedal.

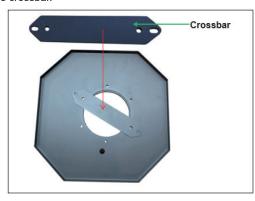


Step 16. Secure the movable supporting brace on the foot pedal bar with the octagon foot pedal using (2) 3/8" x 13/16" hex bolts. Make sure the bolt head is on the inside of the octagon handle. Adjust the tightness of this bolt accordingly. If this bolt is too tight, the Octagon foot pedal will not work smoothly. When too loose it will not pick up the Octagon drum.



Step 17. Attach the crossbar to the drum lid and tighten using the two bolts removed in the previous step. It does not matter which position you

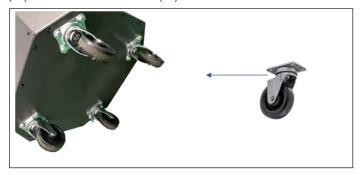
attach the crossbar.



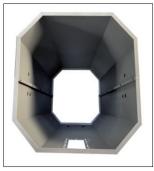
Step 18. Apply foam tape to the cone flange before attaching the drum lid. Secure the Octagon drum lid to the cyclone funnel using (6) 5/16" x 3/4" hex bolts, (12) 5/16" x 1" flat washers and (6) 5/16" hex nuts. Make sure to first attach all the bolts before tightening. NOTE: The lid will turn when the bolts have not been tightened for alignment. Failure to do will result in the drum lid not being able to align with the drum.



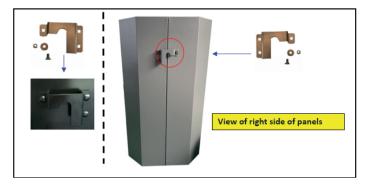
Step 19. Locate the drum base panel, (it does not matter which side faces inside), and secure the (4) casters using (16) 5/16" x 3/4" hex bolts, (32) 5/16" x 1" flat washers and (16) 5/16" hex nuts.



Step 20. Assemble the Octagon drum by connecting the two panels with (12) M4 x 12mm sheet metal screws.



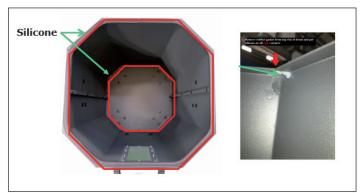
Step 21. Attach each of the two side plates to the drum by fastening with three  $\frac{1}{4}$ " x  $\frac{1}{2}$ " carriage bolts. Insert the bolt from the inside of the drum with the washer and nut on the outside of the drum. Secure both brackets by tightening all six carriage bolts.



Step 22. Place the Octagon base panel with casters on the bottom of the drum and secure using Secure the Octagon base panel to the bottom of the drum using (22) M5 Sheet metal screws to secure tightly, make sure the head of the sheet metal screw is on the outside of the drum. Take the plastic bolt end caps to cover all the bolt ends on the inside of the Octagon drum base. This step is necessary to prevent any injuries caused by the sharp end of the bolts.



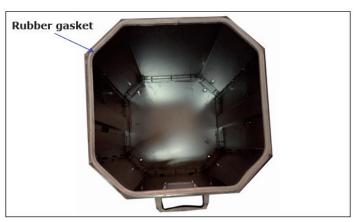
Step 23. Once completing the assembly, keep the drum laying on its side to apply silicone to the inside of the drum including the base and the top rim of the drum before the rubber seal has been attached to seal and prevent air leakages. You will need to use a caulking gun (not supplied). NOTE: Sealing the perimeters with silicone is imperative for proper operation of dust collector and efficient operation!



Step 24. Attach the handles to the top and bottom end on the front panel with the window display using (4) flat head Philip bolt, (4) 5/16" x 7/8" flat washers and (4) 5/16" hex nuts.



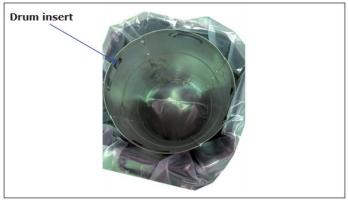
Step 25: Attach the rubber gasket to the top inner edges of the Octagon drum. The wider end of the gasket goes up. Use tin snips to trim any excess rubber gasket after completing the seal.



Step 26. Insert the plastic debris collection bag inside the Octagon drum. Open and spread out the plastic bag to the corners and edges.



Step 27. Assemble drum insert and place it inside over the plastic bag in the Octagon drum.



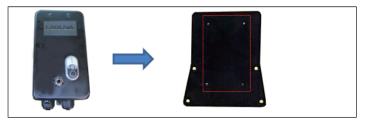
Step 28. Lift the foot pedal bar. Align the Octagon drum window to the center point of the drum lid and push the drum in. Lower the foot pedal bar to seal the drum for normal machine operation.



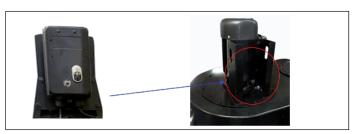
Step 29. Confirm when aligning the drum that both the left and right side lift plates are over the top of the foot peddle bar assembly before lifting the foot pedal bar. If not aligned, the drum will not be fully sealed and will interfere with air flow.



Step 30. Take the switch box, open it by removing the bolt at the bottom of the switch box to mount to the switch base plate using (4) 3/8"\*1" hex bolts, (8) 3/8" flat washers and (4) 3/8" hex nuts.



Step 31. Install the Switch Box to the switch plate on the motor using (4) 1/4" x 3/4" hex bolts, (4) 1/4" x 1" flat washers and (4) 3/8" lock washers.



Step 32. All the assembly steps have been completed.



# 6. Maintenance procedures

# **CLEANING THE FILTER**

To ensure proper operation of this Mobile Dust Cyclone, the HEPA canister filter must have adequate air flow. This means the filter must be regularly maintained by carefully blowing the filter clean using compressed air and an air gun to release built-up particulates trapped between the filter pleats.

For heavy duty users, it is recommended to use compressed air on a regular basis to maintain maximum filtration efficiency and longer life span of the filter.

# Using the Filter Cleaner Crank and Compressed Air

# DISCONNECT MACHINE FROM POWER!

The filter cleaner crank knocks dust particulate and small debris from

the pleated filter and into the filter bag. To improve the effectiveness of the paddles, slowly rotate the handle while simultaneously blowing (from outside – in) into the pleats. This will assist the release of fine dust from the inside of the pleats. NOTE: using the blowing function (hose connected to exhaust port) of a vacuum can also help dislodge dust. To keep your machine in good working condition, it is recommended to use the filter cleaner crank to clean the filter after every use. To clean the filter using the crank simply rotate the crank handle clockwise four or five rotations.

NOTE: Excessive turning of the filter cleaner crank or fast turning will prematurely wear the interior of the pleated filter.

### REMOVING THE CANISTER FILTER

1. Release the spring-loaded band clamp at the bottom of the canister filter and remove the plastic debris bag.



2. Remove the bolt and washer from the bottom, center of the flap pivot assembly using a 12mm wrench.



3. While supporting the canister filter assembly from the bottom, release the spring-loaded band clamp from the top of the canister filter assembly.



Hold canister from bottom when releasing clamp (top)



### Disassembling canister for cleaning

- 4. Remove the canister filter by carefully lowering the canister. Be careful to tilt the top of canister, if necessary, to clear the paddle branches.
- 5. With the canister filter removed use a compressed air gun to thoroughly clean between the pleats, both inside and outside.

# **RE-ASSEMBLING THE CANISTER FILTER AFTER CLEANING**

1. With the aid of another person, carefully re-insert the canister filter repeating step 1,2,3 and 4 in reverse.

# **EMPTYING OR REPLACING THE FILTER BAG**

Periodically check the filter bag, if it is more than one third full, it is recommended that you empty it.

**NOTE:** If the filter bag gets too full, the weight may force it to pull away from the band clamp, exposing the user to potentially harmful particulates.

- 1. Release the spring-loaded band clamp at the bottom of the filter and remove the filter bag.
- 2. Empty or replace the filter bag and re-attach using the spring-loaded band clamp.

### **EMPTYING THE DRUM**

Periodically inspect the contents of the drum and empty as needed. To inspect the contents of the drum:

- 1. Raise the drum foot peddle bar to lower the drum to the floor.
- 2. Roll it away from the machine, inspect and empty as needed.

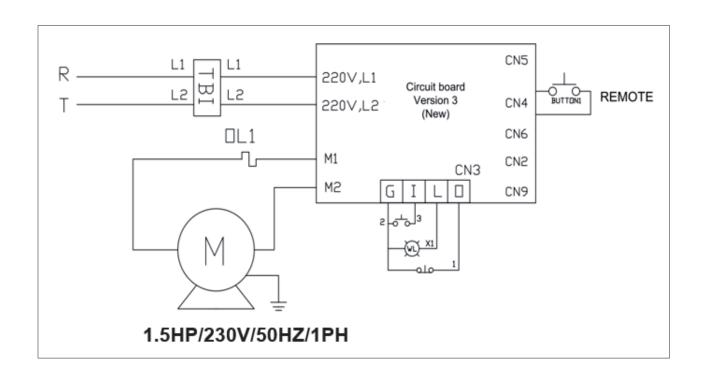
# **ROUTINE INSPECTION**

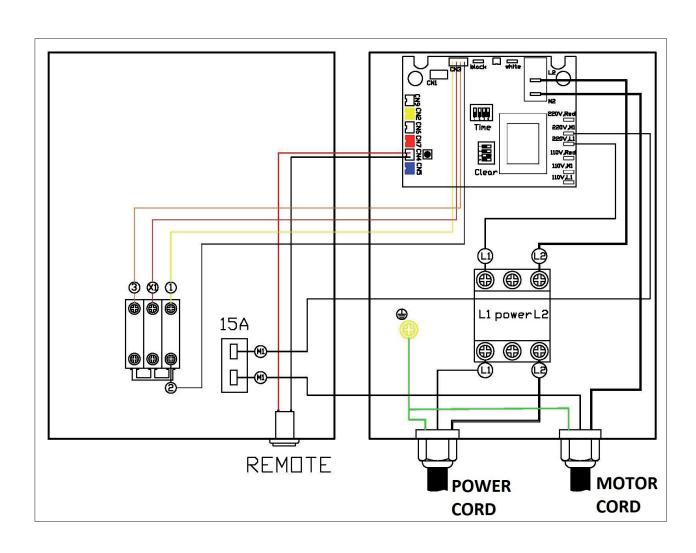
It is a good idea to routinely inspect all quality woodworking tools in order to keep them in optimum condition. This includes inspecting all hardware for tightness, ensuring filters are clean, and cleaning debris and grime from any surfaces and moving parts.

# 7. Troubleshooting guide

Machine does not start or a breaker trips.	
Possible Cause 1. Power supply switched OFF or is faulty. 2. Wall fuse/circuit breaker is blown/tripped. 3. Faulty remote control. 4. Remote receiver is faulty. 5. Incorrectly wired motor connection. 6. On-board circuit breaker is tripped. 7. Wiring is open/has high resistance. 8. Faulty power switch. 9. Motor is at fault.	Possible Solution 1. Ensure power supply is ON and has the correct voltage. 2. Ensure adequate circuit size; install inlet restrictor, replace weak breaker. 3. Replace batteries; ensure unobstructed line-of-sight and signal range. 4. Inspect receiver circuit board; replace if faulty. 5. Rewire or call certified service technician or electrician. 6. Allow motor to cool, improve ventilation, press reset button. 7. Check for broken wires or poor connections, repair as necessary. 8. Replace switch. 9. Test/repair/replace.
Excessive vibration or noise during operation.	
Possible Cause 1. Loose component. 2. Loose or broken motor mount. 3. Motor fan hitting fan cover. 4. Bad motor bearings.	Possible Solution 1. Inspect and tighten all bolts/nuts. 2. Tighten or replace as needed. 3. Check fan and cover; replace as needed. 4. Rotate shaft manually, check for grinding or loose shaft, replace bearings if needed.
Loud, repetitive noise, or excessive vibration coming from cyclone	
Possible Cause 1. Machine is on uneven surface. 2. Damaged/Unbalanced impeller. 3. Loose connections. 4. Impeller is loose. 5. Motor fan hitting fan cover.	Possible Solution 1. Stabilize on a flat surface. 2. Inspect impeller for dents, bends, loose fins. Replace if needed. 3. Check and re-tighten all fasteners. 4. Replace the motor and impeller. 5. Check fan and cover; replace as needed.
Dust cyclone does not adequately collect dust or chips; poor performance.	
Possible Cause 1. Canister end cap is full. 2. Filter is dirty. 3. Restricted duct line. 4. Suction route is too long or has too many sharp bends. 5. Wet lumber is clogging ducts. 6. Leaks in the duct work or too many open ports. 7. Inadequate velocity in the main suction line. 8. Wrong size ducting/ports used.	Possible Solution 1. Empty canister end cap. 2. Clean filter. 3. Clean inlet splitter. 4. Move machine closer to the point of suction, and rerun ducts to eliminate sharp bends. 5. Use lumber with less than 20% moisture content. 6. Repair all duct leaks and close any ports not being used. 7. Increase velocity by opening 1 or 2 more blast gates to different branch lines. 8. Re-size and re-install ducts and fittings.
Sawdust being blown into the air from the dust cyclone.	
Possible Cause 1. Band clamp or end cap is not secure. 2. Loose or damaged seals.	Possible Solution 1. Re-install ensuring a tight fit. 2. Replace seals and gaskets.

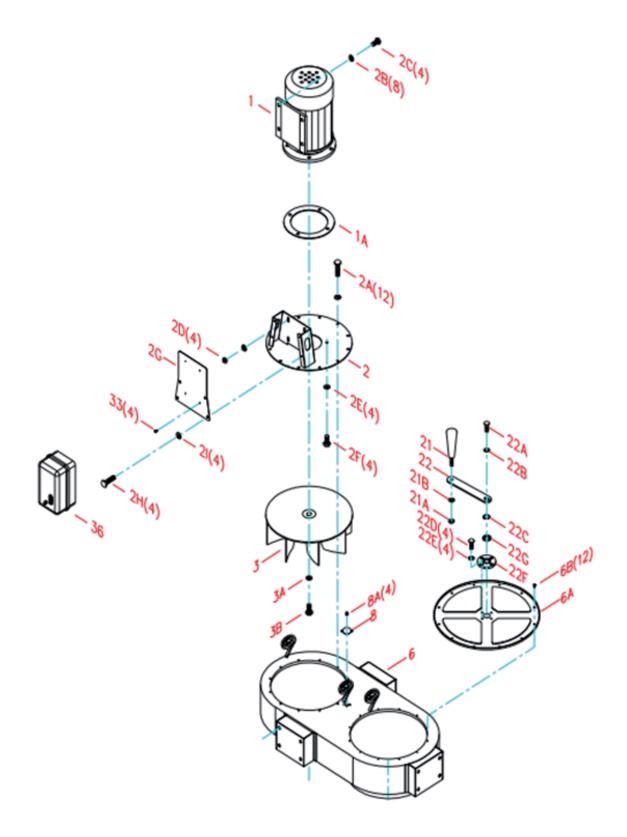
# 8. POWER CONNECTIONS & WIRING DIAGRAMS



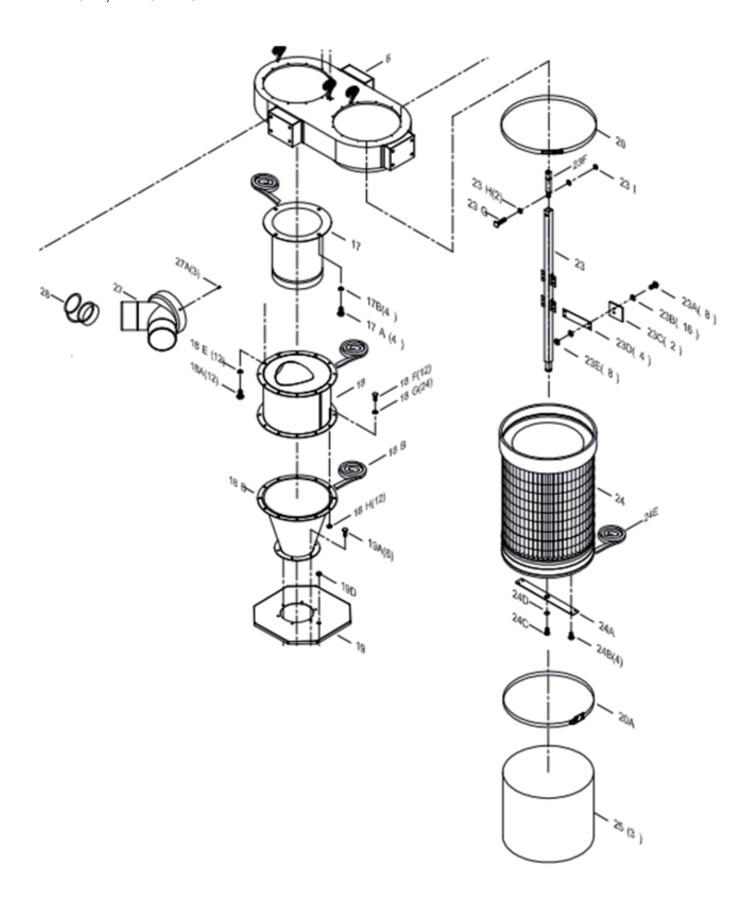


# 9. PARTS BREAKDOWN / EXPLODED VIEWS

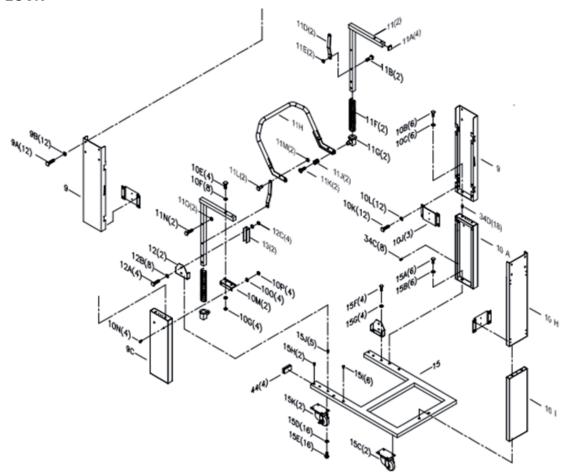
# FAN, MOTOR & SWITCH



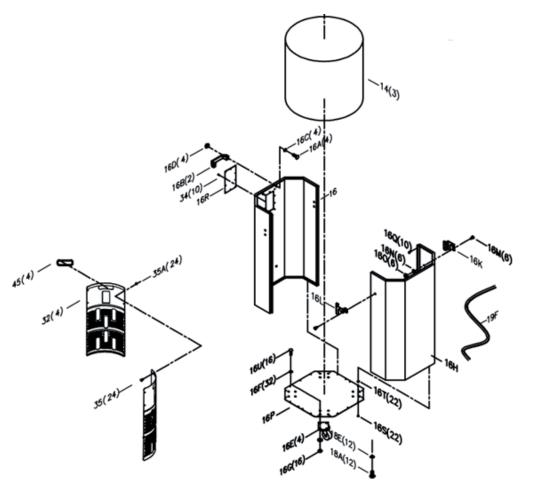
# CYCLONE, CANISTER & BARREL



# **PANELS & LOCK**



# **BARREL & INSERT**



# 10. Parts list

<b>REF #</b> 16U	PART NUMBER PDCCF15110-16U	PART NAME HEX BOLT	DESCRIPTION 5/16" x 3/4"	<b>QTY</b>
16U 16F	PDCCF15110-16F	FLAT WASHER	5/16" x 3/4" 5/16" x 3/4"	32
16G	PDCCF15110-16G	HEX NUT	5/16"	16
16H	PDCCF15110-16HV2	OCTAGON DRUM BACK PANEL		1
16K	PDCCF15110-16K	LEFT SIDE PLATE		1
16L	PDCCF15110-16L	RIGHT SIDE PLATE		1
16M	PDCCF15110-16M	CARRIAGE BOLT	1/4" x 1/2"	6
<u>16N</u> 16O	PDCCF15110-16N PDCCF15110-16O	FLAT WASHER HEX NUT	1/4" x 1" 1/4"	6
16P	PDCCF15110-160V2	OCTAGON DRUM BASE PANEL	1/4	1
16R	PDCCF15110-16R	WINDOW		1
16S	PDCCF15110-16SV2	SHEET METAL SCREWS	M5	22
16T	PDCCF15110-16TV2	PLASTIC BOLT END CAP	M5	22
16Q	PDCCF15110-16Q	THREAD BOLT	M4 x 12mm	10
17	PDCCF15110-17	INTAKE CYLINDER	F /4 C // F /O //	1
17A 17B	PDCCF15110-17A PDCCF15110-17B	HEX BOLT FLAT WASHER	5/16" x 5/8" 5/16" x 3/4"	4
17 <u>6</u> 18	PDCCF15110-178	CYCLONE BARREL	5/16 x 3/4 5/16" x 3/4"	1
18A	PDCCF15110-18A	HEX BOLT	5/16"x 3/4"	12
18B	PDCCF15110-18B	FOAM TAPE	3 x 6mm x 10M	1
18D	PDCCF15110-18D	CYCLONE FUNNEL		1
18E	PDCCF15110-18E	FLAT WASHER	5/16" x 3/4"	12
18F	PDCCF15110-18F	HEX BOLT	5/16" x 3/4"	12
18G	PDCCF15110-18G	FLAT WASHER	5/16" x 3/4"	24
18H 19	PDCCF15110-18H PDCCF15110-19	HEX NUT OCTAGON DRUM LID	5/16"	12
19A	PDCCF15110-19A	HEX BOLT	5/16" x 3/4"	6
19B	PDCCF15110-19B	FLAT WASHER	5/16" x 3/4"	12
19C	PDCCF15110-19C	HEX NUT	5/16"	6
19D	PDCCF15110-19D	PLUG	MSP-16	1
19E	PDCCF15110-19E	NUT	AGL-16	1
19F	PDCCF15110-19F	RUBBER GASKET	1400mm	1
20	PDCCF15110-20	BAND CLAMP	Ø 400mm	1
20A 21	PDCCF15110-20A PDCCF15110-21	SPRING BAND CLAMP ROTATION HANDLE	Ø 400mm	1
21A	PDCCF15110-21A	HEX LOCK NUT	3/8"	1
21B	PDCCF15110-21R	FLAT WASHER	3/8" x 7/8"	1
22	PDCCF15110-22	ROTATION CRANK	210, 35, 4.5t	1
22A	PDCCF15110-22A	HEX BOLT	5/16" x 3/4"	1
22B	PDCCF15110-22B	FLAT WASHER	5/16" x 1-3/16"	1
22C	PDCCF15110-22C	GEAR	Ø20mm	1
22D	PDCCF15110-22D	HEX BOLT	1/4" x 3/4"	4
22E 22F	PDCCF15110-22E PDCCF15110-22F	FLAT WASHER BEARING	1/4" x 3/4" Ø70, Ø20.5, 7t	1
22G	PDCCF15110-22F	SEAL	Ø70, Ø20.3, 7t	1
23	PDCCF15110-23V2	ROTATION SHAFT		1
23A	PDCCF15110-23A	HEX BOLT	1/4" x 5/8"	8
23B	PDCCF15110-23B	FLAT WASHER	1/4" x 1/2"	16
23C	PDCCF15110-23C	PADDLE		2
23D	PDCCF15110-23D	PADDLE BRANCH	2.4.00	4
23E 23F	PDCCF15110-23E	HEX LOCK NUT ROTATION SHAFT CONNECTION	1/4"	8
23G	PDCCF15110-23F PDCCF15110-23G	HEX BOLT	5/16" x 1-1/2"	1
23H	PDCCF15110-23H	FLAT WASHER	5/16"x 3/4"	2
231	PDCCF15110-23I	HEX LOCK NUT	5/16"	1
24	PDCCF15110-24	CANISTER FILTER	Ø 400x500mm L	1
24A	PDCCF15110-24A	ROTATION SHAFT BASE		1
24B	PDCCF15110-24B	SHEET METAL PHILIPS BOLT	3/16" x 3/4"	4
24C	PDCCF15110-24C	HEX BOLT	5/16" x 3/4"	1
24D 24E	PDCCF15110-24D PDCCF15110-24E	FLAT WASHER FOAM TAPE	5/16" x 7/8" 3 x 25mm x 1.5M	1
24 <u>c</u> 25	PDCCF15110-24E	PLASTIC BAG	Ø 400 x 600mm	3
27	PDCCF15110-27	INTAKE MANIFOLD	6"X1 / 4"X2 ports	1
27A	PDCCF15110-27A	SHEET METAL BOLT	M4 x 12mm	3
28	PDCCF15110-28	RUBBER CAP	4"	1
32	PDCCF15110-32	DRUM INSERT		4
33	PDCCF15110-33	FLAT HEAD BOLT	M4 x 6mm	4
34	PDCCF15110-34	RIVET	03.	10
34A 34C	PDCCF15110-34A PDCCF15110-34C	FLAT WASHER RIVET NUT	1/8" x 5/16"	6 8
34C 34D	PDCCF15110-34C	RIVET NUT	5/16"	18
35 35	PDCCF15110-34D	ROUND HD BOLT	3/16" x 1/2"	24
35A	PDCCF15110-35A	NUT	3/16" 3/16"	24
36	PDCCF15110-36V2	FREQUENCY REMOTE SWITCH		1
44	PDCCF15110-44	RUBBER PLUG	30 x 60mm	4
45	PDCCF15110-45	RUBBER HANDLE FOR DRUM INSERT		4
46	PDCCF15110-46	SILICONE	Tube	1
47	PDCCF15110-47	CROSSBAR		