Upright Service Manual
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#### ATTENTION

Before servicing any part or proceeding with any repair procedure on any ProTeam vacuum, **ALWAYS** disconnect the vacuum from power source.

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**View Upright Vacuum Wiring Schematic at www.pro-team.com**

www.pro-team.com  866.888.2168
**DISASSEMBLY**

1. **Tilt bag cover forward to open.** Remove (4) Phillips screws to release from bag cover nozzle plate.

2. **To release XP transition duct** remove (2) Phillips screws from bag cover nozzle. Base model duct crossover has (4) Phillips screws.

3. **Lift transition duct/duct crossover** from bag cover nozzle plate and remove.

4. **Using a flathead screwdriver** pry upward on bag cover latch spring to release.

5. **Insert flathead screwdriver** beneath bag cover latch plate to release. Make sure rounded points clear holes in bag cover.

6. **Using thumb to hold in place,** insert flathead screwdriver into bag cover (near top) to release bag cover release latch.

---

To Reassemble. Repeat steps in reverse.
Bag Housing

Bag Housing Seal Gasket

Phillips Screw

Handle Nut Plate

Filter Lock-Out Cover Switch

Filter Lock-Out Switch

Rivet for Bag Housing Assembly

Bag Housing Assembly with Riveted Hinge and Bag Cover Nozzle Plate

Completed Bag Housing
DISASSEMBLY

1. Remove screw on carry handle. Slide tube away from base. Unplug power cord.

2. Remove cover screw.

3. Remove switch cover and filter lockout switch. To remove the switch cover, insert a flathead screwdriver under switch lever and gently pry upward.

4. Remove crimps by pressing locking tab on locked connector.

5. Remove 4 screws located near bottom of bag housing (2 front, 2 back). Remove bag housing.

To Reassemble. Repeat steps in reverse.
BAG LOCKOUT SWITCH REPLACEMENT

1. Open filter bag housing. Remove filter bag.

2. Remove cover screw.

3. Remove switch cover and filter lockout switch. To remove the switch cover, insert a flathead screwdriver under switch lever and gently pry upward.

4. Remove crimps by pressing locking tab on locked connectors. Reverse steps to reassemble.
HOSE CAP COLLAR REPAIR – XP Models Only

1. To inspect the collar, attach the quick release cuff to the bag cover collar. Lift the vacuum by the hose cuff. The collar should support the weight of the vacuum. If not, the collar will fail and separate from the bag cover. The collar will need to be removed from the quick release cuff and re-glued into the bag cover. If this collar test fails, Proceed to Step 2.

2. Clean the quick release cuff and bag cover with rubbing alcohol to ensure a secure grip.
   Apply a continuous bead of adhesive* around the entire perimeter of the detached collar. Care should be taken to avoid drips and runs.

3. Quickly insert collar into bag cover evenly, pressing firmly for 20 seconds to ensure an adequate bond.

IMPORTANT: you have only a few seconds to apply the bead of glue and seat the collar into the bag cover.

*IMPORTANT: use only Loctite adhesive #454.
QUICK RELEASE CLIP REPLACEMENT


2. Snap into place.
ASSEMBLY

(a) Feed bag switch wires through bag housing.

(b) Align duct with opening in bag housing (APPLIES TO XP MODELS ONLY).

(c) Bag housing assembly should fit neatly onto bulkhead.

(d) Insert bag housing screws and tighten.

(e) Attach harness connectors to switch and place switch into position.

(f) Fasten switch cover with screw.

(g) If replacing the bag housing seal, do not let the seal cover the lockout switch cover opening.

NOTE: Make sure the handle nut plate is in place before you replace the bag housing gasket seal.
Motor Housing

BASE MODEL

- Completed Motor Housing
- Bulkhead
- Upper Motor Mount
- Motor (Includes Wires)
- Lower Motor Mount
- Lower Air Duct Phillips Screw
- Air Duct Assembly
- Left Panel Motor Housing Sound Foam
- Front Panel Motor Housing Sound Foam
- Rear Wheel
- Pivot Bearing
- Filter Cartridge Cover
- Motor Housing
- High Filtration Filter Exhaust
- D. Power Nozzle Switch Harness
- E. Power Nozzle Switch Harness
- A. Main Power Supply Harness (105754 Wire Harness Kit Includes A-D)
- C. Bag Full Indicator Sensor
- B. Jumper Harness

HEPA MODEL

- Completed Motor Housing
- Pivot Bearing
- Rear Wheel
- HEPA Media Exhaust Filter
- Filter Cartridge Cover

APPLIES TO XP MODELS ONLY

BASE MODEL

- Completed Motor Housing
- Bulkhead
- Upper Left Wand Guide
- Upper Left Wand Guide APPLIES TO XP MODELS ONLY
- Upper Right Wand Guide APPLIES TO XP MODELS ONLY
- Wand Lockout Switch
- Lower Air Duct Seal
- A. Main Power Supply Harness (105754 Wire Harness Kit Includes A-D)
- C. Bag Full Indicator Sensor
- B. Jumper Harness

HEPA MODEL

- Completed Motor Housing
- Pivot Bearing
- Rear Wheel
- HEPA Media Exhaust Filter
- Filter Cartridge Cover

APPLIES TO XP MODELS ONLY

- Completed Motor Housing
- Bulkhead
- Upper Left Wand Guide
- Upper Left Wand Guide APPLIES TO XP MODELS ONLY
- Upper Right Wand Guide APPLIES TO XP MODELS ONLY
- Wand Lockout Switch
- Lower Air Duct Seal
- A. Main Power Supply Harness (105754 Wire Harness Kit Includes A-D)
- C. Bag Full Indicator Sensor
- B. Jumper Harness

HEPA MODEL

- Completed Motor Housing
- Pivot Bearing
- Rear Wheel
- HEPA Media Exhaust Filter
- Filter Cartridge Cover

APPLIES TO XP MODELS ONLY
DISASSEMBLY

1. Remove handle and power cord. Open bag housing cover. Remove Intercept Micro® Filter.

2. Remove switch cover screw.

3. Remove switch cover and filter lockout switch. To remove the switch cover, insert a flathead screwdriver under switch lever and gently pry upward.

4. Remove crimps by pressing locking tab on connector.

(Continued on page 12)
5. Remove (4) bag housing screws and bag housing.

6. Remove the bag full indicator tube (tube not pictured) from the bulkhead and lift off the bulkhead.

7. Remove upper motor mount. Lift motor from housing.

8. Disconnect motor crimps from motor and from lower air duct. Remove motor.

(Continued on page 13)
Motor Housing

DISASSEMBLY  (CONTINUED FROM PAGE 12)

9. Remove (2) lower air duct screws from inside motor housing then remove the foam that covers wire harness.

10. Housing should look like this after the foam and air duct are removed.

11. Turn vacuum over and remove (8) screws.

12. Slide duct flex hose from powerhead.

(Continued on page 14)
DISASSEMBLY (CONTINUED FROM PAGE 13)

13. Remove (2) wheel clamp screws on left and right wheels.

14. Remove wheels and pivot bearings. Pull wire harness through body housing.

15. Remove exhaust filter.

To Reassemble. Repeat steps in reverse.
WAND GUIDE – For XP Models Only

1. Separate left wand guide from right wand guide by inserting two fingers between two guides. Use a flat tip screwdriver with opposite hand to unsnap lock latches and pry open wand guides using your two fingers.

2. Switch Installation. Seat switch into the left wand guide. Snap lock latches together all the way up both sides of the wand guides.

Note: Use care in prying open latches with screwdriver so as not to break tabs.
WIRE HARNESS REPLACEMENT

1. Remove handle and power cord. Open bag housing cover. Remove Intercept Micro Filter.

2. Remove switch cover screw.

3. Remove switch cover and filter lockout switch. To remove the switch cover, insert a flathead screwdriver under switch lever and gently pry upward.

4. Remove crimps by pressing locking tab on connector.

(Continued on page 17)
5. Remove (4) bag housing screws and remove bag housing.

6. Remove the bag full indicator tube (tube not pictured) from the bulkhead and lift off the bulkhead.

7. Remove upper motor mount.

8. Disconnect motor crimps from motor and remove motor.

(Continued on page 18)
WIRE HARNESS REPLACEMENT (CONTINUED FROM PAGE 17)

9. Remove (2) lower air duct screws from inside motor housing then remove the foam that covers wire harness.

10. Cut lower wire harness between the motor housing and the base assembly. Pull the air duct system, air duct hose and lower wire harness out of the motor housing.

11. Insert new power nozzle wire harness in motor housing, locking brass fitting into position as shown.

Note: Rotate brass fitting so it cannot be trapped by the lower duct.

(Continued on page 19)
Install lower duct assembly and foam. Tighten (2) screws. Wire harness should remain behind lower duct assembly. Reinstall foam as shown.

Connect wires as shown – Red to red. White to white.

Note: The two black wires are threaded up through the wand guide.

Replace vacuum motor as shown.

Note: motor must be properly seated. It is properly seated when the motor can no longer rotate easily. The bulkhead will not fully seat over the motor housing if the motor is not properly installed.
16. Replace sound foam and install the motor mount.

17. Tuck wires below bulkhead, leaving the bag full indicator tube out to insert into the bulkhead as shown. If the bulkhead does not seat firmly onto the motor housing, you must adjust the motor until the motor is properly installed.

18. Pull wires up through housing – one on each side.


(Continued on page 21)
WIRE HARNESS REPLACEMENT (CONTINUED FROM PAGE 20)


21. To replace lower wire harness remove (8) baseplate screws and turn vacuum back over to remove base cover.

22. Disconnect all wire connections.

23. Remove wire ties. Remove the circuit breaker and power nozzle lockout switch. Do not remove power nozzle motor.
   *ProCare models do not have a power nozzle lockout switch.

(Continued on page 22)
WIRE HARNESS REPLACEMENT (CONTINUED FROM PAGE 21)

24. Remove screw that holds the cover and air duct.

25. Thread the air duct hose into the motor housing, turning counter clockwise.

26. Put the hose sleeve into the other end of the hose and position in the base assembly. Replace the cover, air duct, and screw.

27. Connect wires as shown and verify orientation of switches.

(Continued on page 23)
TO PERFORM A FUNCTION TEST:

1. Reinstall handle assembly and cord.
2. Install Intercept Micro Filter.
3. Plug in vacuum and turn vacuum on in the number two (II) position.
4. Powerhead motor should be running. Release vacuum from upright locked position.
5. The brush roll motor should stop and the red warning light should light up. Release the switch and the powerhead should go back to normal operation.
6. Turn the vacuum on in position number one (I). The vacuum motor should be on. Pull out the wand and cover the end of the wand with your hand. This will simulate blockage and the bag full light should come on. Take your hand off the end of the wand and the light should turn off. If your vacuum passes these tests, your vacuum is ready to use.
REMOVING CARBON BRUSHES

1. Disconnect wire from carbon brush.
2. Remove both locking connectors with small flat tip screwdriver. Press brass tab (inside bracket) down so it is flush with brush.
3. Using pliers (or fingers), carefully grasp tab and remove carbon brush from bracket.

INSTALLING CARBON BRUSHES

1. Insert carbon brush into bracket.
2. Carefully bend brass tab slightly upward with small flat tip screwdriver.
**ASSEMBLY**

1. Insert braces.

2. Install motor, brush roll, and belt. Be careful. Do not attempt to over-tighten screws.

3. Additional components:
   a) Install sleeve and hose.
   b) Install duct cover.
   c) Install electronic components, Vacuum Operation Indicator Board, circuit breaker, and power nozzle lockout switch (lockout switch XP models only – not pictured).
   d) Attach jumper wire to Vacuum Operation Indicator Board.
   e) Make sure components are properly seated in the base.

Fully assembled power nozzle (bottom view).
Power Nozzle to Body Assembly

ASSEMBLY

1. Place axle sleeve onto motor axle, making sure the shoulder is facing the motor housing. Put wheel onto motor housing axle.

2. Wheel axles on the motor housing should be placed in the grooves on the power nozzle base. Wheel clamps are then put into place and screwed down. Power nozzle cover will then be placed on top of the base.

3. Flip the unit and fasten cover to power nozzle base using (8) screws.
HOSE SLEEVE REPLACEMENT

1. Remove (8) screws from base plate. Turn vacuum over and pull base cover off powerhead.

2. Unclip circuit board and move aside.

3. Unscrew air duct cover.

PIVOT BEARING REPLACEMENT/WHEEL REPLACEMENT

1. Remove 8 screws from base plate.

2. Turn vacuum over and pull base cover off powerhead.

3. Remove right and left rear wheel clamps.

4. Lift bag housing from powerhead and remove wheel.

5. Remove old pivot bearing. Install new pivot bearing.

To Reassemble.
Repeat steps in reverse.
DETENT SPRING REPLACEMENT

1. Place vacuum on flat surface in unlocked position exposing detent springs.

2. Use needle nose pliers to remove detent spring if there is adequate spring to grab.

3. If there is not enough detent spring to remove with pliers use a flat head screwdriver to pry out broken spring.

4. Place new detent spring into spring slot in vacuum power head as shown.

5. Push down on detent spring until fully seated.
WAND AND HOSE APPLY TO XP MODELS ONLY

Power Cord with Strain Relief

Hose Assembly with Cuffs

Quick Release Hose Clip

Quick Release Hose Cuff

Wand

Carry Handle with Tool Caddy for XP Model

Handle Assembly Screw for XP Model

Carry Handle with Tool Caddy for Base Model

Handle Assembly Screw for Base Model

Cord Retention Clip
Handle

HANDLE ASSEMBLY

1. Use a flathead screwdriver (fig. 1) to pry bottom of switch from the handle body. Disconnect all wires from switch posts by depressing locking tab on base of crimps. (fig. 2)

2. Remove screw at base of handle and remove from handle tube (fig. 3).

3. Feed handle wire harness through new handle and replace screw at the base of the handle (fig. 4).

(Continued on page 34)
**HANDLE ASSEMBLY** (CONTINUED FROM PAGE 33)

4. Feed wires through opening on handle bezel.

5. Using the diagram provided above, attach wires to switch. Orient the switch box with the II position on the down side.
   a) Attach the first plug on the brown wire to the middle left spade.
   b) Attach the first plug on the blue wire to the lowest left spade. Wait to attach the last blue plug.
   c) Wrap the second brown plug underneath blue and attach to the middle right spade.
   d) Attach the last blue plug to the upper right spade. The bottom right spade will remain unattached.
   e) Connect the red wire to the top right spade.

6. When finished with steps a) through e) your final wire connection configuration should appear as above.

Install the switch into the handle bezel. Place the long BLUE, BROWN, then RED wires between the screw bosses in that order (as shown). BROWN and BLUE wire loops must be positioned above the screw bosses on the handle bezel as shown.

*(Continued on page 35)*
HANDLE ASSEMBLY (CONTINUED FROM PAGE 34)

7. Switch must remain flat to the handle bezel when installed into handle body as shown.

8. Press the switch into place in the handle bezel. The II position should be closest to the front of the bezel.

9. Lay the long red, brown and blue wires between the circular shoulders and gently place handle bezel into handle.

10. Slide tab A into handle slot B and press firmly into place at C. Be sure all switch wires are routed between screw bosses to ensure that the wires do not get damaged. Insert screws into bezel (fig. 5).
NEW CORD AND STRAIN RELIEF REPLACEMENT

1. Use a flathead screwdriver and hammer to push the strain relief towards the handle. Snap off remaining strain relief.

2. Remove screw from carry handle and remove carry handle.


4. Feed new strain relief clasp over the new power cord. Slide strain relief up to the groove on the power cord and snap strain relief clasp into place.

**NOTE:** Use care when sliding the strain relief clasp over the handle tube bushing so as not to damage bushing.

(Continued on page 37)
5. Slide handle tube through opening in strain relief. Align holes on strain relief and handle tube. Insert new ratchet fastener in hole and push flush.

6. Plug in new cord and slide handle tube into handle sleeve on motor housing. Press firmly down on handle to ensure it is fully seated. Install cord retension clip next to power cord. Install screw and tighten.

7. Use flathead screwdriver to reattach carry handle to handle tube. Ensure proper alignment of carry handle by verifying bag cover closure.
HANDLE INSTALLATION

1. Insert the handle tube into the channel on the bag housing and press downward until it is 2-3 inches inside the channel. It will be correctly inserted when the handle bushing hole in the handle tube aligns with the nut plate hole in the bag housing.

2. Insert ratchet fastener into cord clasp opening by pushing with thumb to connect cord to handle.

3.
### IMPACT BUMPER INSTALLATION

1. Using a Phillips Head screwdriver, remove screw from cord wrap bracket. Discard screw only.

2. Place new washer on new screw and insert into impact bumper. Place old washer on end of screw. **Note:** Make sure spring is installed as shown above.

3. Insert impact bumper assembly into cord wrap bracket. **Note:** Screw should be inserted inside spring from original assembly. Do not over tighten.
ASSEMBLY

1. Install all 3 filters:
   (a) Intercept Micro Filter
   (b) Motor Intake Filter
   (c) Exhaust Filter

2. Install Power Cord and Handle with Over Mold and Decal. Attach with Handle Tube Bushing and Carry Handle with Tool Caddy.

CLEARING HOSE AND WAND OBSTRUCTIONS – XP MODELS

CLEARING THE BRUSH ROLL
Obstructions such as hair, string, and throw rugs may cause the red brush indicator light to be illuminated and the power nozzle to shut off.

1. Turn off vacuum and unplug power cord from outlet.
2. On underside of vacuum, pull out, or cut away, obstructions on the brush roll. (Figure A)
3. Press the reset button on top side of powerhead. Plug-in power cord, and restart motor (Figure A).

CLEARING HOSE & WAND
Obstructions in hoses and wands may reduce or eliminate suction.

1. Familiarize yourself with air flow path and possible obstruction locations (Figure B).
2. To determine obstruction location, remove wand from port. (Figure C). Turn on vacuum and place hand over wand opening to check for proper suction. If no suction exists, blockage is at location A or B (as shown in Figure B) and proceed to Step 3. If there is proper suction, the blockage is at location C or D (as shown in Figure B) and proceed to Step 5.
3. Open Bag Housing Cover (Fig. 1) and replace Intercept Micro Filter. A full filter will restrict airflow.
4. Remove hose from the bag housing cover by using the quick release tabs. (Fig. 2). Look into upper hose and wand. Shake or insert broom handle to clear any visible debris. Replace hose and wand on vacuum.
5. If blockage is not in the wand or upper hose, disconnect the lower air duct hose on the back of the power nozzle (Fig 3). Visually check the lower air duct hose for debris and remove. To check for unobstructed air flow, turn on vacuum and place hand over opening on lower air duct. If you feel proper suction, reconnect lower air duct and resume vacuuming. If blockage is not in lower air duct hose, proceed to step 6.
6. With bottom air duct hose and upper hose and wand disconnected, carefully insert a broom handle (or any similar item like a short length of hose, pipe, etc) approximately 14 inches into wand guide on top of vacuum housing (Figure D) to dislodge obstruction or debris. Debris should then drop or move into the lower air duct hose where you can then remove it with your hand (Fig 3).
7. Reconnect the lower air duct hose and upper hose assembly, and turn on the vacuum.
CLEARING HOSE AND WAND OBSTRUCTIONS – HEPA MODELS

CLEARING THE BRUSH ROLL
Obstructions such as hair, string, and throw rugs may cause the red brush indicator light to be illuminated and the power nozzle to shut off.

1. Turn off vacuum and unplug power cord from outlet.

2. On underside of vacuum, pull out, or cut away, obstructions on the brush roll. (Figure A).

3. Press the reset button on top side of powerhead. Plug-in power cord, and restart motor. (Figure A).

CLEARING HOSE & WAND
Obstructions in hoses and wands may reduce or eliminate suction.

1. Turn off vacuum and unplug power cord from outlet

2. Open Bag Housing Cover (Figure B) and replace Intercept Micro Filter. A full filter will restrict airflow.

3. Disconnect the lower air duct hose on the back of the power nozzle (Figure C). Visually check the lower air duct hose for debris and remove.

4. To check for unobstructed air flow, turn on vacuum with bag housing cover closed and place hand over opening on lower air duct (Figure C). If you feel proper suction, reconnect lower air duct and resume vacuuming. If blockage is not in lower air duct hose, proceed to step 5.

5. Carefully insert a broom handle (or any similar item like a short length of hose, pipe, etc.) approximately 14 inches into guide on top of vacuum housing (Figure D) to dislodge obstruction or debris. Debris should then drop or move into the lower air duct where you can then remove it with your hand.

6. Reconnect the lower air duct and upper hose assembly. Close bag housing cover and power on the vacuum.