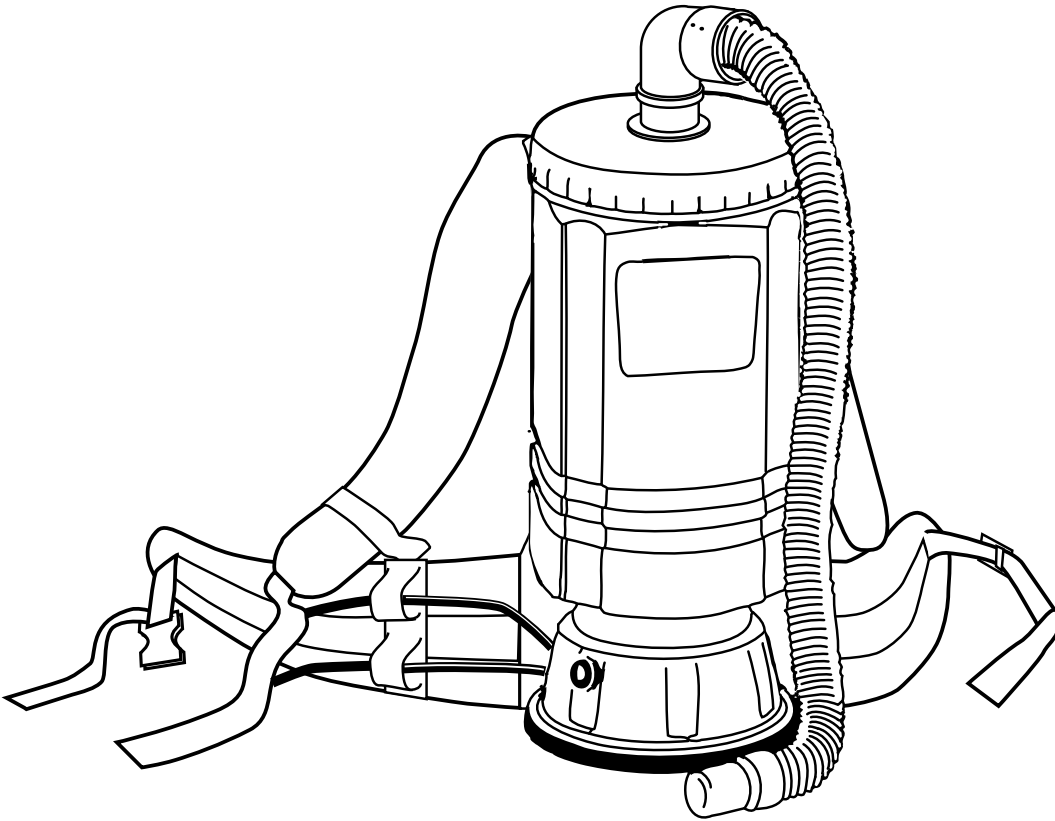




# KÄRCHER

MODEL:            BV11/1    10140120



---

***Read instructions before operating the machine.***

Operating Instructions (ENG)

## **MACHINE DATA LOG/OVERVIEW**

Model: \_\_\_\_\_

Date of Purchase: \_\_\_\_\_

Serial Number: \_\_\_\_\_

Sales Representative: \_\_\_\_\_

Address: \_\_\_\_\_

Phone Number: \_\_\_\_\_

# TABLE OF CONTENTS

*Machine Data Log/Overview* .....2  
*Table of Contents*.....3

## HOW TO USE THIS MANUAL

*How to use this Manual*..... 1-1

## SAFETY

*Important Safety Instructions* .....2-1  
*Hazard Intensity Level*. ....2-2  
*Grounding instructions* .....2-3  
*Safety Label Location* .....2-4

## OPERATIONS

*Technical Specifications*. ....3-1  
*Equipment Set-Up*.....3-2  
*Machine Operation*.....3-2

## MAINTENANCE

*Daily Maintenance* .....4-1  
*Wiring Diagram* .....4-1  
*Machine Troubleshooting*.....4-2  
*Service Schedule*. ....4-2

## PARTS LIST

*BV 11/1* .....5-1  
*Accessory Tools and Kits*.....5-3  
*Suggested Spare Parts*.....5-5  
*Serial Numbers* .....5-5

## HOW TO USE THIS MANUAL

This manual contains the following sections:

- HOW TO USE THIS MANUAL
- SAFETY
- OPERATIONS
- MAINTENANCE
- PARTS LIST

The HOW TO USE THIS MANUAL section will tell you how to find important information for ordering correct repair parts.

Parts may be ordered from authorized dealers. When placing an order for parts, the machine model and machine serial number are important. Refer to the MACHINE DATA box which is filled out during the installation of your machine. The MACHINE DATA box is located on the inside of the front cover of this manual.

The model and serial number of your machine is located on the bottom back-end of the machine.

The SAFETY section contains important information regarding hazardous or unsafe practices of the machine. Levels of hazards are identified that could result in product damage, personal injury, or severe injury resulting in death.

The OPERATIONS section is to familiarize the operator with the operation and function of the machine.

The MAINTENANCE section contains preventive maintenance to keep the machine and its components in good working condition.

The PARTS LIST section contains assembled parts illustrations and corresponding parts list. The parts lists include a number of columns of information:

- **REF** – column refers to the reference number on the parts illustration.
- **PART NO.** – column lists the part number for the part.
- **PRV NO.** - reference number.
- **QTY** – column lists the quantity of the part used in that area of the machine.
- **DESCRIPTION** – column is a brief description of the part.
- **SERIAL NO. FROM** – If this column has an (\*) and a Reference number, see the SERIAL NUMBERS page in the back of your manual. If column has two asterisk (\*\*), call manufacturer for serial number. The serial number indicates the first machine the part number is applicable to. The main illustration shows the most current design of the machine. When a boxed illustration is shown, it displays the older design.
- **NOTES** – column for information not noted by the other columns.

# **IMPORTANT SAFETY INSTRUCTIONS**

**When using an electrical appliance, basic precaution must always be followed, including the following:**

** **WARNING:** READ ALL INSTRUCTIONS BEFORE USING THIS MACHINE.**

**To reduce the risk of fire, electric shock, or injury:**

Do not leave the 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, had been dropped, damaged, left outdoors, or dropped into water, return to an authorized service center.

Do not pull or carry by cord, use cord for handle, close a door on cord, or pull cord around sharp edges or corners. Keep cord away from heated surfaces.

Do not unplug by pulling on cord. To unplug, grasp the plug, not the cord.

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 airflow.

Do not operate without dust bag and filter in place.

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.

Do not pick up anything that is burning or smoking, such as cigarettes, matches, or hot ashes.

This machine is not suitable for picking up hazardous dust.

Maintenance and repairs must be done by qualified personnel.

Connect to a properly grounded outlet. See grounding instructions.

## **SAVE THESE INSTRUCTIONS**

## **HAZARD INTENSITY LEVEL**

The following symbols are used throughout this guide as indicated in their descriptions:

### **HAZARD INTENSITY LEVEL**

There are three levels of hazard intensity identified by signal words -**WARNING** and **CAUTION** and **FOR SAFETY**. The level of hazard intensity is determined by the following definitions:



**WARNING** - Hazards or unsafe practices which COULD result in severe personal injury or death.



**CAUTION** - Hazards or unsafe practices which could result in minor personal injury or product or property damage.

#### ***FOR SAFETY: To Identify actions which must be followed for safe operation of equipment.***

Report machine damage or faulty operation immediately. Do not use the machine if it is not in proper operating condition. Following is information that signals some potentially dangerous conditions to the operator or the equipment. Read this information carefully. Know when these conditions can exist. Locate all safety devices on the machine. Please take the necessary steps to train the machine operating personnel.

#### ***FOR SAFETY:***

**DO NOT OPERATE MACHINE:**

Unless Trained and Authorized.

Unless Operation Guide is Read and understood.

In Flammable or Explosive areas.

In areas with possible falling objects.

#### ***WHEN SERVICING MACHINE:***

**Avoid moving parts. Do not wear loose clothing; jackets, shirts, or sleeves when working on the machine. Use manufacturer approved replacement parts.**

## GROUNDING INSTRUCTIONS

**THIS PRODUCT IS FOR COMMERCIAL USE ONLY.**

### ELECTRICAL:

In the USA this machine operates on a standard 15 amp 115V, 60 hz, A.C. power circuit. The amp, hertz, and voltage are listed on the data label found on each machine. Using voltages above or below those indicated on the data label will cause serious damage to the motors.

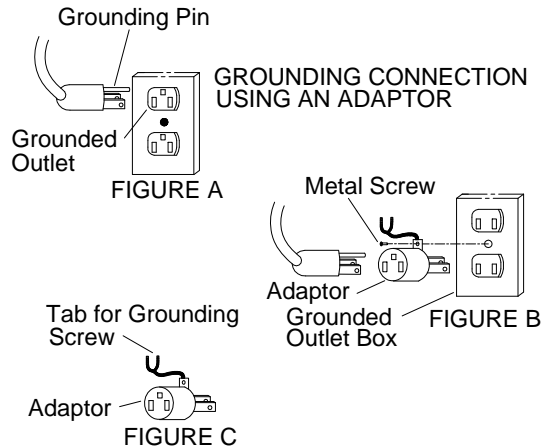
### EXTENSION CORDS:

A suitable extension cord is provided with this appliance. The safe operation of the appliance is dependent on the use of a suitable extension cord. If a cord other than the one provided is used, it must be type SJT, at least 16 gauge, and limited to no more than 50 feet in length.

### GROUNDING INSTRUCTIONS:

This appliance must be grounded. If it should malfunction or break down, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This appliance is equipped with a cord having an equipment-grounding conductor and grounding plug. The plug must be inserted into an appropriate outlet that is properly installed and grounded in accordance with all local codes and ordinances.

This appliance is for use on a nominal 120-volt circuit, and has a grounded plug that looks like the plug in "Fig. A". A temporary adaptor that looks like the adaptor in "Fig. C" may be used to connect this plug to a 2-pole receptacle as shown in "Fig. B", if a properly grounded outlet is not available. The temporary adaptor should be used only until a properly grounded outlet (Fig. A) can be installed by a qualified electrician. The green colored rigid ear, lug, or the like extending from the adaptor must be connected to a permanent ground such as a properly grounded outlet box cover. Whenever the adaptor is used, it must be held in place by a metal screw.



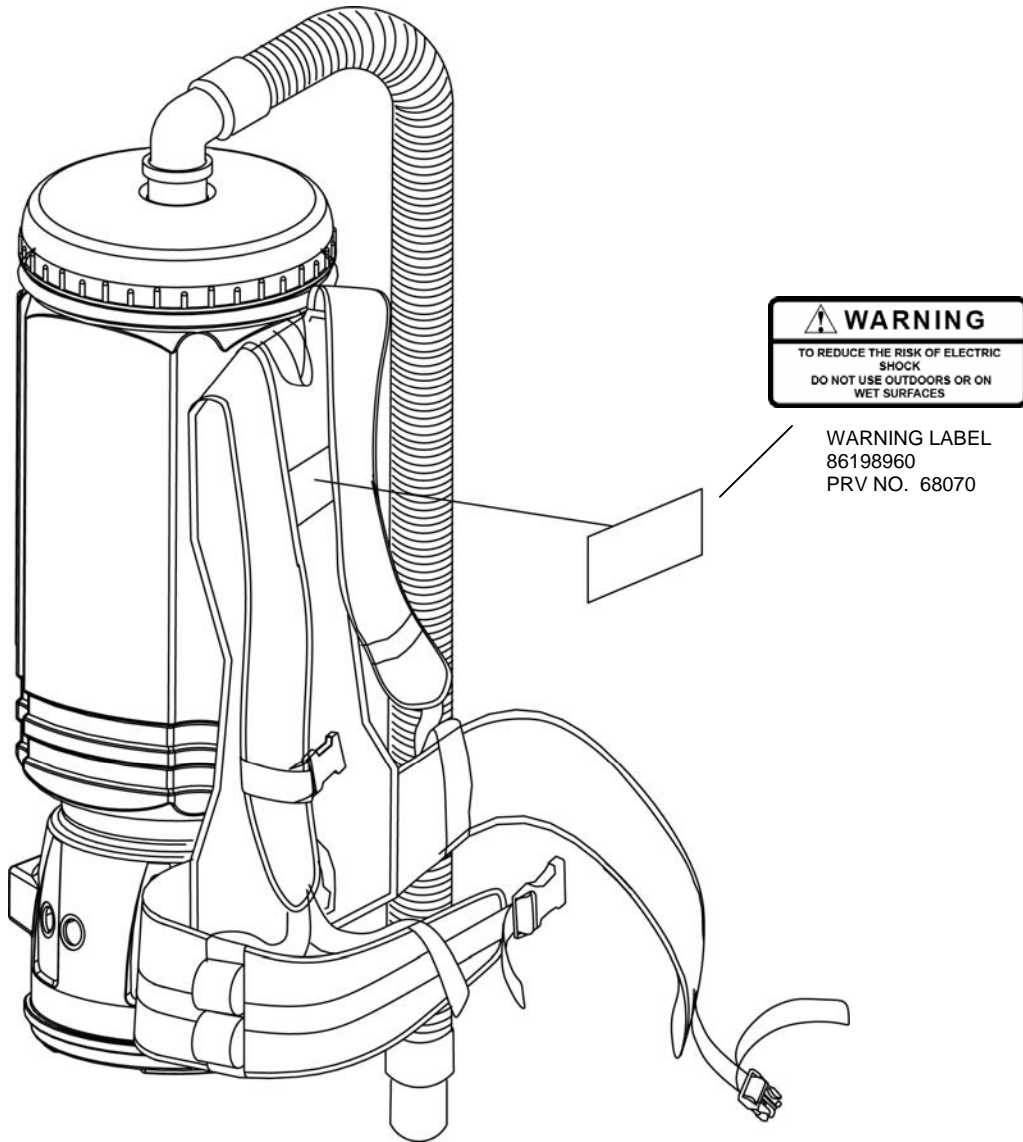
Note: Adaptors are not allowed in Canada.

## **! WARNING:**

Improper connection of the equipment-grounding conductor can result in a risk of electric shock. Check with a qualified electrician or service person if you are in doubt as to whether the outlet is properly grounded. Do not modify the plug provided with the appliance - if it will not fit the outlet, have a proper outlet installed by a qualified electrician.

## SAFETY LABEL LOCATION

*NOTE: This drawing indicates the location of safety label on the machine. If at any time the label becomes illegible, promptly replace it.*





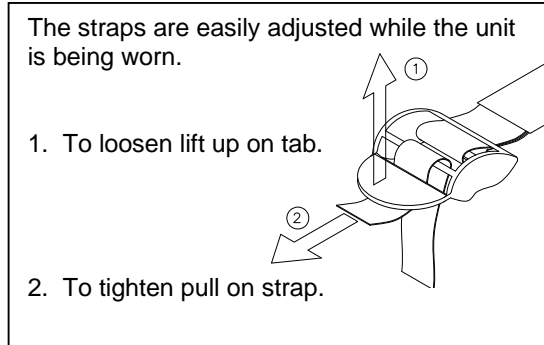
## TECHNICAL SPECIFICATIONS

ITEM	DIMENSION/CAPACITY
Power Type:	
Electrical:	115V, 8A, 60 Hz
Electric Vacuum Motor:	Single Stage = 1.6 HP, 80 CFM, (2.2 Cubic Meter/Min.)
Waterlift:	95 Inches of Water
Filter Bag:	BV 11/1 = 10 Quart
General Dimensions/Weight	
Vacuum Hose:	5' (1.5m) X 1.5" (3.8cm) Diameter
Weight:	11/1 = 11.0 Lb. (5.0 Kg)
Depth:	10.5" (267mm)
Height:	BV11/1 = 23.7" (602mm)
Width:	8.8" (224mm)
Power Cable:	50' (15.2m) (16 Gauge)

## MACHINE OPERATION

### EQUIPMENT SET-UP

1. Insert hose (90° swivel cuff end) into top of unit. Attach desired cleaning tool.
2. Unclip waist and sternum straps. Loosen shoulder straps and hip belt.



3. Put on unit by placing arms through shoulder straps and secure and tighten the hip belt.

(For the most comfort, adjust unit so that the hip belt covers the front hipbones and the bowed-out portion of the back padding rests on the small of the back.)

4. Tighten the shoulder straps to the point where the unit's weight just starts to pull down on the shoulders. Ideally most of the unit's weight will remain on the waist.
5. Adjust the sternum strap position to be high on the chest and tighten till comfortable.
6. Plug in power cord from machine into properly grounded wall outlet (see grounding instructions).

### OPERATION

The unit is a commercial vacuum designed for dry pick-up only.

1. Place a paper bag inside the cloth bag in the vacuum chamber. Be sure the foam filter is in place at the bottom of the chamber.
2. Attach the accessories to be used.
3. Put unit on back and adjust straps.
4. Plug unit into properly grounded wall outlet (see grounding instructions).
5. Turn machine on or off using switch on left side of machine.
6. To empty, remove the cover and dump paper bag into trash receptacle. Shake cloth bag vigorously each time paper bag is emptied to prevent soil build-up, which would clog filter.

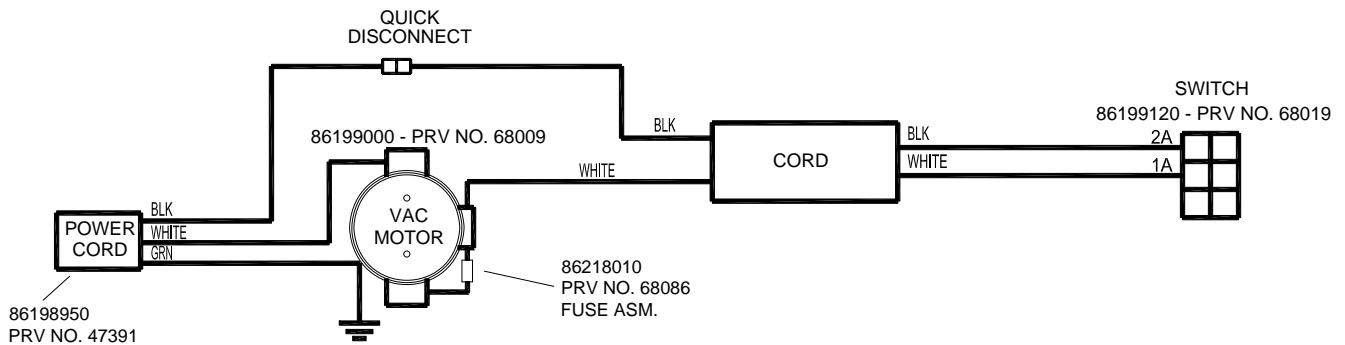
# MAINTENANCE & WIRING DIAGRAM

## DAILY MAINTENANCE

*(At the end of each working day)*

1. Turn cloth filter bag inside out and brush clean. Do not use a wire brush. Cloth bags can be vacuumed with another machine or washed occasionally in warm water using a mild, water-based soap without harming filtering capacity. Allow to dry completely before using.
2. Wipe down exterior of machine.
3. Check round foam filter at bottom of vac chamber and clean if necessary.
4. Inspect hose for wear. Frayed or cracked hoses should be replaced to avoid vacuum loss.
5. Inspect power cord for wear. To prevent electric shock, immediately replace cords with frayed or cracked insulation.

## WIRING DIAGRAM



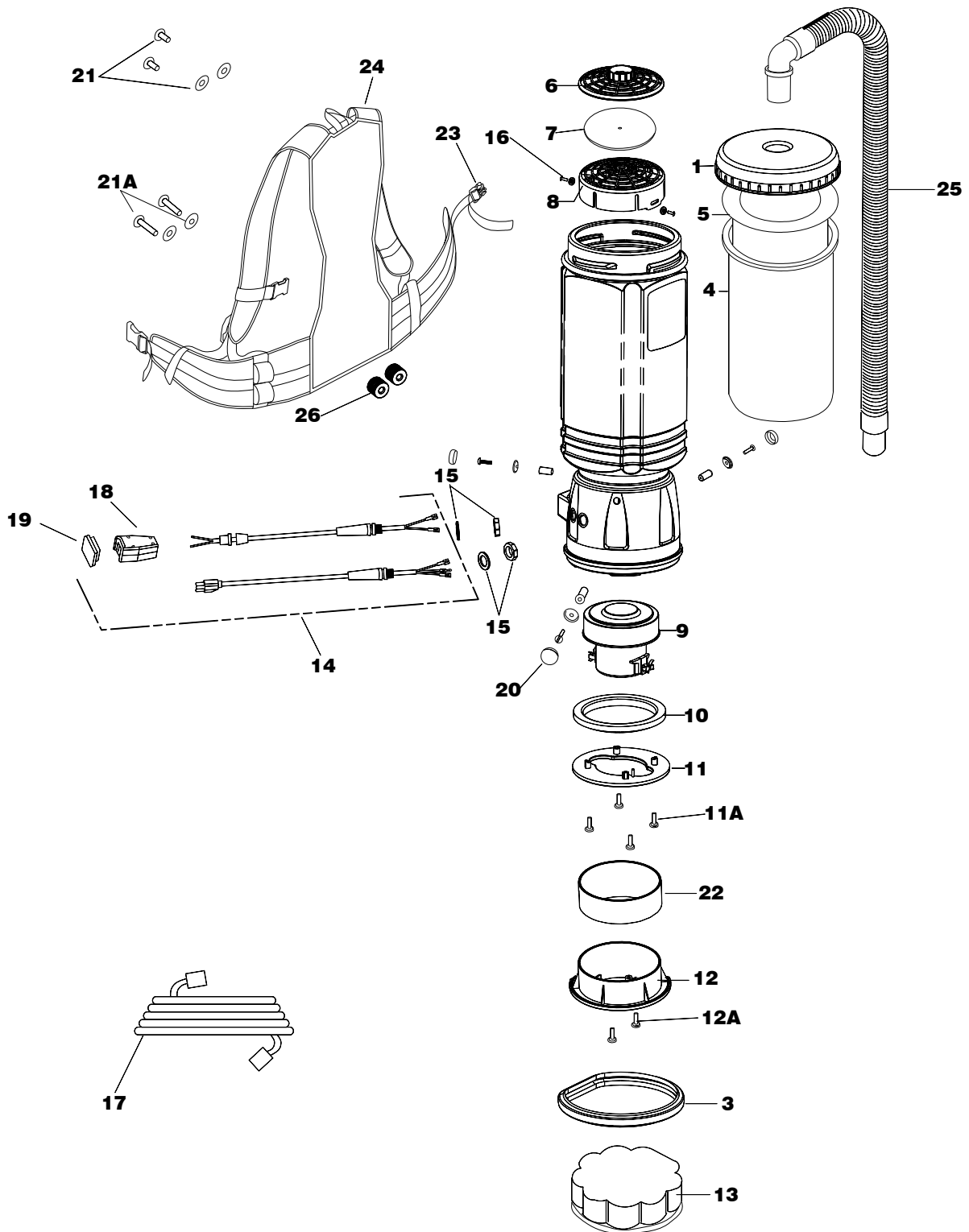
## TROUBLESHOOTING

PROBLEM.	CAUSE	SOLUTION
<b>No power, vacuum motor will not run</b>	Is the cord plugged in?	Plug in cord.
	Circuit breaker tripped in building.	Reset breaker.
	Thermal protector tripped	Motor will restart after cooling down. To prevent repeated tripping, clear all restrictions out of hose and tools, replace paper filter bag. Clean cloth filter bag and internal foam filter, clear all restrictions to the exhaust air flow.
	Faulty switch.	Call for service.
	Faulty power cord.	Call for service.
<b>Poor vacuum performance</b>	Debris plugging hose, wand or accessory tool.	Remove debris.
	Paper bag full.	Replace bag.
	Cloth bag plugged.	Remove from machine, turn inside out and shake or brush clean.
	Hosecuffs loose or hose cracked.	Tighten cuffs or replace hose.
	Cap loose on top of machine.	Tighten cap.

## SERVICE SCHEDULE

MAINTENANCE	DAILY	WEEKLY	MONTHLY	QUARTERLY
Check bag and replace if necessary	*			
Check hoses for wear, blockages, or damage	*			
Check major gaskets for leakage	*			
Check brush-should be clean with no lint or strings attached	*			
Wind cord and store in upright position	*			
Check hoses for cracks or holes		*		
Check all cords and handles for damage or cracks; replace as necessary		*		
Inspect and replace all filters including exhaust, intake, and microfilters			*	
Check all gaskets for wear and leakage			*	
Check vac motor carbon brushes				*
Check for arcing and pitting on any electrical contacts; replace if found				*
Inspect and clean vac shoe; check for dents and damage which would detrimentally effect vacuum and brush movement				*
Check overall performance of machine				*

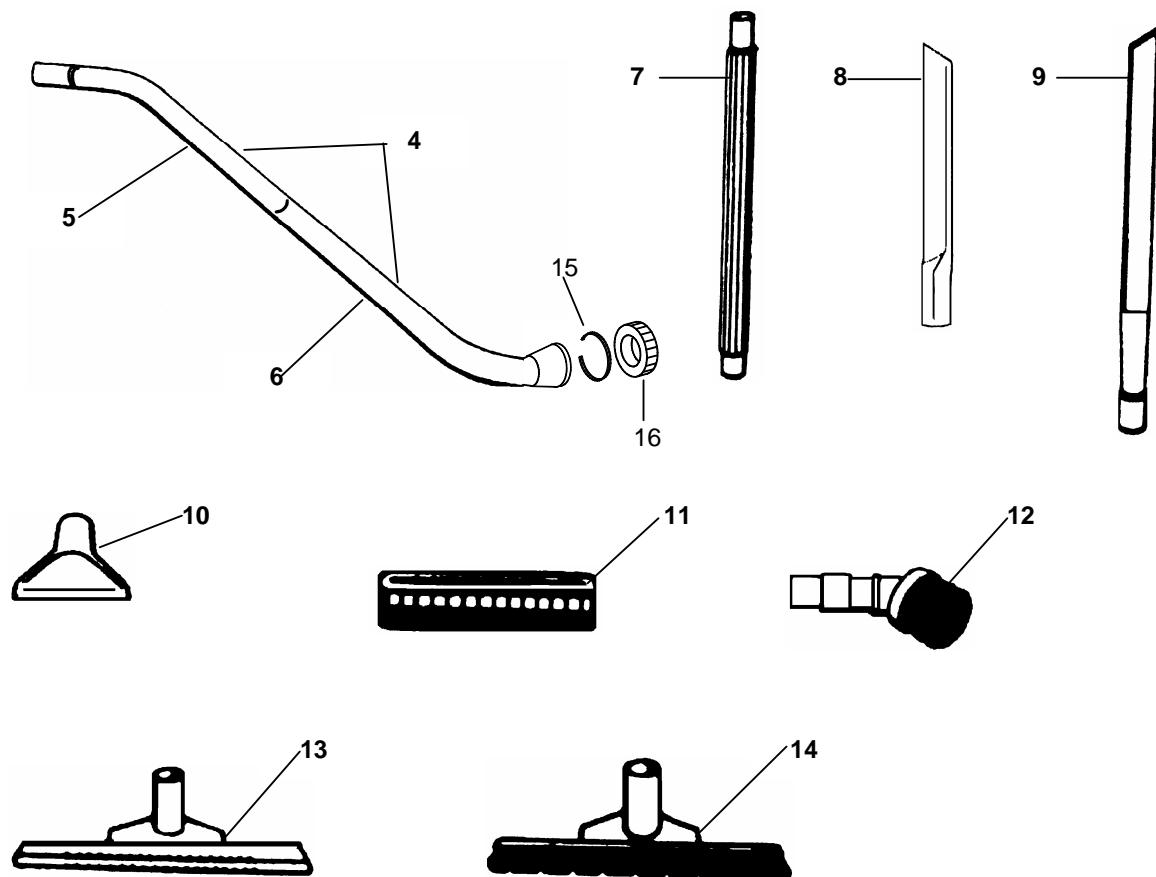
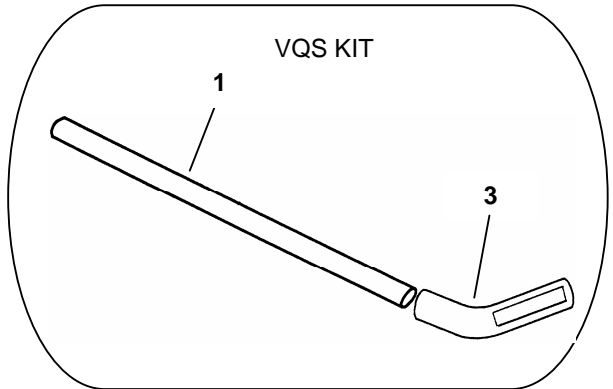
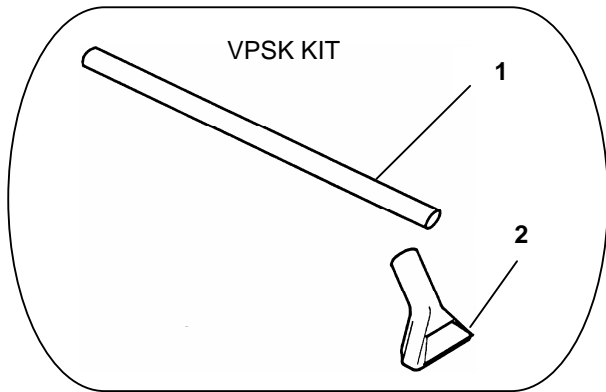
# VACPAC



# VACPAC

REF	PART NO	PART NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86198740	68000BLK	1	CAP, BLACK		
2	OPEN	-	-	-		
3	86198730	68003	1	BUMPER		
4	86198840	68004	1	FILTER BAG, MICRO-TEX (CLOTH) LG		
5	86198850	68005	1	FILTER BAG, MICRO (PAPER) LG 10/PKG		
6	86198860	68006	1	COVER, FILTER HOUSING		
7	86198870	68007	1	FILTER, DOME		
8	86198880	68008	1	HOUSING, FILTER		
9	86199000	68009	1	MOTOR, VACUUM 115V		
10	86199010	68010	1	SEAL, MOTOR		
11	86199050	68011	1	RING, MTR COMP W/ SCRS		
11A	86199070	68076	1	SCR, MTR COMP RING (4/PKG)		
12	86198790	68012	1	DIFFUSER, AIR W/ SCREWS		
12A	86199080	68077	1	SCR, AIR DIFFUSER (2/PKG)		
13	86198890	68013	1	FILTER, AIR/SOUND DIFFUSER		
14	86198950	47391	1	KIT, VP SWCH/PWR CORD, W/O BOX		
15	86199020	68015	2	NUT, STRAIN RELIEF W/ WASHER		
16	86198830	68082	2	FASTENER SET, FILTER HOUSING		
17	86198750	68017	1	CORD ASM, 50' EXTENSION		
18	86225100	72177	1	SWITCH BOX W/ SCREWS		
19	86199120	68019	1	SWITCH		
20	86198800	68020	3	FASTENER SET, MOTOR MOUNT		
21	86198810	68030	1	FASTENER SET, BACK PLATE (TOP)		
21A	86198820	68081	1	FASTENER SET, BACK PLATE (BTM)		
22	86198930	68092	1	FOAM, DIFFUSER		
23	86198990	68054	1	LATCH, WAIST BELT		
24	86312540	-	1	HARNES ASSY, VP6/VP10		
25	86198770	68066	1	HOSE ASSEMBLY		
26	86199090	68083	2	SPACER, BACK PLATE		

# ACCESSORY TOOLS AND KITS



## ACCESSORY TOOLS AND KITS

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86090220	89079	1	WAND, SPOTTER		VPSK, VQS
2	86063120	78263	1	TOOL, SPOT LITE		VPSK
3	86033020	78277	1	TOOL, QUICK SWEEP		VQS
4	86286660	02443	1	WAND, DOUBLE CURVE 2 PC. ALUM.		INCL 5, 6, 15 & 16
5	86199140	68062	1	WAND, UPPER		
6	86199150	68078	1	WAND, LOWER		INCL 15 & 16
7	86000090	02086	1	TUBE, 20" EXTENSION		
8	86198760	68068	1	TOOL, 16" CREVICE		
9	86284510	02293	1	TOOL, 28" PLASTIC CREVICE		
10	86000080	02084	1	TOOL, 5" UPHOLSTERY		
11	86283600	02085	1	BRUSH, UPHOLSTERY		
12	86000070	02083	1	BRUSH, 3" DUST		
13	86284450	02004	1	TOOL, CARPET		
14	86284440	02003	1	TOOL, BRISTLE SHOD DRY PICK-UP		
15	86199060	68094	1	RING, BOTTOM WAND		
16	86199030	68090	1	NUT, BOTTOM WAND		

## **SUGGESTED SPARE PARTS**

PART NO	PRV NO.	DESCRIPTION	NOTES:
86198840	68004	FILTER BAG, MICRO-TEX (CLOTH) LG	
86198850	68005	FILTER BAG, MICRO (PAPER) LG 10/PKG	
86198870	68007	FILTER, DOME	
86198890	68013	FILTER, AIR/SOUND DIFFUSER	
86218010	68086	FUSE ASM	
86198710	68097	BRUSH SET (PKG 2)	

## **SERIAL NUMBERS**

REF. NO.	MODEL: SERIAL #:
1	-