

Minuteman[®]
Excellence Meets Clean



**Parts and Instruction Manual
290 Series Stainless Steel Vacuum
4 & 6 Gallon**

This manual is furnished with each new **MINUTEMAN 290 Vacuum**. This provides the necessary operating and preventive maintenance instructions. Operators must read and understand this manual before operating or servicing this machine.

This machine was designed to give you excellent performance and efficiency. For best results and minimal cost, please follow the general guidelines below:

- Operate the machine with reasonable care.
- Follow the manufacturers suggested maintenance instructions as provided in this booklet.
- Use original Minuteman supplied parts.

Model No.	C29485-01	C29685-01
115V	C29486-01	C29686-01
230V		
Power	1.25 hp (1000W)	1.25 hp (1000W)
Tank Size	4 gal (15 ltrs)	6 gal (23 ltrs)
Dry Capacity	.21ft ³ (.006m ³)	.46ft ³ (.013m ³)
Wet Capacity	N/A	4.5 gal (17 ltrs)
Airflow	95 cfm (2.7m ³ /min)	95 cfm (2.7m ³ /min)
Waterlift	85 in (2159mm)	85 in (2159mm)
Decibel Rating	68 db	74 db
Weight	25 lbs (11 kg)	26lbs (12 kg)

EC Declaration of Conformity


according to Directives 72/23, 89/392 and 89/336

We, Minuteman International Incorporated, of 111 South Rohlwing Road Addison Illinois 60101 USA, declare under our sole responsibility that the products C29486-00-01-02-05-10 and C29686-01-06 Commercial Tank Vacuums to which this declaration relates corresponds to the relevant requirements of the EC Directives 72/23, 89/392 and 89/336. The following standards were used to determine compliance with the Directives: EN 292, EN 294, EN 811, EN 55014, EN 55104 and EN 60335-2-69.

SOUND	
74 dB Machine	69 dB At 3m
Tests were conducted on 6/12/00 with calibrated sound equipment under the conditions noted below:	
General Condition: Indoors Temperature: 22°C Barometric Pressure: 29.2	Wind: 0 km/hr Humidity: 40%



Jeff Pollack, Standards Engineer



Date

Form: EC062

Table of Contents

INSPECTION	2
ELECTRICAL	2
115 Volt	2
240 Volt	2
GROUNDING INSTRUCTIONS	2
USER MAINTENANCE INSTRUCTIONS	3
CLOTH BAG & HOSE ASSEMBLY	3
CORD STORAGE	3
Exploded Views	7
Bag Assembly	7
Lid Assembly (Dry Only)	8
Lid Assembly (Dry Only) BOM.....	9
Lid Assembly (Wet/Dry)	10
Lid Assembly (Wet/Dry) BOM.....	11
Tank Assembly	12
Industrial Tools and Accessories	13
Model C29485-01, C29486-01	13
Model C29685-01, C29686-01	14
Wiring Diagrams	15
Minuteman International Made Simple Commercial Limited Warranty	16

FOR COMMERCIAL USE ONLY IMPORTANT SAFETY INSTRUCTIONS

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

READ ALL INSTRUCTIONS BEFORE USING

WARNING - 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, cleaning or maintaining.

WARNING: C29685-01 / C29686-01 Wet & Dry

To reduce the risk of electric shock - Do not expose to rain. Store indoors.

WARNING: C29485-01 / C29486-01 Dry Only

Electric shock could occur if used on wet surfaces. Do not expose to rain and store indoors.

- 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 center.
- 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.
- Do not pick up anything that is burning or smoking, such as cigarettes, matches, or hot ashes.
- Do not use without dustbag and/or filters in place.
- 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

INSPECTION

Carefully unpack and inspect your machine for shipping damage. Each unit is tested and thoroughly inspected before shipment, and any damage is the responsibility of the delivery carrier who should be notified immediately.

ELECTRICAL - 115 Volt

This machine is designed to operate on a standard 15 amp, 115 volt, 60 hz, AC circuit. Voltages below 105 volts AC or above 125 volts AC could cause serious damage to the motor.

ELECTRICAL - 240 Volt

This machine is designed to operate on a standard 10 amp, fused 230 volt, 50 hz, AC circuit.

WARNING

Electric motors can cause explosions when operated near explosive materials or vapors. Do not operate this machine near flammable materials such as solvents, thinners, fuels, grain dust, etc.

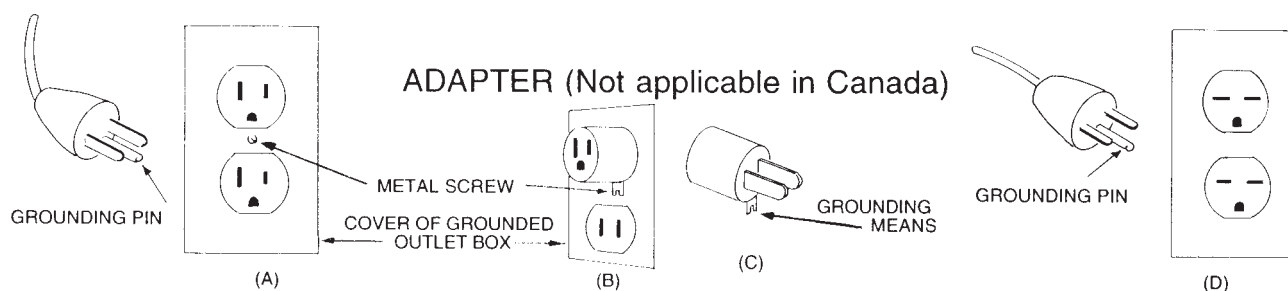
GROUNDING INSTRUCTIONS

This appliance must be grounded. If it should malfunction or breakdown, 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 plugged into an appropriate outlet that is properly installed and grounded in accordance with all local codes and ordinances.

DANGER - 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.

This appliance is for use on a nominal 120 volt circuit and has a grounding plug that looks like the plug illustrated in Sketch A below. Make sure that the appliance is connected to an outlet having the same configuration as the plug. No adapter should be used with this appliance.

For equipment rated 150-250 volts: If the machine is provided with an attachment plug as shown in Sketc B, it is intended for use on a 240 volt (nominal) circuit. No adapter is available for this plug.



USER MAINTENANCE INSTRUCTIONS

All service and repair should be performed by qualified vacuum service representative or electrician. No user serviceable components are employed in the electrical vacuum lid head assembly. No lubrication of the motor is required.

CLOTH BAG & HOSE ASSEMBLY

Cloth bag and hose assembly are user maintenance items and can be replaced when worn out. Cloth bags can be maintained by blowing dust off of the bag and then laundering. Cloth bags should be completely dried before re-installing into machine. For optimum performance, empty and clean filter bag regularly. A clogged and dirty bag restricts the flow of air and results in reduced vacuum. Wet & Dry Models only: Remove the dry dust filter bag. Check the automatic shut-off to be certain it is working properly. The hose assembly can be maintained by wiping off with a dampened cloth of mild liquid soap and water, then allowed to dry.

CORD STORAGE

While not in use storage can be accomplished by winding cord around motor lid assembly. Cord should be completely unwound from lid assembly during operation.

- 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 service center.
- Do not pull or carry by cord, use cord as 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 cord. To unplug, grasp the plug, not the cord.
- Do not handle plug or appliance with wet hands.

Always unplug the machine when removing the motor head off the tank. This equipment should be stored indoors and not exposed to rain.

POUR USAGE COMMERCIAL SEULEMENT

MODE D'EMPLOI SÉCURITAIRE

Lors d'utilisation d'appareils électriques on doit toujours suivre des mesures de précaution de base:

LIRE TOUTES LES INSTRUCTIONS AVANT D'UTILISER

AVERTISSEMENT: Pour réduire le risque de feu, choc électrique ou blessures

- Ne jamais déserrer l'appareil quand il est branché

AVERTISSEMENT

Pour éviter des chocs électriques ne pas exposer à la pluie, entreposer à l'intérieur.

- Ne pas s'en servir comme jouet, faire bien attention si près des enfants.
- Utiliser seulement tel que recommandé par le fabricant.
- Ne pas s'en servir si le cordon ou la prise électrique est brisée. Si l'appareil ne travaille pas tel que convenu, si elle a été échappée, laissée à l'extérieur ou elle est tombée dans l'eau retournez l'appareil à un centre de service.
- Ne tirer pas le cordon et ne pas vous en servir comme poignée. Ne marcher pas sur le cordon. Éviter les surfaces trop chaudes.
- Ne débranchez pas en tirant sur le cordon. Pour débrancher capter la prise et non le cordon.
- Ne manipulez pas avec les mains trempées.
- Ne mettez rien dans les ouvertures.
- N'utilisez pas si les ouvertures sont bouchées; Nettoyer les poussières, cheveux ou n'importe quoi qui pourrait réduire la vitesse d'air.
- S'assurer que toutes parties du corps tels que cheveux, linge, doigts sont éloignés des ouvertures.
- Ne ramasser rien qui est en feu tels que cigarettes, allumettes ou cendres.
- Ne pas s'en servir sans sacs filtres bien placés.
- Fermer tous les contrôles avant de Débrancher.
- Soyez très prudent en montant des escaliers.
- Ne ramasser pas de liquide combustible ou inflammable tel que gazoline ou dans les endroits où il y en aurait.
- Brancher seulement sur prise en bon ordre. Voir instructions pour brancher.

CONSERVER CES INSTRUCTIONS

ENTRETIEN DE L'APPAREIL PAR L'UTILISATEUR

Tout le service de même que réparations devraient être exécutés par un représentant de service qualifié ou un électricien. Aucun composant n'est employé dans cet aspirateur électrique et personne d'autre qu'un représentant qualifié devrait en faire le service. Aucune lubrification du moteur est nécessaire.

Filtre de tissu et Boyau

Le filtre de tissu et le boyau sont des items que l'utilisateur se doit de maintenir en bon ordre. Ils doivent être remplacés si usés. Ces sacs peuvent être nettoyés en enlevant la poussière et les lavent. Les sacs devraient ensuite être complètement asséchés avant de les remettre dans l'appareil. Pour une meilleure performance, vider et nettoyer ce sac filtreur régulièrement. Un sac bouché et sale restreint le débit d'air et réduit l'efficacité de l'aspirateur. Pour ramasser du liquide enlever le sac filtreur à sec. Vérifier la flote notnine no AC de fermeture pour être certain qu'elle fonctionne correctement. Le boyau peut-être entretenu en le nettoyant avec un linge humide soit avec savon et eau, ensuite laisser sécher.

Entreposage du cordon électrique

Quand entreposé on se doit d'enrouler le cordon alentour de la tête du moteur. Le cordon devrait être complètement dérouler de la tête du moteur durant la mise en opération.

- Ne pas s'en servir si le cordon ou la prise électrique est endommagée. Si l'appareil ne fonctionne pas comme il devrait ou s'il a été échapé, laisser à l'extérieur ou s'il a tombé dans l'eau, retourner. Le à votre dépôt de service.
- Ne le tirez pas ou ne le portez pas par le cordon électrique. Ne vous servez pas du cordon comme poignée. Ne fermer pas de portes sur le cordon ou tirer le cordon contre les coins aiguisés. Ne pas diriger l'appareil dessus le cordon et prener soin d'éloigner le cordon des surfaces chaudes.
- Ne pas débranchez en tirant sur ce cordon. Pour débrancher, saisir la prise et non le cordon.
- Ne pas manipulez la prise ou l'appareil avec les mains trempées

Débrancher toujours l'appareil quand vous enlevez le moteur du réservoir. Cet appareil devrait être entreposé à l'intérieur et n'être jamais exposé aux intempéries.

INSPECTION

Ouvrir prudemment et inspecter la machine au cas de dommage. Chaque machine est mise à l'épreuve et inspecté avant l'envoi et tout dommage est la responsabilité de la compagnie de transport qui devrait être avertie immédiatement.

ELECTRICITÉ

Cette machine est conçue pour opérer sur un circuit standard de 15 ampères 115 volt, 60 hz, sur un circuit AC. Du voltage de 105 ou au delà de 125 AC peut causer des dommages sévères au moteur.

AVERTISSEMENT

Les moteurs électriques peuvent causer de explosions dans un environnement près de matériaux explosifs ou vapeurs. Ne pas travailler près de solvants, gazoline poussière de grain, etc.

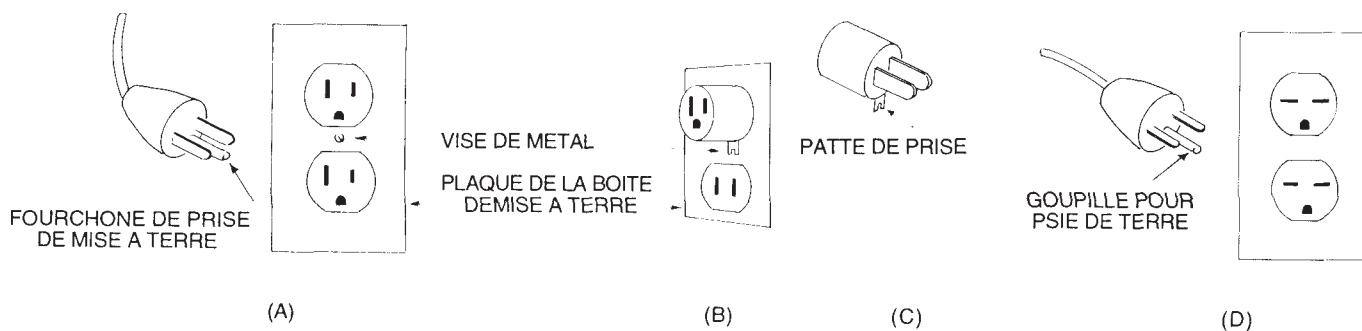
INSTRUCTIONS POUR BRANCHER

Cette machine doit avoir une prise de terre. Elle ne doit pas être brisée ou mal fonctionné. La prise de terre offre une voie de moindre résistance de façon à ce que le courant électrique réduise le risque de choc électrique. Cet appareil est équipé d'un cordon style prise de terre de même que la prise elle-même. Cette prise doit être placée dans une sortie électrique appropriée, bien installée avec prise de terre d'après les codes et ordonnances locales.

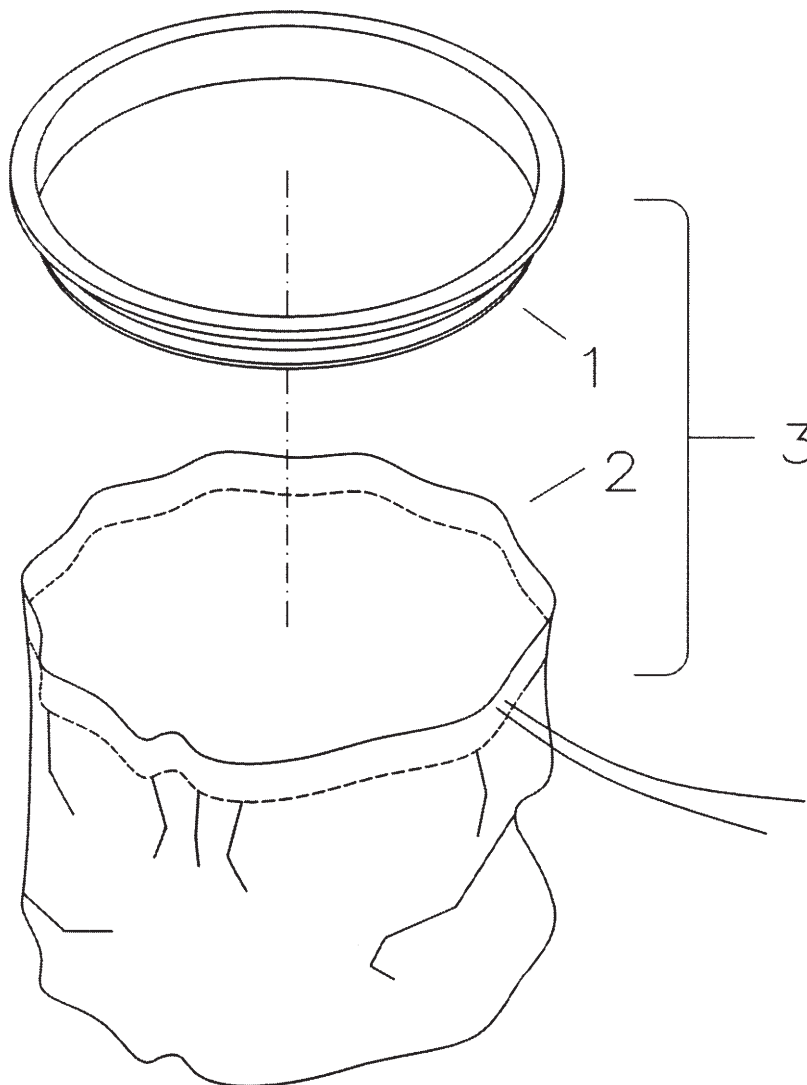
DANGER

Une mauvaise connexion de l'équipement ou du conducteur prise de terre pourrait causer un risque de choc électrique. Vérifier auprès d'un électricien qualifié ou un réparateur si en doute ou si la prise n'est pas bien installée. Ne changer pas la prise fournie avec l'appareil. Si elle est défectueuse contacter un électricien qualifié.

Cet appareil est conçu pour un circuit électrique de 120V et à une prise de terre qui ressemble au croquis A, au bas de cette page. Soyer certain que l'appareil est branché dans une sortie qui à la même configuration que la prise. Aucun adaptateur ne devrait être utilisé avec cet appareil.

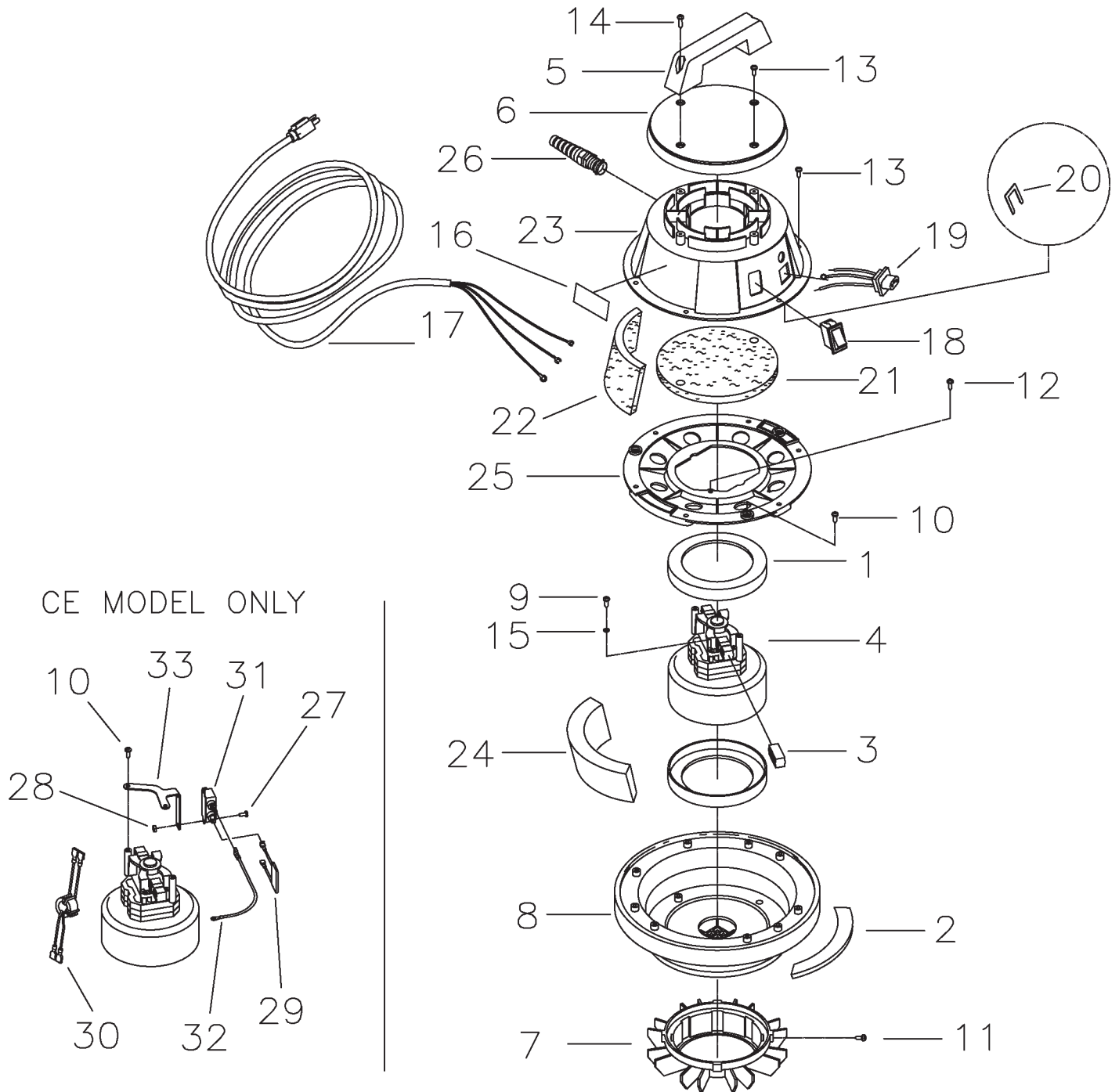


Exploded Views
Bag Assembly



Item	Part No.	Qty.	Description
1	760244	1	Bag Ring 4/6 PV Black
2	805043	1	Bag Only 4G
2A	805040	1	Bag Only 6G
3	805044	1	Cloth Bag Assy 4G
3A	805041	1	Cloth Bag Assy 6G

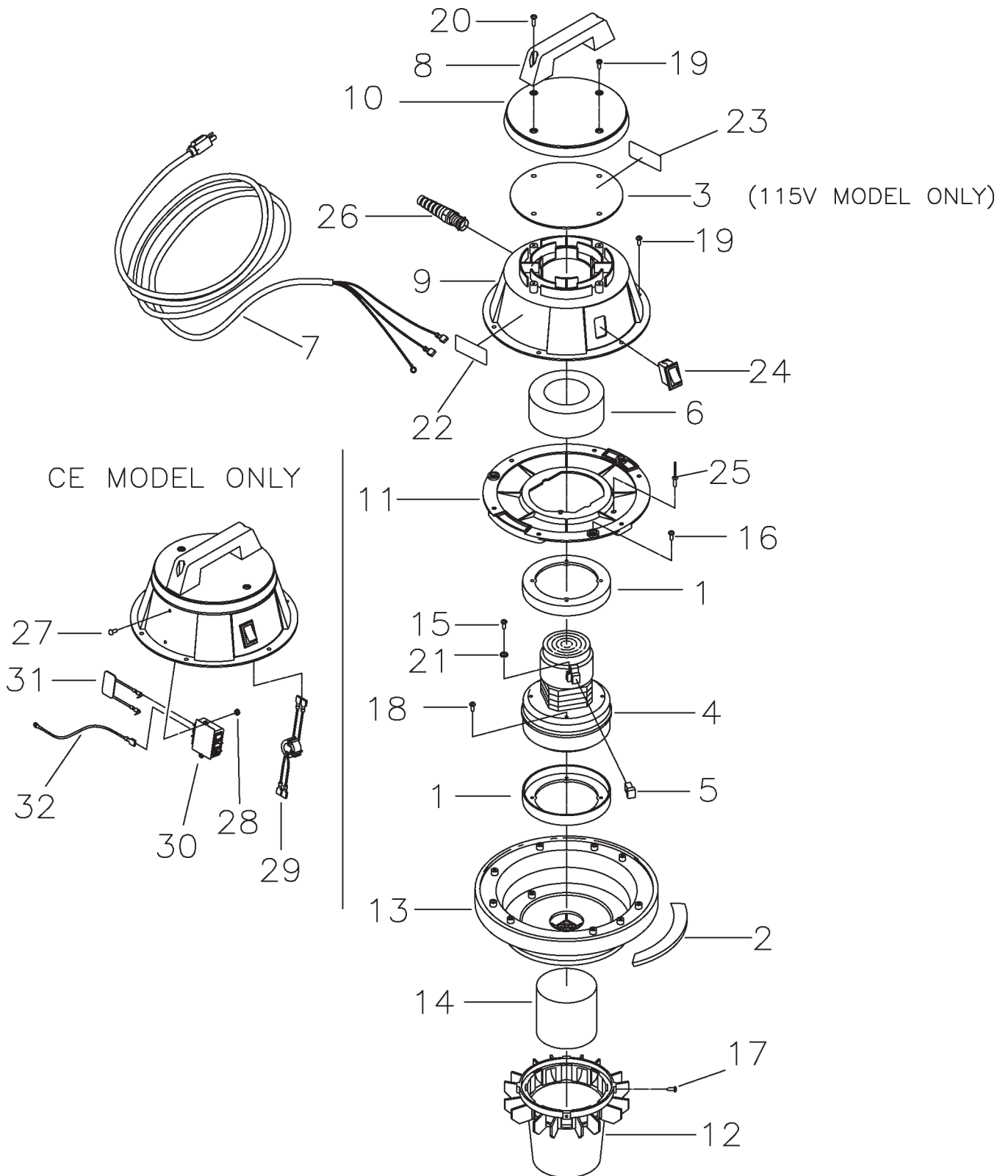
Lid Assembly (Dry Only)



Lid Assembly (Dry Only) BOM

Item	Part No.	Qty.	Description
1	290017	2	Molded Vac Motor Gasket
2	290031	1	Lid Gasket 294/6 Diecut
3	380005	2	Carbon Brush Replacement (ECM)
3A	380028	2	Carbon Brush Replacement
4	381001-4	1	Vac Motor 120V (ECM)
4A	381044-2	1	Vac Motor 240VAC w/Male QC Term
5	460001	1	Handle Basic 460 Black
6	460101	1	Motor Cap Black
7	460106	1	Bag Guard Black
8	460116	1	Motor Pan Assembly 294/6
9	711124	3	SCR-ST-B 10 x .37 NI
10	711125	3	SCR-ST-B 10 x .50 NI
11	711128	4	SCR-ST-B HI/LO 8 x .62 Zinc
12	711160	1	SCR HI/LO #10 x 5/8 Zinc
13	711161	8	SCR HI/LO #10 x 3/4 Zinc
14	711162	2	SCR HI/LO #10 x 1 1/2 Zinc
15	711553	1	WSR-Internal Lock #10
16	715015	1	Decal, Warning 1.25x2.75
17	740705	1	Cord 18GA-3 40FT Grey
17A	740600	1	Cord European F3 G1.5MM 50FT B
18	809754	1	Switch-Rocker
18A	809754CE	1	Switch-Rocker
19	831801	1	Receptacle
20	831801-1	1	Receptacle Clip
21	832197	1	Felt Upper Dome
22	832198	1	Felt Outer Dome
23	832201	1	Motor Lid Cover 294 Dry
24	832219	1	Diffuser Foam 27"
25	832637	1	Motor Hold Down 294
26	833237	1	Strain Relief w/ Nut
			CE Model Only
27	710328	2	SCR-MC 8-32 x .37 Zinc
28	711372	2	Nut-Nyloc 8-32
29	740613	1	Capacitor Assembly .1UF
30	742254-1	1	Torroid Assembly w/Wire Assy
31	742391	1	RFI Filter
32	744407	1	Wire Assy Grn/Yel 8.00"
33	832107	1	RFI Bracket 290 Series Vac
***	294110	1	Lid Assy. Complete 115V Dry
***	294220CE	1	Lid Assy. Complete 294 230V CE Dry

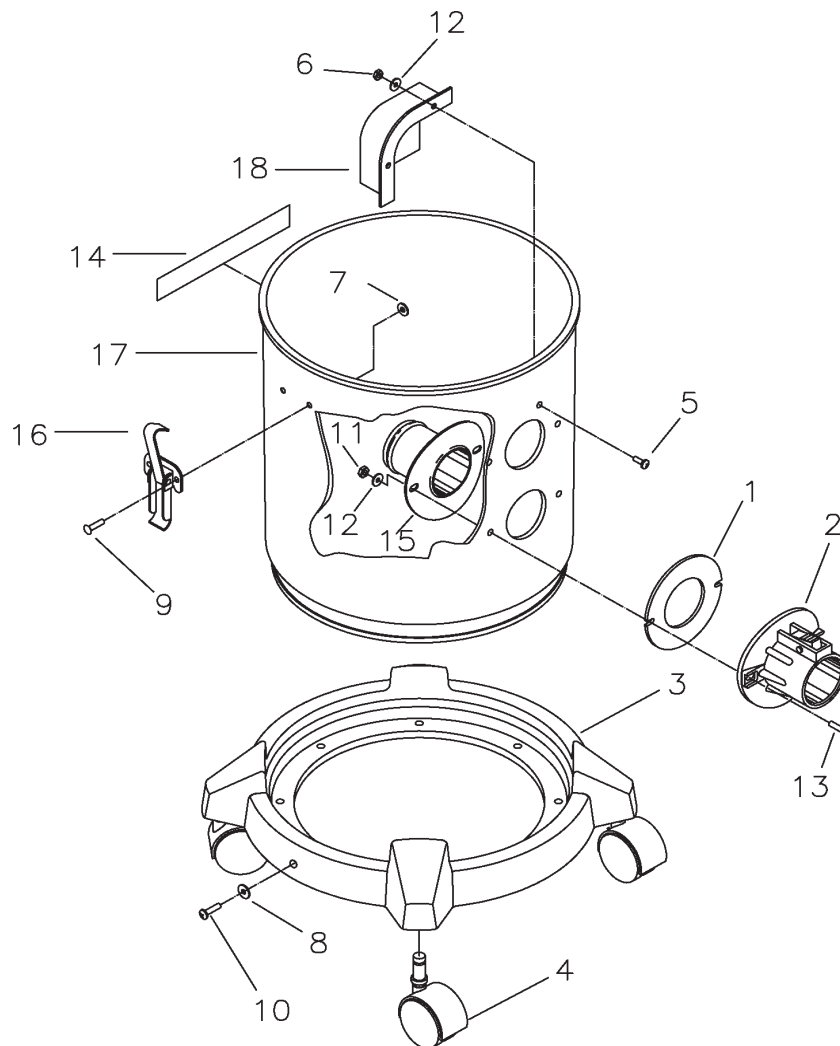
Lid Assembly (Wet/Dry)



Lid Assembly (Wet/Dry) BOM



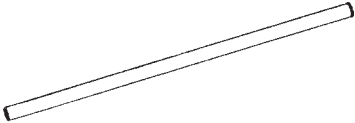
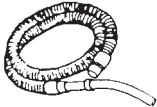
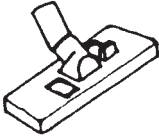

Item	Part No.	Qty.	Description
1	290017	2	Molded Vac Motor Gasket
2	290031	1	Lid Gasket 294/6 Diecut
3	290032	1	Dome Seal 296
4	380001-4	1	Vac Motor 120V (ECM)
4A	380054-1	1	Vac Motor 240VAC w/Male QC Term
5	380005	2	Carbon Brush Replacement (ECM)
5A	380028	2	Carbon Brush Replacement
6	380064	1	Ring, Foam
7	381020	1	Cord 16GA-3 50FT Med Grey
7A	740600	1	Cord European F3 G1.5MM 50FT B
8	460001	1	Handle Basic 460 Black
9	460100	1	Motor Lid Cover Black
10	460101	1	Motor Cap Black
11	460104	1	Motor Hold Down Plate Black
12	460105	1	Float Cage Black
13	460116	1	Motor Pan Assembly 294/6
14	460117	1	Float Assembly 290-6
15	711124	1	SCR-ST-B 10 x .37 NI
16	711125	3	SCR-ST-B 10 x .50 NI
17	711128	4	SCR-ST-B HI/LO 8 x .62 Zinc
18	711160	1	SCR HI/LO #10 x 5/8 Zinc
19	711161	11	SCR HI/LO #10 x 3/4 Zinc
20	711162	2	SCR HI/LO #10 x 1 1/2 Zinc
21	711553	1	WSR-Internal Lock 10
22	715009	1	Decal, Warning to Avoid
23	715501	1	Decal Made in USA
24	809754	1	Switch Rocker
24A	809754CE	1	Switch Rocker CE
25	828893	1	Rivet Bap KTR64BX
26	833237	1	Strain Relief w/ Nut
			CE Models Only
27	710355	2	SCR-MC RD HD10-32 x .50 Zinc
28	711350	2	Nut-Nyloc 10-32
29	742254-1	1	Torroid Assembly w/Wire Assy
30	742393	1	RFI Filter
31	742394	1	Capacitor Assembly .15 UF
32	744407	1	Wire Assy 16G Grn/Yel 8.00"
***	296115	1	Lid Assy Comp 115V
***	296230CE	1	Lid Assy Comp 296 230V CE

Tank Assembly


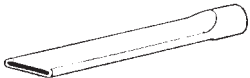


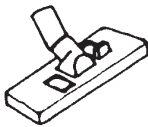




Item	Part No.	Qty.	Description
1	390087	1	Gasket Diecut VNN
2	390110	1	Intake Assembly Aluminum
3	460113	1	Caster Bracket (4 Gal)
3A	460113MCH	1	Caster Bracket (6 Gal)
4	460118	4	Caster
5	710530	1	SCR-MC 8-32x.50 BRS
6	711372	1	Nut-Nloc 8-32
7	711503	4	Flat Washer #10
8	711584	3	Washer #10
9	711915	4	Rivet-Tube .19x.28 NI PL
10	712066	3	SCR-ST-Pan HD-AB 10x1.25 Zinc
11	712638	2	Hex Nut 10/24 SS Nyloc
12	712764	3	Washer SS #10
13	712824	2	SCR-MC 10-24x.75 Truss HD ST
14	715383	1	Decal-MMN 1x6.88 Lt Gry
15	750118	1	Intake Asy Tube 4 Gal
16	761054	2	Latch
17	900014	1	Tank 6 Gal SS High Intake
17A	900109	1	Tank 4 Gal SS Low Intake
18	900035	1	Deflector Intake 6 Gal
***	290006	1	Tank Asy 6G SS HI DF&WB
***	290008	1	Tank Asy 4Gal SS Comp

Industrial Tools and Accessories
Model C29485-01, C29486-01

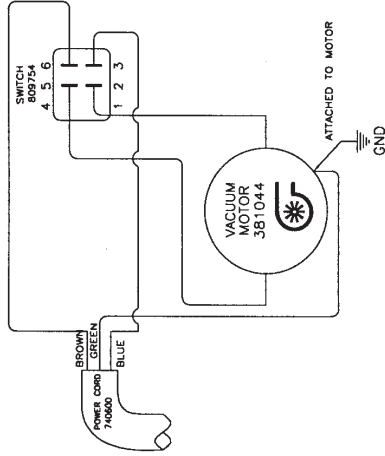
		Part No.	Description
A		829563	Dust Brush Complete
B		829562	Crevice Tool 1 1/4" (32 mm)
C		829565MCH	Wand Tube (2 required)
D		829849 390013 762241 829566	Hose Assy. 1-1/4 x 8 (32 mm x 2.4 m) Cuff Hose Tube Handle
E		829561	Combination Floor Tool
F		829564	Upholstery Tool

Industrial Tools and Accessories
Model C29685-01, C29686-01

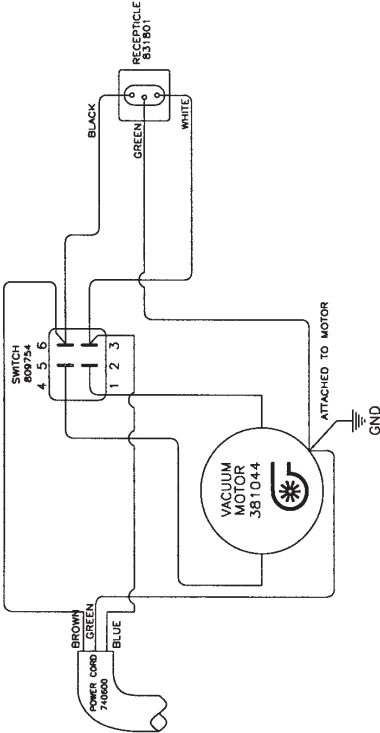
		Part No.	Description
A		800083 133249 800084 808023	3" Rd. Dust Brush Complete Dust Brush HSG 3" Bristle Insert 3" Adapter
B		800035	12" Crev Tool Complete
C		290000 290001 290002	Wand Assy. 1-1/2, Complete Upper Wand Lower Wand
D		800317 390014 801044	Hose Assy. 1-1/2 x 10' 1-5" Molded Hose Intake Hose
E		829561	Combination Floor Tool
F		800124 731	5" Tool Only Without Insert Bristle Insert Replacement
G		800605 712088 800615 808648 500295 500296	14" Squeegee, Complete SCR #10 HILO 14" Retaining Strip Nozzle, Squeegee Blade Squeegee Blade Squeegee Reinforcement

Wiring Diagrams

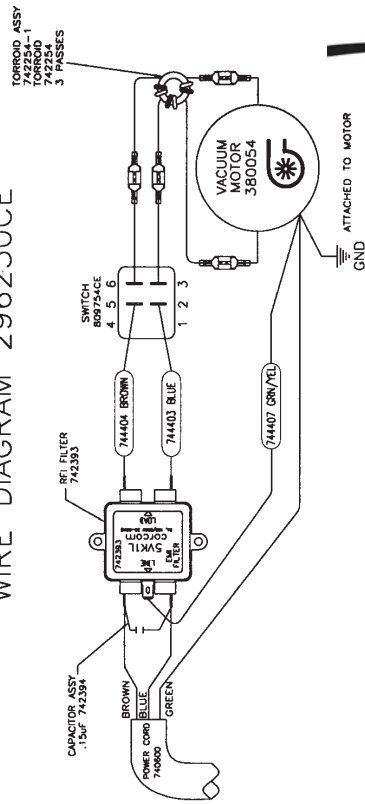
WIRE DIAGRAM 296115



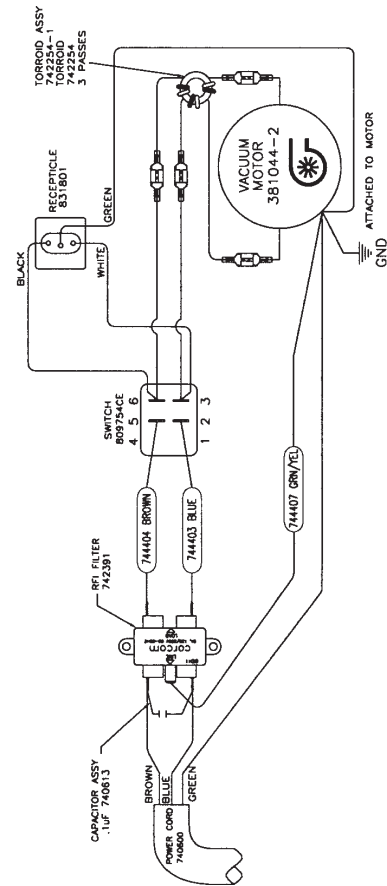
WIRE DIAGRAM 294110



WIRE DIAGRAM 296230CE



WIRE DIAGRAM 294220CE



Minuteman International Made Simple Commercial Limited Warranty

Minuteman International, Inc. warrants to the original purchaser/user that the product is free from defects in workmanship and materials under normal use. Minuteman will, at its option, repair or replace without charge, parts that fail under normal use and service when operated and maintained in accordance with the applicable operation and instruction manuals. All warranty claims must be submitted through and approved by factory authorized repair stations.

This warranty does not apply to normal wear, or to items whose life is dependent on their use and care, such as belts, cords, switches, hoses, rubber parts, electrical motor components or adjustments. Parts not manufactured by Minuteman are covered by and subject to the warranties and/or guarantees of their manufacturers. Please contact Minuteman for procedures in warranty claims against these manufacturers.

Special warning to purchaser -- Use of replacement filters and/or prefilters not manufactured by Minuteman or its designated licensees, will void all warranties expressed or implied. A potential health hazard exists without original equipment replacement.

All warranted items become the sole property of Minuteman or its original manufacturer, whichever the case may be.

Minuteman disclaims any implied warranty, including the warranty of merchantability and the warranty of fitness for a particular purpose. Minuteman assumes no responsibility for any special, incidental or consequential damages.

This limited warranty is applicable only in the U.S.A. and Canada, and is extended only to the original user/purchaser of this product. Customers outside the U.S.A. and Canada should contact their local distributor for export warranty policies. Minuteman is not responsible for costs or repairs performed by persons other than those specifically authorized by Minuteman. This warranty does not apply to damage from transportation, alterations by unauthorized persons, misuse or abuse of the equipment, use of non-compatible chemicals, or damage to property, or loss of income due to malfunctions of the product.

If a difficulty develops with this machine, you should contact the dealer from whom it was purchased.

This warranty gives you specific legal rights, and you may have other rights which vary from state to state. Some states do not allow the exclusion or limitation of special, incidental or consequential damages, or limitations on how long an implied warranty lasts, so the above exclusions and limitations may not apply to you.

Cord Electric Group..... Three years parts, two years labor, ninety days travel (Not to exceed two hours)
Exceptions..... Port-A-Scrub, one year parts, six months labor
MPV 13, one year parts
MPV 14 and 18, two years parts, one year labor
RapidAir blower, one year parts, one year labor
Explosion-Proof Vacuum, one year parts, one year labor
Pneumatic Vacuums, three years parts, one year labor
EX 12 and EX12H, one year parts, one year labor

Battery Operated Group..... Three years parts, two years labor, ninety days travel
(Not to exceed two hours)
Exceptions..... Sweepers, one year parts, one year labor, ninety days travel
(Not to exceed two hours)

Internal Combustion Group....One year parts, one year labor, ninety day travel
(Not to exceed two hours)

Replacement Parts.....Ninety days
Batteries.....0-3 months replacement, 4-12 months pro-rate
Polypropylene Plastic Tanks...Ten years, no additional labor