



Parts Manual Max Ride 20 Vacuum Sweeper

PREFACE

Thank you for your purchase of the new industry standard for scrubbers. Minuteman International takes great pride in offering the most dependable, reliable and best value in industrial power sweepers and sweeper / scrubbers. We set the standard.

Our Customer Service Department would like to hear from you. If you see any errors, omissions or something that needs clarification in this Parts Catalog please let us know. We are working hard towards continually improving our processes to bring you the best you deserve. Please copy the form below, fill out and comment on how you found our catalog.

Thank you!

The Minuteman International Team

Name: _____

Title: _____

Company Name: _____

Address: _____

Country: _____

Type of equipment or model number: _____

Comments: _____

Please return to:

Customer Service Manager
Minuteman International, Inc.
14N845 U.S. Route 20
Pingree Grove, Illinois 60140 USA

Phone: (800) 323-9420

Email: tech@minutemanintl.com

Technical Specifications

Model Max Ride 20 Vacuum Sweeper
Models: MR20SW, MR20SWQP

Model	MaxRide Sweeper Vac
Sweep Path	20"
Sweeping Brush Speed	700 RPM
Sweeper Brush Diameter	6"
Vacuum Brush Speed	1500 RPM
Vacuum Brush Diameter	4"
Side Broom Diameter	11"
Vacuum Motor	24V 2 Stage
Vacuum Airflow	67 CFM
Vacuum Waterlift	51" H ₂ O
Sound Pressure	68 dba
Vacuum Bag	H.E.P.A Standard
Vacuum Bag Capacity	.58 ft ³ Max
Hopper Capacity	190"³
Max Productivity	27,200 sq ft/hr
Average Productivity	22,015 sq ft/hr
Turning Radius	50.5"
Maximum Ramp Climbing	6%
Machine Voltage	24 VDC
Power Source	235AH AGM
Battery Charger	On Board
Maximum Run Time	2.5 - 4.0 hours
Weight/ W-Batteries	342/691 lbs
Dimensions	47.5" L X 26.25" W X 45" H

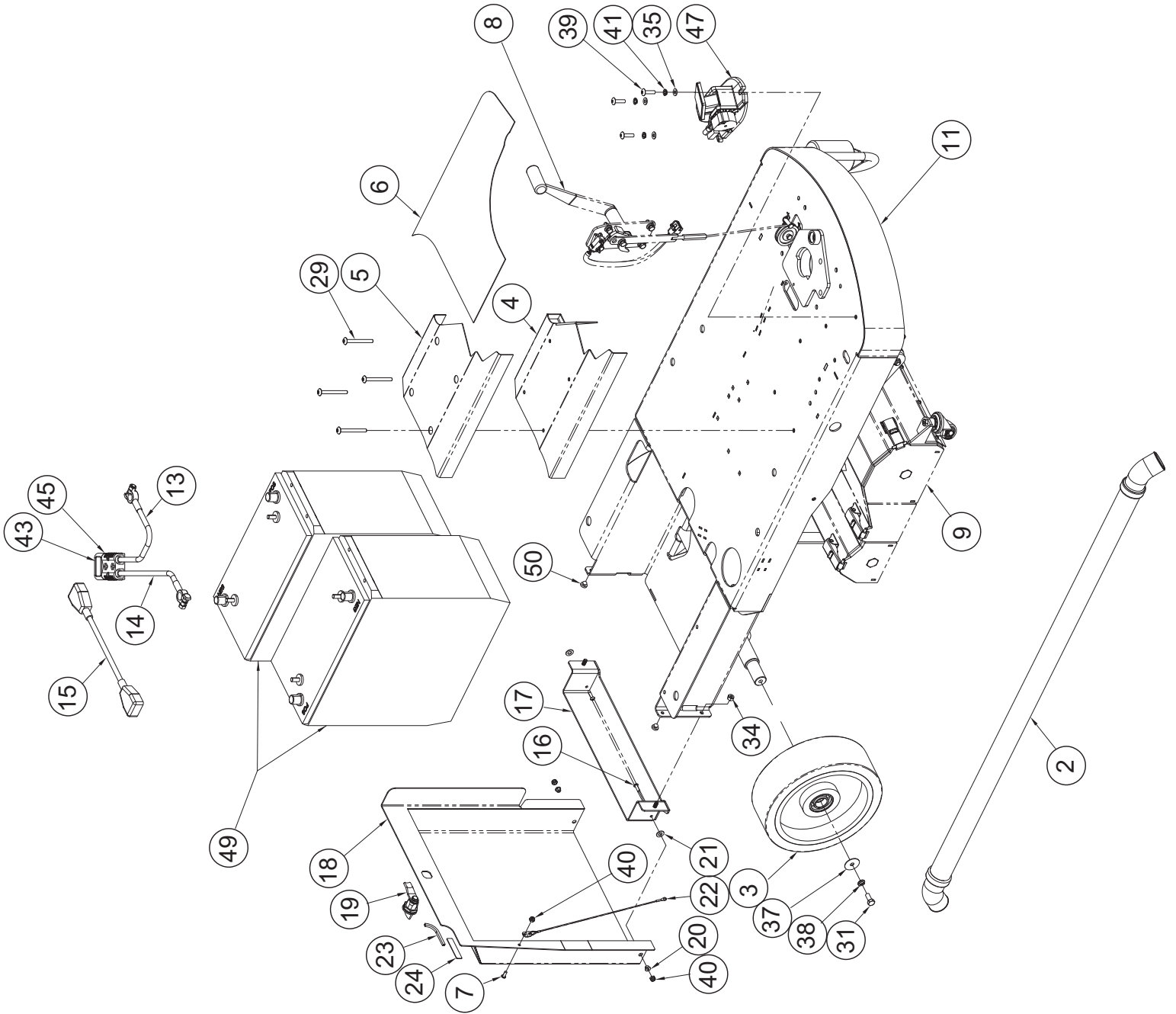
For Safety When Servicing or Maintaining Machine

- Stop on level surface.
- Disconnect the power to the machine by pulling the red Battery Connector located under the recovery tank near the batteries.
- Avoid moving parts. Do not wear loose jackets, shirts, or sleeves when working on machine.
- Avoid contact with battery acid. Battery acid can cause burns. When working on or around batteries, wear protective clothing and safety glasses. Remove metal jewelry. Do not lay tools or metal objects on top of batteries.
- Do not clean machine with a pressure washer.
- Authorized personnel must perform repairs and maintenance. Use Minuteman supplied replacement parts.

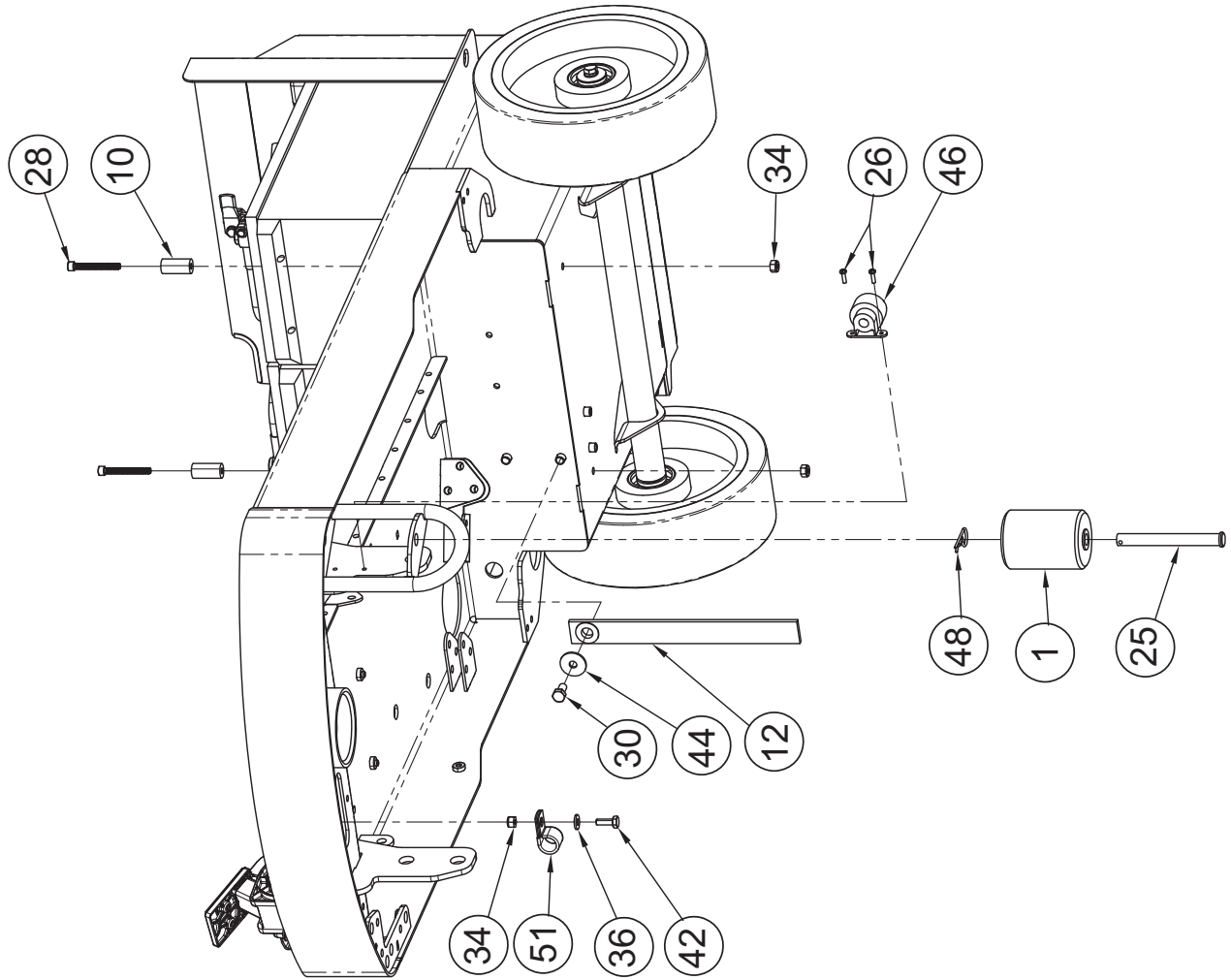
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Frame Group



Rev B

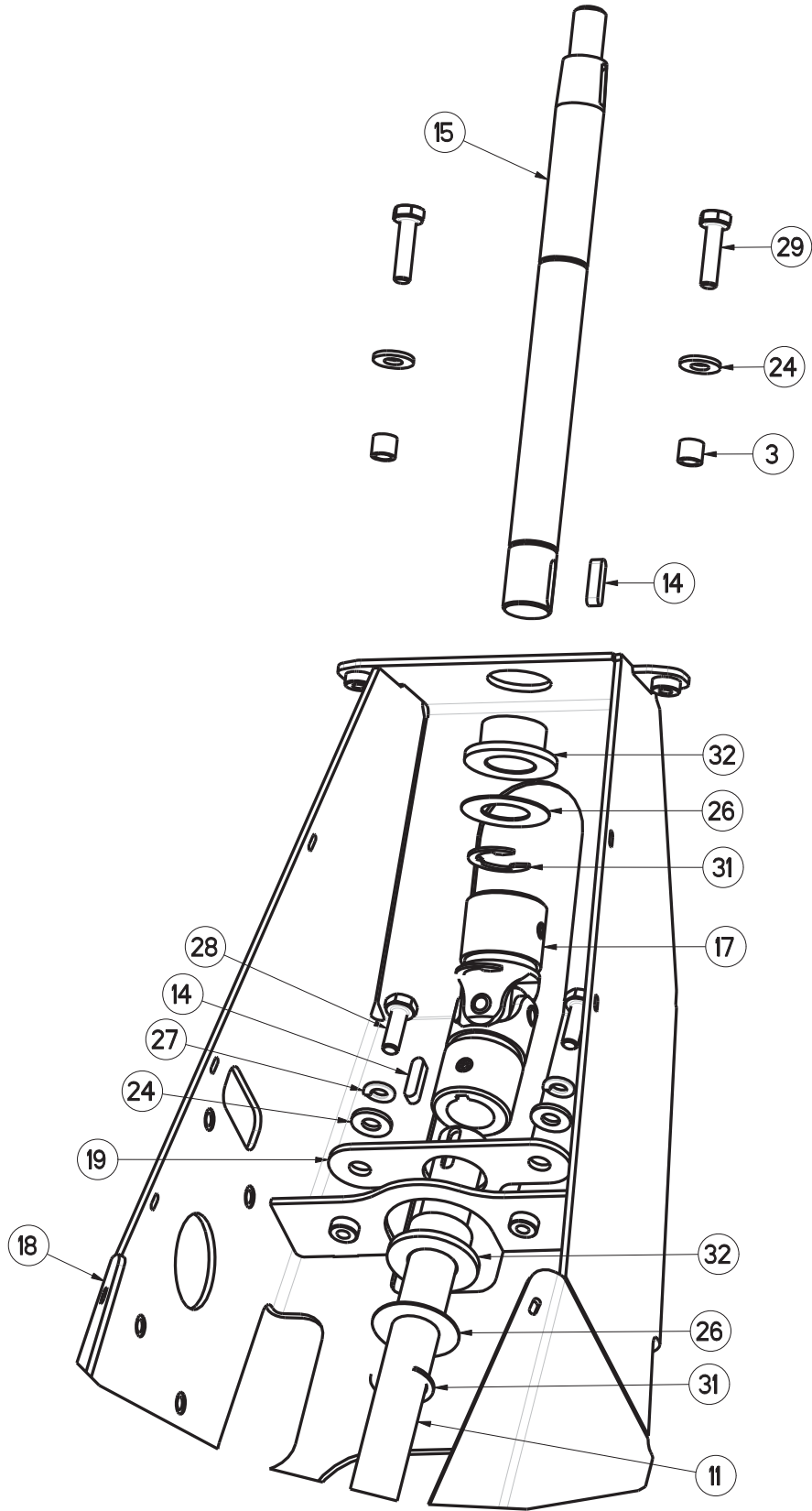


Frame Group BOM

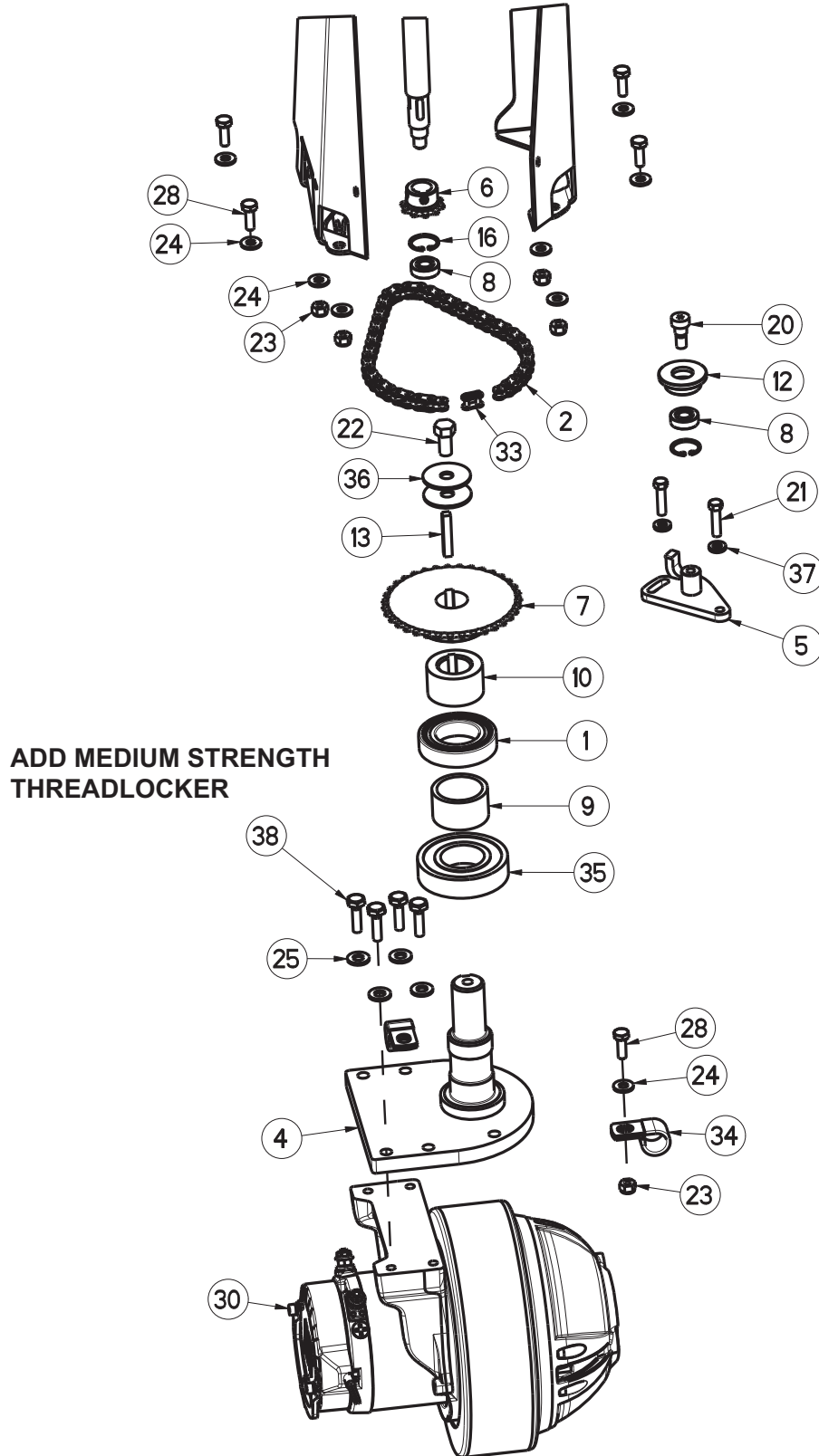
BILL OF MATERIAL - 246668			
ITEM	PART NO.	QTY	DESCRIPTION
1	245419	1	ROLLER, BUMPER, 2.5 DIA.
2	245450	1	HOSE-VAC, CLEAR 1.50"ID X 43 LONG
3	245461	2	WHEEL - ASSY, IDLER, 254 X 80 W/BRGS
4	245475	1	WELDMENT, FLOOR PLATE RISER 20"
5	245796	1	TREAD, ANTI-SKID, RISER 20"
6	245797	1	TREAD, ANTI-SKID, FRAME 20"
7	246257	1	SCR-BHSCS 10-24 X .50 SS BLK-OX
8	REFERENCE	1	VACUUM HEAD LIFT GROUP, 20 SWEEPER
9	REFERENCE	1	VACUUM HEAD GROUP, 20 SWEEPER
10	246938	2	SPACER, .252 X .625 X 1.25, NYL
11	247067	1	WELDMENT, FRAME, 20 MODULAR
12	247091	1	STATIC STRAP, 10"
13	247117	1	BATTERY CABLE, RED, 4 AWG
14	247118	1	BATTERY CABLE, BLACK, 4 AWG
15	247119	1	BATTERY CABLE, JUMPER, 4 AWG
16	247602	2	SCR-BHSCS 10-24 X .63 SS BLK-OX
17	247606	1	BRACKET, BATTERY
18	247607	1	WELDMENT, REAR COVER
19	247610	1	LATCH, QUARTER TURN
20	247611	1	BUSHING-FLG .188 X .31 X .25 OILITE
21	247612	1	BEARING-THRUST .313 ID X .63 OD
22	247614	1	LANYARD, NYLON COATED 12"
23	247615	1	GROMMET EDGING, SLOTTED ADH .062-.099
24	247616	1	DECAL, CABLE PASS THROUGH
25	620027	1	PIN-CLEVIS 1/2 X 4.50 ZP
26	710204	2	SCR-PHMS 6-32 X .50 ZP
27	710355	2	SCR-RHMS 10-32 X .50 ZP
28	710387	2	SCR-BHMS, HEX DRIVE, 1/4-20 X 1.75 ZINC
29	710998	4	SCR-THMS 1/4-20 X 2.50 SS
30	711227	1	SCR-HH 5/16-18 X .62 ZP GR 5

BILL OF MATERIAL - 246668			
ITEM	PART NO.	QTY	DESCRIPTION
31	711228	2	SCR-HH 5/16-18 X .75 ZP GR 5
32	711350	2	NUT-NYLOC 10-32 ZP
33	711371	2	NUT-NYLOC 6-32 ZP
34	711373	5	NUT-NYLOC 1/4-20 ZP
35	711504	3	WASHER-FLAT 1/4 SS
36	711505	1	WASHER-FLAT 1/4 ZP
37	711516	2	WASHER-FLAT 5/16 X 1.25 X .05 ZP
38	711545	2	WASHER-LOCK 5/16 SPLIT ZP
39	712541	3	SCR-THMS 1/4-20 X 1.00 SS
40	712638	3	NUT-NYLOC 10-24 SS
41	712758	3	WASHER-LOCK 1/4 SPLIT SS
42	713002	1	SCR-HH 1/4-20 X .75 ZP 5
43	715502	1	DECAL-CONNECT TO CHARGE
44	730526	1	WASHER-FENDER M8 X 24 SS
45	740159	1	CONNECTOR-SB175 RED HOUSING
46	748200	1	HORN / BACK UP ALARM, 9-48VDC
47	748507	1	PEDAL ASSY, THROTTLE, FLOOR MTG 25°, IEC
48	833374	1	PIN-HAIRPIN COTTER 3/8
49	956748	2	BATTERY, 12V 234AH AGM
50	3300526	2	BUMPER-RUBBER 1/4 ID X 1/8 THK
51	3301158	1	CLAMP - WIRE & TUBE .687 DIA STEEL

Tower Group



Rev D

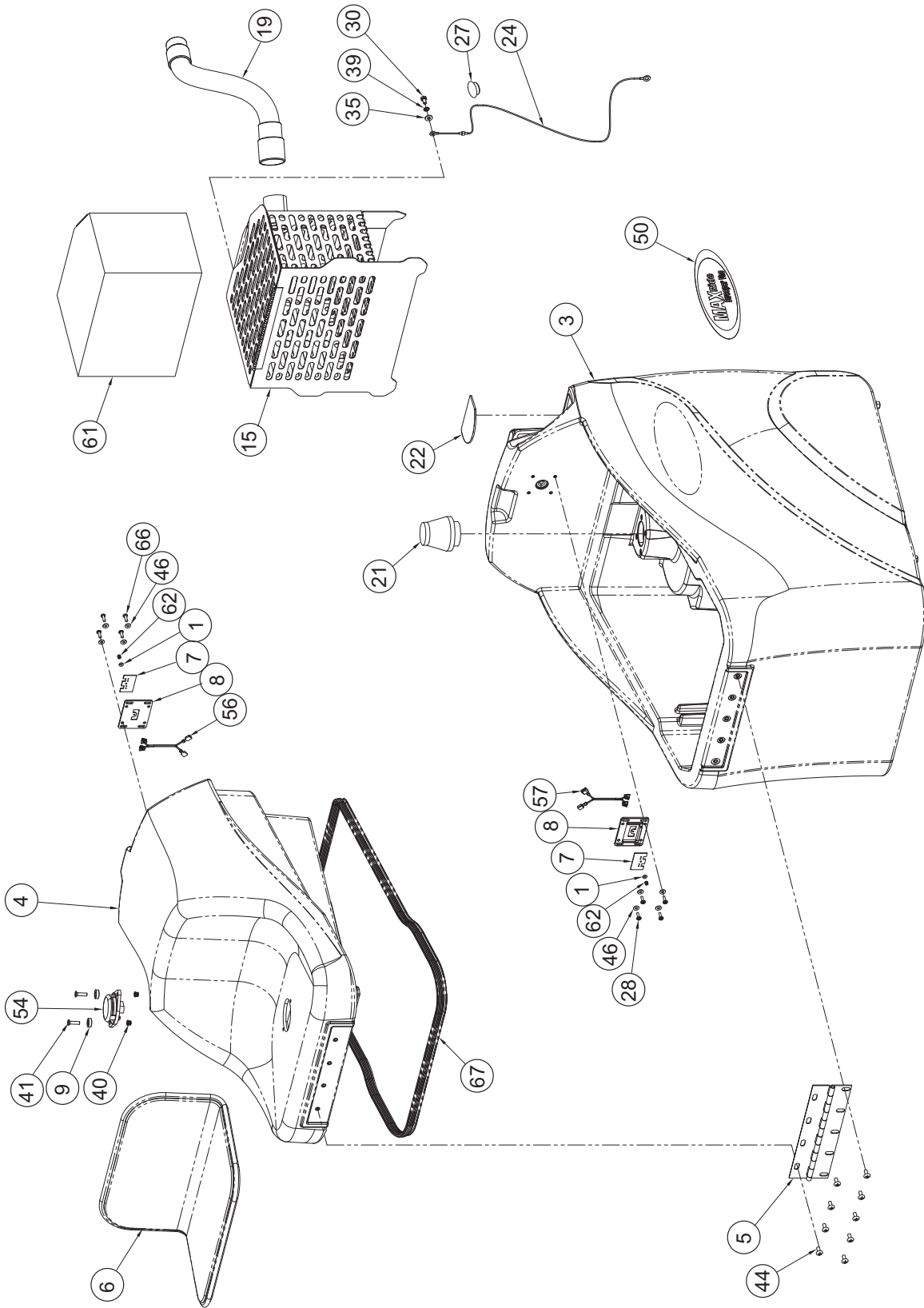


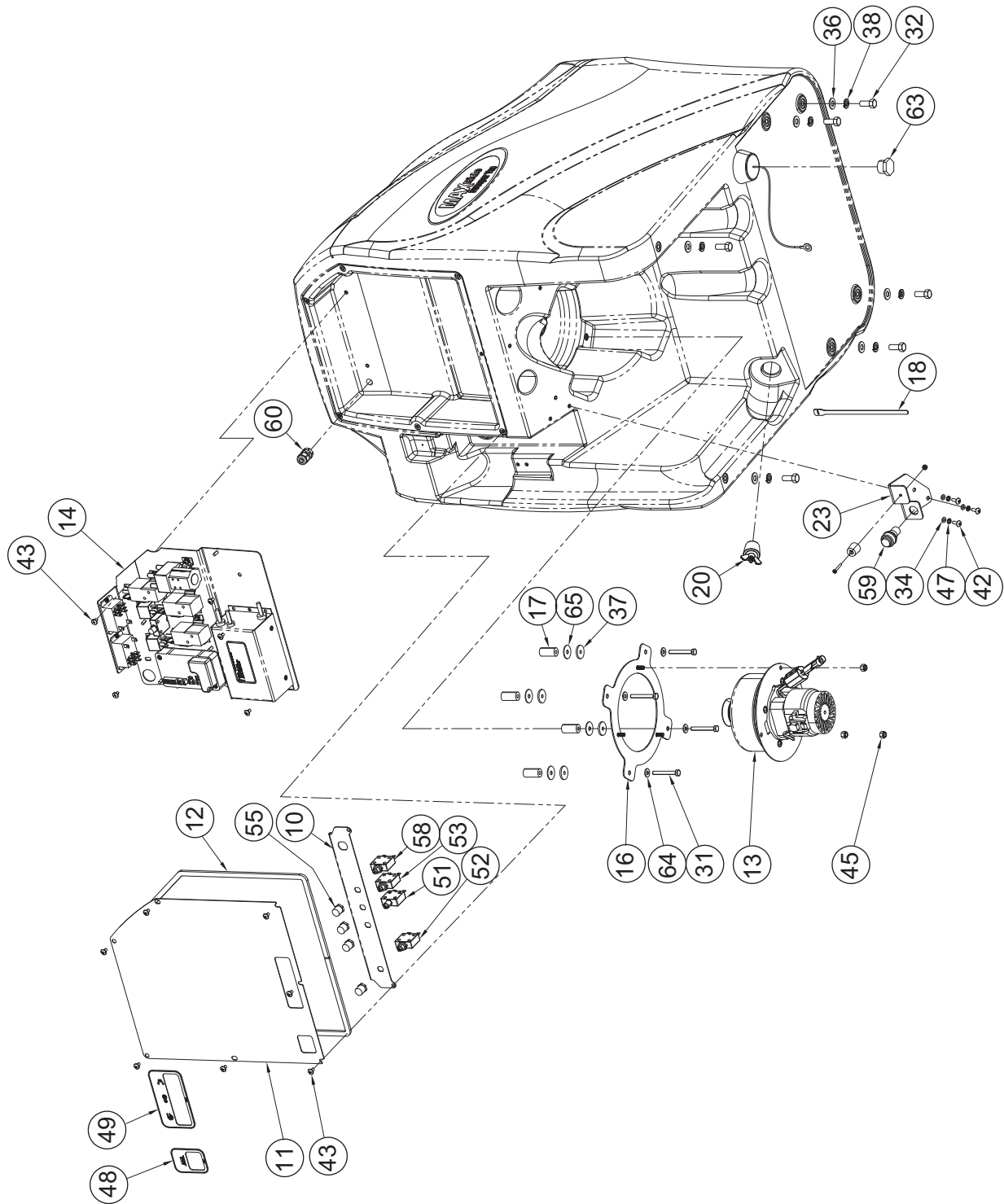
Tower Group BOM

BILL OF MATERIAL - 246164			
ITEM	PART NO.	QTY	DESCRIPTION
1	245416	1	SKF BALL BRG 35mm x 62 OD x 14 W
2	245445-1	1	CHAIN - ROLLER #35
3	245583	2	SPACER, .266 B, .313 OD, .313 T
4	246022	1	SPINDLE WLDT, STEERING
5	246025	1	BRACKET WLDT, CHAIN TENSIONER
6	246028	1	SPROCKET, ANSI 35, 10 TOOTH, 0.375P, 0.62B
7	246029	1	SPROCKET, ANSI 35, 35 TOOTH, 0.375P, 1.00B
8	246030	2	BEARING, BALL, 0.375B, 0.875D, SEALED
9	246031	1	SPACER, 1.75D 1.44B 1.12L, STL
10	246032	1	PIVOT, STEERING STOP
11	246033	1	SHAFT, LOWER STEERING
12	246034	1	GUIDE, CHAIN TENSIONER
13	246035	1	KEY, SQ, 0.25 X 0.25 X 1.50
14	246036	3	KEY, SQ, 0.18 X 0.18 X 0.75
15	246037	1	SHAFT, UPPER STEERING
16	246038	2	RING, RTNR, FOR .875 BORE, STL
17	246039	1	U-JOINT, 25DEG, 0.75B 1.06D 3.75L
18	246040	1	TOWER WELDMENT, STEERING
19	246042	1	PLATE, BEARING, STEERING
20	246067	1	BLT-SHOULDER .375 X .312 LG BLK OX
21	711207	2	BLT-HH 1/4-20 X 1.00 STPL
22	711241	1	SCR-HEX 3/8 -16X .75" ZP
23	711373	5	NUT-NYLOC 1/4-20
24	711505	13	WASHER-FLAT 1/4 ZP
25	711506	4	WSR-FLT .344 X .690 X .062, STEEL
26	711517	2	WSR- FLAT .75X1.375X.09 SS
27	711544	2	WSR-HELICAL 1/4
28	713002	7	SCR-HH 1/4-20 X .75 ZP 5
29	713003	2	BLT-HH 1/4-20 X 1 #5
30	748523	1	WHEEL DRIVE, 24V 300W

BILL OF MATERIAL - 246164			
ITEM	PART NO.	QTY	DESCRIPTION
31	809148	3	RET RING-E TYPE .75
32	832554	2	BUSHING-FLG .7505 X 1.437 X .625 BRNZ
33	833292	1	CHAIN MASTER LINK #35
34	3301158	2	CLAMP-CABLE 3/4
35	3305667	1	BEARING-MAIN BROOM
36	3400092	2	WASHER-FENDER 3/8 ZP 1.5 OD X .07 THK
37	3401570-7W	2	WASHER-NORD-LOCK, 1/4, 0.53 OD, ZP
38	11038247	4	BOLT - HH, M8 X 1.25 X 25, STL, ZINC DICH

Tank Group



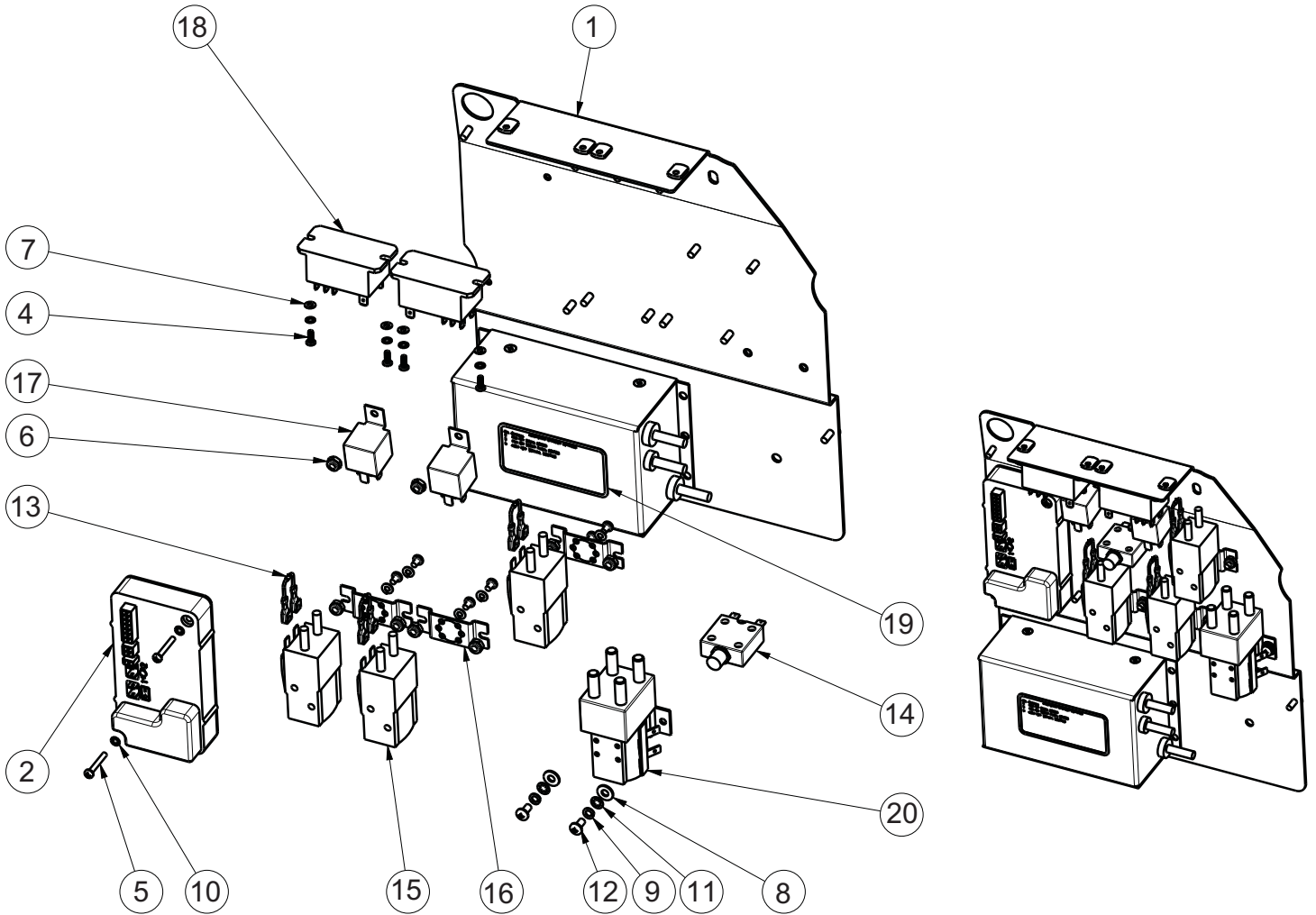


Tank Group BOM

BILL OF MATERIAL - 248000			
ITEM	PART NO.	QTY	DESCRIPTION
1	950-4-S	2	BACK UP PLATE 1/8" STEEL
2	172159	1	FILTER, FILL PORT, ES1720
3	245001	1	TANK, SOLUTION & RECOVERY ER20-V
4	245002	1	LID W/ SEAT, TANK, ER20-V
5	245422	1	HINGE, STEEL, 11.38" LONG PAINTED
6	245444	1	SEAT-CUSHIONED, SEWN SEAT & BACK
7	245453	2	PLATE - INSERT, INTERCONNECT-SEE NOTES
8	245456	2	PLATE -BASE, INTERCONNECT (SEE CS NOTES)
9	245817	2	SPACER, .39 ID X .75 OD X .25 T, PVC
10	245902	1	BRACKET, BREAKER MOUNT 20"
11	245906	1	COVER, ELEC BOX, ECO 20"
12	246184	1	GASKET, ELECTRICAL PANEL
13	246189	1	ASSY, 2-STAGE VACUUM
14	246196	1	ASSY, ELECTRICAL PANEL, VAC SWEEPER
15	246879	1	WELDMENT, BAG HOUSING
16	246936	1	BRACKET VACUUM MR20
17	246938	4	SPACER, .252 X .625 X 1.25, NYL
18	246943	1	CABLE TIE, HOOK AND LOOP
19	247086	1	HOSE, VACUUM BAG
20	247087	1	PLUG, VACUUM
21	247088	1	FILTER, VACUUM
22	247092	1	COVER, SOLUTION FILL, 20 VAC
23	247096	1	BRACKET, REAR COVER LATCH
24	247134	1	ASSY, WIRE, MR20 SWEEPER TANK
25	247602	1	SCR-BHSCS 10-24 X .63 SS BLK-OX
26	247613	1	BUMPER, .80 OD X .78 H RUBBER
27	260238	1	PLUG, ROTO MOLD, BURGUNDY
28	710130	4	SCR-THMS 8-32 X .62 SS
29	710307	1	SCR-PHMS 6-32 X 1.00 ZP
30	711202	1	SCR-HH 1/4-20 X .50 ZP
31	711214	4	SCR-HH 1/4-20 X 2.00 ZP GR 5
32	711246	6	SCR-HH 3/8-16 X .87 ZP GR 5
33	711371	1	NUT-NYLOC 6-32 ZP
34	711502	3	WASHER-FLAT #8 ZP

BILL OF MATERIAL - 248000			
ITEM	PART NO.	QTY	DESCRIPTION
35	711505	1	WASHER-FLAT 1/4 ZP
36	711515	6	WASHER-FLAT 3/8 X .812 X .0625 ZP
37	711529	4	WASHER-RUBBER .25 x 1.00 x .110
38	711546	6	WASHER-LOCK 3/8 SPLIT ZP
39	711554	1	WASHER-INT TOOTH LOCK 1/4 ZP
40	711962	2	NUT, 1/4-20, HIGH TORQUE 12 POINT FLANGE
41	712153	2	SCR-FHSCS 1/4-20 X 1.00 SS
42	712536	3	SCR-THMS 10-24 X .62 SS
43	712540	12	SCR-THMS 10-24 X .37 SS
44	712565	9	SCR-THMS 1/4-20 X .62 SS
45	712667	3	NUT-NYLOC 1/4-20 SS
46	712764	8	WASHER-FLAT #10 SS
47	712770	3	WASHER-INT TOOTH LOCK #10 SS
48	715534	1	DECAL, BRUSH MOTOR, MAX RIDE 20
49	715535	1	DECAL, VACUUM-DRIVE MOTOR-POWER
50	715987	2	DECAL, MAIN OVAL MAX-RIDE, SWEEPER VAC
51	740220	1	CIRCUIT BREAKER-20AMP PUSH BUTTON
52	740221	1	CIRCUIT BREAKER, 30 AMP
53	740247	1	CIRCUIT BREAKER-30AMP PUSH BUTTON
54	740601	1	SWITCH, SEAT, BOLT MOUNT
55	742748	4	CIRCUIT BREAKER-BOOT
56	747349	1	WIRE ASSY, SEAT SWITCH
57	747350	1	WIRE ASSY, TANK SWITCH -SEE NOTES
58	747609	1	CIRCUIT BREAKER-4.0AMP PUSH BUTTON
59	747614	1	INDICATOR, BATTERY CHARGE STATUS (E1720)
60	747689	1	STRAIN RELIEF CABLE DIA. .181-.312 #3210
61	760598	1	BAG, DISP ASB SINGLE
62	827666	2	RIVET-POP 1/8 DOME HD, BLK ALUM BODY
63	3309060	1	FTG-PLUG 3/4 MPT POLYPRO
64	3400089	4	WASHER-FLAT 1/4 ZP
65	3401052	4	WASHER-FENDER 1/4 X 1.00 SS
66	3401449	4	SCR-HI/LO 10 X .75 SS PAN HD
67	25510512	1	GASKET, RUBBER BLADE, PRESS IN

Electrical Panel Assembly

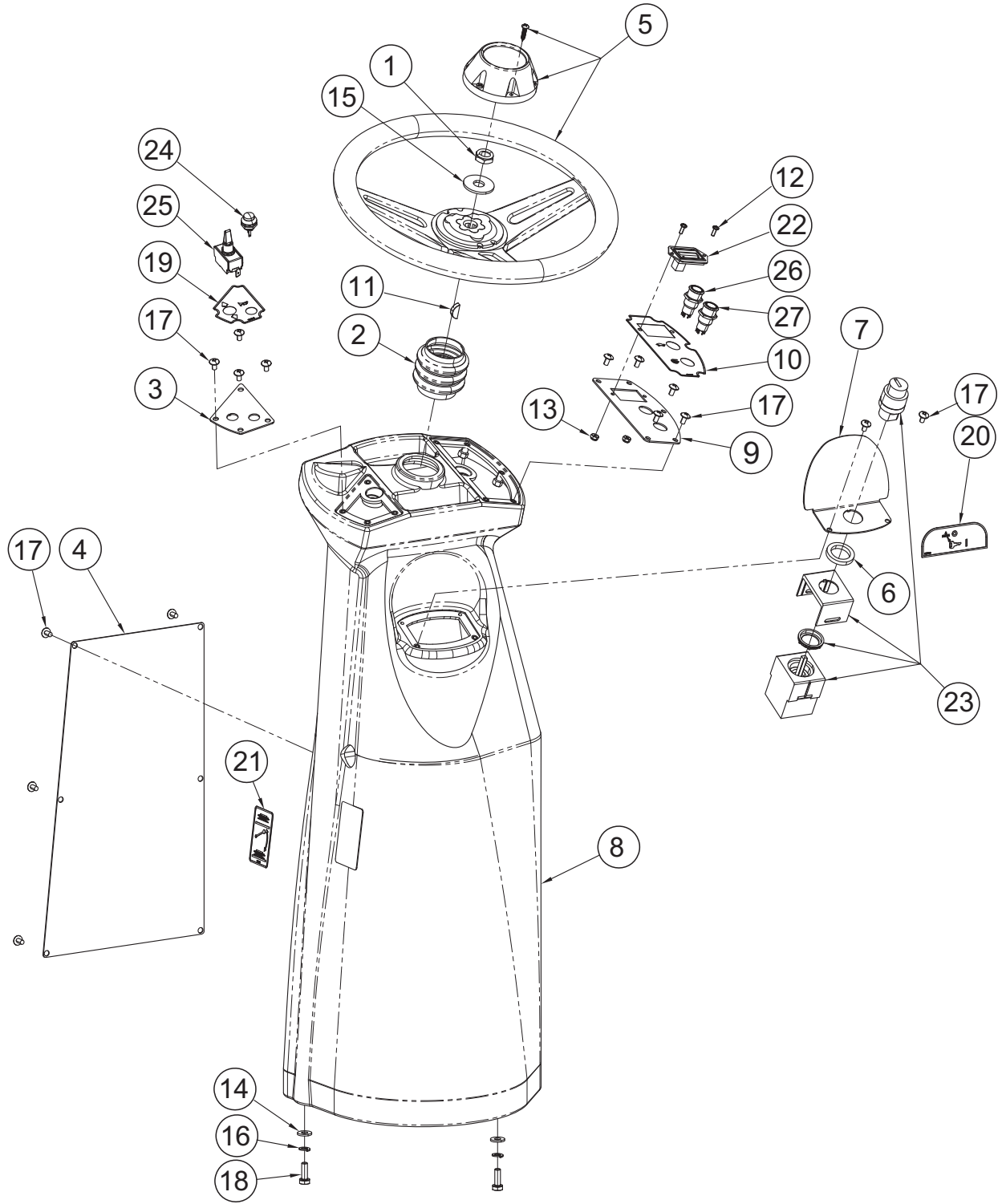


Rev A

Electrical Panel Assembly BOM

BILL OF MATERIAL - 246196			
ITEM	PART NO.	QTY	DESCRIPTION
1	245851	1	PANEL, ELEC CHASSIS, 20/26
2	246191	1	I-DRIVE, 24V 70A, MAX RIDE ORBITAL
3	246195	1	MR20 VAC ELECT COMPONENTS
4	710203	4	SCR-PHMS 6-32 X .37 ZP
5	710307	2	SCR-PHMS 6-32 X 1.00 ZP
6	711350	8	NUT-NYLOC 10-32 ZP
7	711501	4	WASHER-FLAT #6 X .375 ZP
8	711503	2	WASHER-FLAT #10 X .50 ZP
9	711543	2	WASHER-LOCK #10 SPLIT ZP
10	711551	6	WASHER-INT LOCK #6
11	711553	2	WASHER-INT TOOTH LOCK #10 ZP
12	712810	2	SCR-RHMS 10-24 X .37 ZP
13	740482	3	DIODE ASY, 1N4007 W/PIGGY
14	740703	1	CIRCUIT BREAKER, 1 AMP
15	747616	3	RELAY, 24VDC 1 POLE NO 80A
16	747619	3	BRACKET, RELAY 747615 & 747616
17	748511	2	RELAY, SPDT, MAX RIDE
18	748524	2	RELAY, DPDT, 40A
19	957936	1	LABEL, FOR CHARGERS 957764
20	90331026	1	RELAY, 24VDC 2 POLE NO 125A

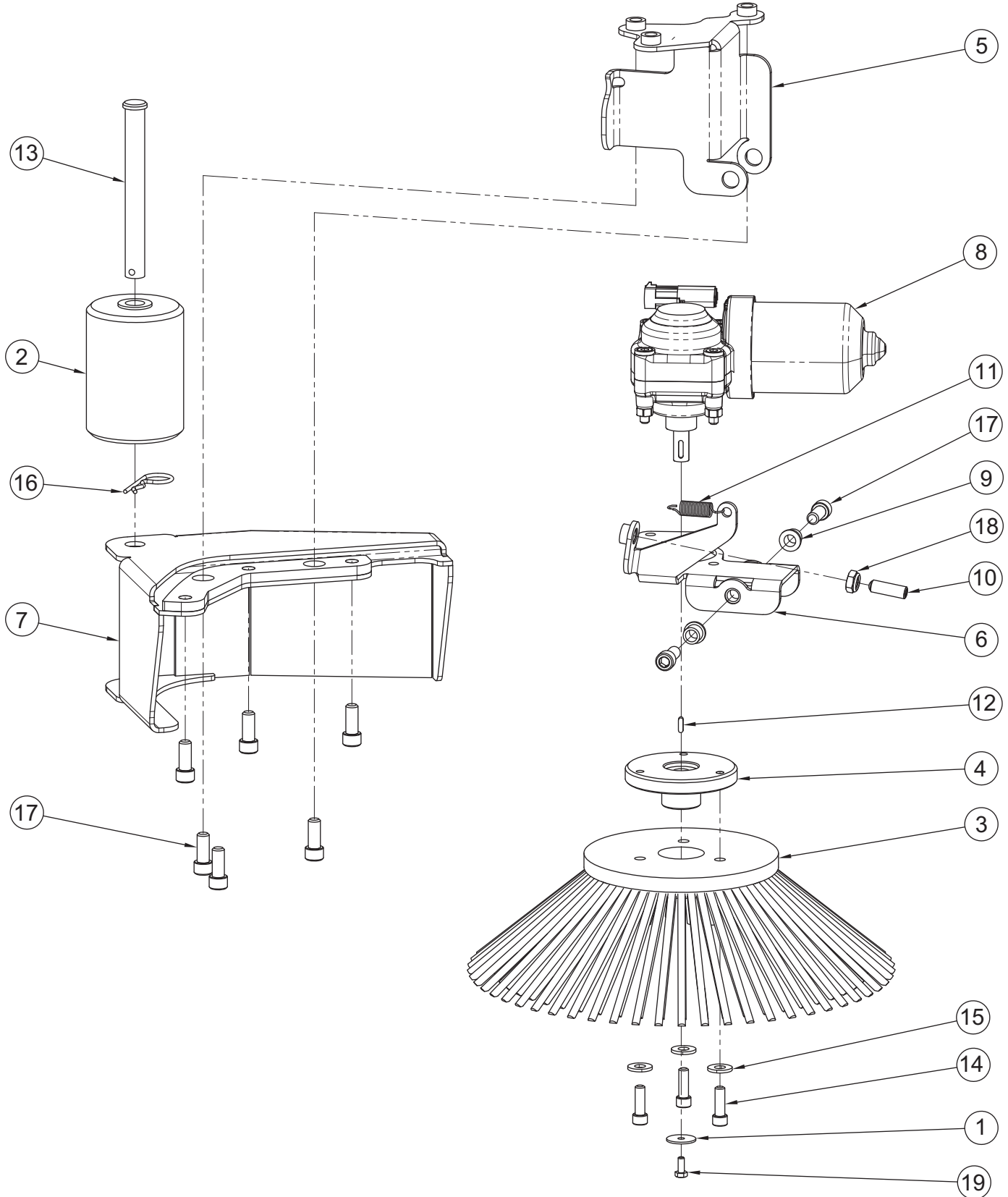
Steering Column Group



Steering Column Group BOM

BILL OF MATERIAL - 246669			
ITEM	PART NO.	QTY	DESCRIPTION
1	368-816	1	NUT-JAM NYLOC 1/2-20 ZP
2	241224	1	BOOT - STEERING SHAFT, SCV 2426
3	245028	1	PANEL-CONTROL, LH FWD-REV SLCTR ASSY
4	245156	1	PANEL-FRONT, STEERING CONSOLE, ER20/26-V
5	245345	1	STEERING WHEEL- 12.75"
6	245802	1	SPACER, PVC, KEY SWITCH, .188 THK
7	245840	1	PANEL, CENTER, KEY SWITCH
8	246090	1	CONSOLE, STEERING
9	246814	1	PANEL-CONTROL RH, FUNCTION
10	246815	1	DECAL, FUNCTION SELECTOR
11	383277	1	KEY-WOODRUFF 3/16 X .750
12	710203	2	SCR-PHMS 6-32 X .37 ZP
13	711371	2	NUT-NYLOC 6-32 ZP
14	711505	2	WASHER-FLAT 1/4 ZP
15	711510	1	WASHER-FLAT 1/2 X 1.37 X .10 ZP
16	711544	2	WASHER-LOCK 1/4 SPLIT ZP
17	712540	17	SCR-THMS 10-24 X .37 SS
18	713002	2	SCR-HH 1/4-20 X .75 ZP 5
19	715762	1	DECAL-FWD-REV SELECTOR MAX RIDE
20	715778	1	DECAL, CENTER PANEL, KEY SWITCH
21	715781	1	DECAL, BRUSH LIFT, 20/26
22	747011	1	GAUGE-BATTERY TRUCHARGE PGDT 36VDC
23	747387	1	KEYSWITCH ASSY, SWITCH+WIRES MR
24	748047	1	SWITCH, PUSH BUTTON (HORN SCV 36V)
25	748800	1	SWITCH-TOGGLE G SERIES NYL SPDT ON/ON
26	748803	1	SWITCH, PUSH BUTTON, BLUE LED
27	748804	1	SWITCH, PUSH BUTTON, ORANGE LED

Side Brush Group

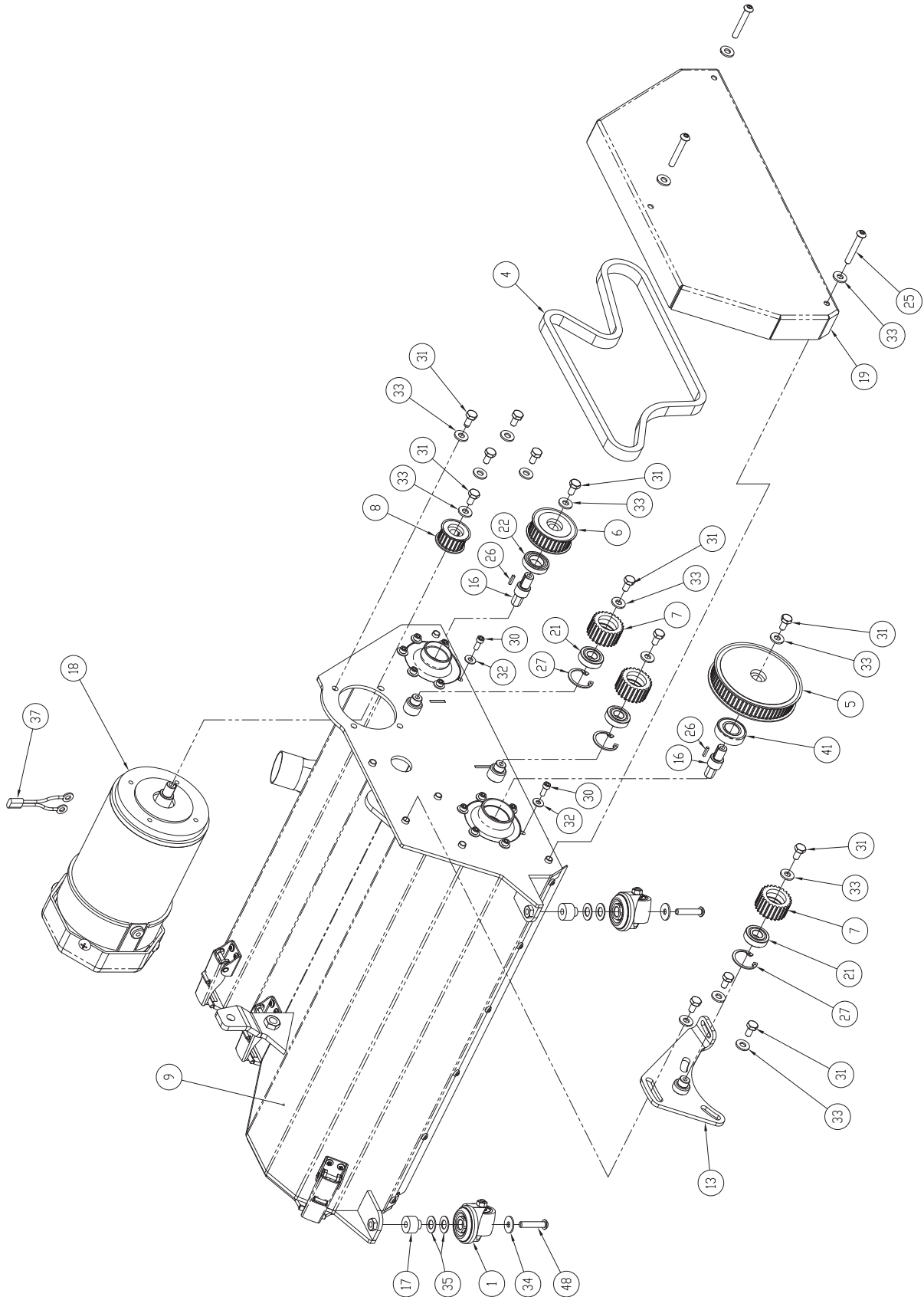


Rev A

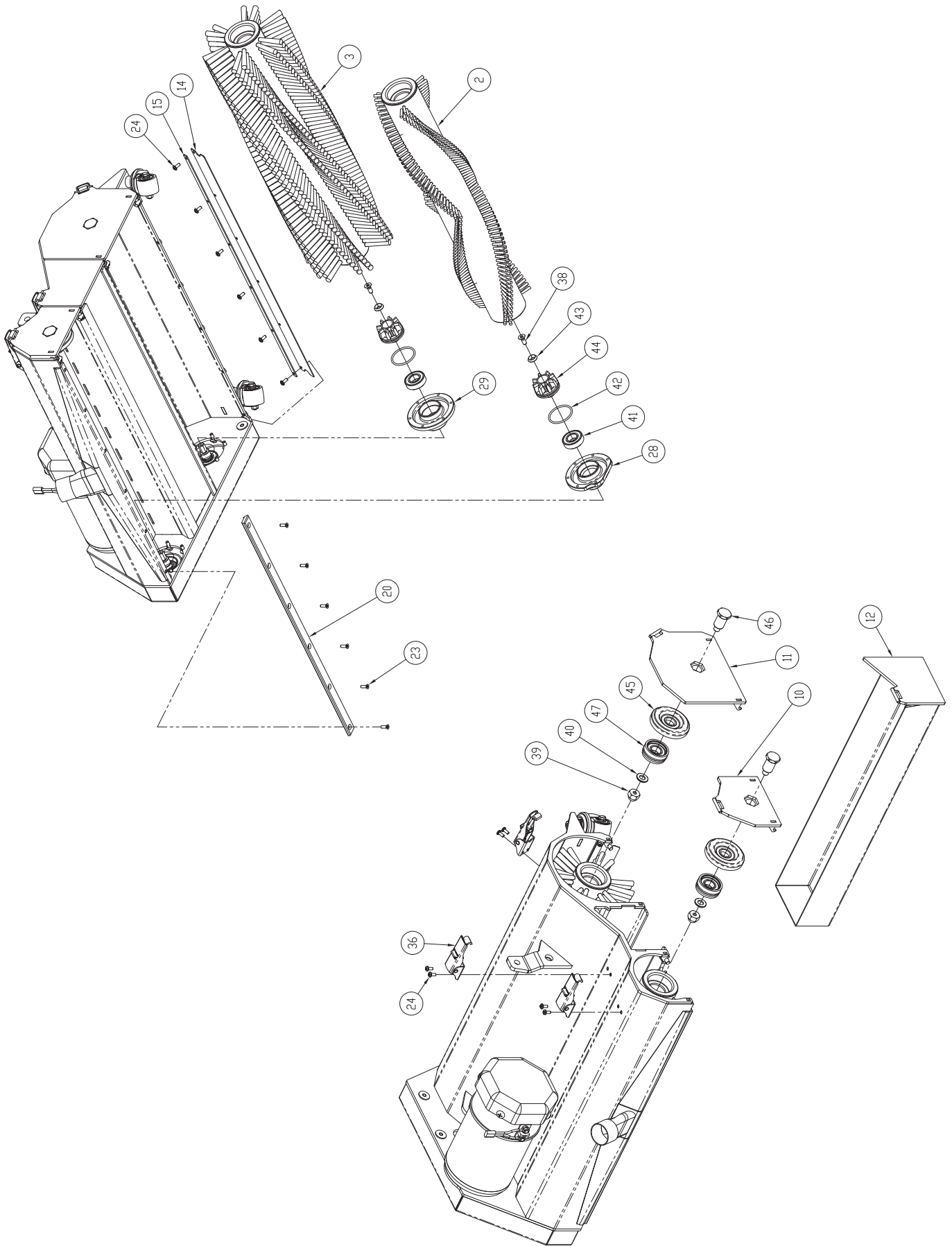
Side Brush Group BOM

BILL OF MATERIAL - 246667			
ITEM	PART NO.	QTY	DESCRIPTION
1	173079	1	WASHER-FLAT .172 X .75 X .047 SS
2	245419	1	ROLLER, BUMPER, 2.5 DIA.
3	247049-2	1	SIDE BRUSH, 11, NYLON, BLACK
4	247050	1	HUB, SIDE BRUSH
5	247051	1	WELDMENT, SIDE BRUSH MOUNT
6	247052	1	WELDMENT, SIDE BRUSH PIVOT
7	247062	1	WELDMENT, SIDE BRUSH COVER
8	247069-1	1	ASSY, MOTOR, 24VDC, WITH TERMINALS
9	247074	2	BUSHING, .31 X .44 X .38 LG
10	247075	1	SCR-SET 5/16-18 X 1.00 OVAL TIP
11	247076	1	SPRING-EXT 3/8 X 1.5 LG
12	247077	1	KEY, 3 X 3 X 10MM
13	620027	1	PIN-CLEVIS 1/2 X 4.50 ZP
14	710825	3	SCR-SHCS 1/4-20 X .75 ZP
15	711505	3	WASHER-FLAT 1/4 ZP
16	833374	1	PIN-HAIRPIN COTTER 3/8
17	3400047	8	SCR-SHCS 5/16-18 X 0.75 ZP
18	3401098	1	NUT-JAM 5/16-18 ZP NYLOC
19	11038965	1	BLT-HH M4 X 0.7 X 10 STL ZD 8.8 DIN 933

Vacuum Head Group



Rev C

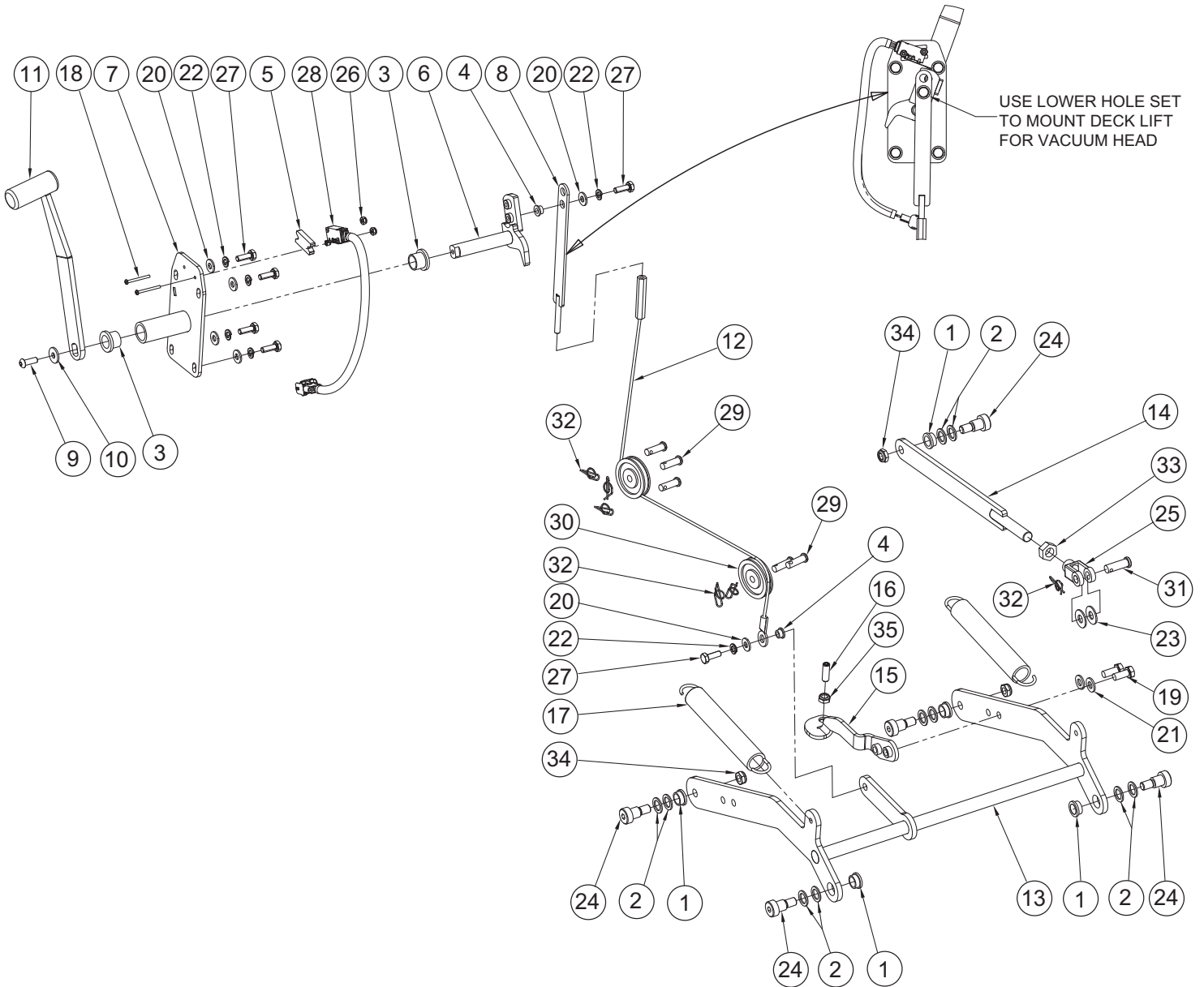


Vacuum Head Group BOM

BILL OF MATERIAL - 246656			
ITEM	PART NO.	QTY	DESCRIPTION
1	245563	2	CASTER
2	246867	1	Brush, Cyl, 20" 4" OD Nylon
3	246869	1	Brush, Cyl, 20" 6" OD Nylon
4	246873	1	BELT, SWEEPER/VAC 172
5	246874	1	PULLEY, SWEEPER 64
6	246875	1	PULLEY, VAC 32
7	246876	3	PULLEY, IDLER
8	246878	1	PULLEY, MOTOR 20
9	247006	1	WELDMENT, SWEEPER-VAC HEAD
10	247007	1	WELDMENT, VAC DOOR
11	247008	1	WELDMENT, SWEEPER DOOR
12	247009	1	WELDMENT, DEBRIS TRAY
13	247013	1	WELDMENT, IDLER PULLEY ADJ
14	247018	1	FRONT SKIRT, 20 VAC
15	247020	1	BAND, FRONT SKIRT, 20 VAC
16	247021	2	SHAFT, BRUSH DRIVE
17	247042	2	SPACER, CASTER
18	247068	1	MOTOR, 24VDC 550W
19	247070	1	WELDMENT, PULLEY COVER
20	247071	1	SKID PLATE, VAC
21	247078	3	BEARING, 12 X 28 X 8
22	247079	1	BEARING, 17 X 30 X 7
23	247081	6	SCR-FHSCS 8-32 X .50 SS TORX
24	247082	12	SCR-PHMS 8-32 X .38 SS TORX
25	247083	3	SCR-BHSCS 1/4-20 X 1.75 SS
26	247084	2	KEY, 3/32 X 3/32 X .50
27	247093	3	RETAINING RING, 28MM ID
28	247097	1	BEARING MNT, VAC BRUSH
29	247098	1	BEARING MNT, SWEEPER BRUSH
30	247099	12	SCR-SHCS 10-24 X .50 FULL THRD, ZP
31	711202	13	SCR-HH 1/4-20 X .50 ZP
32	711503	12	WASHER-FLAT #10 X .50 ZP

BILL OF MATERIAL - 246656			
ITEM	PART NO.	QTY	DESCRIPTION
33	711505	16	WASHER-FLAT 1/4 ZP
34	711575	2	WASHER-FLAT 1/4 X .75 X .06 ZP
35	712767	4	WASHER-FLAT .406 X .75 X .035 SS
36	730652	3	LATCH, UNDER CENTER
37	747504	1	CABLE ASSY, BRUSH MOTOR, SWEEPER
38	829306	2	SCR-FHSCS M6 X 16 SS
39	838100	2	NUT-CAP M10 DOMED-SS
40	845101	2	WSR-10.5 X 20 X 2, 304 SS
41	850043	3	BEARING-SEAL 2 SIDE
42	854007	4	O-RING 2.5MM X 36MM, BUNA
43	925012	2	WASHER, PORT A SCRUB
44	931129	2	PULLEY-DRIVE
45	931157	2	SPACER-IDLER END
46	3130042	2	PIN-IDLER END
47	3180091	2	IDLER PULLEY, BRUSH
48	3401983	2	SCR-BHSCS 1/4-20 X 1.25 SS

Vacuum Head Lift Group



Rev A

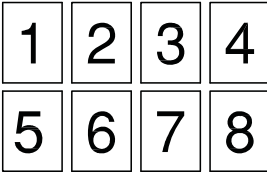
Vacuum Head Group Lift BOM

BILL OF MATERIAL - 246665			
ITEM	PART NO.	QTY	DESCRIPTION
1	245806	5	BUSHING-FLG, .50 X .62 X .31 LG OILITE
2	246064	10	WASHER-FLAT 1/2 X .75 X .062 NYLON
3	246078	2	BUSHING, FLANGED 5/8" SHAFT DIA.
4	246079	2	BUSHING, FLANGED 1/4" SHAFT DIA.
5	246089	1	BRACKET, SWITCH
6	246631	1	WELDMENT, HEAD LIFT SHAFT
7	246647	1	WELDMENT, HEAD LIFT
8	246649	1	WELDMENT, DECK LIFT END
9	246730	1	SCR-BHSCS 1/4-20 X .75 BLK OX NYL PATCH
10	246731	1	WASHER-FLAT, .25 X .75 X .08, HARDEND
11	246736	1	WELDMENT, HEAD LIFT, HANDLE
12	246755	1	CABLE, DECK LIFT
13	247015	1	WELDMENT, TRAILING ARM, 20 VAC
14	247016	1	WELDMENT, LEVELING ARM, 20 VAC
15	247053	1	WELDMENT, SIDE BRUSH LEVER
16	247075	1	SCR-SET 5/16-18 X 1.00 OVAL TIP
17	247085	2	SPRING-EXT 1.00 X 7
18	710495	2	SCR-PHMS 4-40 X 1.25 ZP
19	711228	2	SCR-HH 5/16-18 X .75 ZP GR 5
20	711505	6	WASHER-FLAT 1/4 ZP
21	711506	2	WASHER-FLAT 5/16 X .688 ZP
22	711544	6	WASHER-LOCK 1/4 SPLIT ZP
23	711569	2	WASHER-FLAT .390 X .880 X .062 NYL
24	712099PLT	5	BLT-SHOULDER 1/2 X 1/2 LG X 3/8-16
25	712265	1	CLEVIS-YOKE, 1/2-20 WITH .375 PIN
26	712348	2	NUT-NYLOC 4-40 SS
27	713002	6	SCR-HH 1/4-20 X .75 ZP 5
28	747603-2	1	SWITCH ASY, MICRO ROLLER W/PACK/CONDUIT
29	881002	5	PIN-CLEVIS 5/16 X 1.00 ZINC
30	3300368	2	PULLEY-PLASTIC 2" x .25" GROOVE
31	3400117	1	PIN-CLEVIS 3/8 x 1.125 ZP
32	3400125	6	RING-RUE 3/8
33	3400449	1	NUT-JAM 1/2-20 ZP
34	3401028	3	NUT-JAM 3/8-16 ZP NYLOC
35	3401098	1	NUT-JAM 5/16-18 ZP NYLOC

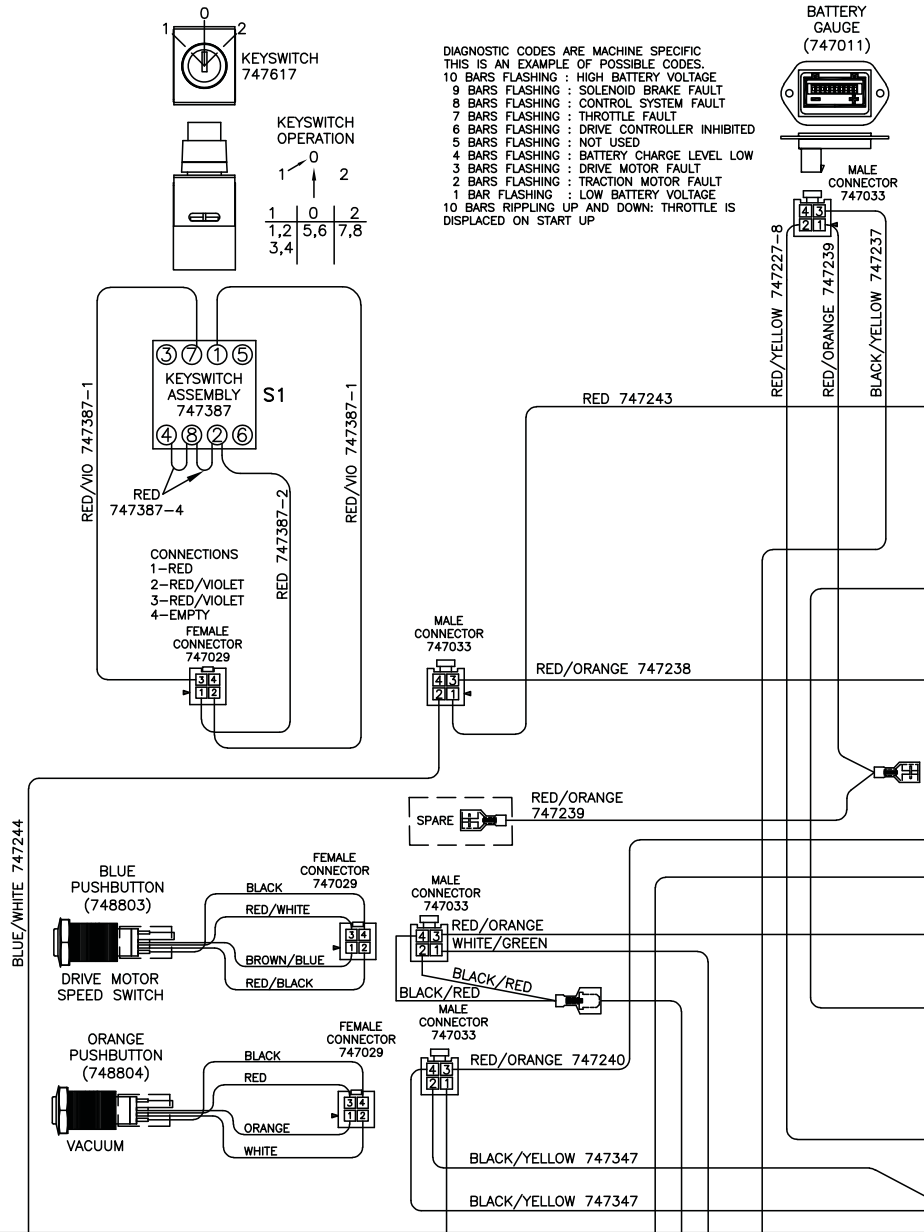
Electrical Schematic

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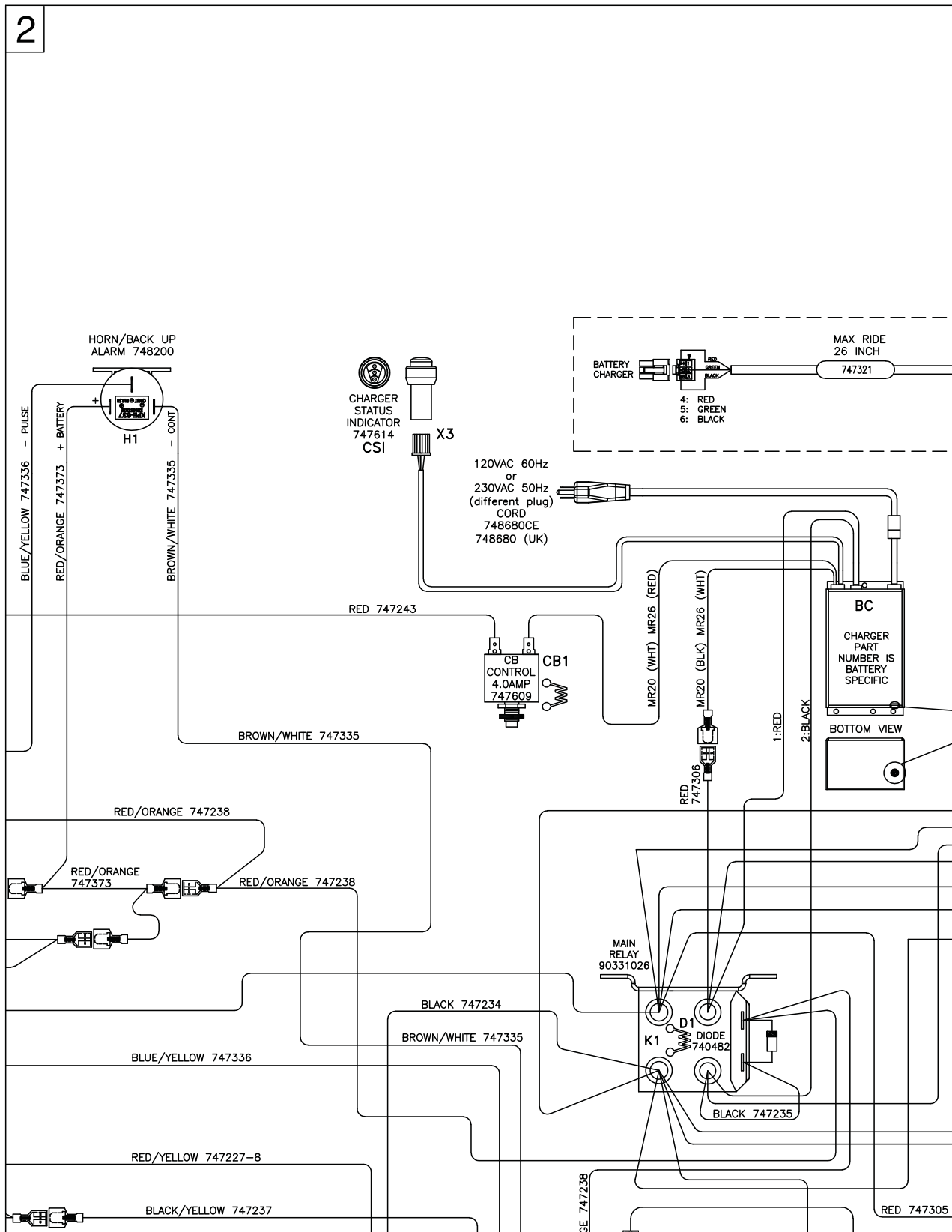
PAGE LAYOUT



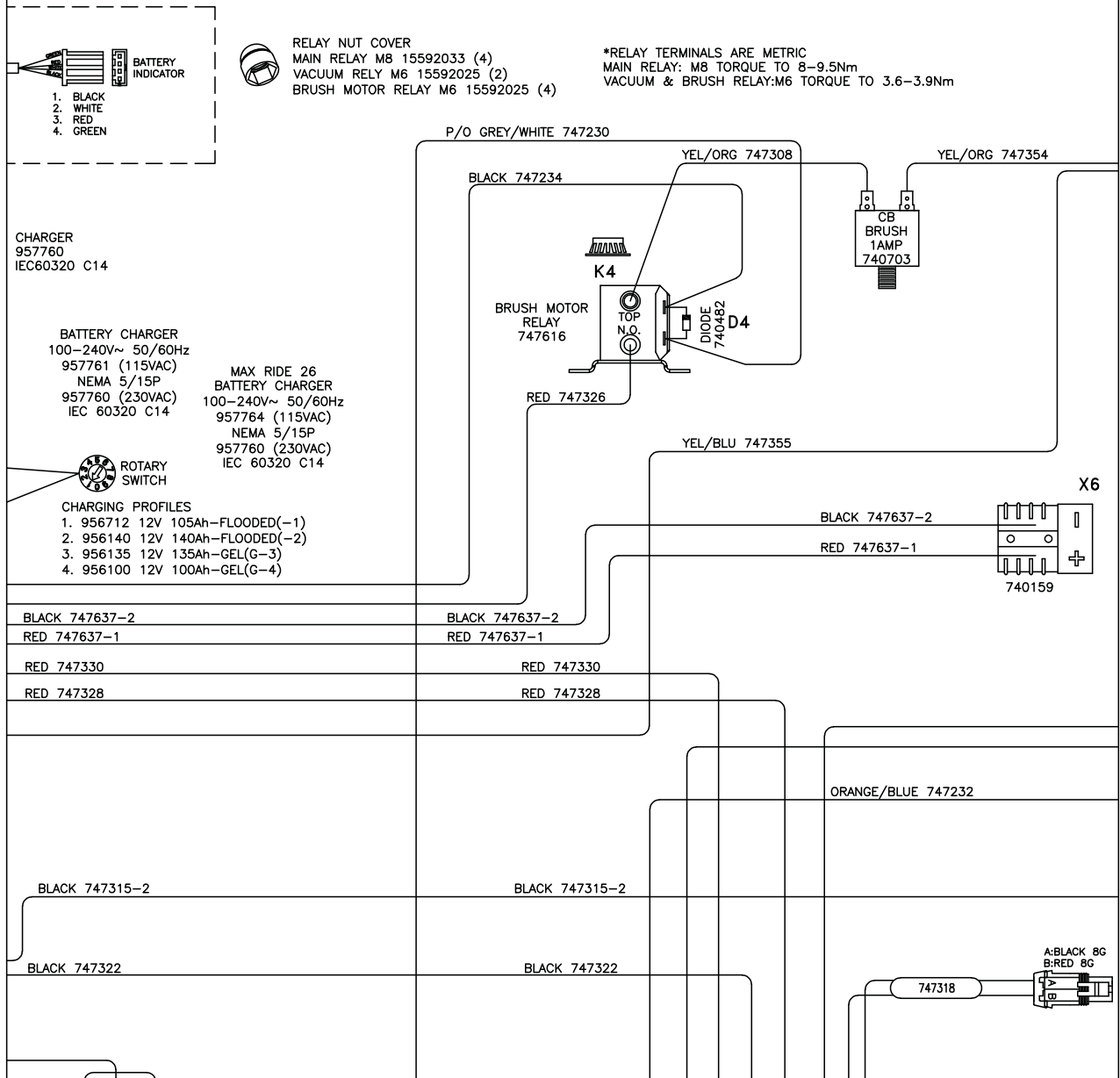
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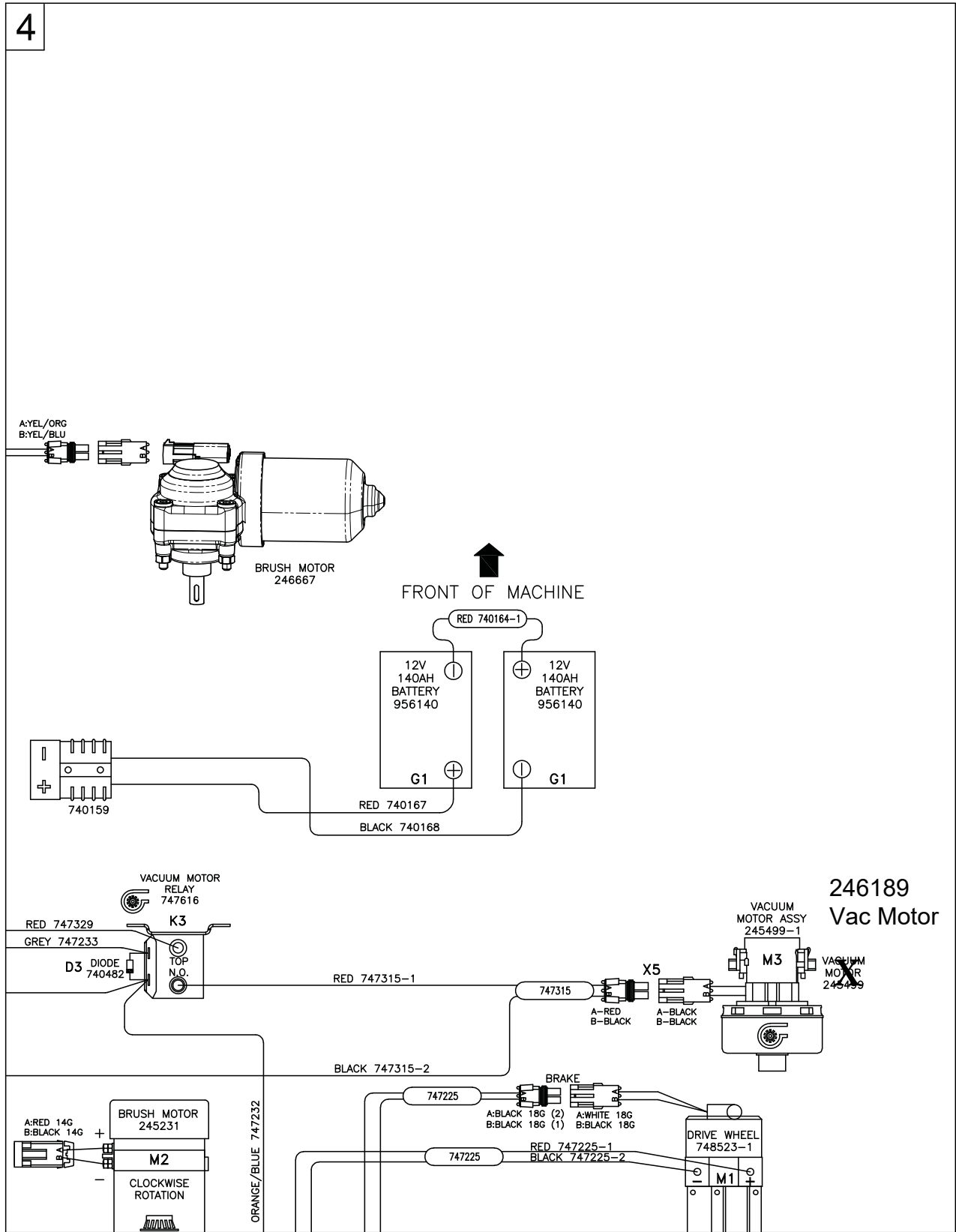
745135 REV B

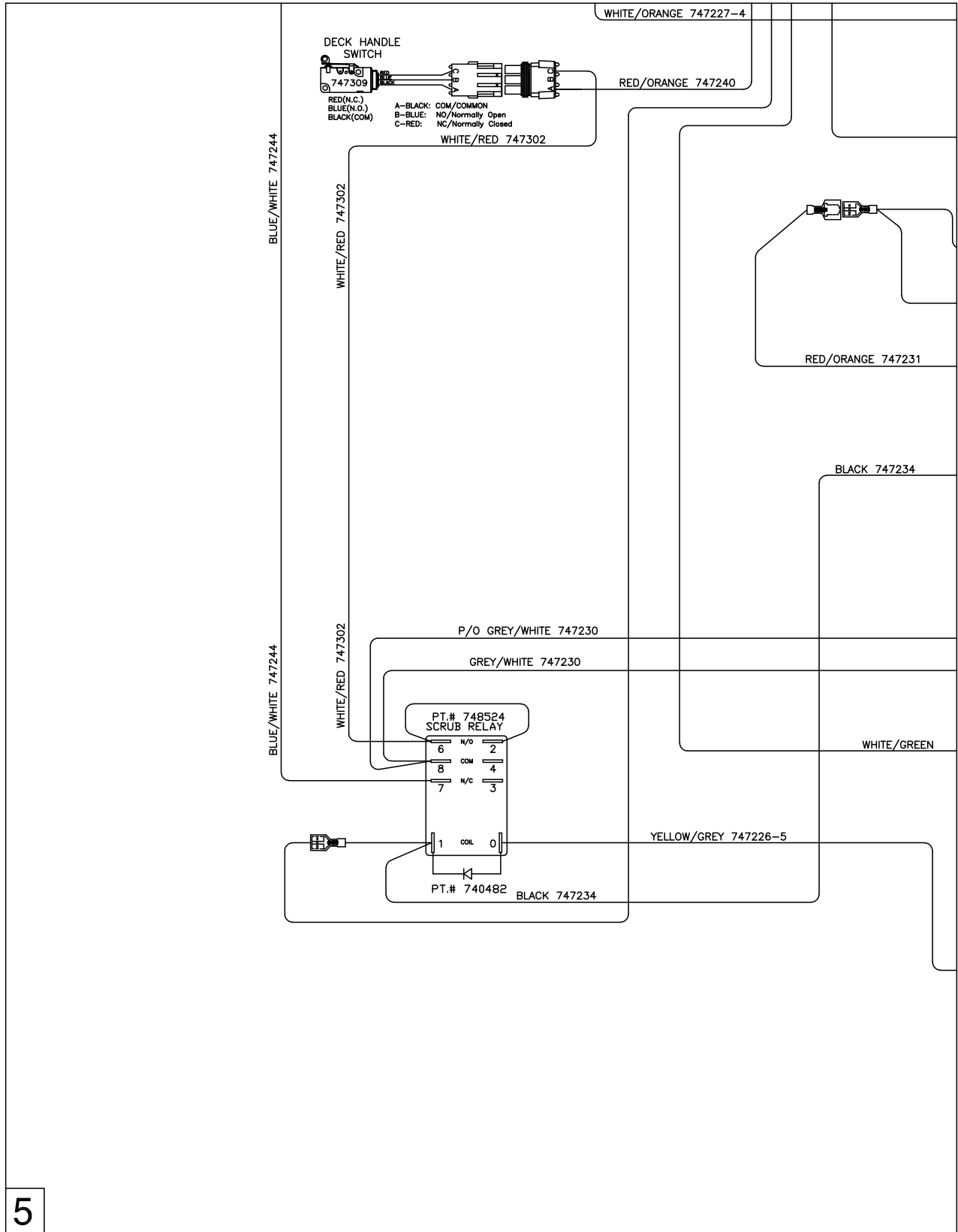


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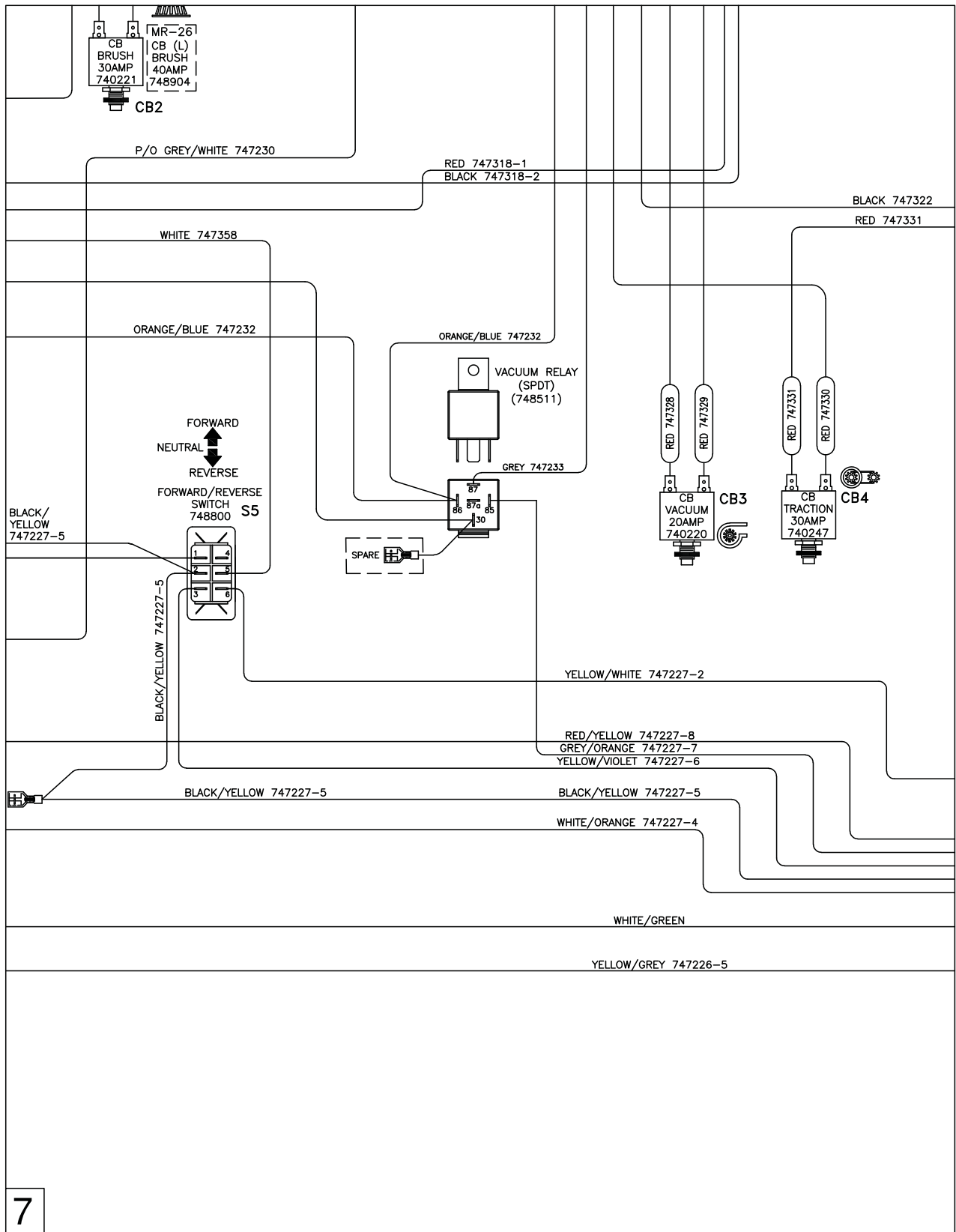


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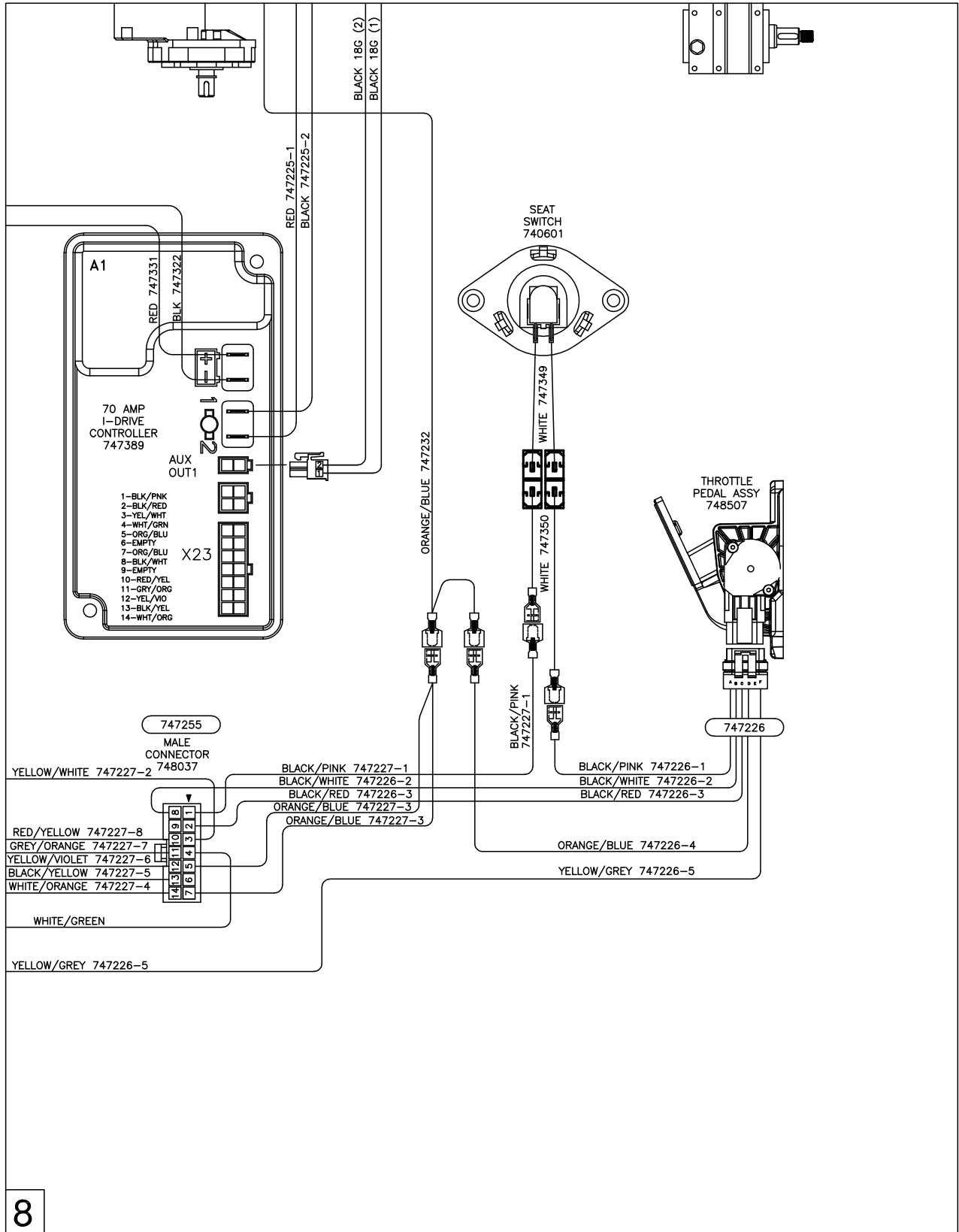




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Warranty

Minuteman International Made Simple Commercial Limited Warranty

REVISION Q EFFECTIVE 4/10/18

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, brushes, electrical motor components or adjustments. Parts 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 pre-filters 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.

Model	Parts	Labor	Poly	Travel**
Cord Electric Group	5yrs	3yrs	12yrs	90 days
Battery Auto Scrubbers (incl. on board charger)	5yrs	3yrs	12yrs	90 days
Battery and Manual Sweepers	3yrs	3yrs	12yrs	90 days

Exceptions.....

Model	Parts	Labor	Poly	Travel**
Port A Scrub, all models (incl. on board charger)	1yr	6months	12yrs	90 days
A3S Blower	1yr	1yr	0	0
Phenom Dual Motor Upright Vacuums	2yrs	2yrs	0	0
Explosion Proof Vacuum	1yr	1yr	0	0
Propane Burnisher	1yr	1yr	0	90 days
E14BQP and E14115 scrubber	1yr	1yr	12yrs	90 days
EZ-Mop	1yr	1yr	0	90 days
ROS-17	1yr	1yr	0	90 days
**Travel, 2 hours max				

<i>Stand-alone Battery Chargers:</i>	One year
<i>Replacement Parts:</i>	Ninety days
<i>Batteries:</i>	0-3 months full replacement, 4-12 months pro-rate
<i>Polypropylene Plastic Tanks:</i>	12yr warranty, no additional labor



“Excellence Meets Clean”

**Minuteman is a Full Line Manufacturer of Sweepers and Scrubbers,
for Industrial Facilities.**

14N845 U.S. Route 20, Pingree Grove, IL 60140 USA
Phone (800) 323-9420 - www.minutemanintl.com
A Member of the Hako Group