



SAFA TECHNOLOGY

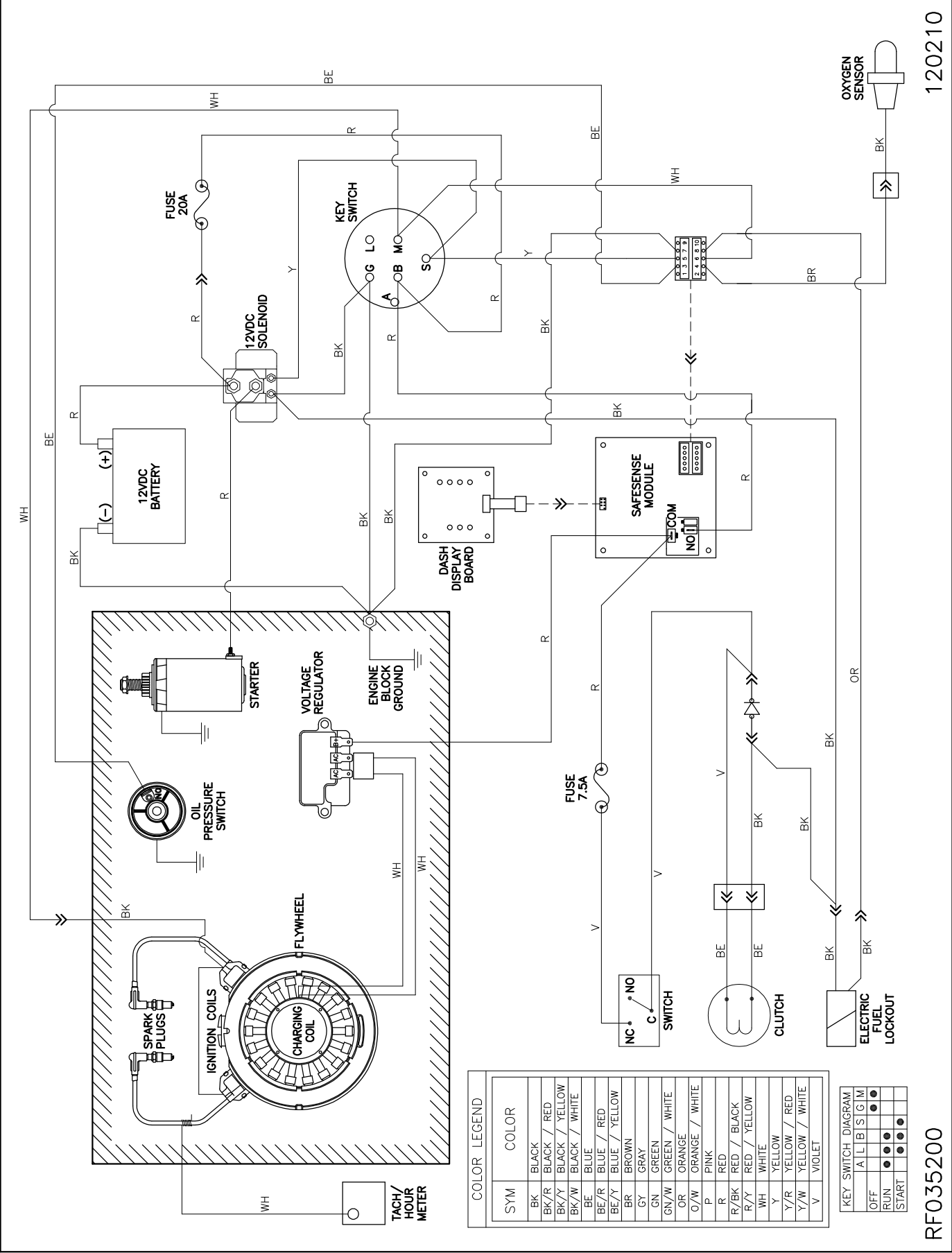


Propane Stripping Machine
PE440ST
Operator's Manual



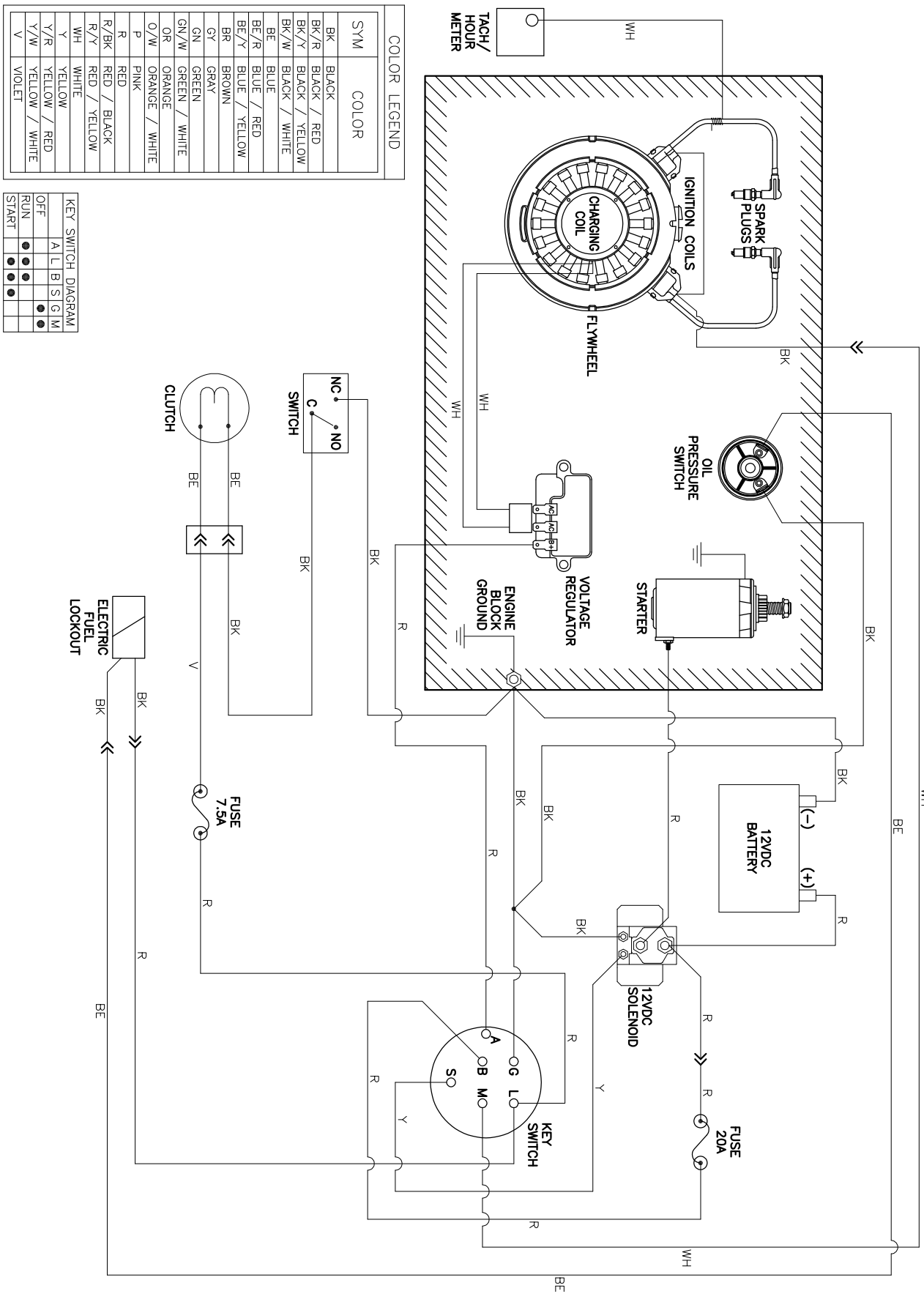
CE

Electrical Schematic (with SafeSense)



RF035200

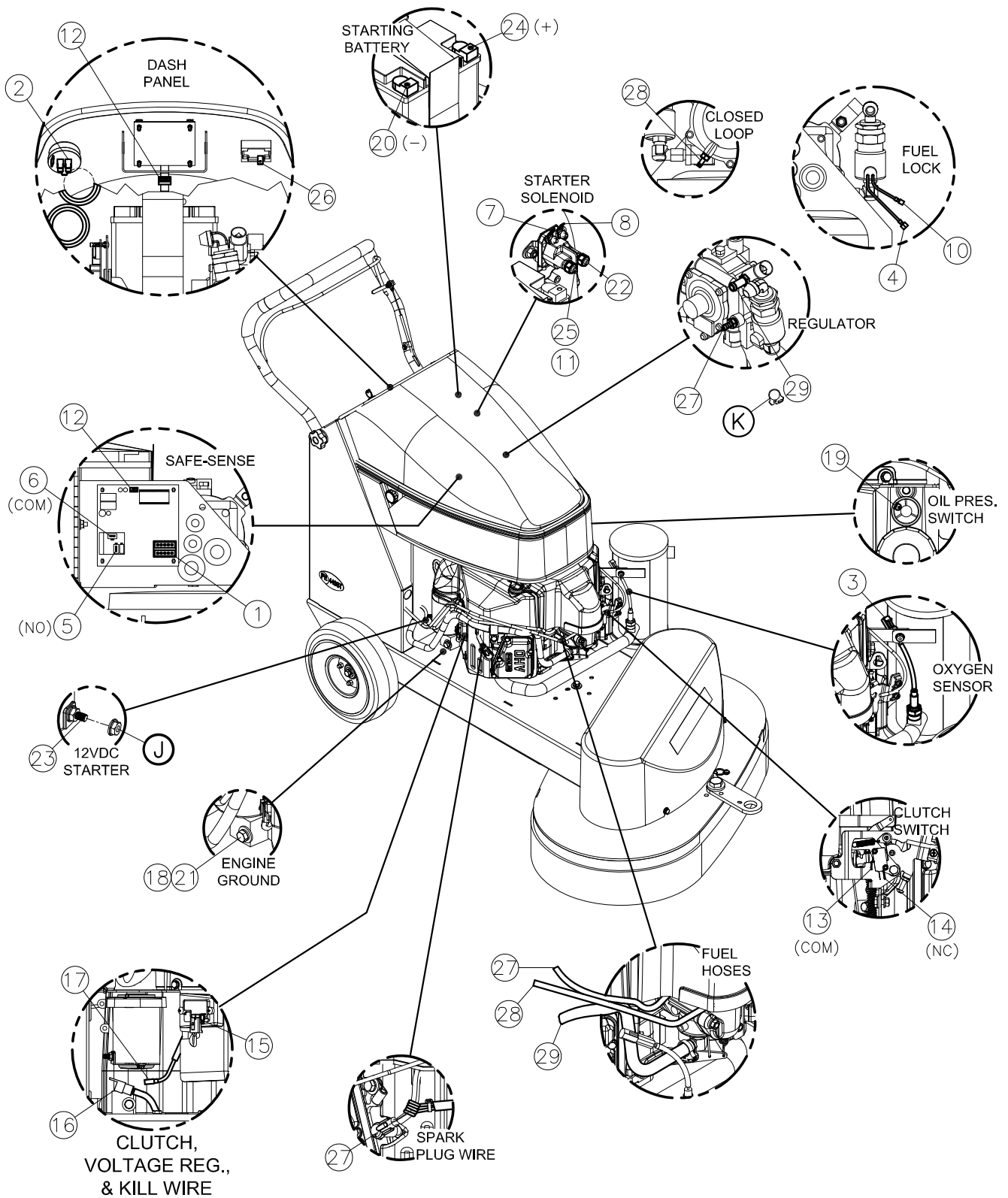
Electrical Schematic (without SafeSense)



RF037100

032911

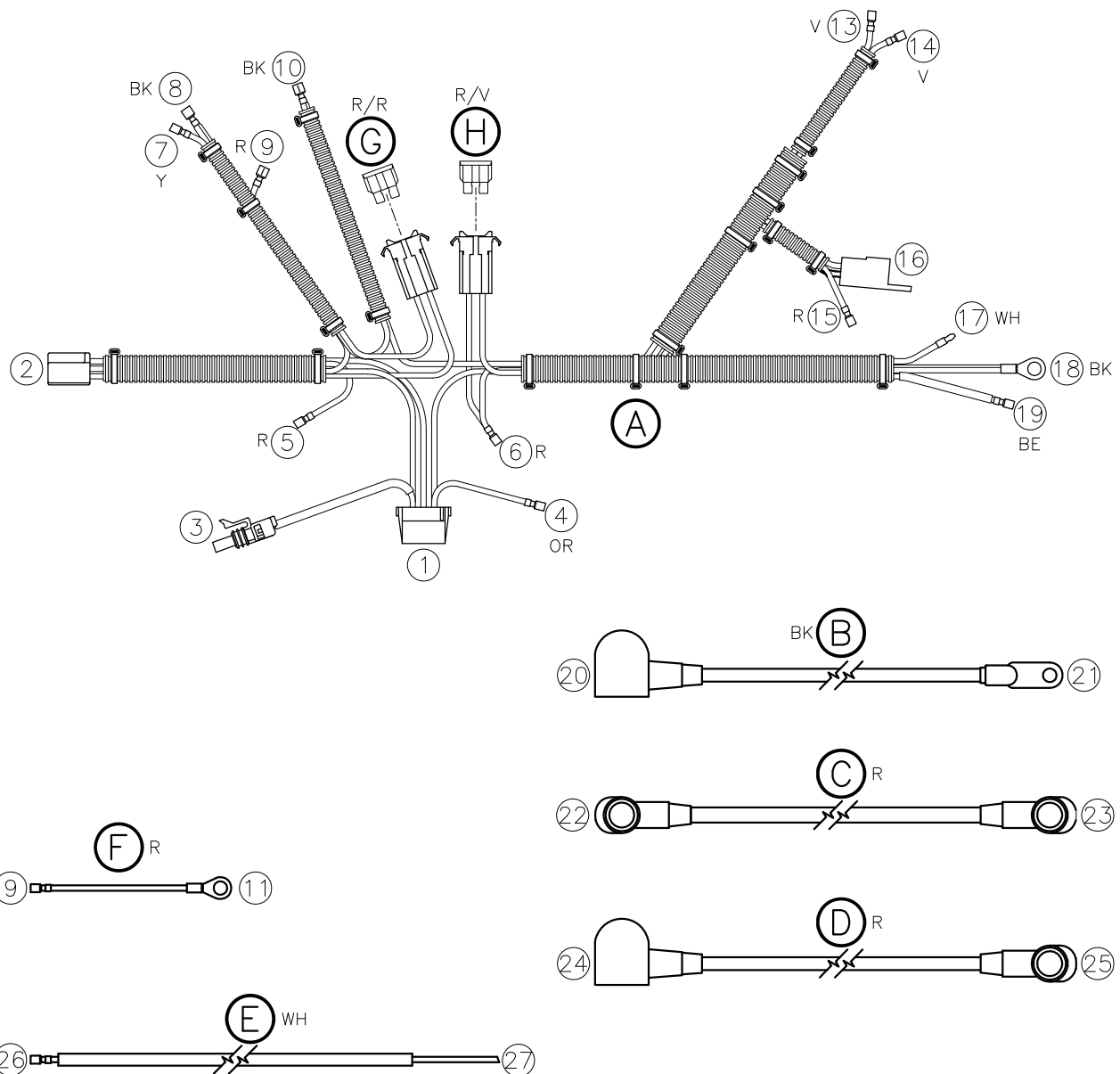
Connections - with SafeSense



RF037400

020116

Connections - with SafeSense (Continued)

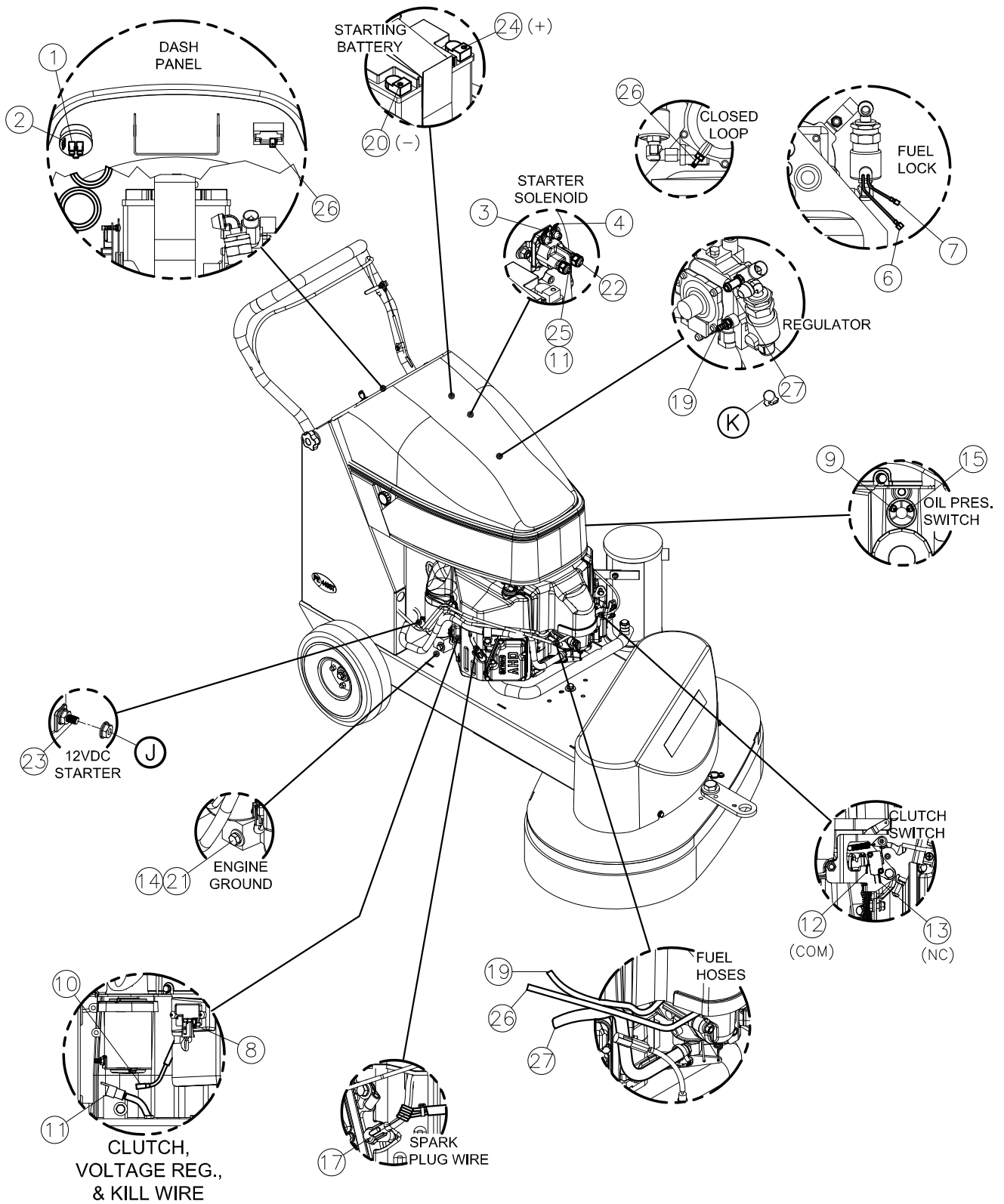


RF037400

020116

Item	Ref. No.	Description	Qty	Item	Ref. No.	Description	Qty
A	MP379200	HARNESS, WIRING	1	F	MP354900	WIRE, SOLENOID, BATTERY	1
B	MP2012	CABLE, BATTERY, NEG	1	G	SS2570	FUSE, 20A	1
C	MP379400	CABLE, BATTERY, POS., 34"	1	H	MP043000	FUSE, 7.5A	1
D	MP379500	CABLE, BATTERY, POS., 14"	1	J	NB9545	NUT, FLANGE, 1/4"	1
E	MP392200	HARNESS, TACH/HOUR, 51"	1	K	NB7282	CLAMP, HOSE	1

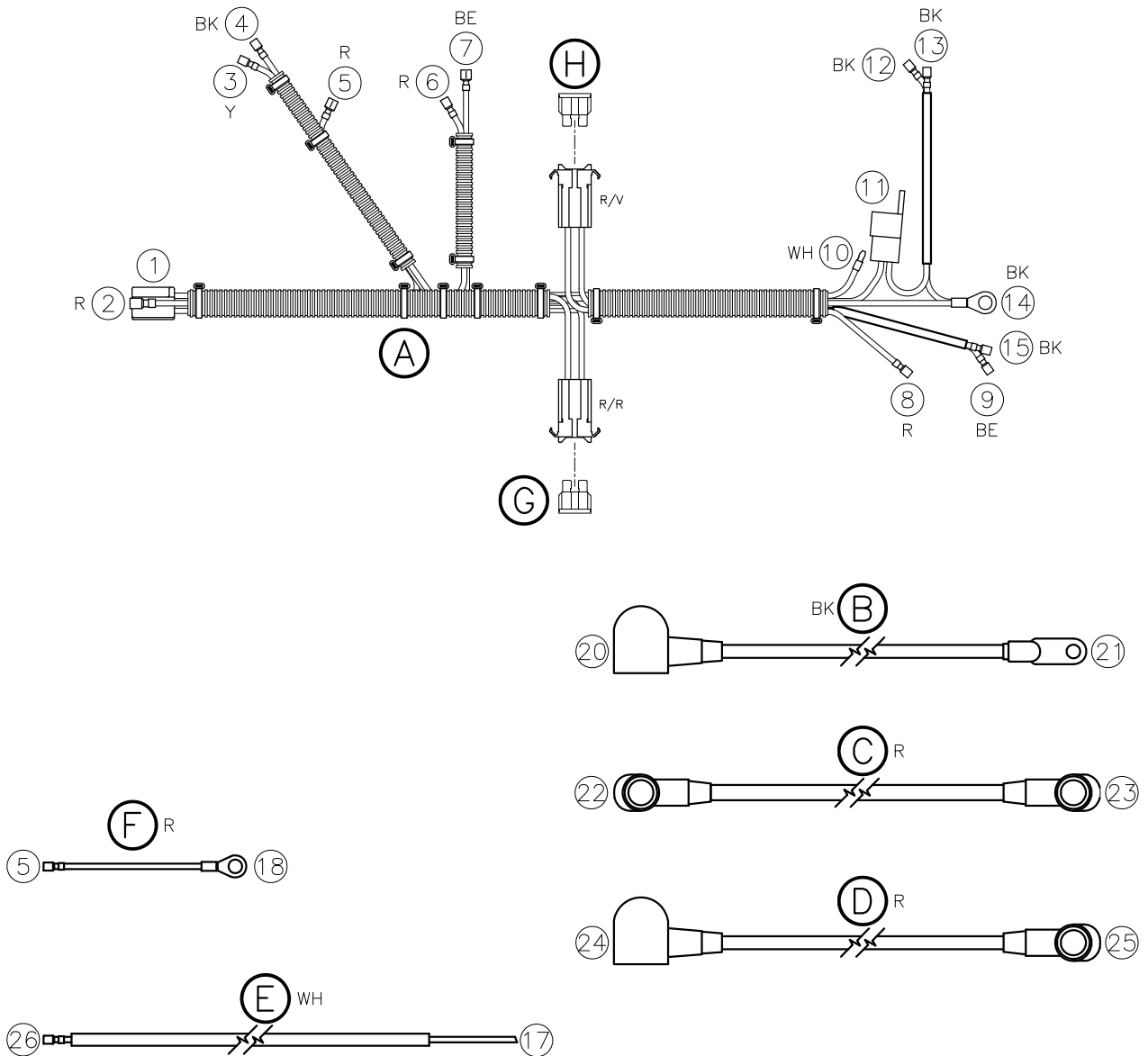
Connections - without SafeSense



RF037500

020116

Connections - without SafeSense (Continued)

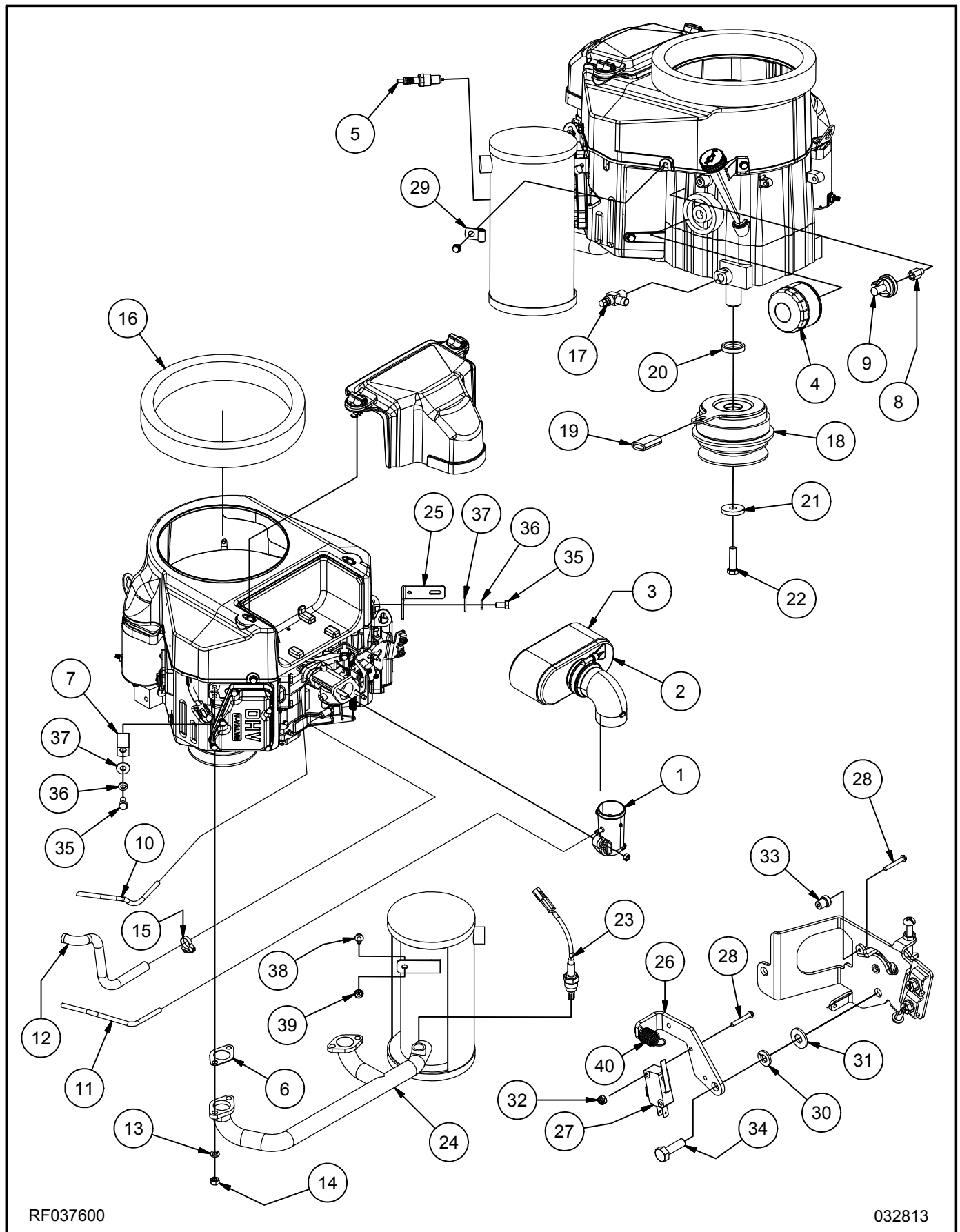


RF037500

020116

Item	Ref. No.	Description	Qty	Item	Ref. No.	Description	Qty
A	MP392300	HARNESS, WIRING	1	F	MP354900	WIRE, SOLENOID, BATTERY	1
B	MP2012	CABLE, BATTERY, NEG	1	G	SS2570	FUSE, 20A	1
C	MP379400	CABLE, BATTERY, POS., 34"	1	H	MP043000	FUSE, 7.5A	1
D	MP379500	CABLE, BATTERY, POS., 14"	1	J	NB9545	NUT, FLANGE, 1/4"	1
E	MP392200	HARNESS, TACH/HOUR, 51"	1	K	NB7282	CLAMP, HOSE	1

Engine Assembly



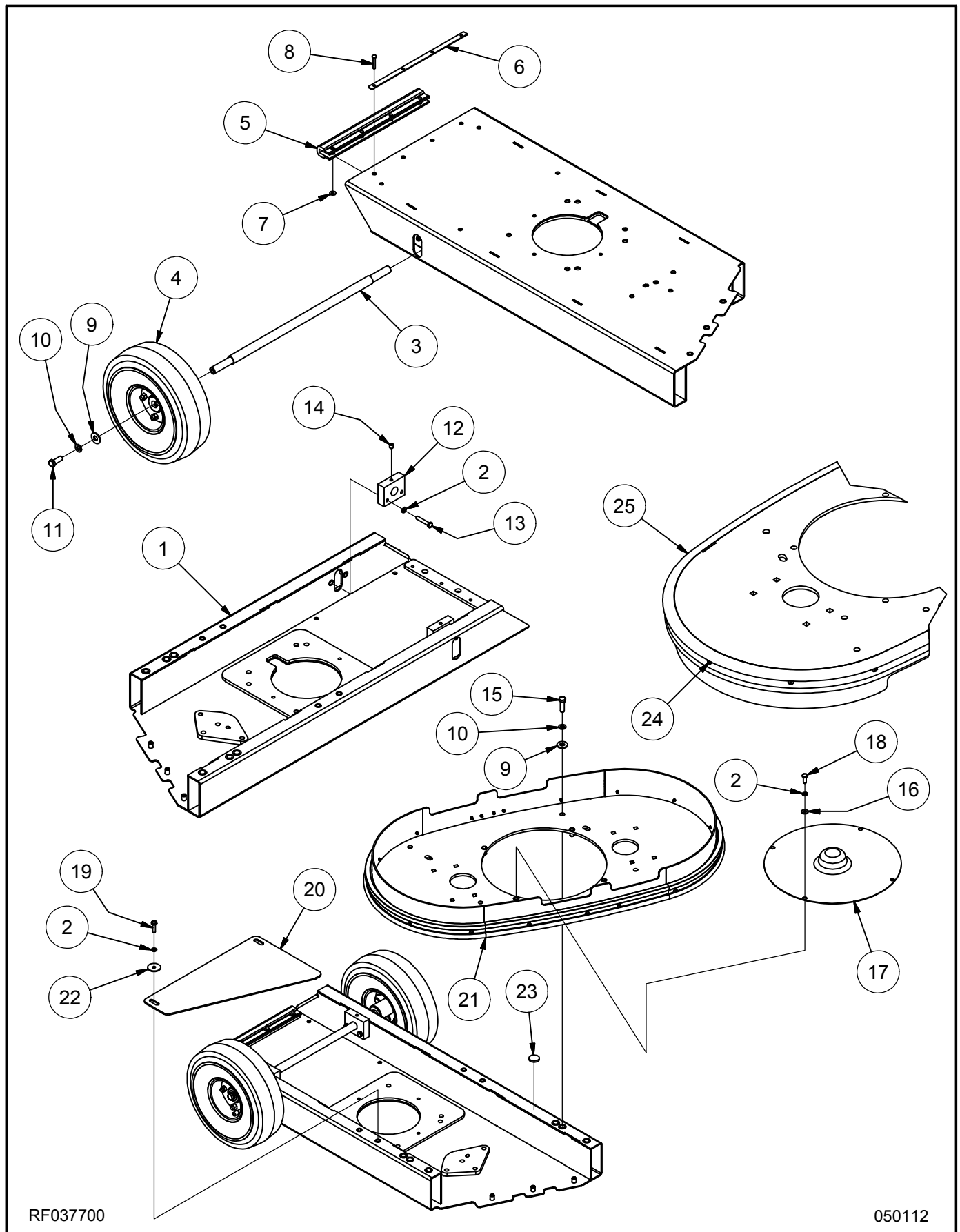
RF037600

032813

Engine Assembly (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>	<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1	KA160600742	PIPE, INTAKE	1	21	MP4805	SPACER, BOTTOM, CLUTCH	1
2	KA110130752	ELEMENT, FILTER, AIR	1	22	NB005800	BOLT, HEX, 7/16" X 1-1/2"	1
3	KA110137046	PRECLEANER, AIR	1	23A	MP466500	SENSOR, OXYGEN (w/ Sf Snse)	1
4	KA490657007	FILTER, OIL	1	23B	MP015200	PLUG, SENSOR (w/o Sf Snse)	1
5	KA920702112	PLUG, SPARK, NGK, BPR4ES	1	24	MP365300	MUFFLER, CATALYST, VERT.	1
6	KA110607016	GASKET, MUFFLER	2	25	MP387601	BRACKET, MUFFLER	1
7	NB8130	CLAMP, 3/4" ID	1	26	MP452101	BRACKET, SWITCH	1
8	MP044800	ADAPTER, 1/8" NPT	1	27	MP318400	SWITCH, MICRO, 12V	1
9A	MP028700	SWITCH, OIL, SP (w/ Sf Snse)	1	28	NB9625	SCREW, #4 X 3/4"	3
9B	MP019200	SWITCH, OIL, DP (w/o Sf Snse)	1	29	NB8125	CLAMP, 1/4"	1
10	NB2460	HOSE, VACUUM, 5/32"	37"	30	NB6110	WASHER, LOCK, 1/4"	1
11	NB2460	HOSE, VACUUM, 5/32"	45"	31	NB3350	WASHER, FLAT, 1/4"	1
12	NB2470	HOSE, FUEL, 3/8"	40"	32	NB007000	NUT, LOCK, #4	2
13	KA461DA0800	WASHER, LOCK, M8	4	33	MP452200	SPACER, THROTTLE, #4	1
14	KA922107027	NUT, HEX, M8	4	34	NB6012	BOLT, HEX, M6 X 20	1
15	NB7282	CLAMP, HOSE	1	35	NB065000	BOLT, HEX, M8 X 16	2
16	MP043100	SEAL, INTAKE, AIR	1	36	NB6111	WASHER, LOCK, 5/16"	2
17	MP072300	VALVE, DRAIN, OIL	1	37	NB9267	WASHER, FLAT, 5/16"	2
18	MP4787	CLUTCH, ASM.	1	38	NB049300	SCREW, 1/4" X 1/2"	1
19	MP4790	TUBING, NEOPRENE	2"	39	NB9545	NUT, FLANGE, 1/4"	1
20	MP371700	SPACER, 1.02" ID	1	40	MP452300	SPRING, EXTENSION	1

Frame Assembly



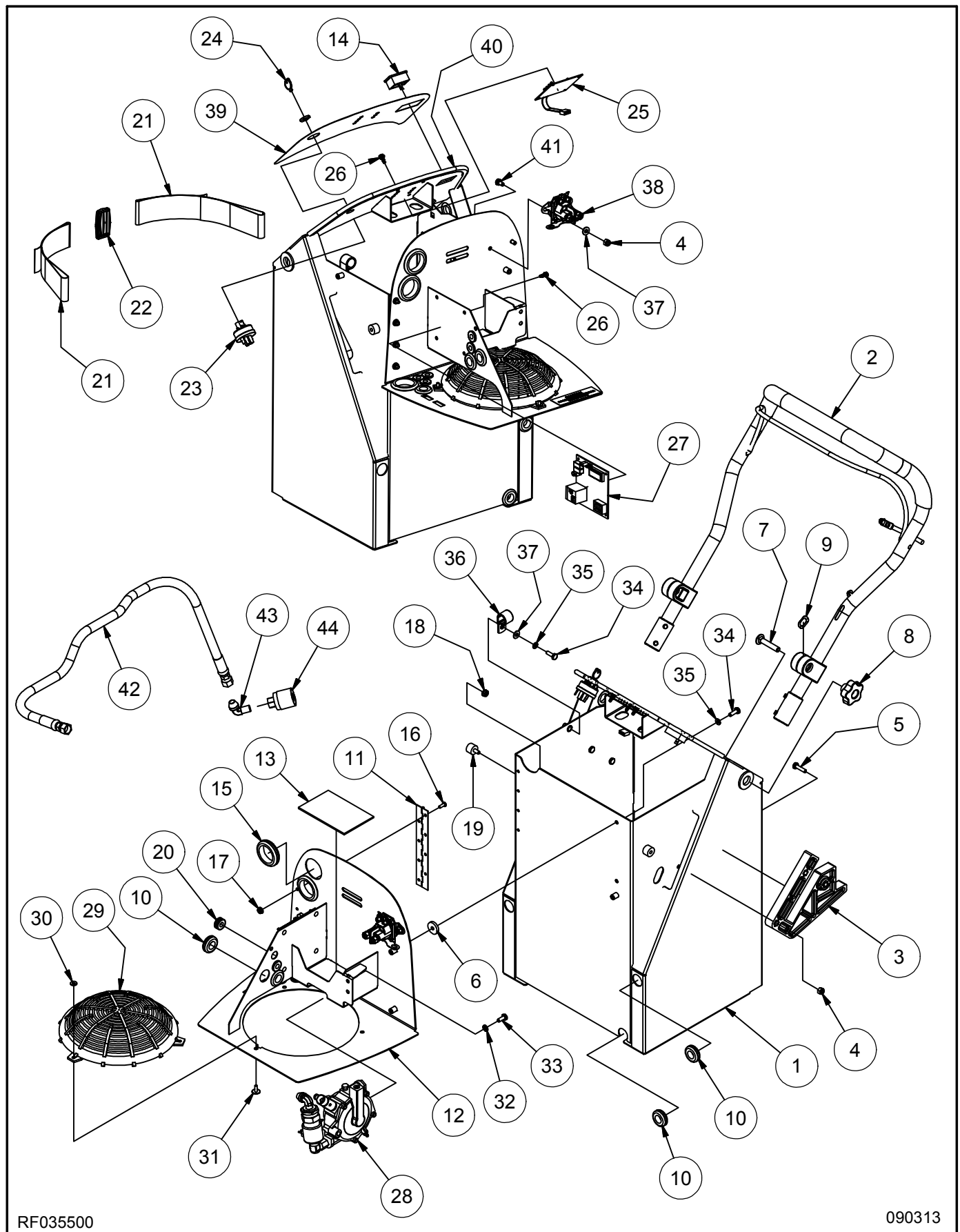
RF037700

050112

Frame Assembly (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>	<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1	MP391300	FRAME, ASM.	1	15	NB6044	BOLT, HEX, 3/8" X 1-1/4"	4
2	NB6110	WASHER, LOCK, 1/4"	10	16	NB3350	WASHER, FLAT, 1/4"	4
3	BA001300	AXLE	1	17	BA014801	COVER, PULLEY	1
4	SS1315	WHEEL, 10"	2	18	NB019100	BOLT, HEX, 1/4" X 3/4"	4
5	MP371400	BUMPER, ROK-BAK	1	19	NB6530	BOLT, HEX, 1/4" X 1"	2
6	MP336200	STRAP, BUMPER	1	20	MP388801	PLATE, GUARD, SPLASH	1
7	NB9645	WASHER, FLAT, #10	4	21A	MP391600	DECK, 30", ASM.	1
8	NB063400	RIVET, 3/16" X 1"	4	21B	MP391700	DECK, 38", ASM.	1
9	NB3450	WASHER, FLAT, 3/8"	6	22	NB006400	WASHER, FENDER, 1/4"	2
10	MX1075	WASHER, LOCK, 3/8"	6	23	MP140000	FELT, DOT	1
11	NB6042	BOLT, HEX, 3/8" X 1"	2	24A	NB008900	RIVET, 3/16" (30")	18
12	BA018700	BLOCK, AXLE	2	24B	NB008900	RIVET, 3/16" (38")	20
13	NB9000	BOLT, HEX, 1/4" X 1-1/2"	4	25A	MP031805	BUMPER, SHROUD (30")	7.5 FT
14	NB2463	SCREW, SET, 5/16" X 3/8"	2	25B	MP031805	BUMPER, SHROUD (38")	9.25 FT

Bulkhead Assembly



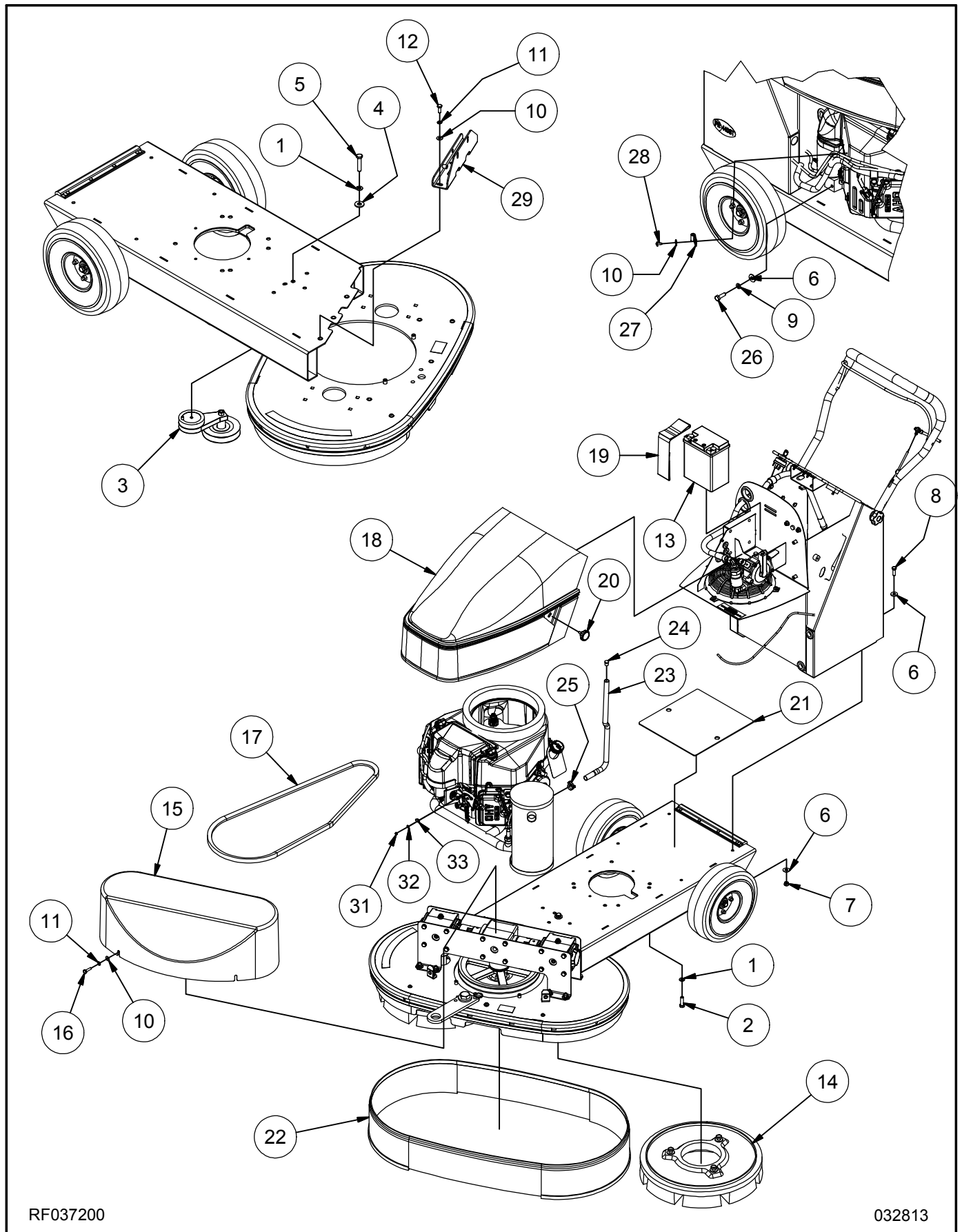
RF035500

090313

Bulkhead Assembly (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>	<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1	MP377300	BULKHEAD, ASM.	1	24	KC4834001	KEY, SWITCH, IGNITION	1
2	MP375500	HANDLE, ASM.	1	25	MP042800	BOARD, DISPLAY***	1
3	MP039300	PLATE, LOCK, HANDLE	2	26	NB012500	SPACER, BOARD***	8
4	NB3275	NUT, LOCK, 1/4"	8	27	MP161200	MODULE, SAFESense***	1
5	NB6530	BOLT, HEX, 1/4" X 1"	6	28	MP375600	REGULATOR, ASM.	1
6	MP373100	WASHER, RUBBER	2	29	KA550200900	GUARD, SCREEN, FS481V	1
7	NB010100	BOLT, CARRIAGE, 3/8" X 2"	2	30	NB9645	WASHER, FLAT, #10	3
8	RV005100	KNOB, HANDLE	2	31	NB021000	RIVET, 3/16"	3
9	NB011400	WASHER, WAVE	2	32	MX1115	WASHER, STAR, 1/4"	2
10	NB009900	GROMMET, 11/16" ID	5	33	NB003200	BOLT, HEX, 1/4" X 5/8"	2
11	MP373600	HINGE, 7.5" X 1.25"	1	34	NB019100	BOLT, HEX, 1/4" X 3/4"	4
12	MP377200	TRAY, BATTERY, ASM.	1	35	NB6110	WASHER, LOCK, 1/4"	4
13	MP373800	PAD, BATTERY	1	36	NB8130	CLAMP, 3/4"	2
14	MP280400	METER, HOUR / TACH	1	37	NB3350	WASHER, FLAT, 1/4"	4
15	NB6514	GROMMET, 1-1/2" ID	3	38	MP367100	SOLENOID, STARTER, 12V	1
16	NB034100	SCREW, #10 X 1/2"	8	39A	MP390400	DECAL, C.PANEL (w/ SfSense)	1
17	NB9510	NUT, FLANGE, #10	8	39B		DECAL, C.PANEL (w/o SfSense)	1
18	NB9845	NUT, KEPS, 1/4"	2	40	IN1015	TRIM, BATTERY TRAY	2 FT
19	IN3510	MOUNT, TYPE S, 1/4"	2	41	NB015700	BOLT, HEX, 1/4" X 5/8"	2
20	NB009800	GROMMET, 3/8" ID	5	42	MP373300	HOSE, FUEL, LP, 3/4", ASM.	1
21	MP368100	STRAP, 2" X 23"	2	43	MP4330	FITTING, ELBOW	1
22	MP367600	SLIDE, STRAP, 2"	1	44	MP4500	COUPLER, REGO	1
23	MP199000	SWITCH, IGNITION	1	*** NOTE: Only used on models equipped with SafeSense.			

Main Assembly



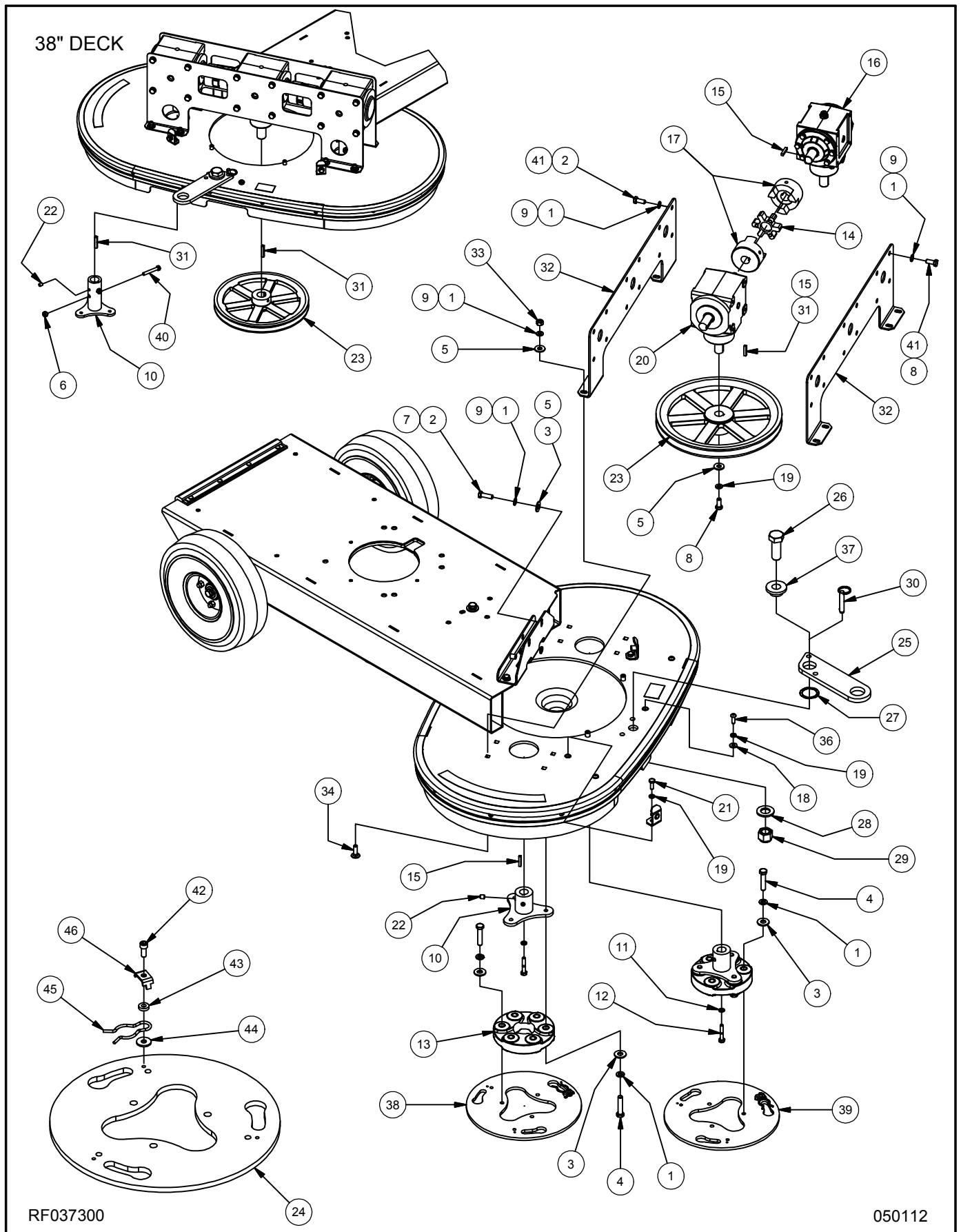
RF037200

032813

Main Assembly (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>	<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1	MX1075	WASHER, LOCK, 3/8"	5	16	NB6530	BOLT, HEX, 1/4" X 1"	3
2	NB6044	BOLT, HEX, 3/8" X 1-1/4"	4	17	MP402100	BELT, BX-62	1
3	MP071800	TENSIONER, BELT	1	18	MP375800	HOOD, ASM.	1
4	NB3450	WASHER, FLAT, 3/8"	1	19	MP368100	STRAP, 2" X 23"	1
5	NB024500	BOLT, HEX, 3/8" X 1-3/4"	1	20	MP372600	KNOB, 1/4"	2
6	NB9267	WASHER, FLAT, 5/16"	9	21	MP038900	PAD, TANK	1
7	NB3265	NUT, LOCK, 5/16"	4	22A	BA014500	SKIRT, SPLASH (30")	1
8	NB6545	BOLT, HEX, 5/16" X 1"	4	22B	BA014700	SKIRT, SPLASH (38")	1
9	NB6111	WASHER, LOCK, 5/16"	1	23	MP4515	TUBING, OIL DRAIN	20"
10	NB3350	WASHER, FLAT, 1/4"	7	24	NB1621	PLUG, TUBING	1
11	NB6110	WASHER, LOCK, 1/4"	6	25	NB7282	CLAMP, HOSE, 3/8"	1
12	NB019100	BOLT, HEX, 1/4" X 3/4"	3	26	NB065100	BOLT, HEX, M8 X 25MM	1
13	MP362200	BATTERY, 12V	1	27	NB8125	CLAMP, HOSE, 1/4"	1
14A	BA013000	BRUSH, 16" (30")	2	28	NB064900	SCREW, #10 X 1/2"	1
14B	BA013500	PAD HOLDER, 16" (OPTIONAL)	2	29A	MP391400	BRACE, GEARBOX (30")	1
14C	BA012800	BRUSH, 20" (38")	2	29B	MP391500	BRACE, GEARBOX (38")	1
14D	BA013700	PAD HOLDER, 20" (OPTIONAL)	2	30	MP105900	CYLINDER, LP (NOT SHOWN)	1
14E	MP8505	RETAINER, PAD (PAD HOLDER)	1	31	NB007000	NUT, LOCK, #4	1
15A	BA018100	COVER, GEARBOX (30")	1	32	NB007100	WASHER, FLAT, #6	1
15B	BA017700	COVER, GEARBOX (38")	1	33	NB012300	WASHER, LINKAGE	1

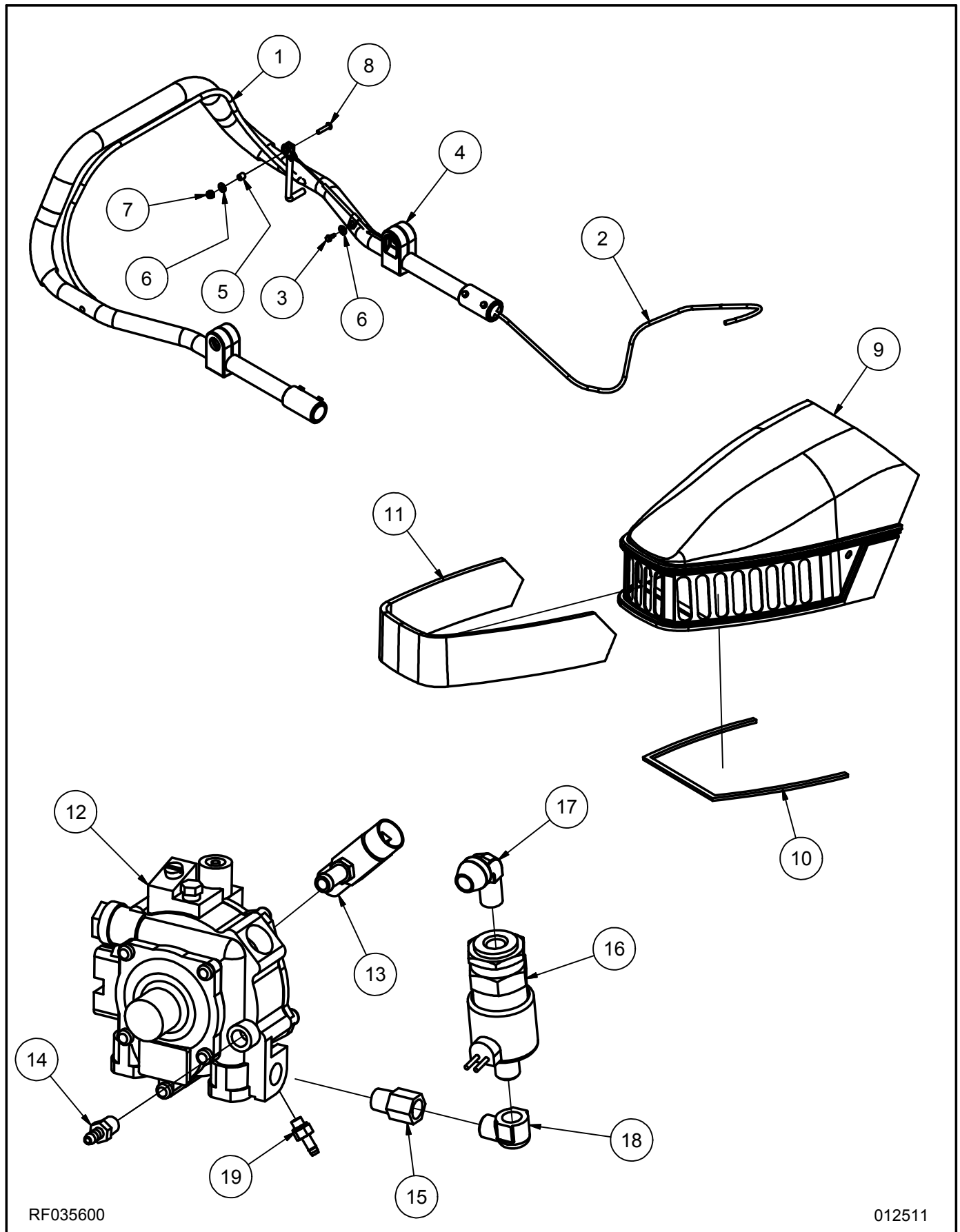
Main Assembly - Deck



Main Assembly - Deck (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>	<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1A	MX1075	WASHER, LOCK, 3/8" (30")	12	21	NB019100	BOLT, HEX, 1/4" X 3/4"	2
1B	MX1075	WASHER, LOCK, 3/8" (38")	36	22	NB2463	SCREW, SET, 5/16" X 3/8"	4
2	NB6042	BOLT, HEX, 3/8" X 1-1/4" (38")	2	23A	MP037600	PULLEY, 10.75" X 3/4" (30")	1
3A	NB3450	WASHER, FLAT, 3/8" (30")	12	23B	MP037300	PULLEY, 10.75" X 1" (38")	1
3B	NB3450	WASHER, FLAT, 3/8" (38")	14	24	MP331100	PLATE, ATTACH, HEAD	1
4	NB024500	BOLT, HEX, 3/8" X 1-3/4"	12	25	MP397901	PLATE, PIVOT, HOOK	1
5A	NB9267	WASHER, FLAT, 5/16" (30")	31	26	NB035400	BOLT, HEX, 3/4" X 2-1/2"	1
5B	NB9267	WASHER, FLAT, 5/16" (30")	38	27	NB033500	WASHER, WAVE	1
6	NB3265	NUT, LOCK, 5/16" (38")	2	28	NB018600	WASHER, FLAT, 3/4"	1
7	NB6545	BOLT, HEX, 5/16" X 1" (30")	2	29	NB035500	NUT, LOCK, 3/4"	1
8	NB9745	BOLT, HEX, 5/16" X 3/4"	23	30	NB035800	PIN, PULL, 3/8" X 1-1/2"	1
9A	NB6111	WASHER, LOCK, 5/16" (30")	32	31	NB7802	KEY, 1/4" X 1-1/2"	3
9B	NB6111	WASHER, LOCK, 5/16" (38")	8	32A	MP388401	BRACKET, GEARBOX (30")	2
10A	BA018500	HUB, DRIVE, 3/4" (30")	2	32B	MP388701	BRACKET, GEARBOX (38")	2
10B	BA019100	HUB, DRIVE, 1" (38")	2	33	NB3260	NUT, HEX, 5/16"	8
11	NB025700	WASHER, LOCK, 1/4" (30")	2	34	NB5000	BOLT, CARRIAGE, 5/16" X 1"	8
12	NB030500	BOLT, HEX, 1/4" X 1-1/2" (30")	2	35	MP391800	BRACKET, COVER, ASM.	2
13	MP317700	COUPLING, FLEXI	2	36	NB049000	SCREW, BH, 1/4" X 3/4"	1
14	MP037500	SPIDER, L099, 1"	2	37	MP389200	BUSHING, PIVOT, HOOK	1
15A	BA003200	KEY, 3/16" X 1" (30")	7	38	MP390700	PLATE, ATTACH, RS, ASM.	1
15B	MP7801	KEY, 1/4" X 1" (38")	4	39	MP390800	PLATE, ATTACH, LS, ASM.	1
16A	MP363200	GEARBOX, RIGHT ANGLE (30")	2	40	NB011800	BOLT, HEX, 5/16" X 2"	2
16B	BA017500	GEARBOX, RIGHT ANGLE (38")	2	41	NB6851	BOLT, HEX, 3/8" X 3/4"	22
17A	MP196700	HUB, L099, .75" BORE (30")	4	42	NB060500	SCREW, #10 X 1/2"	1
17B	MP037400	HUB, L099, .1.00" BORE (38")	4	43	NB060600	WASHER, .20" ID X .44" OD	1
18	NB3350	WASHER, FLAT, 1/4"	1	44	NB060700	WASHER, .22" ID X .63" OD	1
19	NB6110	WASHER, LOCK, 1/4"	3	45	NB024100	PIN, HITCH	1
20A	BA017200	GEARBOX, "T" DRIVE (30")	1	46	MP098700	RETAINER, PIN	1
20B	BA017400	GEARBOX, "T" DRIVE (38")	1				

Regulator, Handle, & Hood Assembly



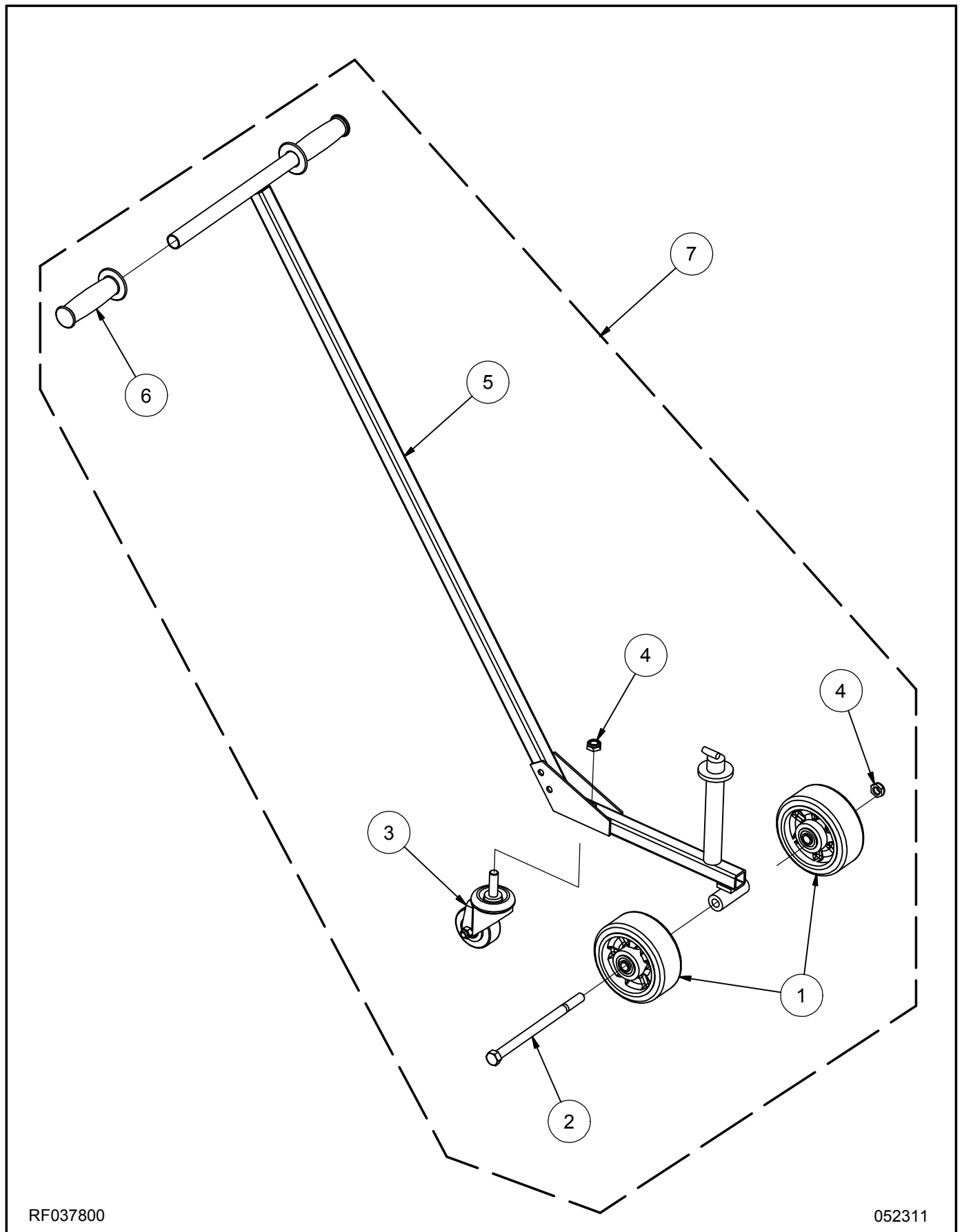
RF035600

012511

Regulator, Handle, & Hood Assembly (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1	MP042000	BAIL, BACK	1
2	MP106500	CABLE, CONTROL, THROTTLE	1
3	NB4382	SCREW, #8 X 1/2"	5
4	MP050500	BLOCK, GUIDE, CABLE	1
5	NB028300	BUSHING, CABLE	1
6	NB9645	WASHER, FLAT, #10	2
7	NB9735	NUT, LOCK, #10	1
8	NB049100	SCREW, #10 X 7/8"	1
9	MP375800	HOOD, BLACK, ASM.	1
10	MP075200	FOAM, 1/2" X 38"	1
11	MP373400	FILTER, AIR, HOOD	1
12	SA026300	REGULATOR, LP	1
13	MP017900	ADJUSTMENT, FUEL, ASM.	1
14	MP019500	FITTING, HB, 1/8" NPT	1
15	MP027100	FITTING, EXTENSION	1
16	MP317500	FUELOCK, ASM.	1
17	MP4330	FITTING, ELBOW	1
18	MP027200	FITTING, ELBOW, 1/4" NPT	1
19	MP371100	FITTING, HB, 1/4-28	1

Transport Cart Assembly



RF037800

052311

Transport Cart Assembly (continued)

<u>Item</u>	<u>Ref. No.</u>	<u>Description</u>	<u>Qty</u>
1	MP352600	WHEEL, 5" X 2"	2
2	NB056000	BOLT, HEX, 1/2" X 8"	1
3	MP012800	CASTER, SWIVEL, 2-1/2"	1
4	NB003100	NUT, JAM, LOCK, 1/2"	1
5	MP389400	CART, TRANSPORT	1
6	MP366900	GRIP, HANDLE	2
7	MP389300	CART, TRANSPORT, ASM.	1