



TORPEDO

Parts Manual

No. PM-RAY-B-EN Ver. 2.0

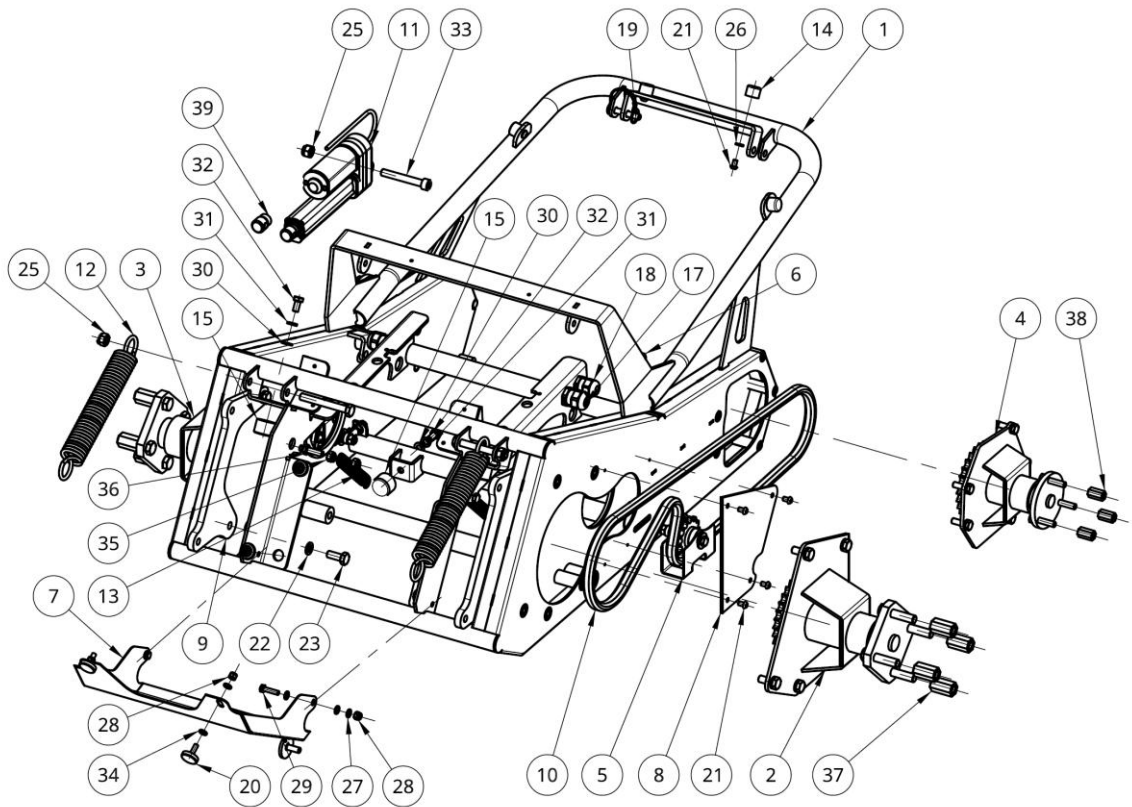
Valid for Serial Numbers: 00049 –

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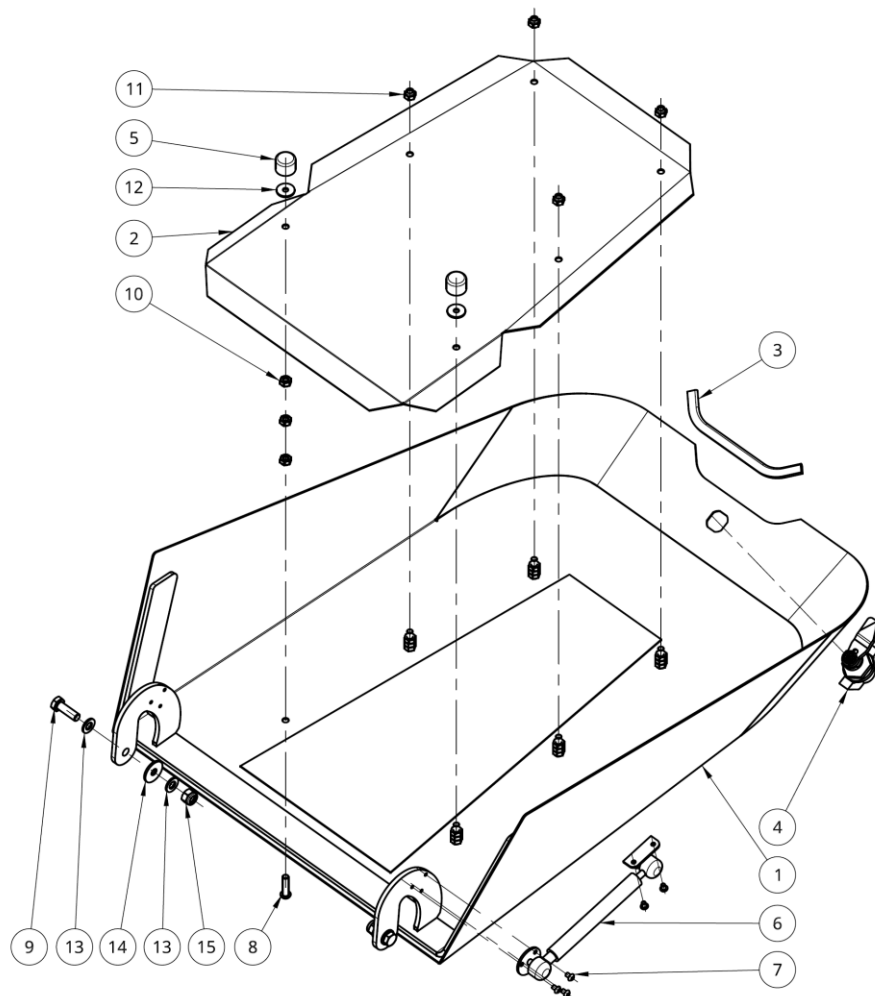
1 CHASSIS



Item No.	Part number	Description	Qty	Item No.	Part number	Description	Qty
1	B011000	CHASSIS B	1	21	F0507	BUTTON SCREW	12
2	B014000	WHEEL HUB FL ASM	1	22	F3101	SPRING WASHER	4
3	B015000	WHEEL HUB FR ASM	1	23	F0202	HEX BOLT	4
4	B016000	WHEEL HUB R ASM	2	24	F0102	HEX BOLT	2
5	B017000	TENSIONER ASM	2	25	F2001	LOCK NUT	3
6	B018000	PP BRACKET ASM	2	26	F3103	SPRING WASHER	4
7	B010070	MULTICARE COVER	1	27	F3005	FLAT WASHER	6
8	B010040	PORTAL COVER	2	28	F2003	LOCK NUT	4
9	B010050	MULTICARE BRACKET	2	29	F0208	HEX BOLT	2
10	B010060	ROLLER CHAIN	2	30	F3004	WASHER	4
11	E1030	LINEAR ACTUATOR	1	31	F3102	SPRING WASHER	4
12	G0302	SPRING	2	32	F0207	HEX BOLT	4
13	G0301	SPRING	2	33	F0301	SOCKET SCREW	1
14	F5005	SILENT BLOCK	4	34	F3203	LARGE WASHERR	4
15	F5004	SILENT BLOCK	4	35	F2002	LOCK NUT	5
16	E3121	CABLE GLAND	4	36	F0206	HEX BOLT	2
17	E3101	CABLE GLAND	2	37	F2201	3D NUT	8
18	E3102	CABLE GLAND	1	38	F2202	3D NUT	6
19	G0150	LOCK PIN	1	39	E1031	LIN. ACTUATOR JOINT	1
20	F1101	HANDLE BOLT	2		B010061	ROLLER CHAIN LINK	2



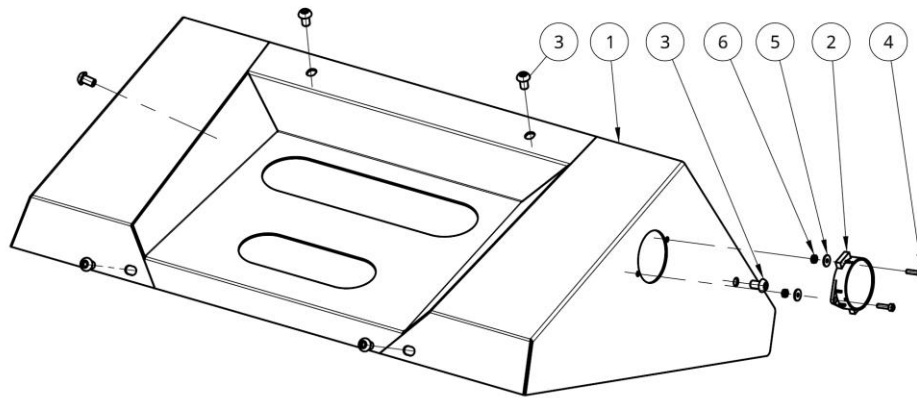
2 REAR COVER



Item No.	Part number	Description	Quantity
1	B013100	REAR COVER	1
2	B013010	BATTERY COVER	1
3	B013020	RUBBER RIM	1
4	G0160	LATCH	1
5	F5005	SILENT BLOCK	2
6	G0170	GAS SPRING	1
7	F0517	BUTTON SCREW	5
8	F0505	BUTTON SCREW	6
9	F0206	HEX BOLT	2
10	F2103	NUT	18
11	F2003	LOCK NUT	4
12	F3203	LARGE WASHERR	2
13	F3004	WASHER	4
14	F3202	LARGE WASHERR	2
15	F2002	LOCK NUT	2



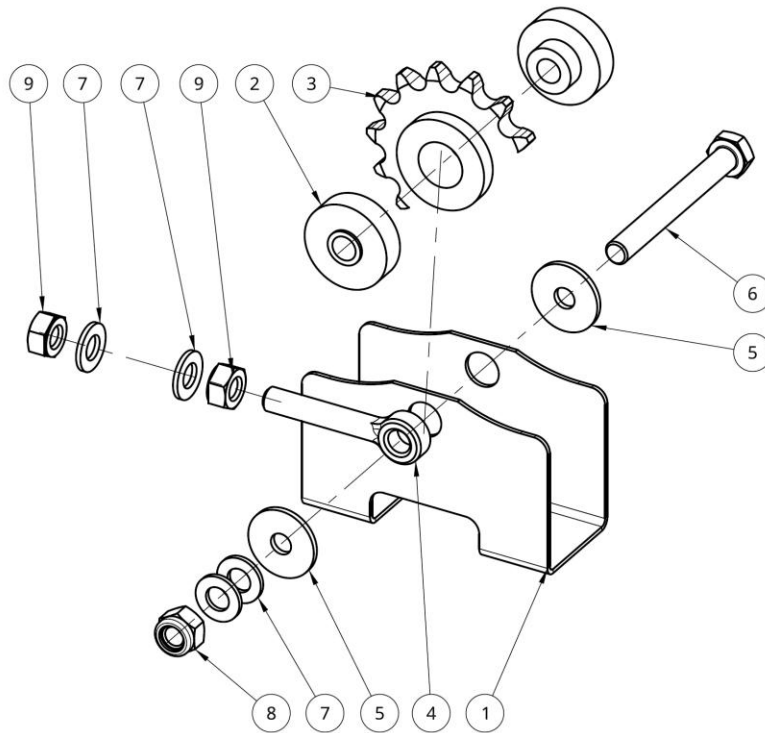
3 TOP COVER



Item No.	Part number	Description	Quantity
1	B012100	TOP COVER	1
2	B012200	RGB LED SET	2
3	F0507	BUTTON SCREW	6
4	F0309	SOCKET SCREW	4
5	F3007	FLAT WASHER	4
6	F2106	NUT	4



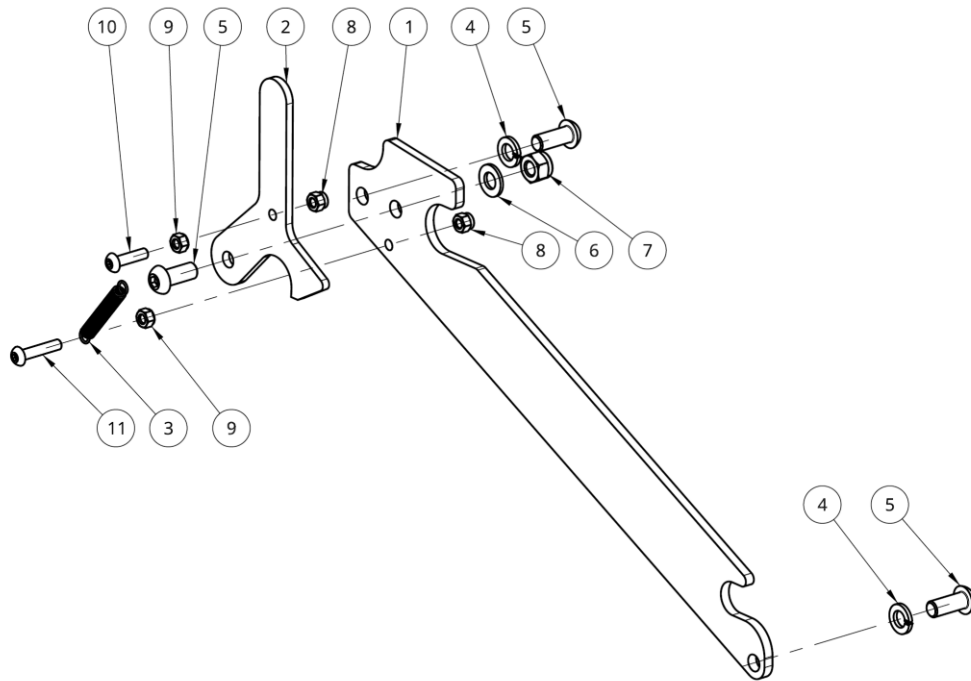
4 TENSIONER



Item No.	Part number	Description	Quantity
1	B017010	TENSIONER BRACKET	1
2	B017020	TENSIONER SPACER	2
3	G0400	TENSION SPROCKET	1
4	F0901	EYE BOLT	1
5	F3202	LARGE WASHER	2
6	F0105	HEX BOLT	1
7	F3004	WASHER	4
8	F2002	LOCK NUT	1
9	F2102	NUT	2



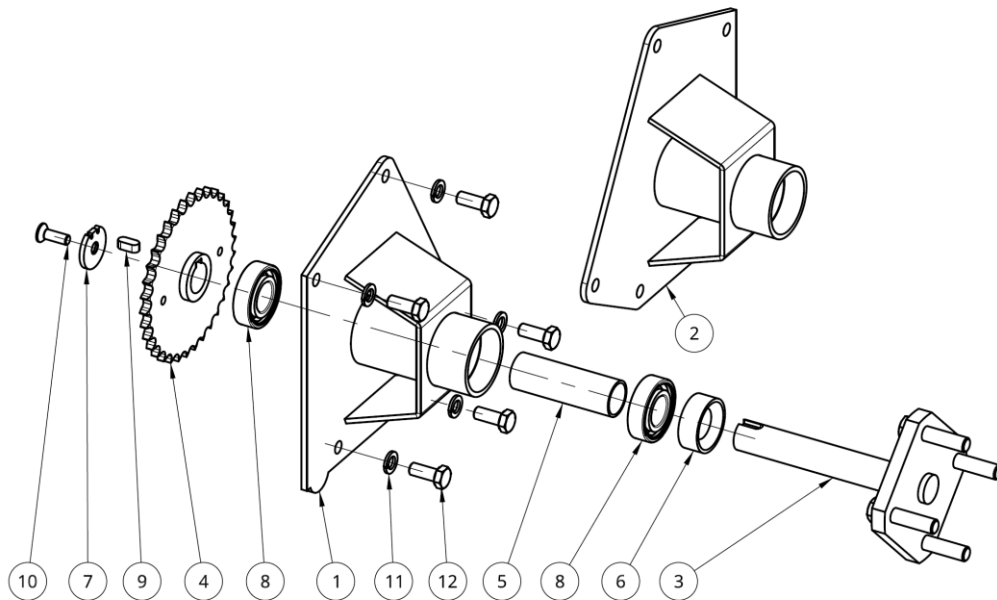
5 POWERSWAP BRACKET



Item No.	Part number	Description	Quantity
1	B010020	POWERSWAP BRACKET	1
2	B010030	POWERSWAP LATCH	1
3	G0300	EXTENSION SPRING	1
4	F3102	SPRING WASHER	2
5	F0503	BUTTON SCREW	3
6	F3004	WASHER	1
7	F2002	LOCK NUT	1
8	F2004	LOCK NUT	2
9	F2104	NUT	2
10	F0511	BUTTON SCREW	1
11	F0510	BUTTON SCREW	1



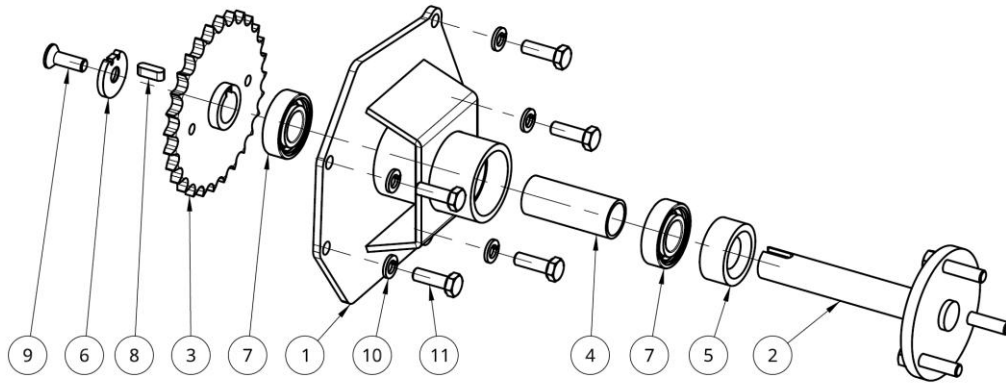
6 WHEEL FLANGE FRONT



Item No.	Part number	Description	Quantity
1	B015100	WHEEL FLANGE FRONT RIGHT	1
2	B014100	WHEEL FLANGE FRONT LEFT	1
3	B014200	WHEEL SHAFT FRONT	1
4	B014300	SPROCKET FRONT	1
5	B014010	SPACING TUBE FRONT	1
6	B014020	SPACING RING FRONT	1
7	B014030	SHAFT WASHER FRONT	1
8	F4520	BEARING	2
9	F4001	KEY	1
10	F0403	FLAT SCREW	1
11	F3101	SPRING WASHER	5
12	F0202	HEX BOLT	5



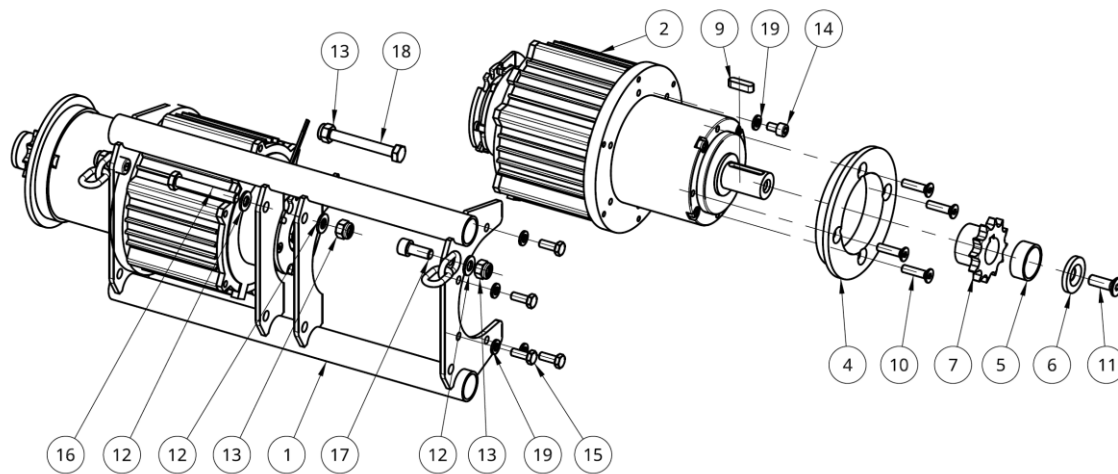
7 WHEEL FLANGE REAR



Item No.	Part number	Description	Quantity
1	B016100	WHEEL FLANGE REAR	1
2	B016200	WHEEL SHAFT REAR	1
3	B016300	SPROCKET REAR	1
4	B016040	SPACING TUBE REAR	1
5	B016050	SPACING RING REAR	1
6	B016060	SHAFT WASHER REAR	1
7	F4530	BEARING	2
8	F4002	KEY	1
9	F0403	FLAT SCREW	1
10	F3102	SPRING WASHER	5
11	F0206	HEX BOLT	5



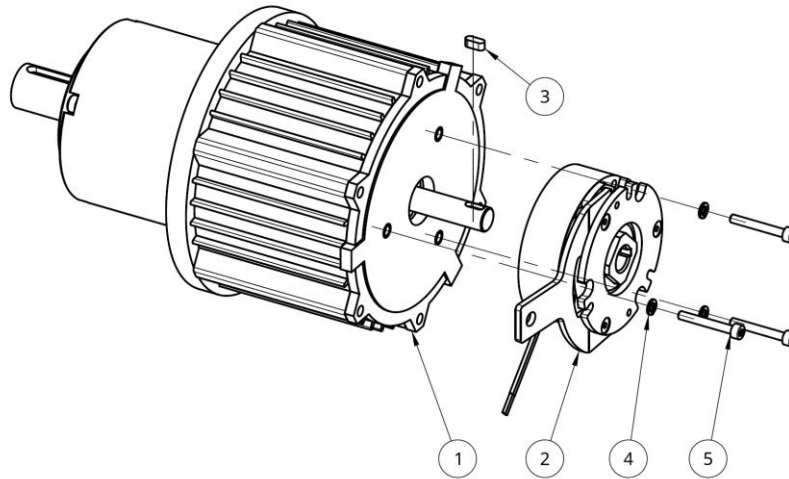
8 DRIVE



Item No.	Part number	Description	Quantity
1	B021000	DRIVE FRAME	1
2	B030000	DRIVE MOTOR B ASM	2
4	B020020	GEARBOX BUSHING	2
5	B020030	SPACING RING	2
6	B020040	SPROCKET WASHER	2
7	B020050	SPROCKET	2
8	B020060	DRIVE SPRING CHAIN	
9	F4004	KEY	2
10	F0404	FLAT SCREW	8
11	F0403	FLAT SCREW	2
12	F3004	WASHER	4
13	F2002	LOCK NUT	4
14	F0306	SOCKET SCREW	4
15	F0210	HEX BOLT	8
16	F0107	HEX BOLT	1
17	F0303	SOCKET SCREW	2
18	F0106	HEX BOLT	1
19	F3103	SPRING WASHER	12



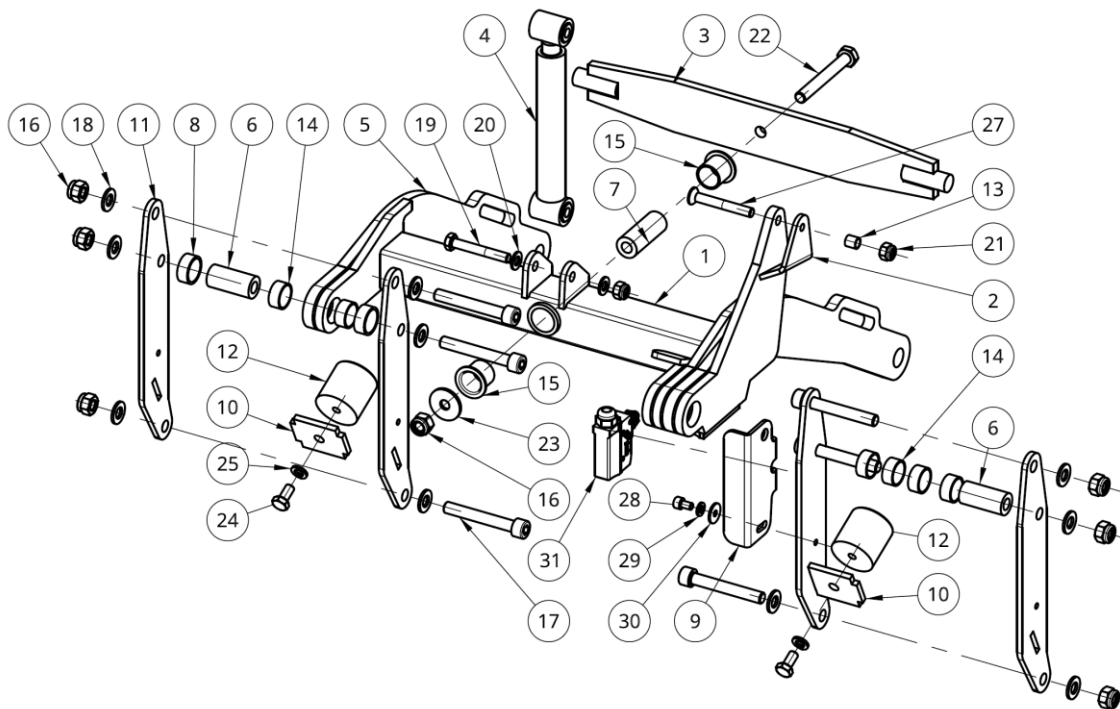
9 DRIVE MOTOR B



Item No.	Part number	Description	Quantity
1	B031000	DRIVE MOTOR B	1
2	B032000	EM BRAKE	1
3	F4003	KEY	1
4	F3104	SPRING WASHER	3
5	F0308	SOCKET SCREW	3



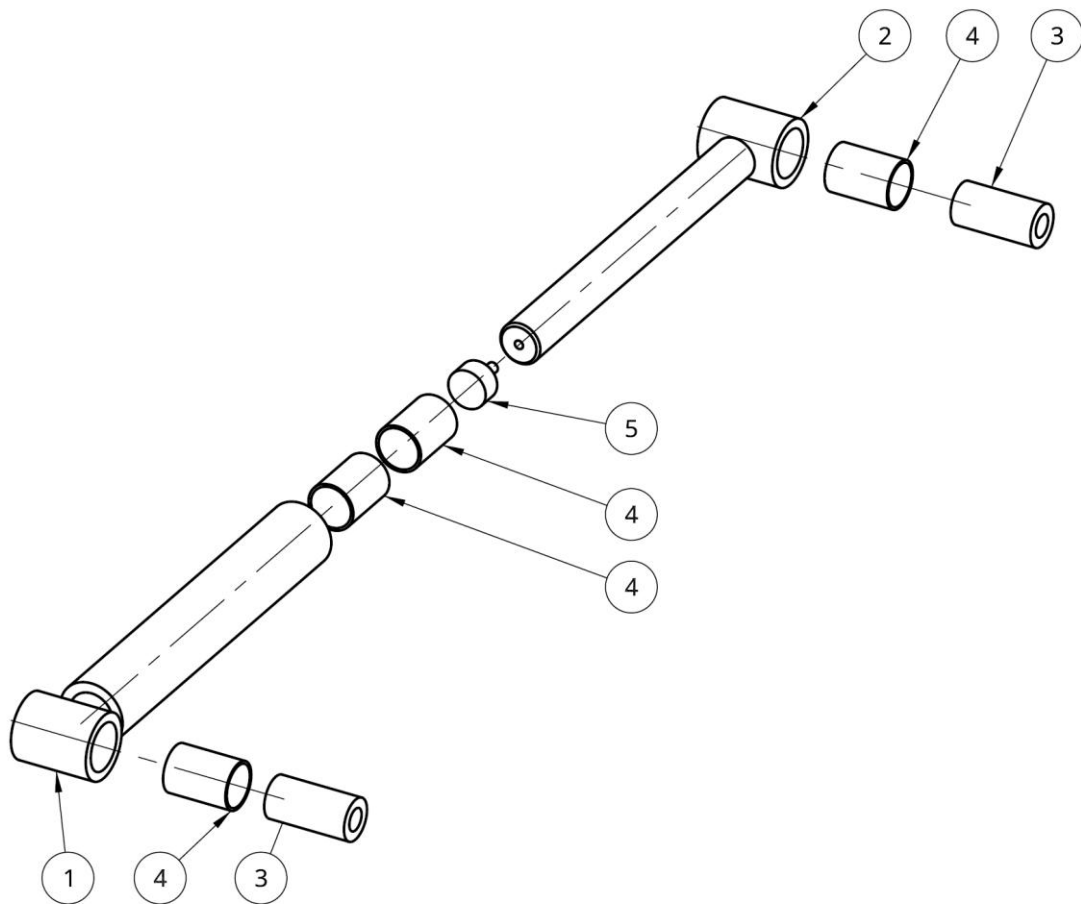
10 BALANCE FRAME



Item No.	Part number	Description	Quantity	Item No.	Part number	Description	Quantity
1	B041000	LIFT FRAME	1	17	F0301	SOCKET SCREW	6
2	B042000	LIFT LEVER	1	18	F3003	WASHER	12
3	B043000	PIVOT LEVER	1	19	F0107	HEX BOLT	1
4	B044000	BALANCE CYLINDER	1	20	F3004	WASHER	2
5	B040010	TOOL ARM	2	21	F2002	LOCK NUT	2
6	B040020	TOOL ARM PIVOT	2	22	F0102	HEX BOLT	1
7	B040030	LIFT FRAME PIVOT	1	23	F3201	LARGE WASHERR	1
8	B040040	ARM RING	2	24	F0207	HEX BOLT	3
9	B040050	SWITCH BRACKET	1	25	F3102	SPRING WASHER	3
10	B040060	SILENT BLOCK BRACKET	2	26	F3202	LARGE WASHER	1
11	B010010	ARM BRACKET	4	27	F0402	FLAT BOLT	1
12	F5001	SILENT BLOCK	2	28	F0306	SOCKET SCREW	1
13	F4201	BUSHING	1	29	F3103	SPRING WASHER	1
14	F4204	BUSHING	6	30	F3203	LARGE WASHERR	1
15	F4205	BUSHING	2	31	E1020	ARM SWITCH	1
16	F2001	LOCK NUT	7				



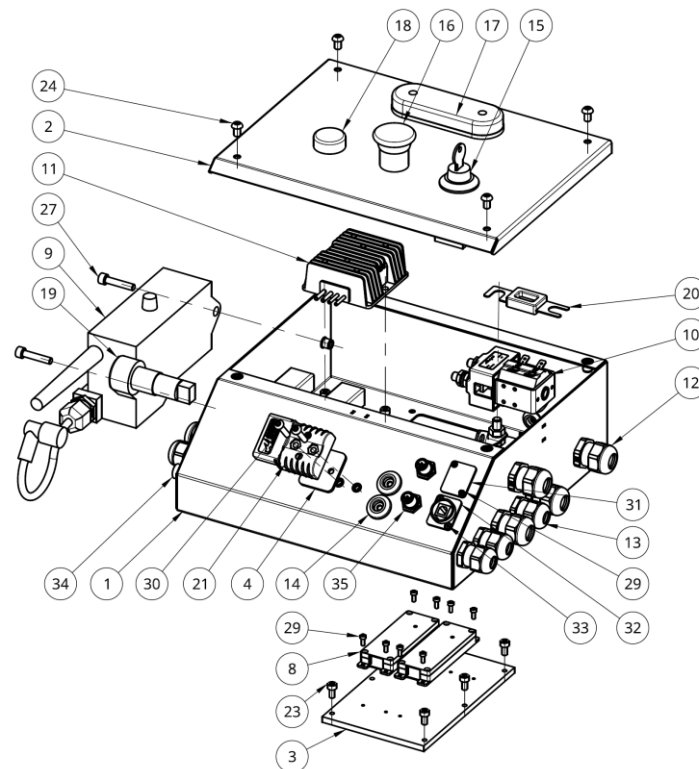
11 BALANCE CYLINDER



Item No.	Part number	Description	Quantity
1	B044100	CYLINDER	1
2	B044200	PISTON	1
3	B044010	CILINDER PIVOT	2
4	F4203	BUSHING	4
5	F5020	SILENT BLOCK	1



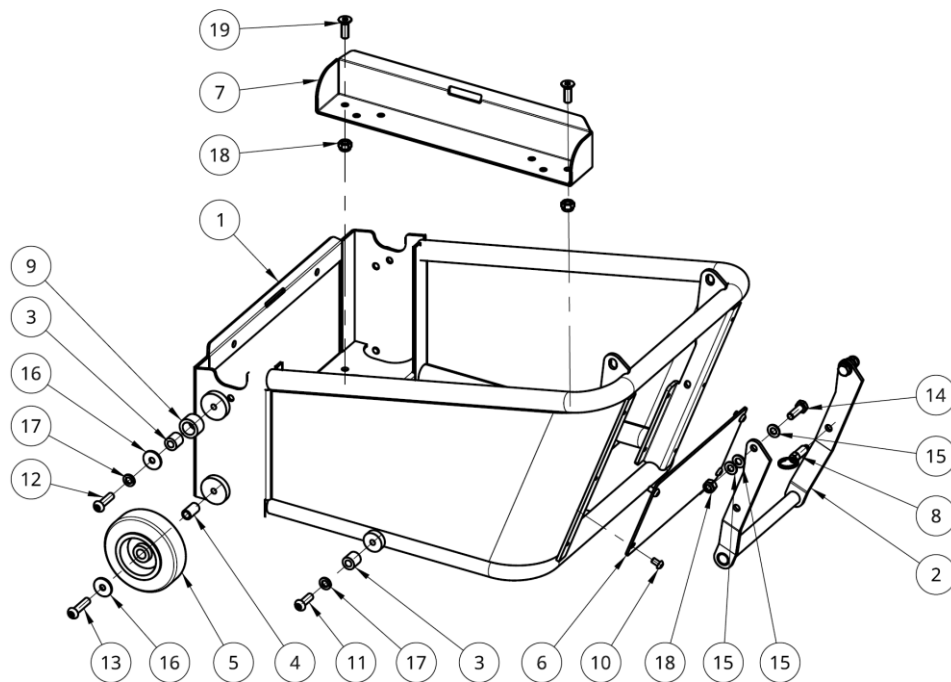
12 ELECTRO BOX



No.	Part number	Description	Qty	No.	Part number	Description	Qty
1	B061000	MAIN EL BOX	1	25	F2004	LOCK NUT	12
2	B060010	MAIN BOX COVER	1	26	F0306	SOCKET SCREW	3
3	B060020	MAIN BOX COOLER	1	27	F0305	SOCKET SCREW	2
4	B060030	WASHER	2	28	F0517	BUTTON SCREW	4
5	B060040	CONTACTOR BRACKET	1	29	F0310	SOCKET SCREW	8
6	B060050	FUSE HOLDER	2	30	F0510	BUTTON SCREW	4
7	B060060	CONTACTOR LEAD	2	31	B060080	CANON COVER	1
8	E2010	RAYMO AM C.U.	2	32	E2200	SERVICE PLUG	1
9	E2030	RECEIVER NBB	1	33	F0408	FLAT SCREW M3x8	4
10	E2050	CONTACTOR	1	34	B062100	NBB WIRING HARNESS	1
11	E2060	DC CONVERTER	1	35	B062200	CAN WIRING HARNESS	1
12	E3101	CABLE GLAND	4		E1040	BRAKE MODUL	1
13	E3102	CABLE GLAND	5		E3301	CONNECTOR RED	1
14	E3121	CABLE GLAND	4		B062300	CONTROL PANEL WIRING HARNESS	1
15	E2080	POWER SWITCH	1		B062600	RGB LED CABLE	1
16	E2090	ESTOP BUTTON	1		B062400	AKU POWER CABLE	1
17	E2100	BEACON	1		E2210	LIN. ACTUATOR RELAY	2
18	E2110	POWER LED	1		E2070	FUSE BOX	1
19	E2120	HORN	1		E3210	FUSE 5A	5
20	E3201	FUSE	1		E3211	FUSE 10A	1
21	E3302	CONNECTOR BLUE	2		E3212	FUSE 15A	2
22	F0405	FLAT SCREW	4		E3214	FUSE 30A	1
23	F0307	SOCKET SCREW	14		E2081	POWER SWITCH KEY	1
24	F0507	BUTTON SCREW	4				



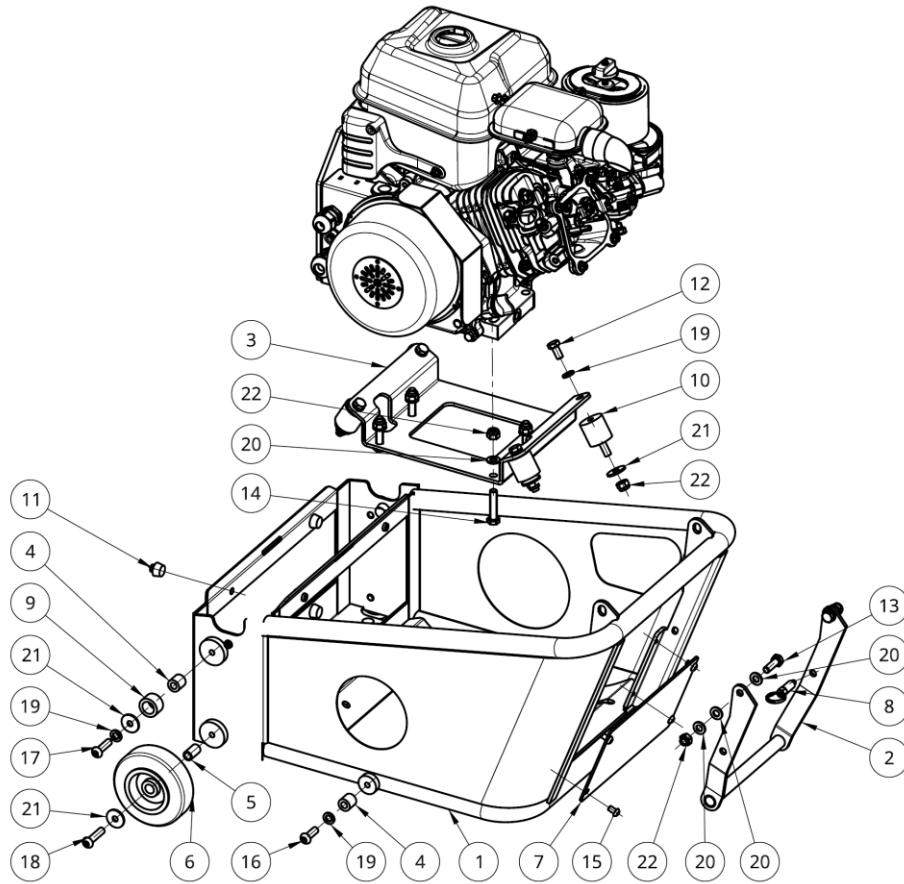
13 CARTRIDGE ELECTRIC



Item No.	Part number	Description	Quantity
1	B072000	CARTRIDGE ELECTRIC	1
2	B073000	CARTRIDGE HANDLE	1
3	B070020	ROLLER SPACING TUBE	4
4	B070030	WHEEL SPACING TUBE	2
5	B070040	CARTRIDGE WHEEL	2
6	B070050	CARTRIDGE PLATE	1
7	B070060	AKU BRACKET	2
8	G0100	HANDLE PLUNGER	1
9	F4401	SPACER	2
10	F0507	BUTTON SCREW	4
11	F0518	BUTTON SCREW	2
12	F0519	BUTTON SCREW	2
13	F0520	BUTTON SCREW	2
14	F0206	HEX BOLT	2
15	F3004	WASHER	6
16	F3202	LARGE WASHERR	4
17	F3102	SPRING WASHER	4
18	F2002	LOCK NUT	6
19	F0403	FLAT SCREW	4



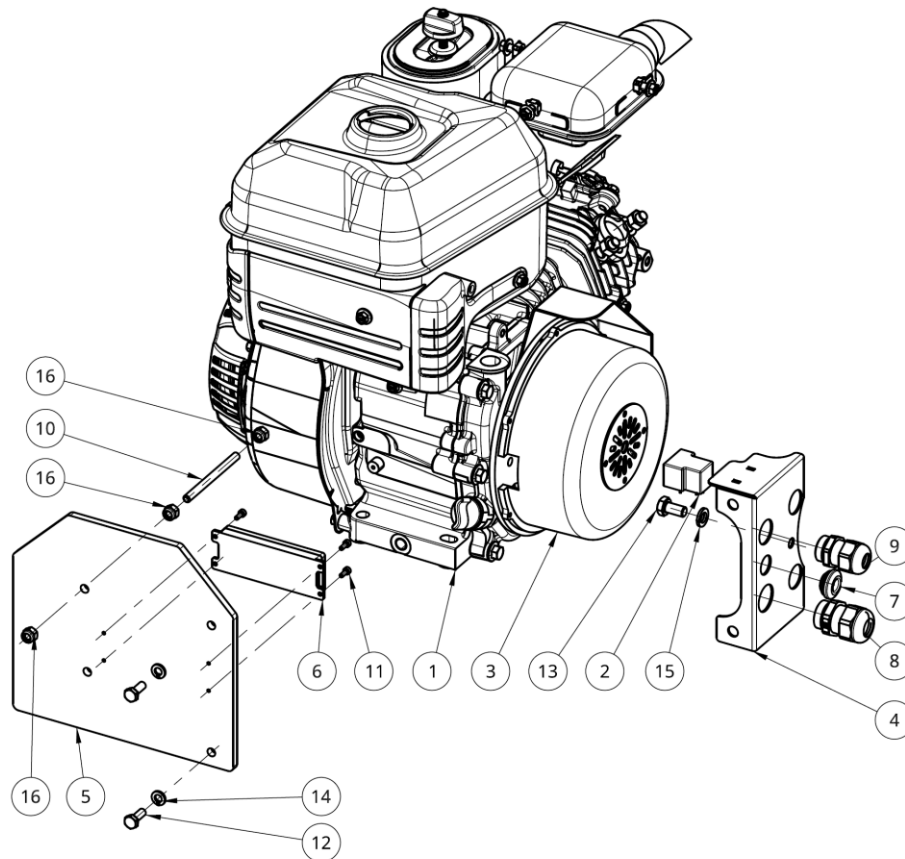
14 CARTRIDGE HYBRID



Item No.	Part number	Description	Quantity
1	B071000	CARTRIDGE HYBRID	1
2	B073000	CARTRIDGE HANDLE	1
3	B070010	ENGINE BRACKET	1
4	B070020	ROLLER SPACING TUBE	4
5	B070030	WHEEL SPACING TUBE	2
6	B070040	CARTRIDGE WHEEL	2
7	B070050	CARTRIDGE PLATE	1
8	G0100	HANDLE PLUNGER	1
9	F4401	SPACER	2
10	F5010	SILENT BLOCK	4
11	F5020	SILENT BLOCK	12
12	F0207	HEX BOLT	4
13	F0206	HEX BOLT	2
14	F0203	HEX BOLT	4
15	F0507	BUTTON SCREW	4
16	F0518	BUTTON SCREW	2
17	F0519	BUTTON SCREW	2
18	F0520	BUTTON SCREW	2
19	F3102	SPRING WASHER	8
20	F3004	WASHER	10
21	F3202	LARGE WASHERR	8
22	F2002	LOCK NUT	10



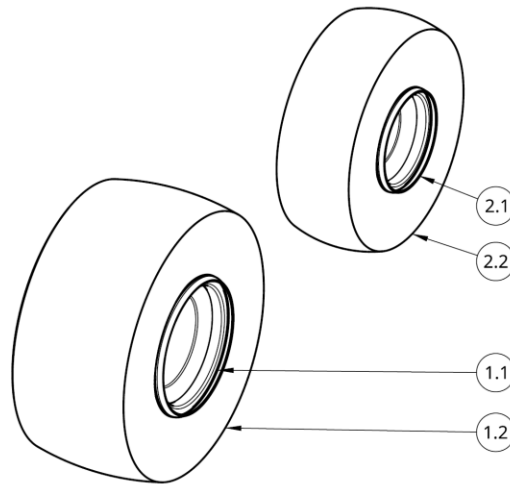
15 GENERATOR



Item No.	Part number	Description	Quantity
1	B081000	ENGINE	1
2	B082000	STOP RELAY	1
3	B090000	GENERATOR ASM	1
4	B080010	GEN BRACKET	1
5	B080020	GEN COOLER	1
6	E2010	RAYMO AM C.U.	1
7	E3121	CABLE GLAND	1
8	E3101	CABLE GLAND	1
9	E3102	CABLE GLAND	1
10	F0802	SET SCREW	1
11	F0310	SOCKET SCREW	4
12	F0210	HEX BOLT	2
13	F0207	HEX BOLT	2
14	F3103	SPRING WASHER	2
15	F3102	SPRING WASHER	2
16	F2003	LOCK NUT	3
	G0600	SPARK PLUG	1
	G0610	AIR FILTER SET	1
	B083000	CABLE GEN POWER	1
	B084000	CABLE GEN CAN	1



16 WHEELS



Item No.	Part number	Description	Quantity
1	G0030	FRONT WHEEL 18x9.50-8	1
1.1	G0031	RIM 7.00-8	1
1.2	G0032	TIRE 18x9.50-8	1
2	G0040	REAR WHEEL 15x6.00-6	1
2.1	G0041	RIM 4.50-6	1
2.2	G0042	TIRE 15x6.00-6	1

