

COATS®

Wheel Balancer Models 1300 2D, 1400 2D, 1500 3D & 1600 3D



Model 1300



Model 1400



Model 1500



Model 1600

Parts Identification

READ these instructions before placing unit in service. KEEP these and other materials delivered with the unit in a binder near the machine for ease of reference by supervisors and operators.

COATS

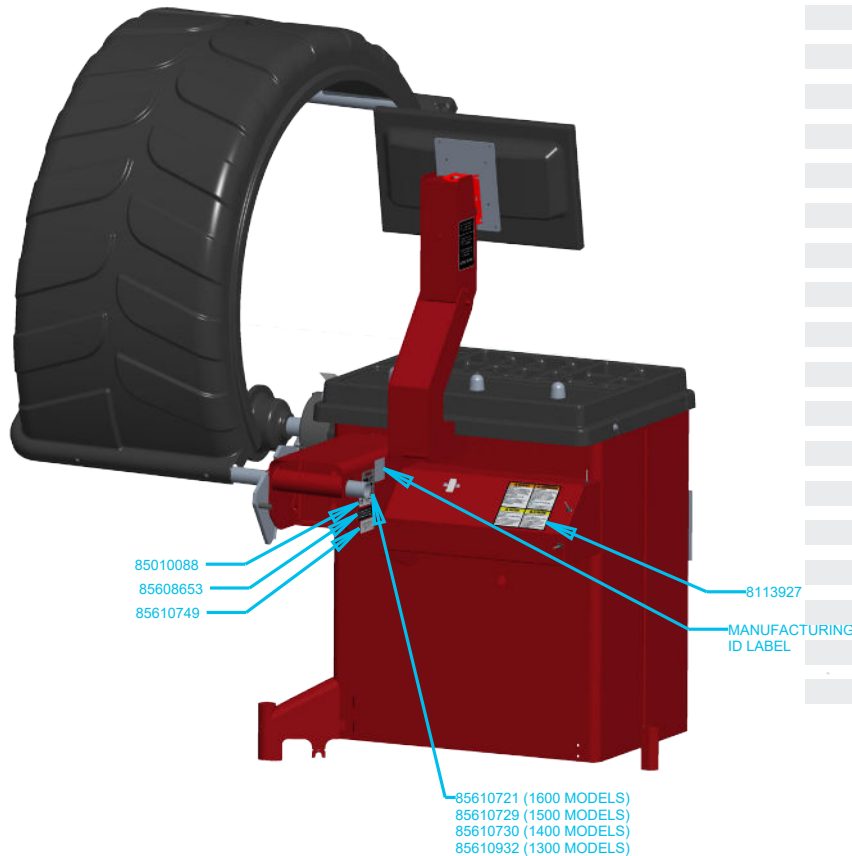
Parts Identification

The following pages include parts breakdowns with exploded view illustrations to help with ordering replacement or spare kits. Assemblies are noted where it is recommended that individual parts not be ordered separately. Note that the parts view illustrations are for multiple models and not all parts shown are on all models. Every effort is made to supply accurate exploded views, however, due to interim changes in manufacturing operations, some units may not be exactly as illustrated.

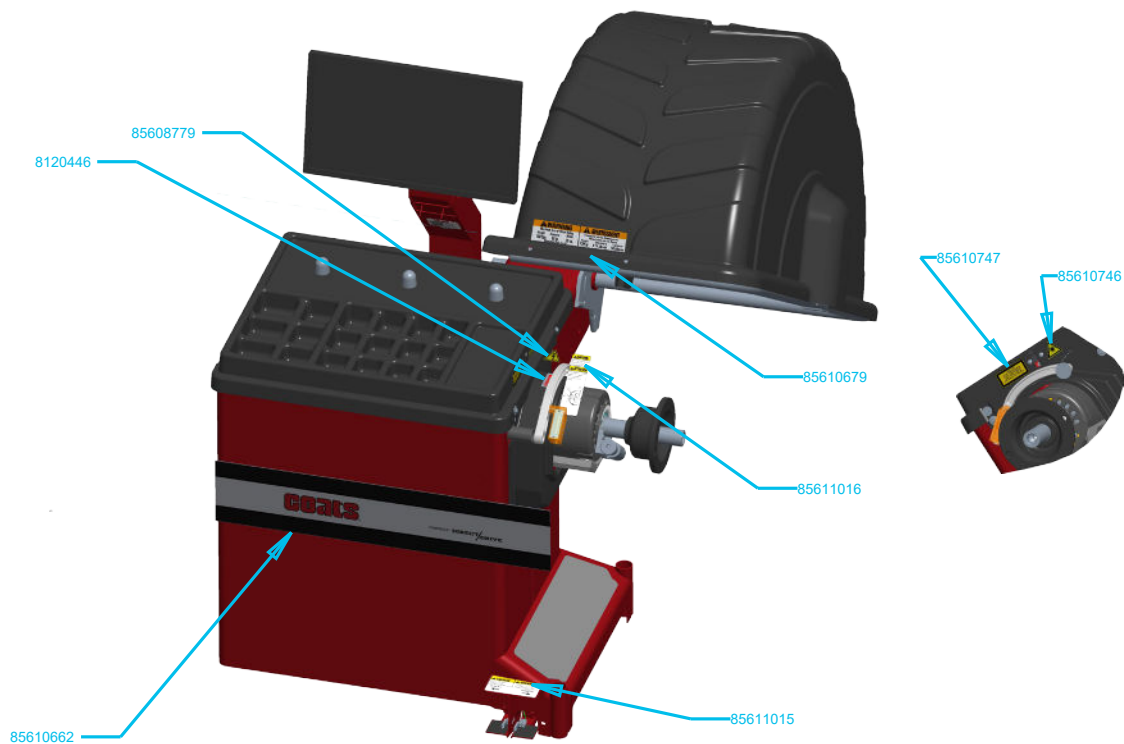
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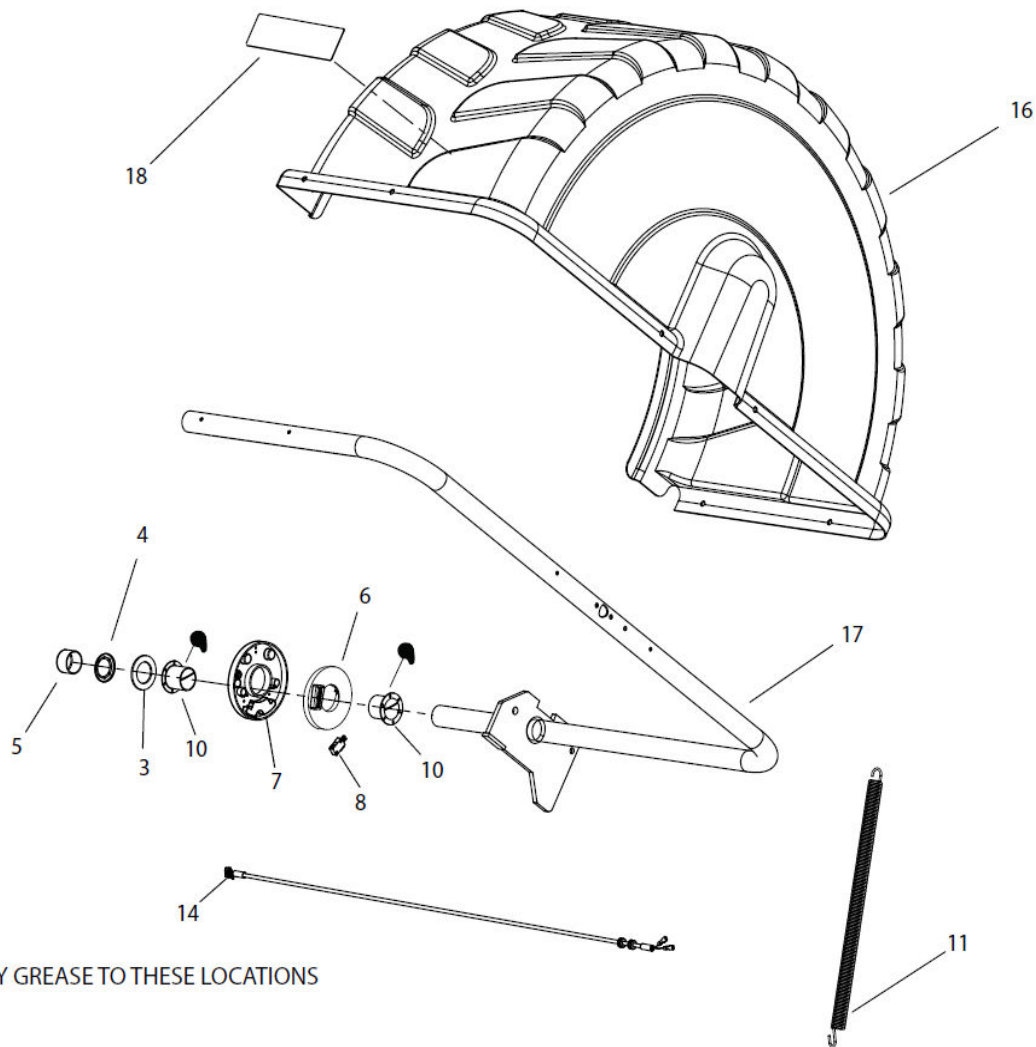
Label Locations



Part Number	Description
8113927	Caution / Warning
8120446	Motor Rotation
85010088	MET Lab Compliance
85608653	Patent Notice
85608779	Electric Shock
85610662	Main, 1400/1500/1600
85610679	Warning
85610721	Nameplate-1600
85610729	Nameplate-1500
85610730	Nameplate-1400
85610932	Nameplate-1300
85610746	Laser Hazard
85610747	Explanatory
85610749	Certification
85611015	Pedal Ops
	(1600 Only - if equipped)
85611259	Reverse Pedal
	(1600 Only - if equipped)
85611016	Caution, Pinch Point
	(1600 Only - if equipped)
85611166	Clean, Screen

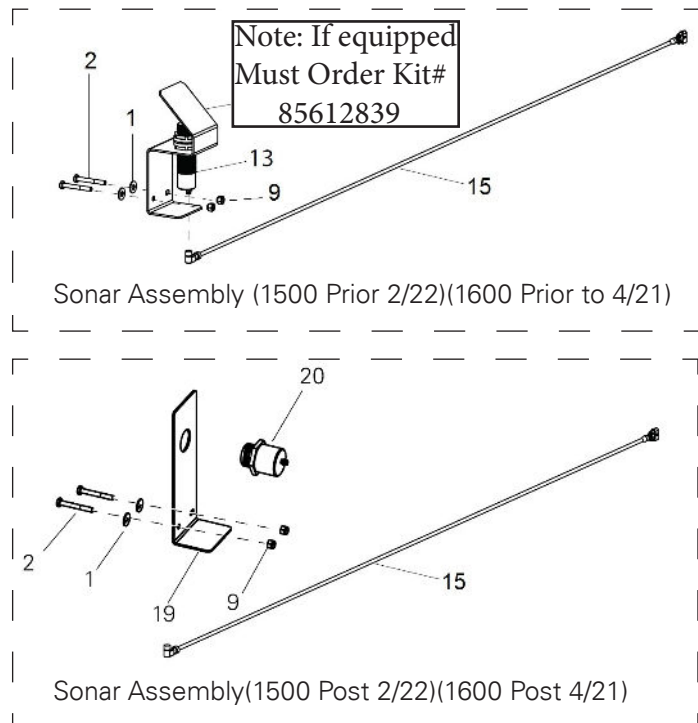


Wheel Guard Assembly

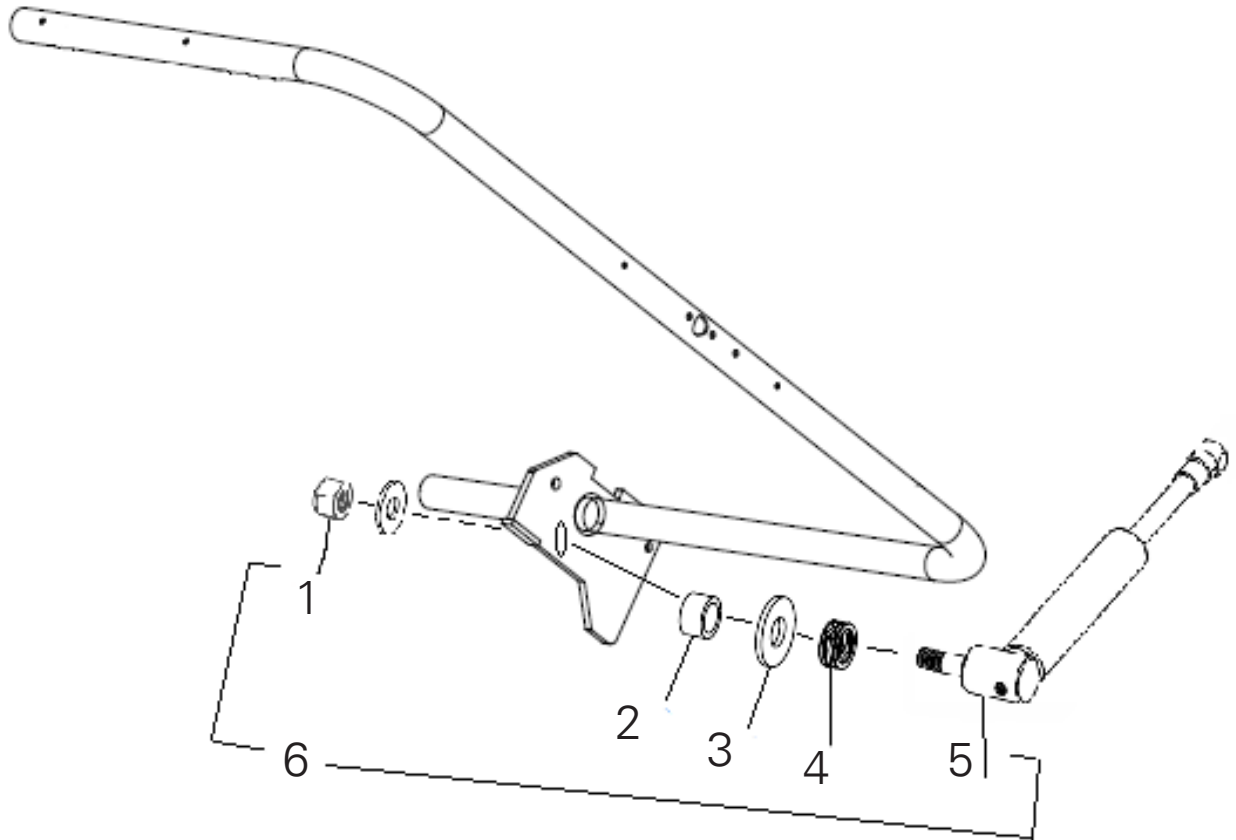


APPLY GREASE TO THESE LOCATIONS

Item	Part No.	Description
1	8000745	1/4 Flat Washer
2	8109802	Bolt, HHCS, 1/4-20 X 2.00
3	8109944	Washer - Hood Bar
4	8109945	Retainer - Washer 1 1/2"
5	85611317	Plug - Hood, w/Hole
6	8113332	Cam/Cover Hood Switch
7	8113333	Housing-Hood Switch
8	81133341	Switch-Micro, Limit
9	8181369	1/4-20 UNC Nut
10	8307014	Bearing - Flanged, Nylon
11	8308062	Spring - Hood, Extension
13	85612839	Sonar Service Kit
14	85609820	Assy, Hood Switch Cable (1500 & 1600)
	85609868	Hood/Encoder Harness (1400 only)
	85610928	Machine Harness Assy (1300 only)
15	85610231	Cable-Sonar, Hood
16	85610517	Hood-Wheel
17	8114319	Weldment - Bar, Hood
18	85610679	Decal - Warning
19	85612034	Bracket - Sonar
20	85612042	Sonar Module



Wheel Guard Hood Damper (1600 Only)

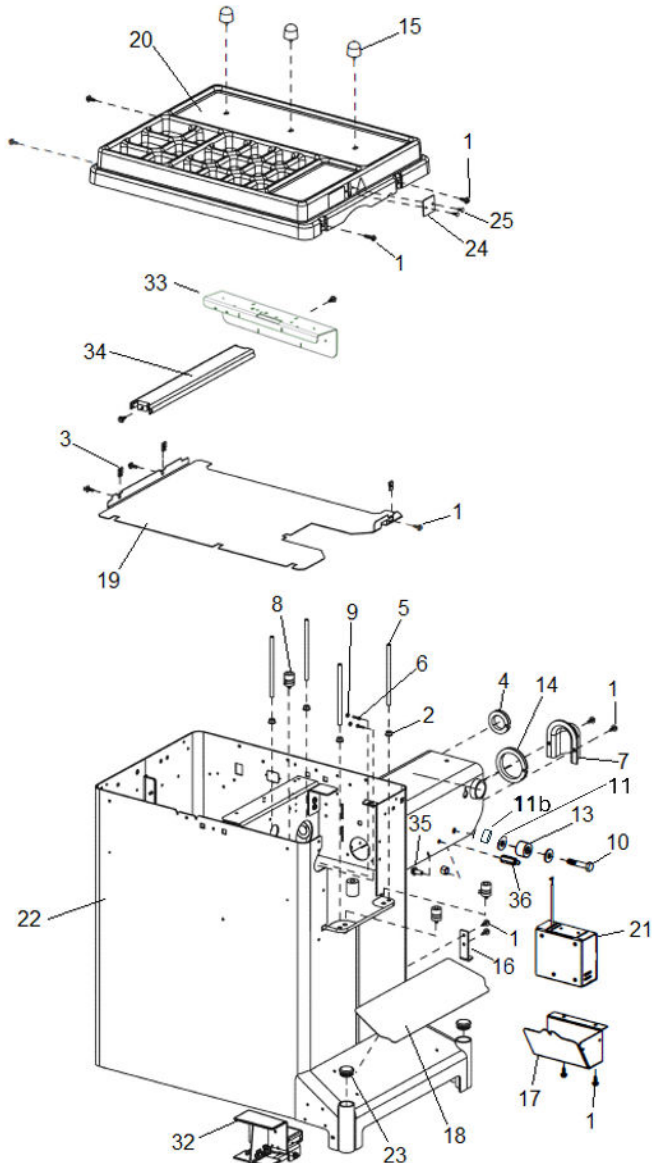


Item	Part No.	Description
1	8000525	Nut-Hex, Lk, 5/16-18
2	85610947	Bearing-Slve,Brnz
3	8000745	Flat Washer - 1/4
4	85611227	Spring - Comp, Hi-Load
5	85610951	Damper - Hood
6	85611231	Damper-Asm,Kit

Chassis Assembly

Item	Part No.	Description
1	*8106301	Screw-1/4-20 X .75
2	8106303	Nut - 3/8 - 16 UNC
3	8106304	Fastener - Skin, Tinnerman
4	85610661	Grommet-Inverter Port
5	8108727	Rod - Threaded
6	8110560	Screw - 8-32 UNC X .75" Lg.
7	8111029	Cover - Rear Harness
8	8561220103	Assembly - Piezo
9	8301084	Nut, #8-32 Kep
10	85613588	Screw - HHCS, 1/2-13X2.75
11	8301121	Washer, Plain .562idx1.375odx.109
11b	85613587	SPACER-STP,HD
12	8301112	1/2-13 Hex Nylock Nut
13	8309008	Molding - Stop, Hood
14	85606581	Grommet - Flex
15	85608850	Stud-Weight Tray
16	85610698	Bracket - Anti Tilt
17	*85610571	Cover-Computer, Monitor

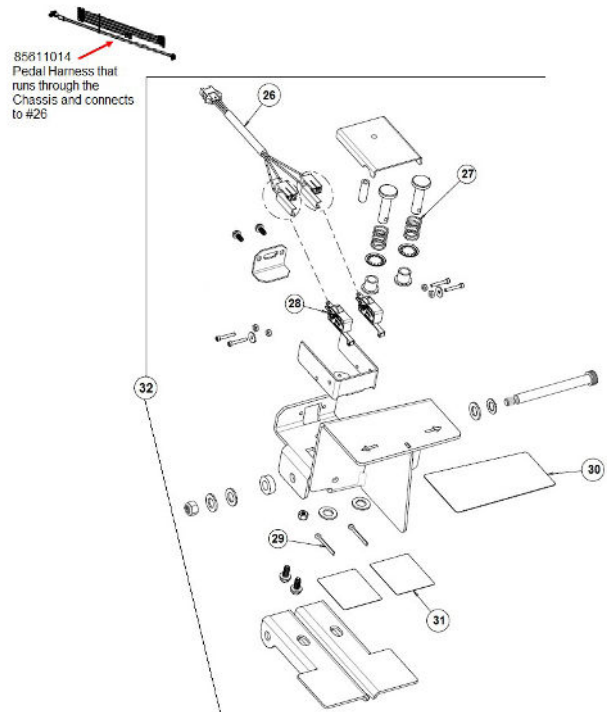
***Note:(For units built prior to 03/22)**



Item	Part No.	Description
18	85610578	Pad, Anti-Skid
19	85610583	Shield - Weight Tray
20	85610587	Assy-Tray, Laser Shield (Includes 85610588 & 85610274)
21	*85611245	Assy-Display Computer
22	85610596	WLD MNT - Chassis, Split, Skirted
23	85610733	Cap - Plug
24	85610962	Black Shield (1300 & 1400)
	85610588	Laser Shield (1500 & 1600)
25	85610274	Plastic Rivet
26	85611020	Pedal Switch Harness
27	929195	Compression Spring
28	85609746	Foot Pedal Switch
29	8102278	Cotter Pin
30	85611015	Pedal Ops Decal
31	85611013	Pedal Grip Pad
32	85611000	Pedal Assembly
33	85610570	Tray Support Bracket
34	85610584	Tray Stringer
35	8106302	Screw, HHCS, 3/8-16X7/8, WHZLK, G5
36	85610944	Standoff-Stud, Ball, 10mm

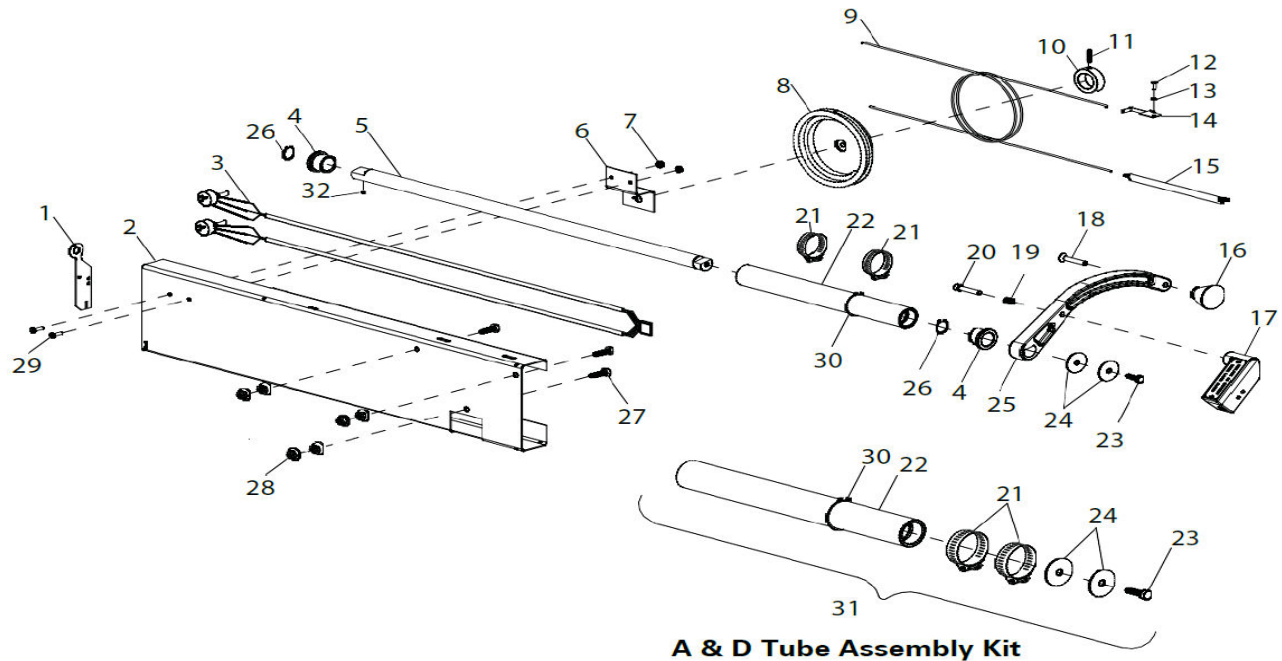
****Note:Post (03/22) New PC on Page 10-11**

Pedal Assembly (1600 Only - if equipped)

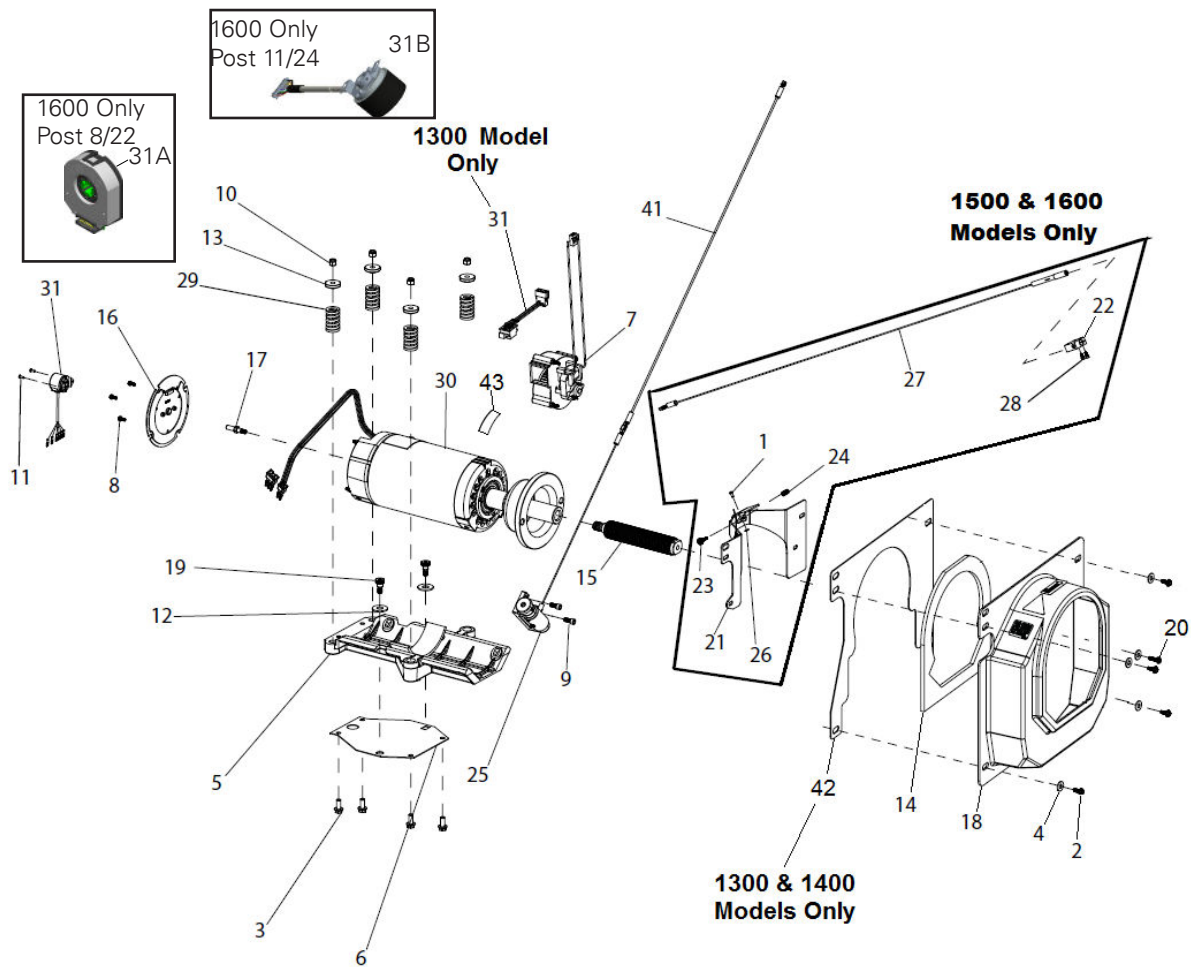


Distance Gauge Assembly

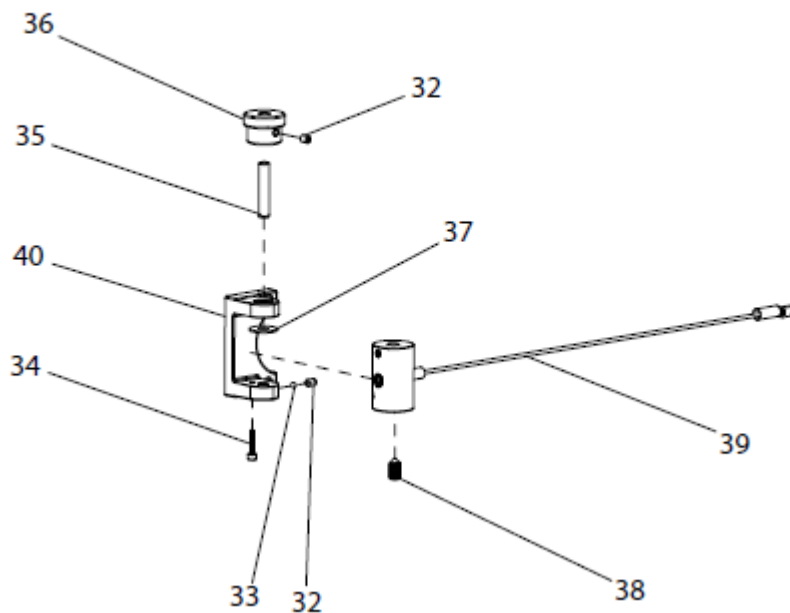
Item	Part No.	Description	Item	Part No.	Description
1	8114254	A & D Pendulum	18	8111173	1/4-20 x 1-1/2 FHS Screw
2	8114251	A & D Bracket	19	8114380	Compression Spring
3	85609866	A & D Pots with Harness Assy	20	8114379	SHC 1/4-20 x 1-1/4 lg. Screw
4	85000730	Distance Rod Bushing	21	8114264	Hose Clamp
5	80180018	A & D Rod	22	8114255	A & D Tube
6	8114258	A & D Pot Bracket	23	85000731	Hex HD Cap Screw
7	8301084	#8-32 Kep Nut	24	8111032	1/4 Fender Washer
8	80180017	Distance Pot Pulley	25	8114373	Arm
9	80180022	String	26	903174	Retaining Ring
10	8114403	Pulley Collar	27	8301534	1/4-20 x 7/8 HHC Screw
11	8114404	10-24 x 3/4 SHSS Screw	28	8143169	1/4-20 Whiz Lock Hex Nut
12	80180020	Spring Bracket, 3MM Screw	29	8111542	#8-32 X 5/8" SEM Screw
13	80180021	Washer 3MM	30	8100964	1 1/4-inch Retaining Ring
14	80180019	String Bracket	31	85000732	A&D Arm Tube Assembly Kit
15	80180023	Spring	32	85609880	M6 x 12mm SHSSCP Screw
16	8114253	Cone			
17	85009229	Line Laser			



Motor Assembly



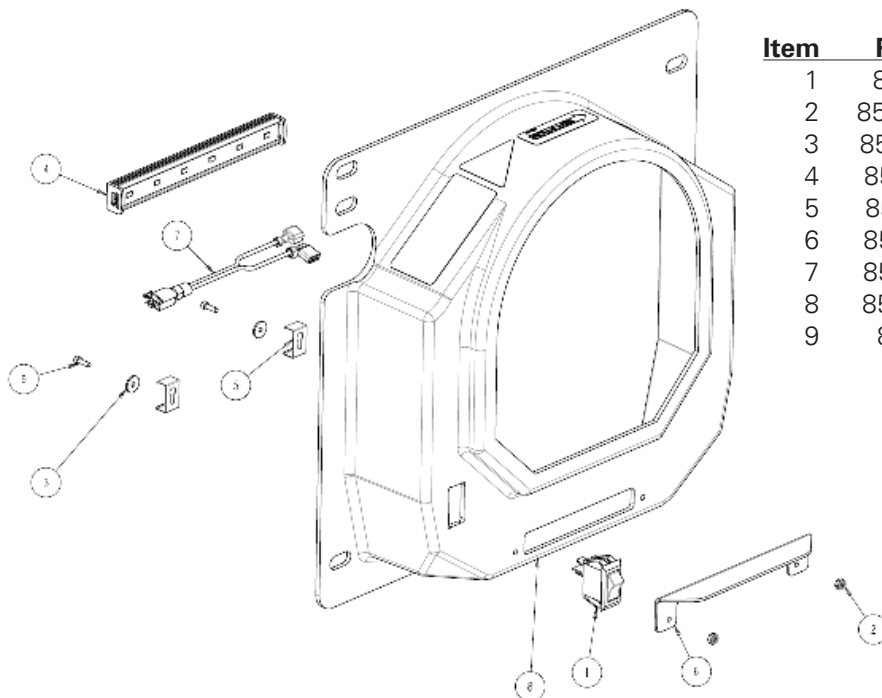
Rotary Laser Assembly



Motor & Rotary Laser Assembly

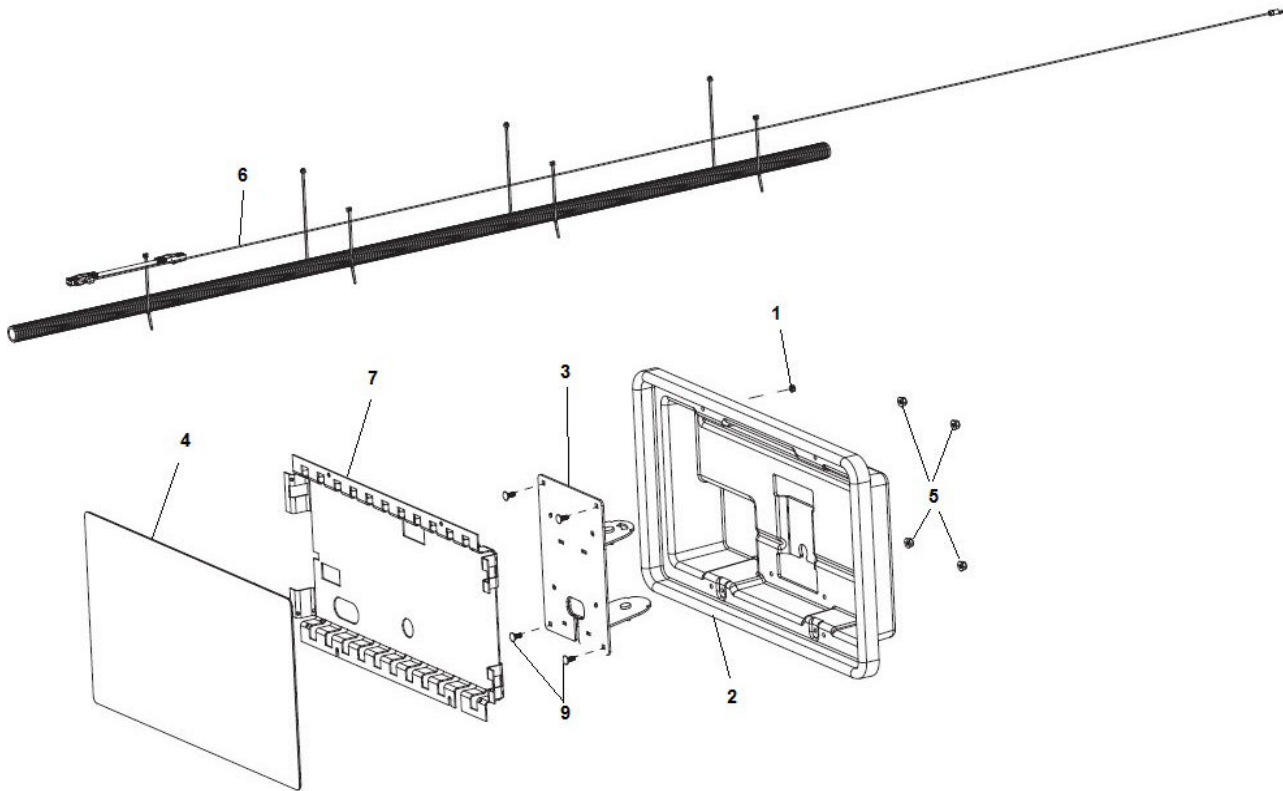
Item	Part No.	Description	Item	Part No.	Description
1	920615	8-32 X .375 BHCS	23	85610273	Screw-Thumb, #8-32 X 7/8
2	8106301	Screw-1/4-20 X .75	24	85610275	Spring, .360 X 3/4"
3	8106302	Screw - HSWF, 3/8-16 X 7/8	25	85610280	Laser Assy-Rotary, Jst
4	8107635	Washer-Flat, 5/16	26	85610282	Washer, #8, Hard Fiber
5	8110430	Ass'y. - Cradle	27	85610536	Assy-Cable, Line, Laser
6	8112182	Flex - Plate	28	85610579	Screw-#8-32X3/8 SHCS
7	8114265	Assembly - Fan	29	85610682	Spring - Piezo, Precision
8	8144110	Screw - Hex Washer Head	30	85010010	Motor Replacement Kit (40mm)
9	8182149	Screw - SHC 5/16-18 X 3/4	31	85610094	Encoder (1500 & 1600)
10	8301035	Nut-3/8-16 Hex Nyloc		8110923	Encoder (1400)
11	8301067	Screw - #6-32 PHIL		8308817	Rotary Shutter (1400)
11A	85612131	Screw-CUI Encoder (Post 8/22)		8110923	Encoder Assembly (1300)
11B	928487	Screw- Nemicon Encoder (Post 11/24)	31A	85612673	Encoder CUI (1600) (Post 8/22)
			31 B	85612935	Encoder Nemicon (1600) (Post 11/24)
12	8301121	Washer, Plain .562 ID	32	902308	Set Screw
13	8308036	Retainer - Piezo Spring	33	906407	Ball-Nyln, .187
14	8308536	Motor Gasket	34	928367	Screw, SHCS 10-24 UNC
15	85009204	Shaft-Extension, 40MM	35	8114237	Dowel 3/8 X 2" LG.
16	85009970	Cover - Rear End Bell (1500 & 1600)	36	8114241	Knob
	8308513	Cover - Rear End Bell (1400)	37	8114242	Plastic Washer
17	85009971	Shaft - Encoder Drive	38	85610252	Screw-Set, Cn Pt,3/816,.75"LG
17A	85612835	Shaft CUI Encoder (Post 8/22)	39	85610268	Cylinder Assy-Laser, Rotary
	85612835	Shaft Nemicon Encoder (Post 11/24)	40	85612820	Bracket-Assy, W/Brg
18	85610748	Shroud-Motor, Assy (1400, 1500)	41	85610265	Cable Assy - 36", JST
	85608997	Shroud-Motor, Assy (1300)	42	85609063	Motor Cover Shield (1300 & 1400)
19	85609427	Bolt-SHSS, 1/2 X 3/8-16	43	85611016	Caution, Pinch Point (1600 - if equipped)
20	85609826	Screw-HWHMS, 1/4-20			
21	85610269	Bracket-Inboard Laser Posn			
22	85610271	Mount Block-12mm Dia Laser			

Motor Shroud (1600 with Hood LED Bar & Switch)

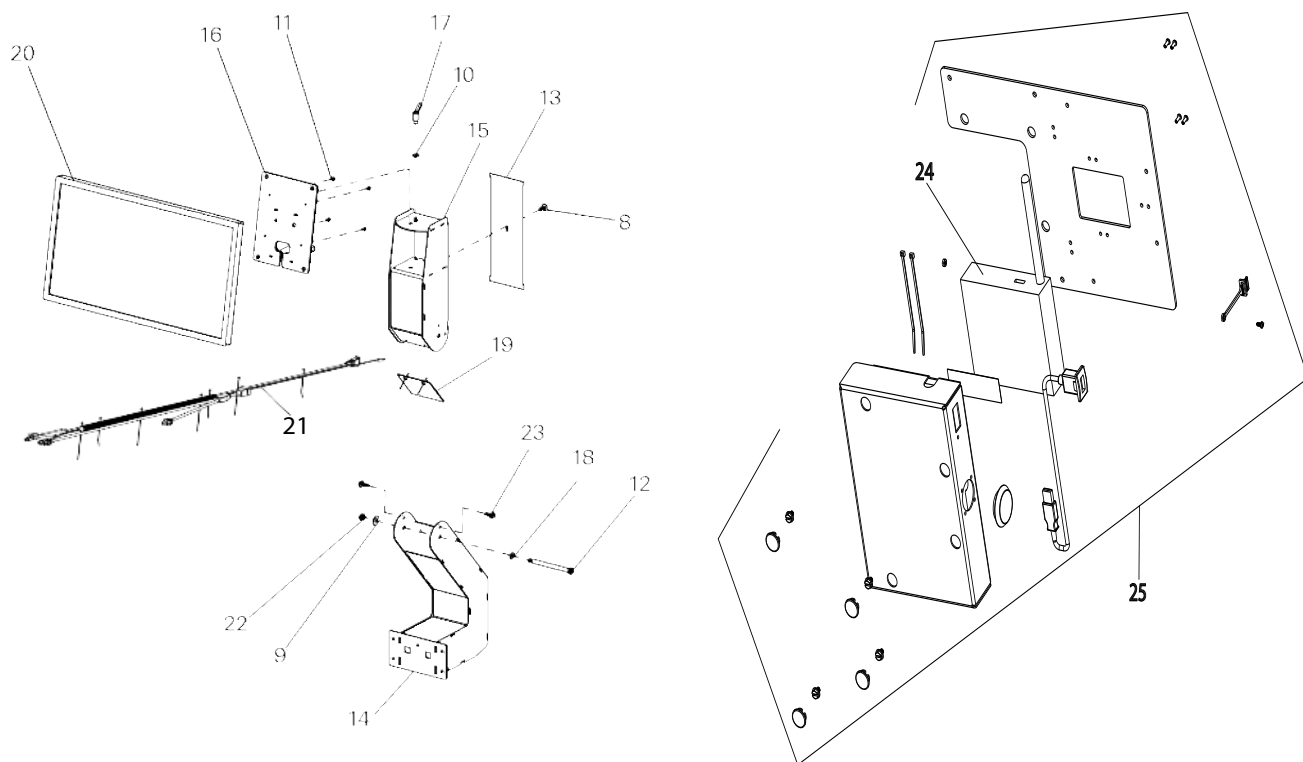


Item	Part No.	Description
1	8305802	Switch-ON/OFF
2	85000357	Nut - Nylok #4-40
3	85609410	Washer-#4 Flat,.125IDX.438OD
4	85611210	LED-6IN,Luxbar
5	85611211	Clip-Bar,LED
6	85611216	Hood-LED,Shroud
7	85611218	Harness-Power,LED
8	85611233	Shroud-Motor, ASM, Routed
9	8112073	Screw-BHCS,#4-40 X 1/2 LG.

1300/1400/1500 Monitor Assembly



1600 Monitor Assembly



1300/1400/1500 Monitor Assembly

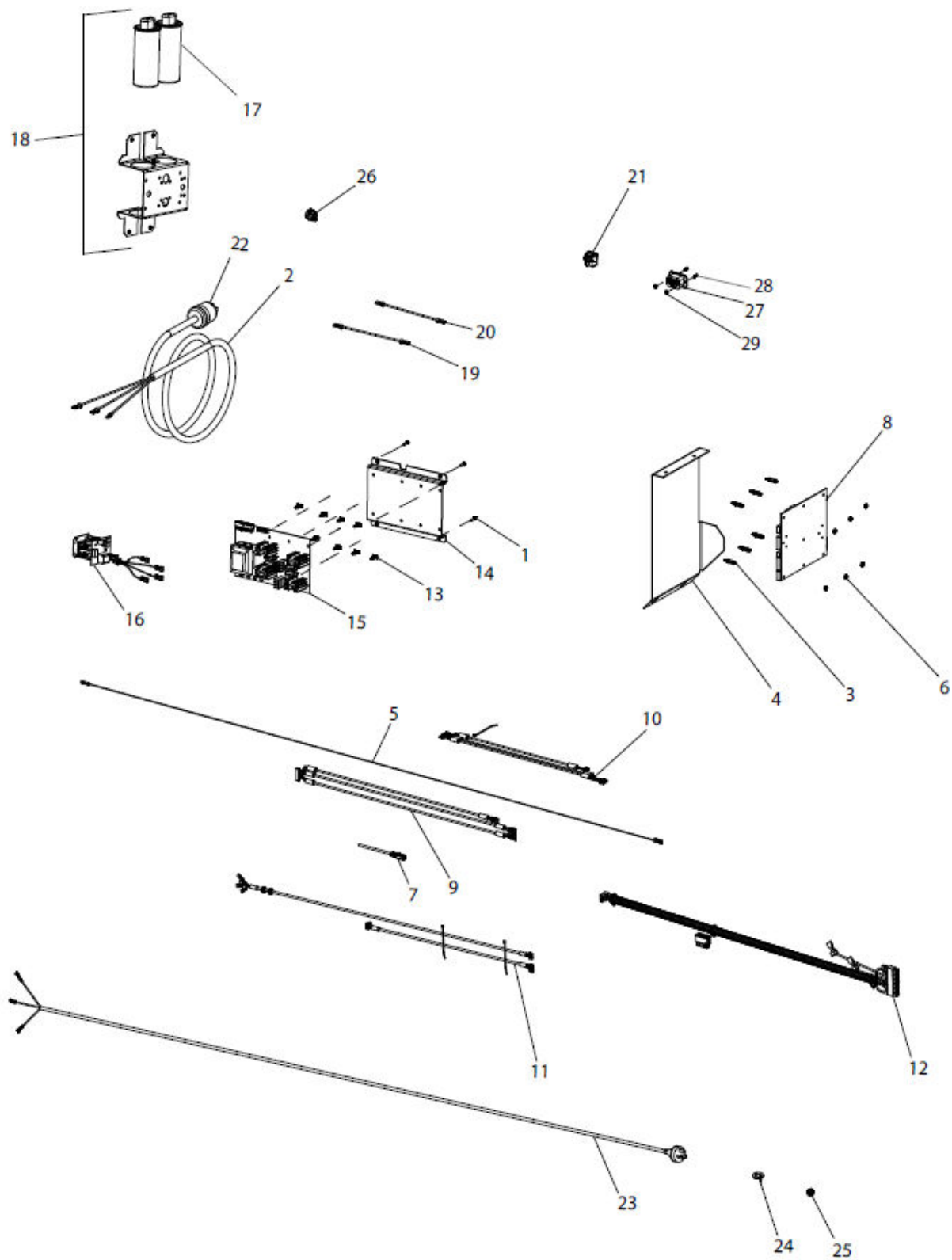
Item	Part No.	Description
1	8111055	Nut - Lock, W/Nylon Collar, #6-32
2	85610516	POD - Electronics
3	85610602	Wldmnt-Display Mount, Pvt Brkt
4	85610931	Assy-Panel, Tactile Touch (1300) (Includes PCB)
	85610896	Panel , Tactile Touch, Only (1300)
	85608097	Board -Panel,Touch, Only (1300)
	85610664	Assy-Panel, Tactile Touch (1400)
	85610663	Panel , Tactile Touch, Only (1400)
	Note	For units pre 05/25, superceed to 85610664
	85610624	Assy-Panel, Tactile Touch (1500)
	85610626	Panel , Tactile Touch, Only (1500)
	Note	For units pre 05/25, superceed to 85610624
5	85611520	Nut-Lock, #10-24, Nylon Insert
6	85610928	Assy-Cable, Tactile Panel (1300)
	85610629	Assy-Cable, Tactile Panel (1400/1500)
7	8113624	Shield - EMC (AUS Models only)
8	85610529	Mount-Cable, Snap-In, 8"
9	85611519	Bolt, Square-Neck Carriage, #10-24 x 0.5"

1600 Monitor Assembly

Item	Part No.	Description
9	8000745	Washer-Flat, 1/4"
10	8113921	Washer - Flat 1/4"
11	85607866	Screw-M4-07X10MM, Slotted Pan
12	85610288	Screw-Shoulder, 3/8 x 4
13	85610556	Plate-Pivot Backing
14	85610599	WLDMNT-Display Mount, Lower
15	85610601	WLDMNT-Display Mount, Upper
16	85610602	WLDMNT-Display Mount, Pvt Brkt
17	85610604	HANDLE-Display Mount, Locking
18	85610606	Washer-Fiber, 3/8" ID
19	85610607	Cover-Mat, 1/16" Rubber
20	85612139	Display-Asus, 22" Touch
	85612143	Display-Viewsonic, 22" Capacitive
21	85610611	Cable-Asm, Display, Opt. Touch (for 85610608)
	85611170	Cable-Asm, Display, (for 85611168)
22	8000525	Nut-Hex, LK, 5/16-18
23	8106301	Screw-1/4-20 X .75
24	85612254	PC
25	8561226801	PC Assembly for Display-Asus,Planar
	8561226802	PC Assembly for Display-Viewsonic
**	85612626	Cable-ASM Male RJ45/Male USB-A
**	85612261	Cable-HDMI

** Not Shown

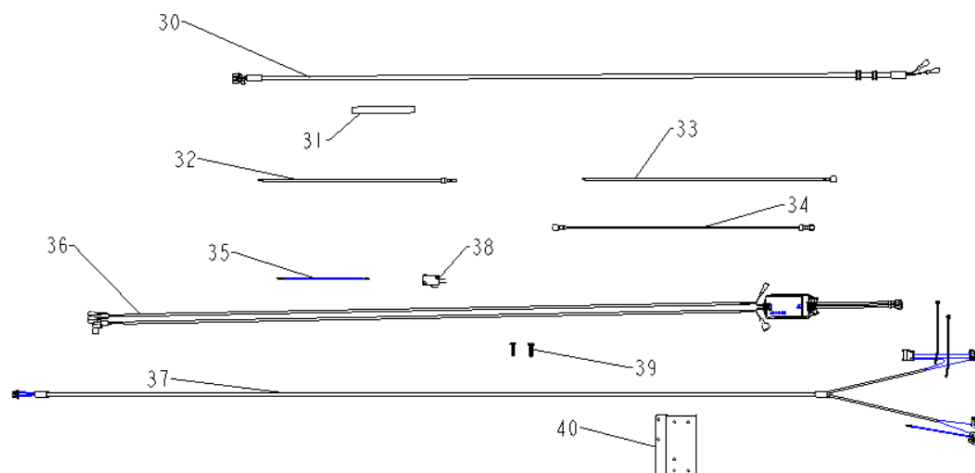
1300/1400 Non-Inverter Model



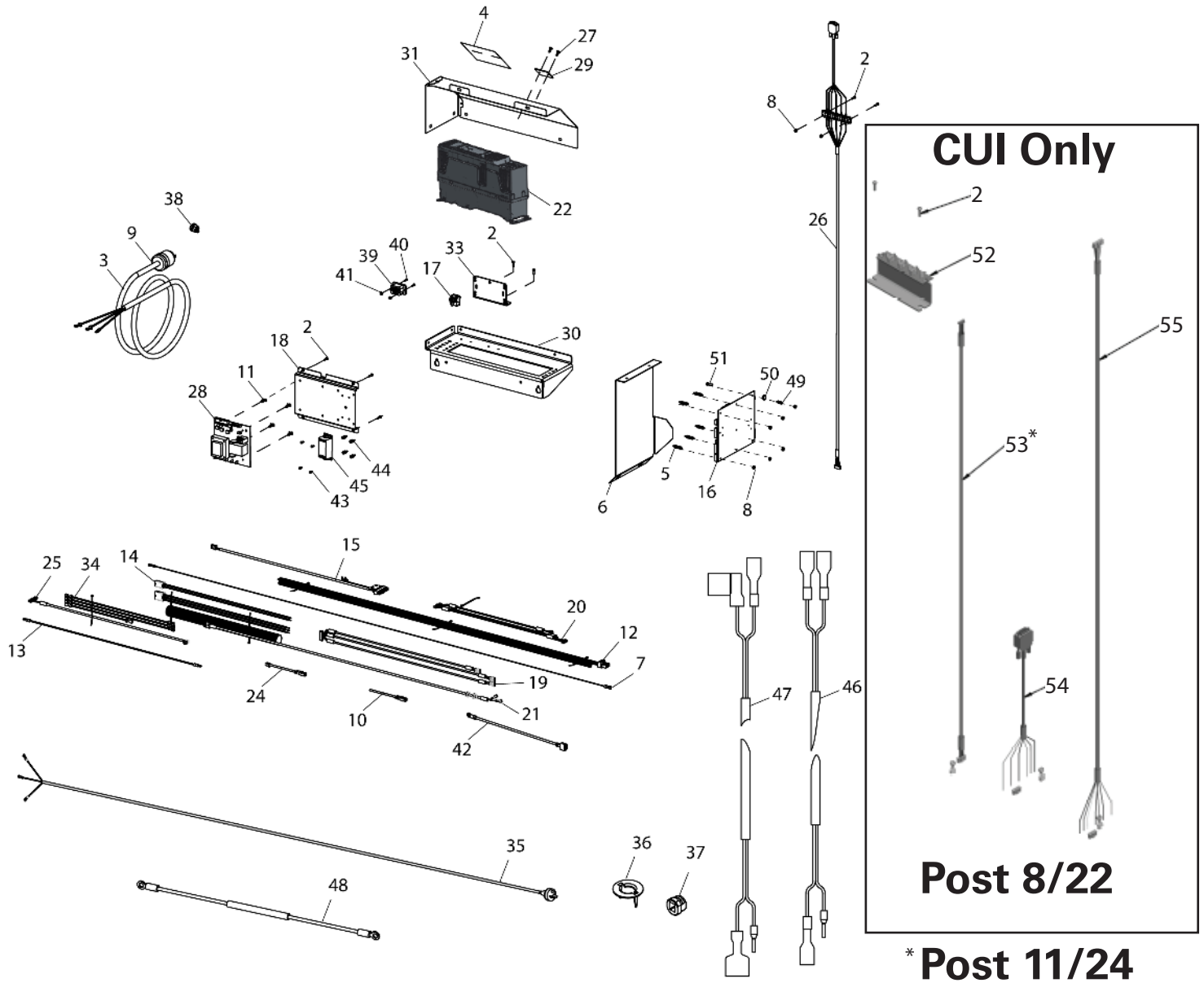
1300/1400 Non-Inverter Model

Item	Part No.	Description	Item	Part No.	Description
1	8111542	Screw - 8-32 X 5/8 LG. Php Sem	35	85613494	Harness-Jmpr, 22Awg, Blk, 6"
2	85611137	Cord – Power	36	85611278	Circuit-Asm, Pwr, Led
	8143127	Cord-Power 3 PH	37	85613417	Harness-Lift, Bal-Side
3	8113996	Standoff - 8-32X3/4	38	8113334	Switch-Micro
4	8114184	Cover	39	8104596	Screw-Hwhst, #10-24 X 3/4
5	8114212	Assembly, Drain Wire	40	85613568	Plate-Extension, Pwr
6	8301084	Nut, #8-32 KEP			
7	81142111	Cable - Cat 5, 7' LG.			
8	85608097	PCB – Processor (1300 Only)			
	85609809	PCB – Processor (1400 Only)			
9	85609815	Assembly - Piezo Harness			
10	85609818	Assembly, MCB Cable			
11	85609868	Harness-Assy			
12	85608188	Harness-Swtch,Hd,Assy			
13	85000361	Standoff-Lck, Snp			
14	85609308	Bracket-Mcb,Assy			
15	85610543	Board-Asm,MCB,JST, 2D			
16	85000705	Motor Module Assembly, 1 PH			
	85000704	Motor Module Assembly, 3 PH			
17	8112356	Capacitor			
18	8111860	Capacity Panel Assembly			
19	8309057	Wire-14AWG,RED,6",Assy			
20	8309005	Wire-14AWG,BLCK,6",Assy			
21	85609122	Switch-RCKR,DPST			
22	8305076	220V, 1 PH Plug			
	8140786	220V, 3 PH Plug			
23	929507	Cord-Power, (Aust. Only)			
24	929642	Adapter-Knckt, Heyco (Aust. Only)			
25	929643	Relief-Strain,SR-6W-1 (Aust. Only)			
26	906058	Relief-Strain,120V,SR-81-1			
27	85609290	Outlet, Panel Mount			
28	85610253	Screw, OHPMS, 6-32 x 1/2			
29	8111055	Nut - Hex, locking, 6-32 Insert			
30	85609820	Harness-Switch, HD, Assy			
31	85611011	Trim-Edge, 4"			
32	85613573	Harness-Jmpr, 14Awg, Blk, 12"			
33	85613496	Harness-Jmpr, 14Awg, Wht, 12"			
34	85613495	Harness-Jmpr, 14Awg, Blk, 16"			

1300/1400 Wheel Lift Accessory (Auto Retract) Components



1500/1600 Inverter Models



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Use 85613388 in place of 85612562



1500/1600 Inverter Models

Item	Part No.	Description	Item	Part No.	Description
1	925019	Screw - Hex Hd. Self Tapping	52	85612709	Bracket ASM PCB
2	8111542	Screw - 8-32 X 5/8 LG. Php Sem	53	85612562	Cable ASM Encoder Samtec/JST
3	85611137	Cord - Power 1 PH	54	85612186	Cable Encoder Junction Drive
	8143127	Cord - Power 3 PH	55	8561285	Cable Encoder Junction PCB
4	8113927	Decal-Caution/Warning	56	85613388	Adapter, Encoder, Nemicon (Post 11/24)
5	8113996	Standoff - 8-32X3/4	57	85613417	Harness-Lift, Bal-Side
6	8114184	Cover			
7	8114212	Assembly, Drain Wire			
8	8301084	Nut, #8-32 Kep			
9	8305076	Plug-Twist Lock,250V,20AMP,1PH			
	8140786	Plug-Twist Lock,220V,20AMP,3PH			
10	81142111	Cable - CAT 5, 7' LG.			
11	85000361	Standoff- Snap-Lock			
12	85010022	Assy - Wire Harness, Motor			
13	85010024	Assy - Wire, Ground X 26' LG.			
14	85600284	Harness-Inverter/Motor-MOLEX(Serial# Before 2207XXXXXX)			
	85612942	Harness-Inverter/Motor-TE(Serial# After 2207XXXXXX)			
15	85608188	Harness-Fan 220V,Assy			
16	85609808	PCB - Processor (1500)			
	85608629	PCB - Processor (1600)			
17	85609122	Switch-DPST, Rocker			
18	85609308	Bracket-MCB Assy			
19	85609815	Assembly - Piezo Harness			
20	85609818	Assembly, MCB Cable			
21	85609820	Assy, Hood Switch Cable			
22	85609942	Inverter-Emerson 701, 3HP			
24	85610107	Cable-RJ45 - RJ12 Assy			
25	85610232	Cable, Sonar Chassis (1500 only)			
	85611014	Cable, Sonar Chassis, Pedal (1600 only)			
26	85610237	Cable-Emrsn,W/Trmnl,Assy			
27	85610274	Rivet-Plastic, A3/16"			
28	85610527	Board-Supply,Power,Inverter			
29	85610588	Shield-Acrylic, IB Laser			
30	85610644	Bracket-Inverter, Reverse			
31	85610645	Weldment-Cover, WND			
33	85610649	Bracket-Terminal Strip, Side			
34	85610672	Harness-Asm,Pwr, 4X 14AWG			
35	929507	Cord-Power, (Aust. Only)			
36	929642	Adapter-Knckt,Heyco (Aust. Only)			
37	929643	Relief-Strain,SR-6W-1 (Aust. Only)			
38	929643	Relief-Strain,120V,SR-81-1			
39	85609290	Outlet, Panel Mount			
40	85610253	Screw, OHPMS, 6-32 x 1/2			
41	8111055	Nut - Hex, locking, 6-32 Insert			
42	85610727	Ground Wire			
43	8301067	Screw- #6-32 X Phil. (1600 with LED Bar Only)			
44	85611225	Spacer-Snap-In,ML/FML (1600 with LED Bar Only)			
45	85611226	Supply-Pwr, 220VAC/24VDC (1600 with LED Bar Only)			
46	85611222	Harness-Pwr,Switch, 48"			
47	85611223	Harness-Pwr,LED, 48"			
48	85611427	Harness-Ground Strap			
49	85611426	Standoff-Hex, Male/Female			
50	901724	Washer, Lock, #8			
51	85611425	Screw- #8-32 X Pan Head Slot, Nylon			

