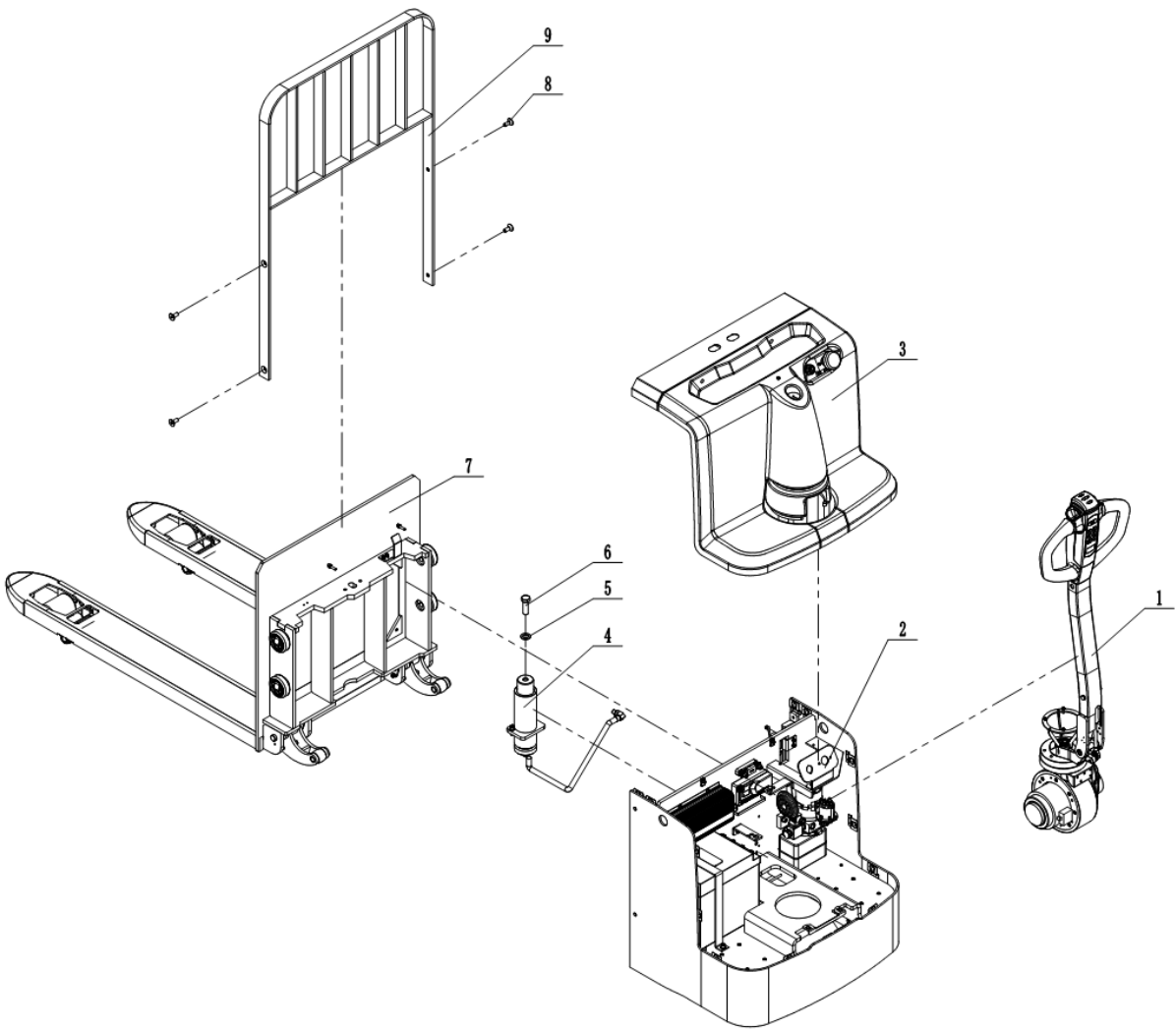


EP18LI/EP20LI
ELECTRIC LONG-HANDLED
FORKLIFT TRUCK
PART MANUAL



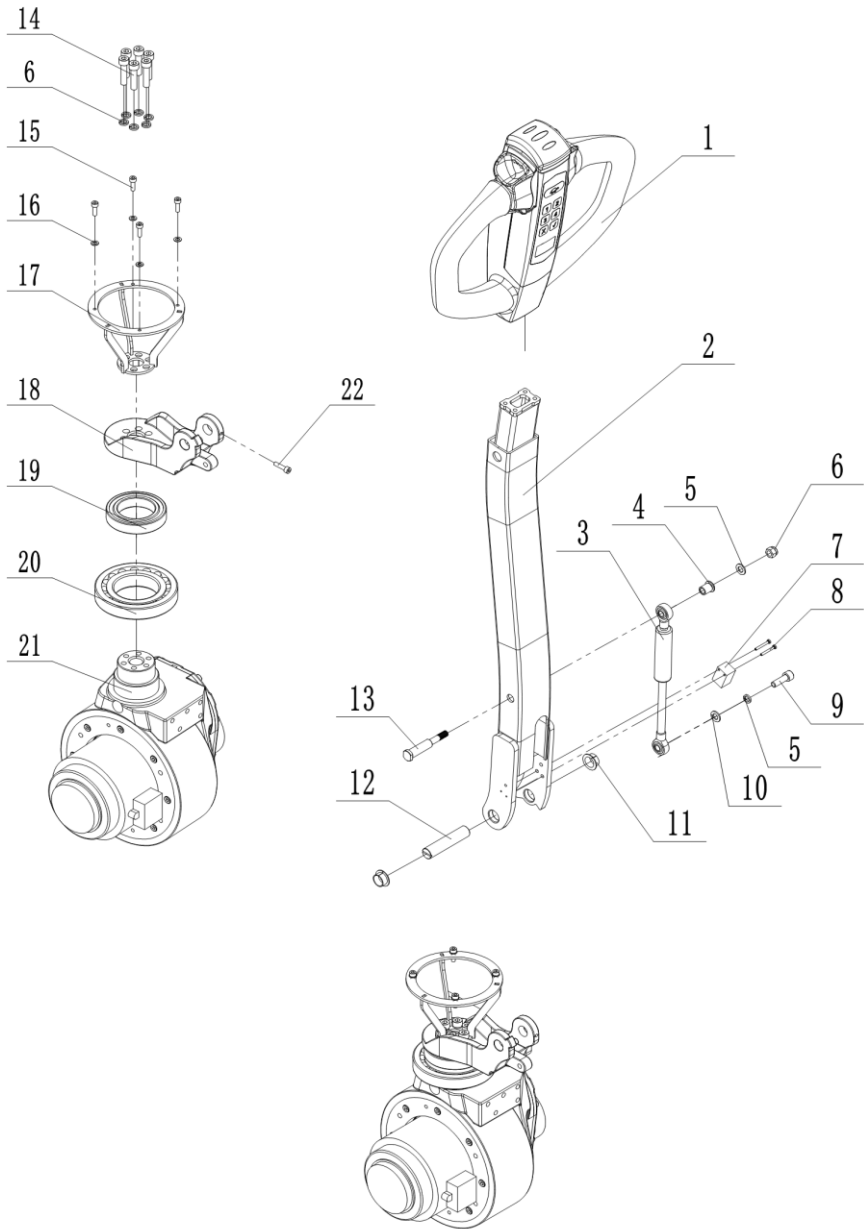
EKKO
MATERIAL HANDLING EQUIPMENT
MOVING **AHEAD**

全电动搬运车 || ELECTRIC PALLET TRUCK



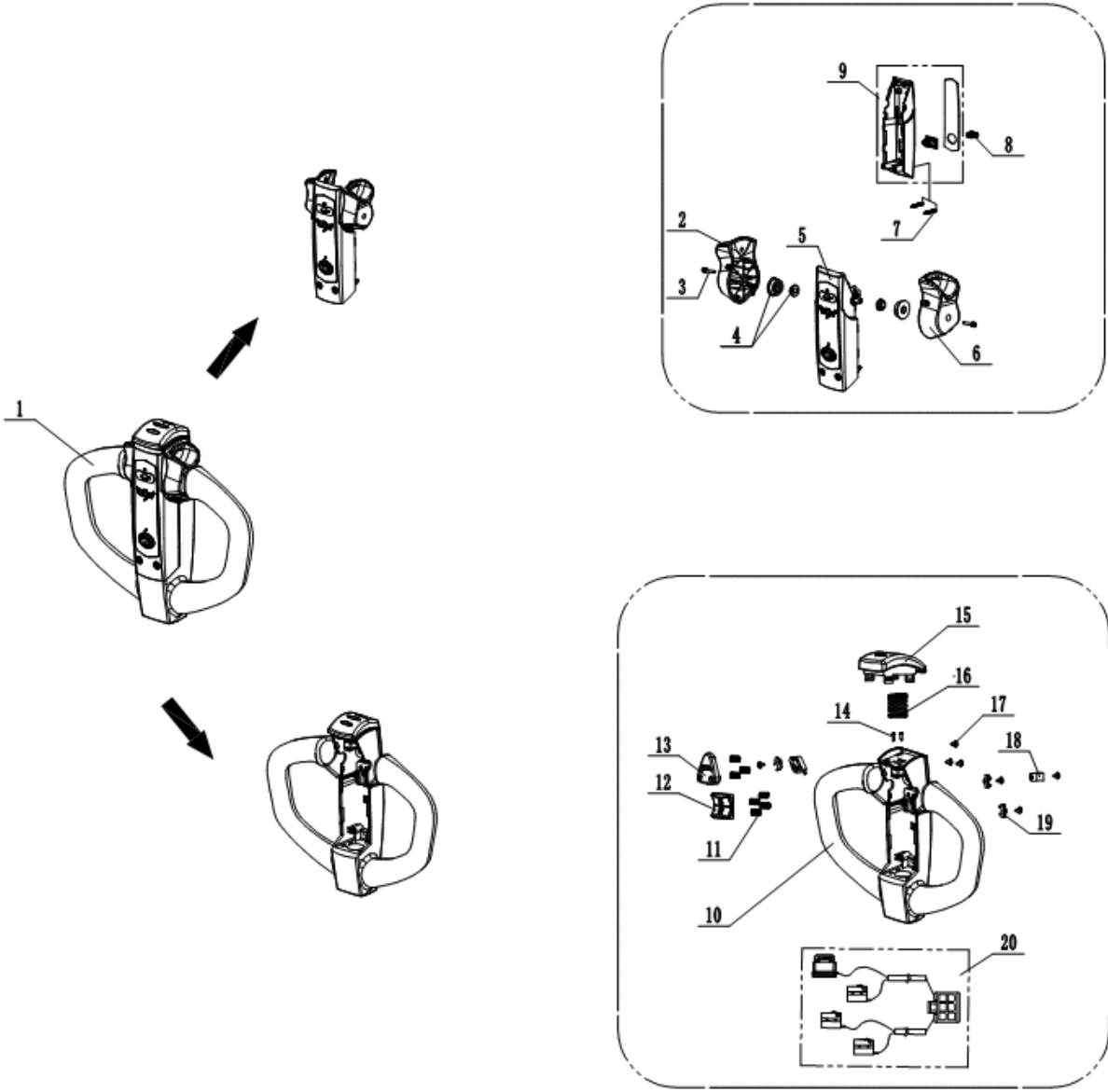
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	20105110025	操作系统总成	Operating System Assembly	1		
2	20105110027	车架组件	Frame assembly	1		
3	20105110026	覆盖件总成	Cover Assembly	1		
4	20105110028	油缸总成	Oil cylinder assembly	1		
5	50101160010	六角头螺栓M16*50	Hexagon bolt	1		
6	50501160001	圆形垫圈φ16	Round washer	1		
7	20105110029	叉架组件	Fork Bracket Assembly	1		
8	50203100009	内六角沉头螺钉 M10*25	Hexagon socket countersunk head screw	4		
9	20105060028	挡货架焊合	Load Guard Welding Assembly	1		

1. 操作系统总成 || Control System Assembly



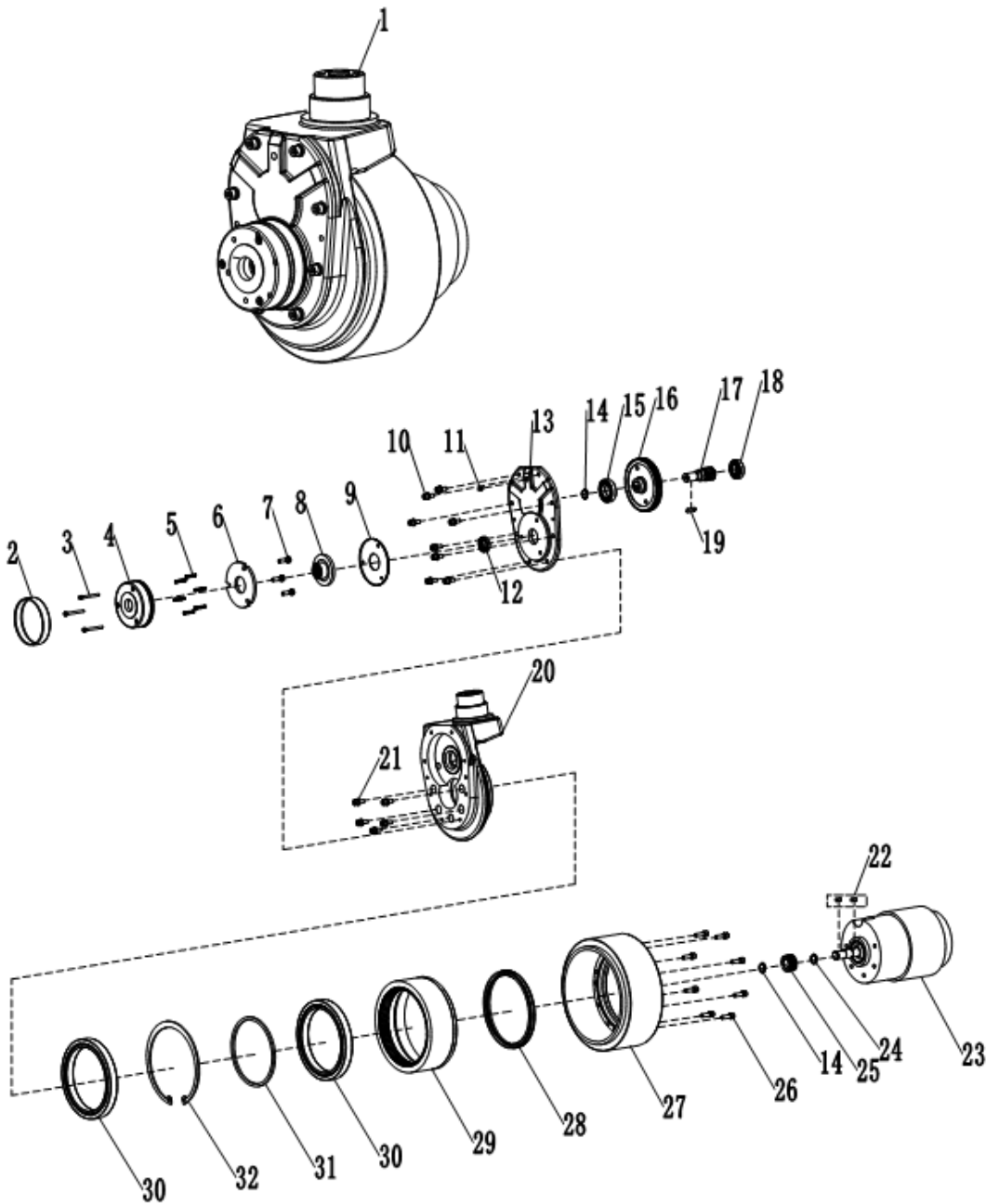
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	82601241011	操作手柄T410A-9C	Operating handle	1		
	82601240008	手柄总成T410A-9	Handle Assembly	1		
2	75303010013	手柄杆焊合	Handle bar assembly	1		
3	70912160004	气弹簧YQ16-70-245-700N	Gas spring	1		
4	70301050002	轴套	Axle sleeve	1		
5	50511080001	弹性垫圈φ8	Resilient washer	8		
6	50311080001	六角锁紧螺母M8	Hex lock nut	1		
7	80119010009	接近开关AZ17M05PNK 10-30VDC	Approach switch	1		
8	50211030003	十字槽盘头螺钉M3×25	Hexagon socket cap screw	2		
9	50201080010	内六角圆柱头螺钉M8×30	Hexagon socket cap screw	1		
10	50501080001	圆形垫圈φ8	Round washer	7		
11	72902160004	带肩复合衬套 16*18*10/24	Composite bush with shoulder	2		
12	70101160005	手柄销轴φ16*75	Handle Pivot Pin	1		
13	70301050001	连接轴	Connecting axle	1		
14	50201080007	内六角圆柱头螺钉M8×35	Hexagon socket cap screw	6		
15	50201050023	内六角圆柱头螺钉M5×16	Hexagon socket cap screw	4		
16	50501050001	圆形垫圈φ5	Round washer	4		
17	77706050091	转向罩安装架	Steering Cover Mounting Bracket	1		
18	77706050092	关节座	Joint Hub	1		
19	50801500006	深沟球轴承6010-2RS	Deep groove ball bearing	1		
20	50802600002	圆锥滚子轴承30212	Tapered roller bearing	1		
21	83101243007	驱动总成	Drive Assembly	1		

1.1 手柄总成 || Handle Assembly



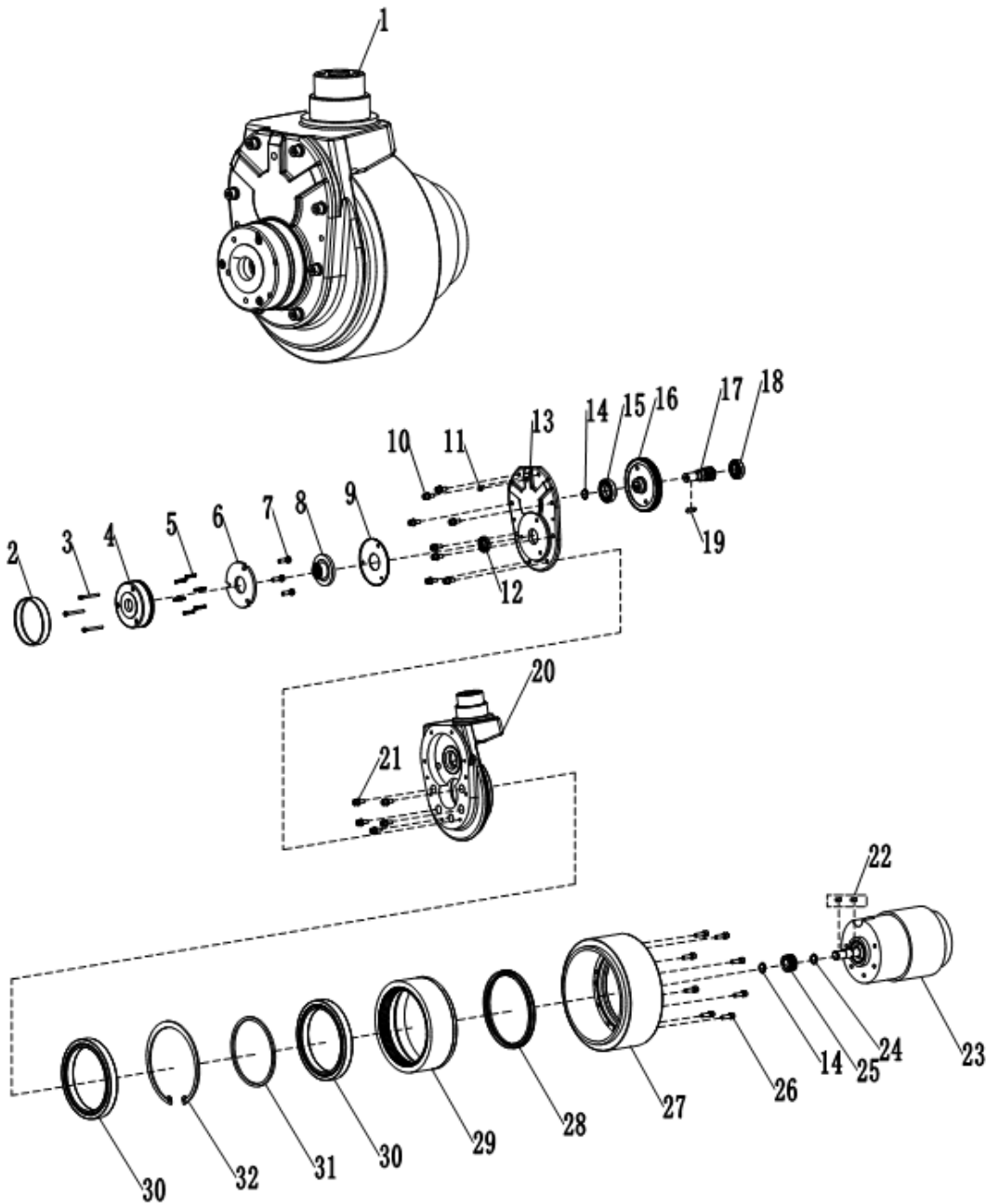
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	82601241011	操作手柄	Operating handle	1		
2	A7060355019	左加速器旋钮	Left accelerator knob	1		
3	A6162607017	平弹垫三合一螺栓	Three-in-one flat spring washer bolt	2		
4	A6162603016	轴内外套总成	Inner/Outer Shaft Sleeve Assembly	2		
5	A6163101032	加速器总成	Accelerator assembly	1		
6	A7060621066	右加速器旋钮	Right accelerator knob	1		
7	A6165102011	8.8级六角螺栓	Grade 8.8 Hex Bolt	2		
8	A7010110012	磁铁钥匙总成	Magnetic key assembly	1		
9	A6165109071	下盖面膜组件	Lower cover facial mask assembly	1		
10	A7060901031	大手柄上盖	Large handle upper cover	1		
11	A5020120011	压簧	Pressure spring	7		
12	A7010110013	升降按钮	Lifting and lowering button	1		
13	A6019001060	喇叭按钮	Horn button	1		
14	A7900301029	自攻螺丝	Self-tapping screw	2		
15	A8090124012	肚皮开关	Emergency reverse button	1		
16	A7310207916	压簧	Pressure spring	1		
17	A6117101611	自攻螺丝	Self-tapping screw	7		
18	A6163601011	尼龙线夹	Nylon wire clamp	3		
19	A5050103011	微动开关定位片	Microswitch positioning plate	3		
20	A5010112024	微动开关总成	Microswitch assembly	1		

1.2 驱动轮总成 || Drive Wheel Assembly



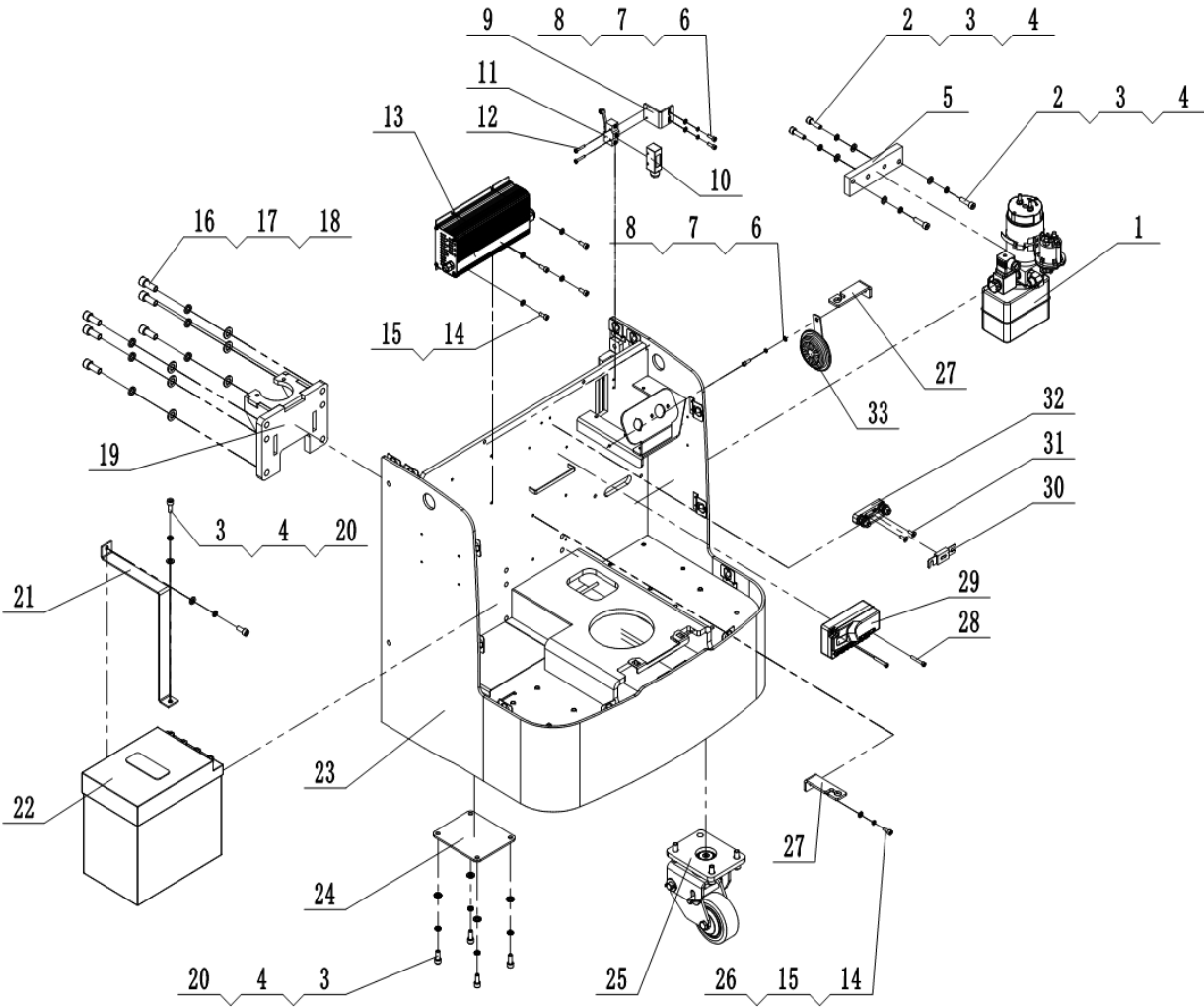
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	83101243007	驱动总成	Drive Assembly	1		
2	A7060355015	防尘皮圈	Dust ring	1		
3	A6162607013	内六角圆柱头螺钉	Hexagon socket cap screw	3		
4	A6162603011	制动器定子	Brake stator	1		
5	A6163101029	弹簧	Spring	6		
6	A7060621063	衔铁	Link iron plate	1		
7	A6165102008	六角头螺栓	Hexagon bolt	3		
8	A7010110008	摩擦盘	Friction disk	1		
9	A6165109068	摩擦板	Friction plate	1		
10	A7060901028	内六角圆柱头螺钉	Hexagon socket cap screw	8		
11	A5020120009	黄油嘴	M8 Grease fitting	1		
12	A7010110093	骨架油封	Metal frame oil seal	1		
13	A6019001052	齿轮箱后盖	Gearbox rear cover	1		
14	A7900301027	轴用弹性挡圈	Shaft retaining ring	2		
15	A8090124010	深沟球轴承	Deep groove ball bearing	1		
16	A7310207913	一级从动齿轮	Driven gear	1		

1.2 驱动轮总成 || Drive Wheel Assembly



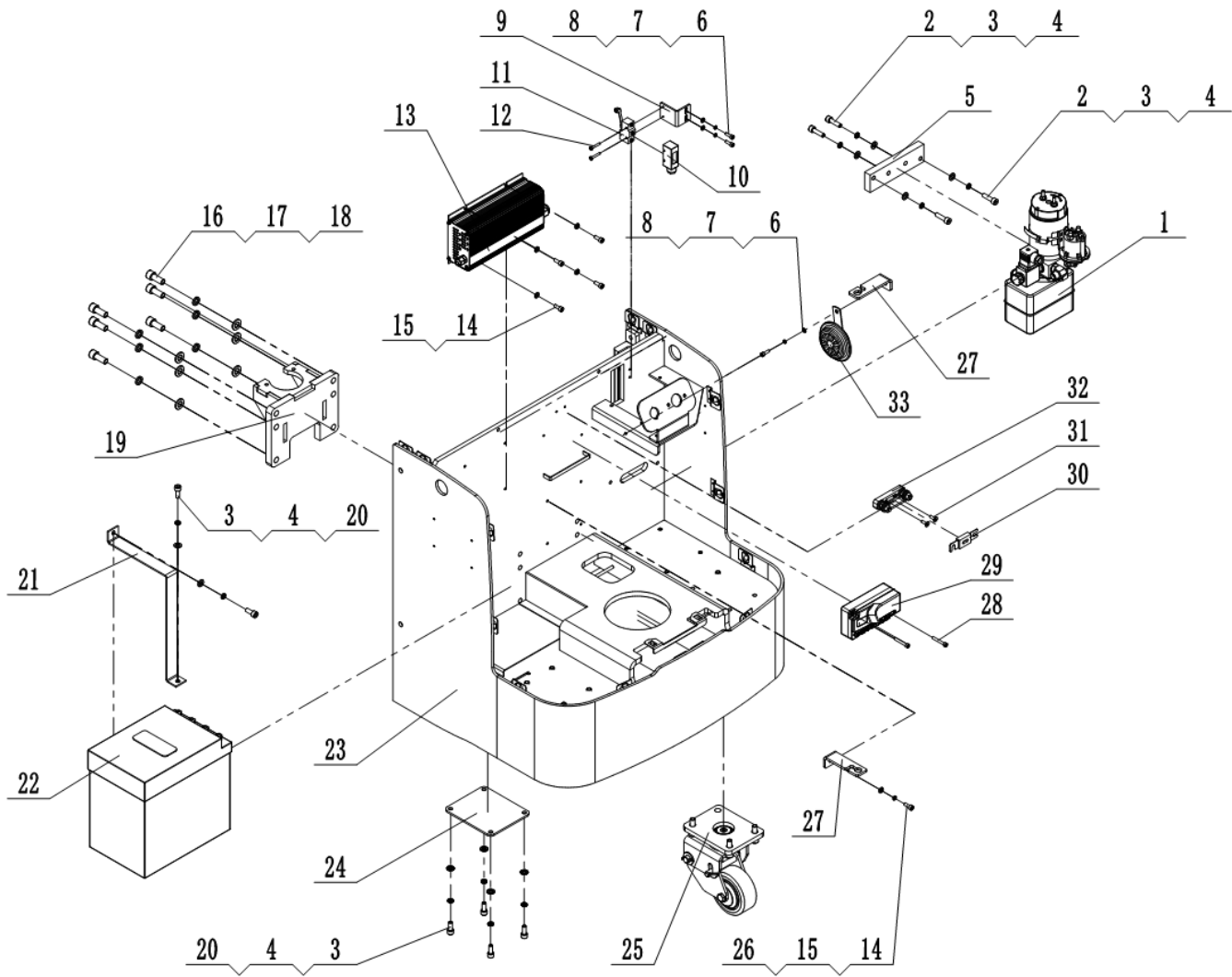
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
17	A6117101608	二级主动齿轮轴	Driving gear	1		
18	A6163601008	深沟球轴承	Deep groove ball bearing	1		
19	A5050103002	平键	Flat key	1		
20	A5010112020	驱动齿轮箱	Drive gearbox	1		
21	A8090125116	内六角圆柱头螺钉	Hexagon socket cap screw	5		
22	A8090125152	平键	Flat key	2		
23	A8090125117	电机总成0.75KW	Motor assembly	1		
24	A2010506005	轴用弹性挡圈	Shaft retaining ring	1		
25	A7060810005	一级主动齿轮	Driving gear	1		
26	A7150101005	内六角圆柱头螺钉	Hexagon socket cap screw	8		
27	71501111001	轮圈	Wheel rim	1		
28	A8260148006	骨架油封	Metal frame oil seal	1		
29	A8260148079	大齿圈	Big gear ring	1		
30	A8260148082	深沟球轴承	Deep groove ball bearing	2		
31	A8260148080	塑料垫圈	Plastic washer	1		
32	A8260148081	孔用弹性挡圈	Hole-use resilient washer	1		

2. 车架系统 || Truck Body Frame



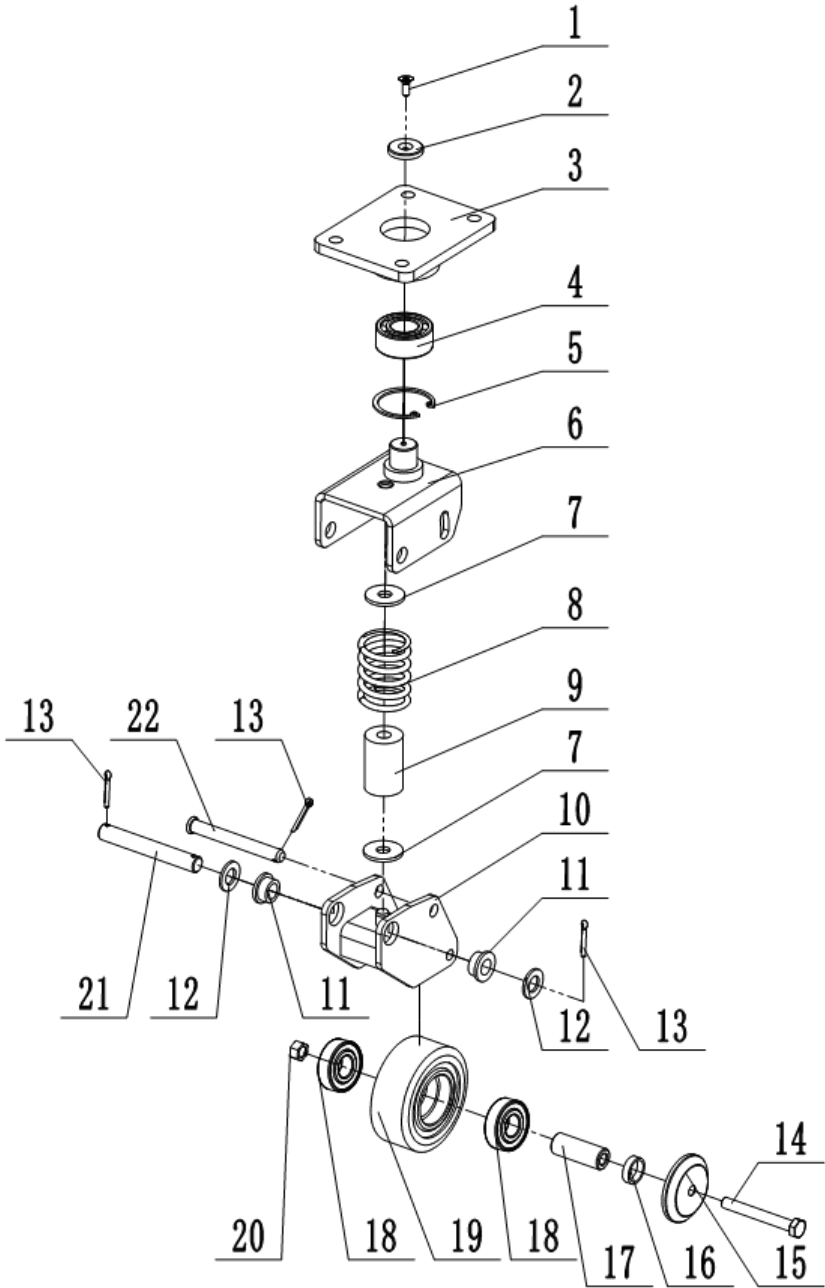
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	61601243005	动力单元总成	Power Unit Assembly	1		
2	50201080010	内六角圆柱头螺钉M8×30	Hexagon socket cap screw	4		
3	50511080001	弹性垫圈φ8	Resilient washer	14		
4	50501080001	圆形垫圈φ8	Round washer	14		
5	77705050073	泵站安装板	Pump Station Mounting Plate	1		
6	50201060005	内六角圆柱头螺钉M6*16	Hexagon socket cap screw	3		
7	50511060001	弹性垫圈φ6	Resilient washer	3		
8	50501060001	圆形垫圈φ6	Round washer	3		
9	77705050074	限位开关安装板	Limit switch mounting plate	1		
10	85100000001	微动开关防护罩	Micro switch protective cover	1		
11	80101010018	LXW5-11G1微动开关	Micro switch	1		
12	50211040007	十字槽盘头螺钉M4×25	Hexagon socket cap screw	2		
13	80912241043	充电器GBCH24V30A-B	Charger	1		Spring cord with US standard
14	50201060005	内六角圆柱头螺钉M6×16	Hexagon socket cap screw	4		
15	50501060001	圆形垫圈φ6	Round washer	4		
16	50201120002	内六角圆柱头螺钉M12×30	Hexagon socket cap screw	6		

2. 车架系统 || Truck Body Frame



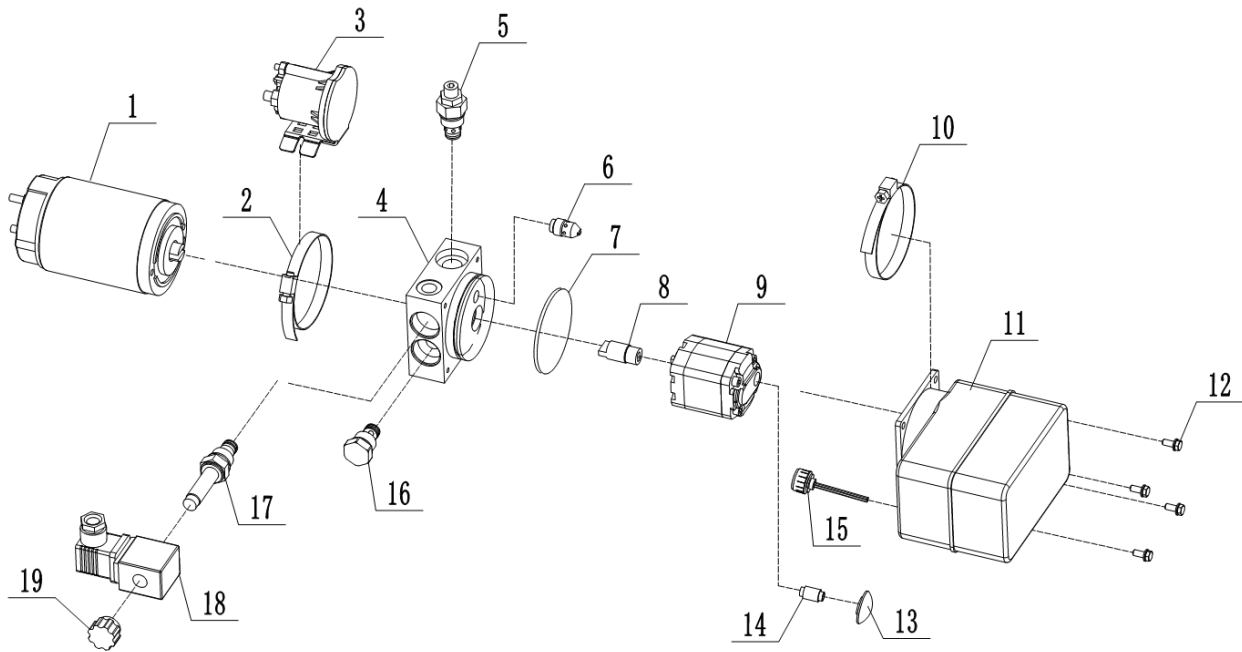
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
17	50511120001	弹性垫圈φ12	Resilient washer	6		
18	50501120001	圆形垫圈φ12	Round washer	6		
19	20105060027	油缸安装座焊合	Hydraulic cylinder mounting bracket weldment	1		
20	50201080003	内六角圆柱头螺钉 M8×20	Hexagon socket cap screw	10		
21	77705050076	电瓶抱箍	Battery clamp	1		
22	81103243010	锂电池24V60A	Lithium Battery	1		
23	20105060029	配电箱焊合件	Welded Electrical Distribution Box Assembly	1		
24	77705050077	曲柄垫板	Crank Shim Plate	2		
25	20106110027	转向轮总成	Steering Wheel Assembly	2		
26	50501060001	圆形垫圈φ6	Round washer	1		
27	77706050062	挂线板	Cable Mounting Plate	2		
28	50201050012	内六角圆柱头螺钉 M5×35	Hexagon socket cap screw	2		
29	80601243003	控制器D4P	Controller	1		
30	81601010002	保险丝ANL-200A	Fuse wire	1		
31	50203050003	内六角沉头螺钉M5×16	Hexagon socket countersunk head screw	2		
32	81603010001	ANL-N保险丝座	Fuse holder	1		
33	80325010001	喇叭XJF-65/24V	Horn	1		

2.1 转向轮总成 || Steering Wheel Assembly



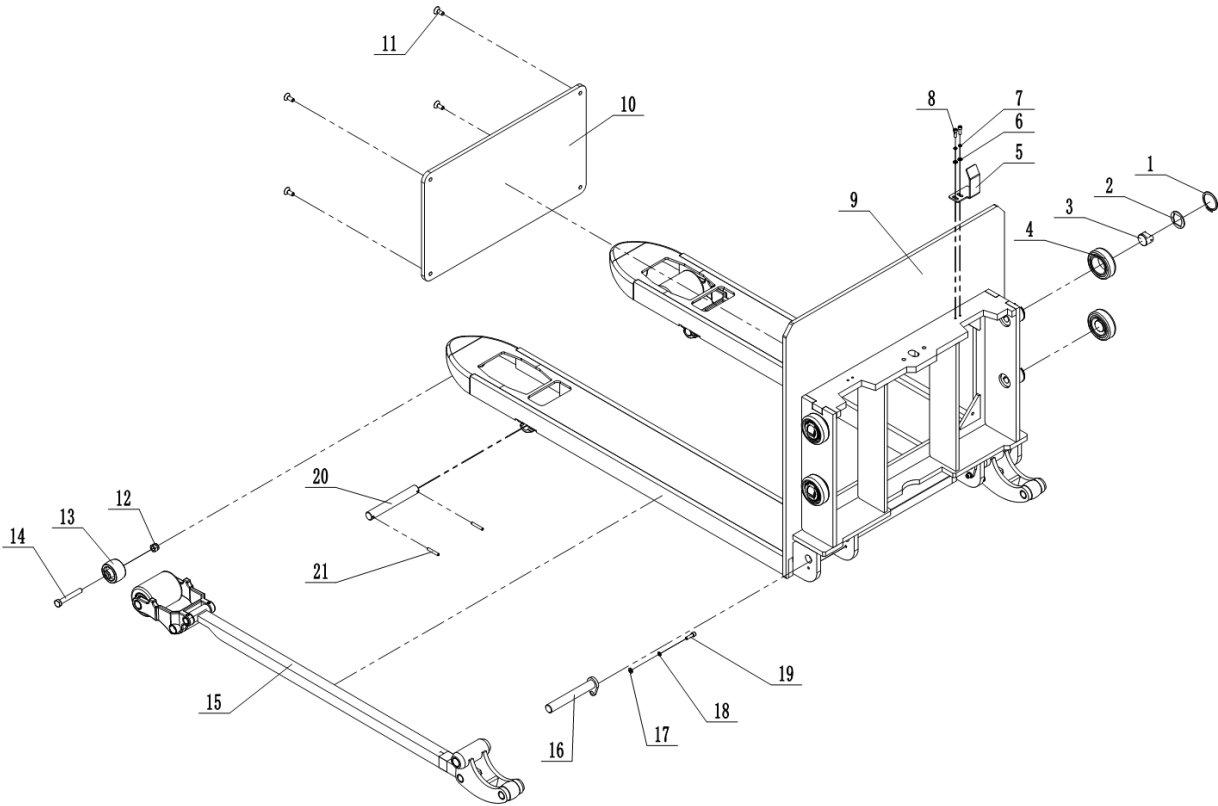
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	50203060005	内六角沉头螺钉M6*16	Hexagon socket countersunk head screw	1		
2	70608060002	转轴连接片6.5*32*5	Pivot Link Plate	1		
3	77706050050	连接板焊合	Welded Connection Plate Assembly	1		
4	50807250003	角接触球轴承S3205A-2RS	Angular Contact Ball Bearing	1		
5	50521522001	孔用弹性挡圈φ52	Hole-use resilient washer	1		
6	77706050052	轮架焊合	Wheel Bracket Welding Assembly	1		
7	70608120001	垫片12.5*36*3	Washer	2		
8	70901050003	压缩弹簧φ5.8*48.6*60	Compression spring	1		
9	73631110001	弹性体13*35*54	Elastomer	1		
10	77706050051	旋转臂焊合	Welded Rotating Arm Assembly	1		
11	70605150001	衬圈	Bushing	2		
12	50501140001	圆形垫圈φ14	Round washer	2		
13	50611040003	开口销φ4*24	Split pin	3		
14	50101100020	六角头螺栓M10*80	Hexagon bolt	1		
15	77706050053	防尘盖	Dust Cover	2		
16	70608200004	垫圈20.5*25*6.5	washer	2		
17	70605100003	轴套φ10*φ20*53	Axle sleeve	1		
18	50801200002	深沟球轴承6204-2RS	Deep groove ball bearing	2		
19	71501110011	直轮φ100*40	Load wheel	1		
20	50311100001	锁紧螺母M10	Lock nut	1		
21	70101150003	销轴φ15*108	Pivot Pin	1		
22	70101120005	销轴12*103	Pivot Pin	1		

2.2 动力单元总成 || Power Unit Assembly



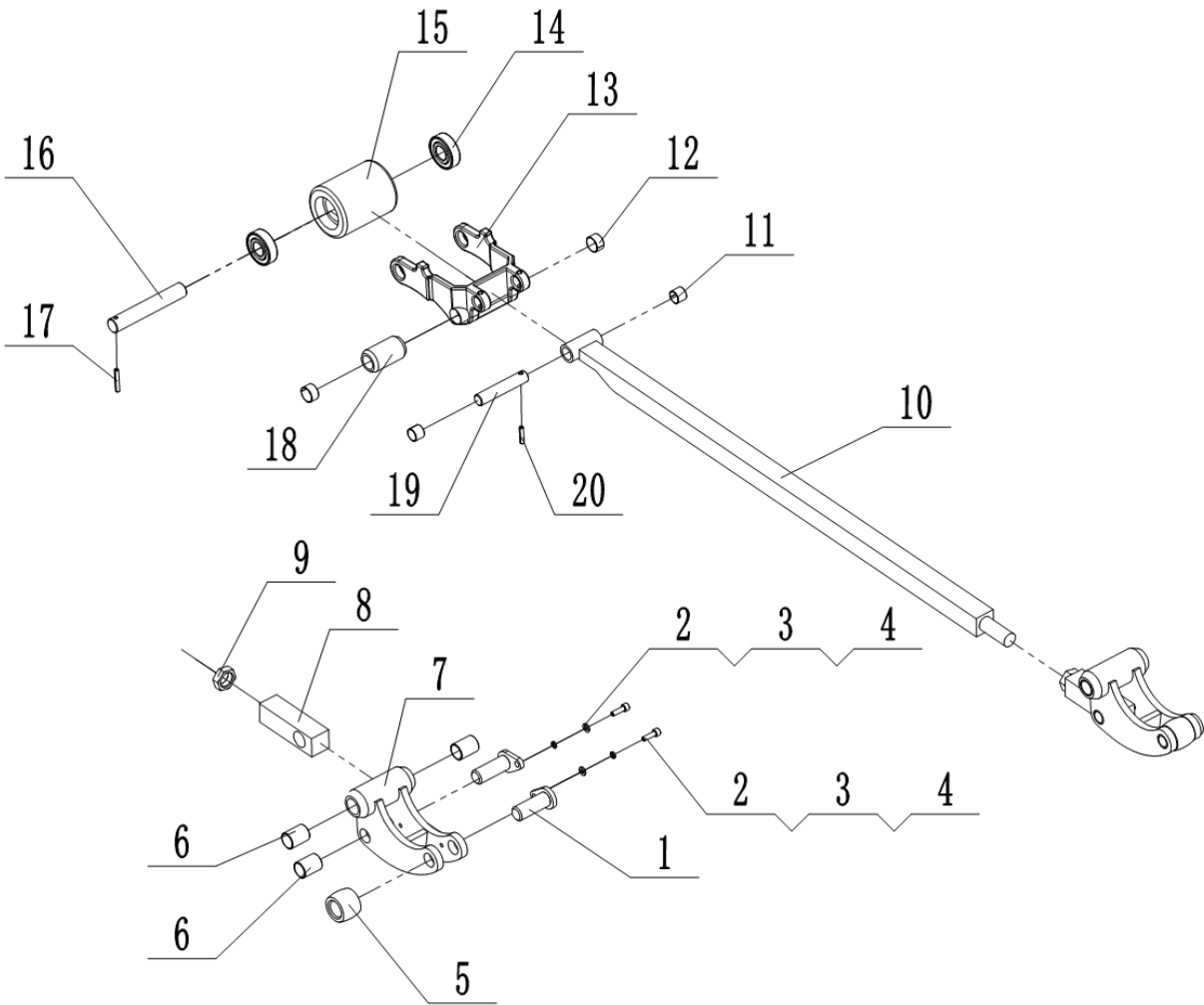
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	A5021102116	直流电机QS-24V-800W-A	DC motor	1		
2	A7060355023	抱箍Φ65-Φ89	Fastening hoop	1		
3	A6162607024	接触器 DC24V 150A	Contactor	1		
4	A6162603022	阀块 DLK31-303	Valve block	1		
5	A6163101037	直动式溢流阀 YF08-00	Direct-acting relief valve	1		
6	A7060621071	压力补偿节流阀 BLF06-G1/4-4L	Pressure-compensated flow control valve	1		
7	A6165102016	O型圈67-2.65	O-ring	1		
8	A7010110020	联轴器	Coupling	1		
9	A6165109075	齿轮泵CBU-F110 0.65cc/r右旋	Gear pump	1		
10	A7060901035	抱箍Φ105-Φ127	Fastening hoop	1		
11	A5020120015	油箱 73口径 1L	Oil box	1		
12	A7010110021	六角头螺栓 M5x16	Hexagon bolt	4		
13	A6019001064	滤网 43	Filter mesh	1		
14	A7900301034	吸油管 G1/4- G3/8-40	Oil suction pipe	1		
15	A8090124015	油箱盖	Tank cap	1		
16	A7310207919	单向阀钢球型 DF08-01	Check Valve	1		
17	A6117101615	常闭电磁阀(二位 二通) HSV2-08-2NCP	Normally Closed Solenoid Valve	1		
18	A6163601016	电磁阀线圈 DC 24V三插	Solenoid Valve Coil	1		
19	A5050103015	塑料螺母M10*20	Plastic Nut	1		

3. 叉架总成 || Fork Rack Assembly



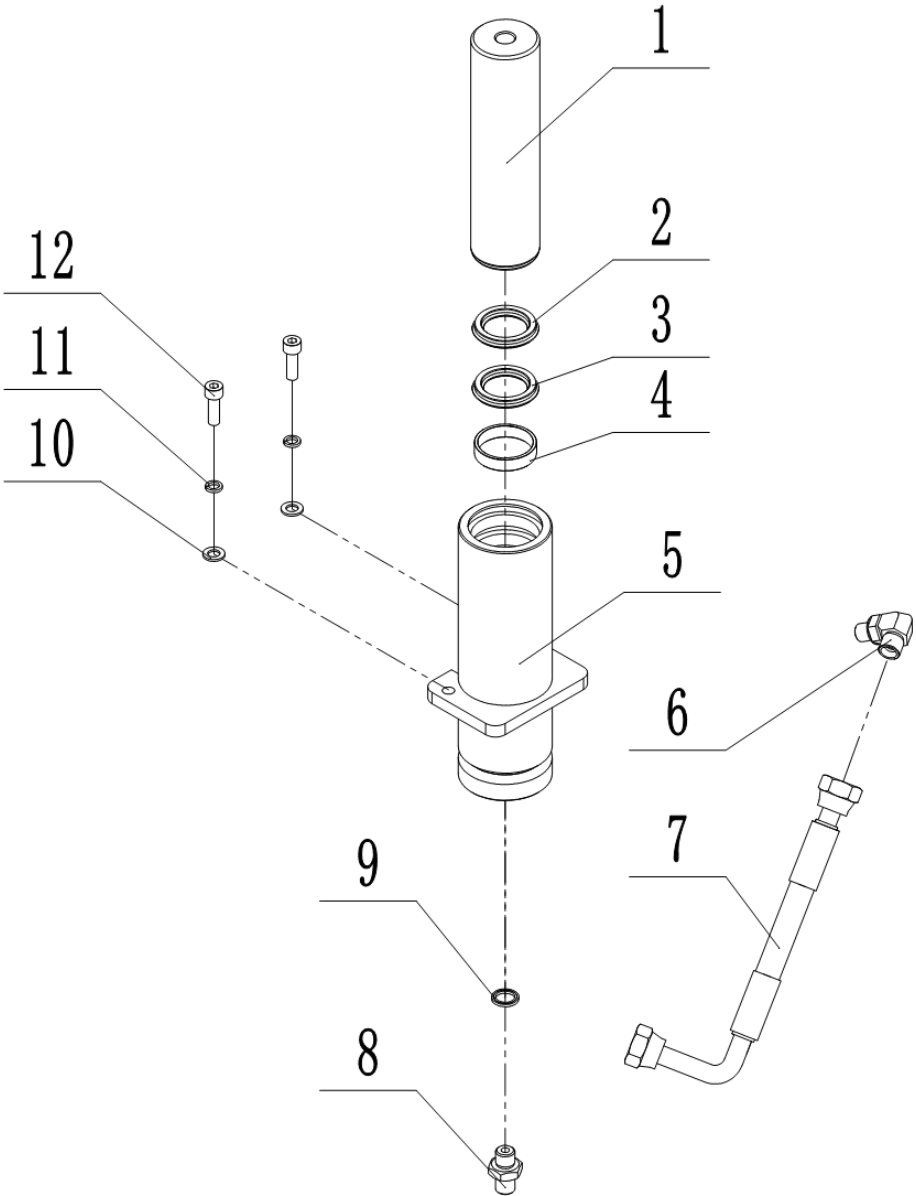
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	50521421001	轴用弹性挡圈φ42	Shaft retaining ring	4		
2	79003010007	锁片	Locking Tab	4		
3	71101010009	侧滚轮	Side Roller	4		
4	71101010018	组合滚轮	Combined Roller	4		
5	77705050078	起升限位板	Lifting Limit Plate	1		
6	50501050001	圆形垫圈φ5	Round washer	2		
7	50511050001	弹性垫圈φ5	Resilient washer	2		
8	50201050003	内六角圆柱头螺钉 M5*16	Hexagon socket cap screw	2		
9	20105060030	叉架焊合	Fork Bracket Welding Assembly	1		
10	77705050079	盖板	Cover plate	1		
11	50203080006	内六角沉头螺钉M8*20	Hexagon socket countersunk head screw	4		
12	50311100001	六角锁紧螺母M10	Hex lock nut	2		
13	71503010001	进入滚子	Entry roller	2		
14	50101100019	六角头螺栓M10*70	Hexagon bolt	2		
15	75901110008	推杆组件	Push Rod Assembly	2		
16	70101200037	销轴焊件φ20*146	Pin shaft welded assembly	2		
17	50501060001	圆形垫圈φ6	Round washer	2		
18	50511060001	弹性垫圈φ6	Resilient washer	2		
19	50201060007	内六角圆柱头螺钉 M6*20	Hexagon socket cap screw	2		
20	70101200009	力臂销φ20*152	Lever pin	2		
21	50601050006	弹性圆柱销φ5*35	Spring pin	4		

3.1 推杆总成 || Pushing Rod Assembly



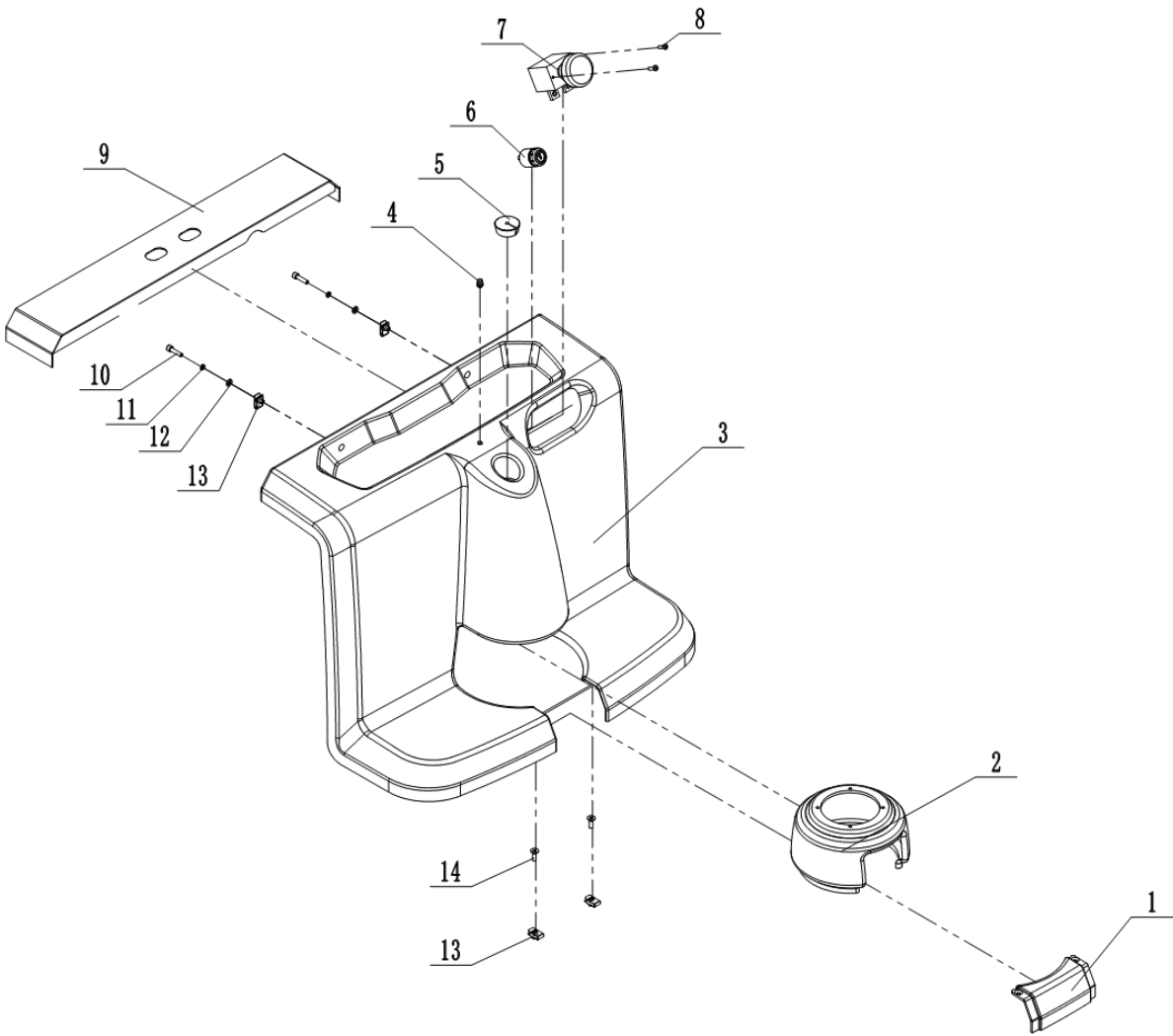
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	70101200038	销轴焊件	Pin shaft welded assembly	2		
2	50201060007	内六角圆柱头螺钉 M6×20	Hexagon socket cap screw	2		
3	50511060001	弹性垫圈φ6	Resilient washer	2		
4	50501060001	圆形垫圈φ6	Round washer	2		
5	71101010012	滚轮φ23*30	Roller	2		
6	72901200004	复合衬套φ23*φ20*30	Composite bush	3		
7	77705050058	曲柄	Crank	1		
8	75901210003	螺纹叉	Threaded Fork	1		
9	50362200001	薄螺母M20*1.5	Thin Nut	1		
10	75901010010	连杆焊件	Welded	1		
11	72901160001	复合衬套φ18*φ16*15	Composite bush	2		
12	72901200005	复合衬套φ23*φ20*15	Composite bush	2		
13	75103010001	力臂架	Force Arm Bracket	1		
14	50801200002	深沟球轴承6204-2RS	Deep groove ball bearing	2		
15	71501110003	直轮φ74*93	Load wheel	1		
16	70101200039	轮轴φ20*122	Wheel Axle	1		
17	50601050006	弹性圆柱销φ5*35	Spring pin	1		
18	71503010003	退出滚子	Exit Roller	1		
19	70101160006	推杆轴φ16*82	Push Rod Shaft	1		
20	50601050003	弹性圆柱销φ5*26	Spring pin	1		

4. 油缸总成 || Oil Cylinder Assembly



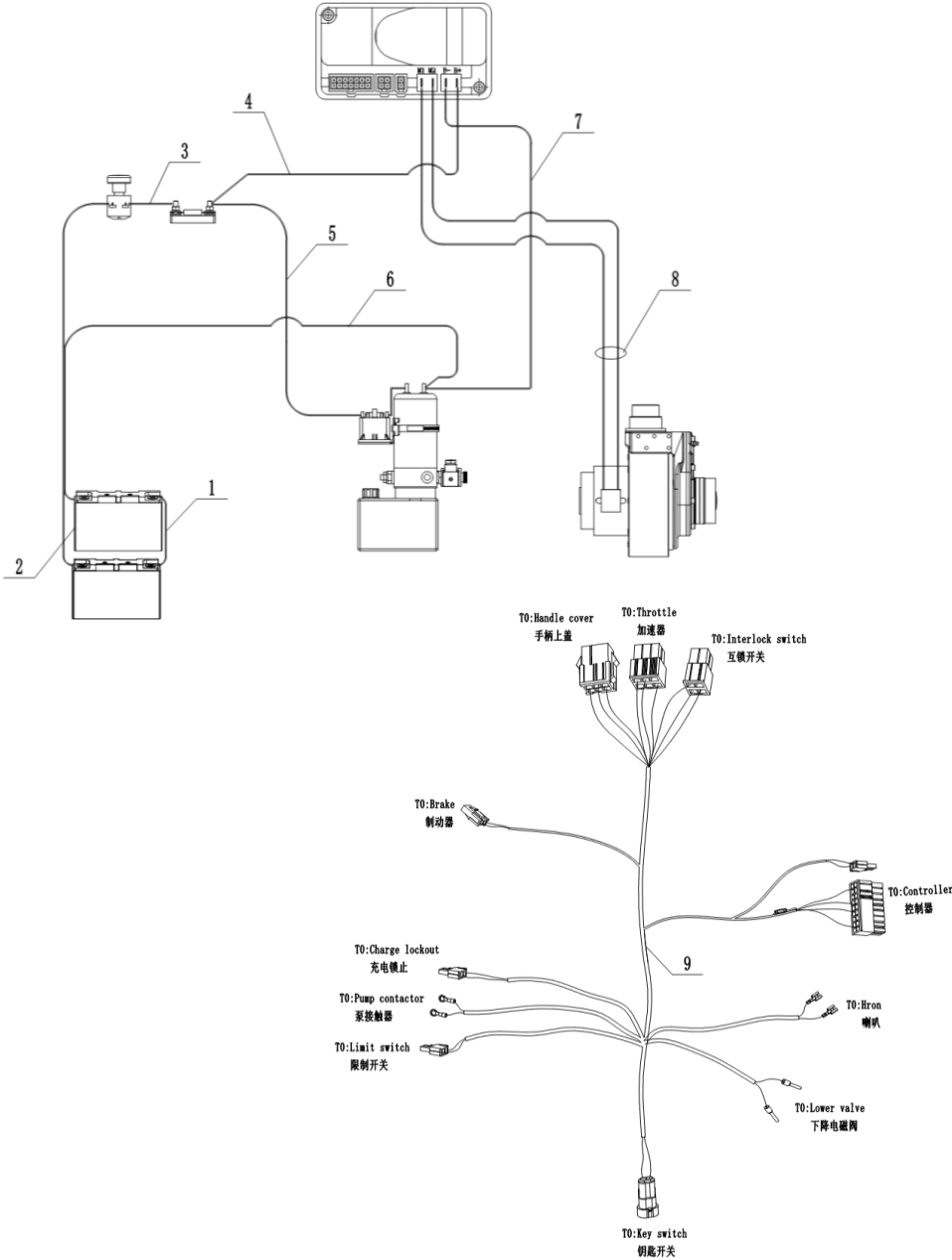
序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	A6162603021	活塞杆	Piston rod	1		
2	61171210010	防尘圈 φ50*φ58*5/6.5	Dust proof ring	1		
3	61171110010	密封圈 φ50*φ60*6	Seal ring	1		
4	A6163101036	轴用耐磨环	Shaft Wear Ring	1		
5	A7060621070	缸筒焊件	Cylinder Barrel Weldment	1		
6	60602010002	直角接头	Right-angle joint	1		
7	A6165102015	油管	Oil pipe	1		
8	60601010023	油管接头	Oil pipe joint	1		
9	60622140001	组合密封垫φ14	Composite Seal Gasket	1		
10	50511080001	圆形垫圈φ8	Round washer	2		
11	50511080001	弹性垫圈φ8	Resilient washer	2		
12	50201080004	内六角圆柱头螺钉 M8*25	Hexagon socket cap screw	2		

5. 覆盖件及其他 || Cover Assembly



序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	73506010003	面罩封板	Mask Cover Plate	1		
2	73506010002	手柄罩	Handle Cover	1		
3	73506010001	配电箱面罩	Distribution Box Cover	1		
4	79003010010	金属灯座φ8	Metal lamp holder	1		
5	73631070001	橡胶线塞	Rubber cable grommet	1		
6	80109010001	钥匙开关JK530AMP	Key switch	1		
7	80107010002	急停开关ED250A	Emergency stop switch	1		
8	50211050001	十字槽盘头螺钉M5*16	Hexagon socket cap screw	2		
9	77705050075	上盖焊合	Welded top cover assembly	1		
10	50201060009	内六角圆柱头螺钉 M6*25	Hexagon socket cap screw	2		
11	50511060001	弹性垫圈φ6	Resilient washer	2		
12	50501060001	圆形垫圈φ6	Round washer	2		
13	70325060001	弹簧卡扣螺母M6	Spring Clip Nut	4		
14	50203060007	内六角沉头螺钉 M6*20	Hexagon socket countersunk head screw	2		

5. 动力线部装图 || Power Line Assembly Drawing



序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	适用日期 Applied Date	备注 Remark
1	83711050046	电池连接电缆线	Battery connection cable	1		
2	83711050047	电池正极--急停电缆线	Battery positive to emergency stop cable	1		
3	83711050048	急停--保险电缆线	Emergency stop to fuse cable	1		
4	83711050049	控制器正极电缆线	Controller positive cable	1		
5	83711050050	泵电机正极电缆线	Pump motor positive cable	1		
6	83711050051	泵电机负极电缆线	Pump motor negative cable	1		
7	83711050052	控制器负极电缆线	Controller negative cable	1		
8	83711050053	电机线材组件	Motor wiring harness assembly	1		
9	83701050030	控制线束	Control wiring harness	1		

4. 易损件清单 || Wear-and-Tear Parts List

序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	图片/位置	备注 Remark	序号 Index	代码 Part No.	零件名称	Part Name	数量 Qty	图片/位置	备注 Remark
1	80325010001	喇叭XJF-65/24V	Horn	1	2/33								
2	80119010009	接近开关 AZ17M05PNK 10-30VDC	Approach switch	1	1/7								
3	71501110011	直轮φ100*40	Load wheel	2	2.1/19								
4	80101010018	微动开关LXW5-11G1	Micro switch	1	2/11								
6	81601010002	保险丝200A	Fuse wire	1	2/30								
7	71501110003	直轮φ74*93	Load wheel	2	3.1/15								
8	50801200002	深沟球轴承 6204-2RS	Deep groove ball bearing	2	3.1/14								
9	71101010012	滚轮φ23*30	Roller	2	3.1/5								
10	50807250003	角接触球轴承 S3205A-2RS	Double-Row Angular Contact Ball Bearing	1	2.1/4								
11	50802600002	圆锥滚子轴承 30212	Tapered roller bearing	1	1/20								
12	50801500006	深沟球轴承 6010-2RS	Deep groove ball bearing	1	1/19								
13	70912160004	气弹簧YQ16-70-245/700N	Gas spring	1	1/3								
14	61171210010	防尘圈 φ50*φ58*5/6.5	Dust proof ring	1	4/2								
15	61171110010	密封圈φ50*φ60*6	Seal ring	1	4/3								