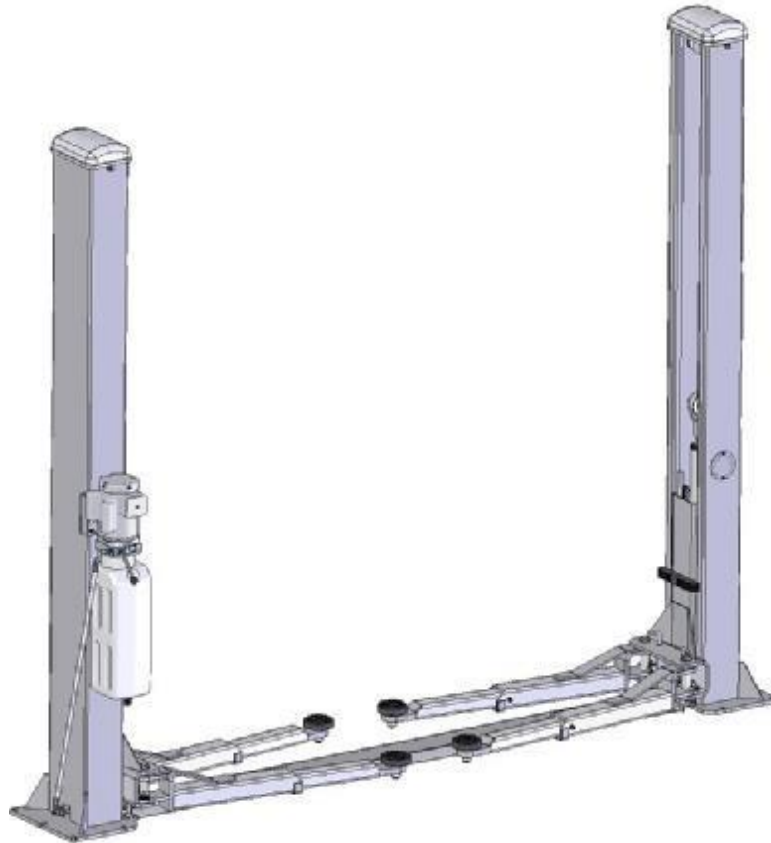


TWO-POST MODEL AUTOLIFT (FLOOR-PLATE)

INSTALLATION, OPERATION & MAINTENANCE MANUAL



MODEL: HP-L4G
9000LBS CAPACITY

IMPORTANT: READ THIS MANUAL COMPLETELY BEFORE
INSTALLING or OPERATING LIFT

GENERAL SPECIFICATIONS

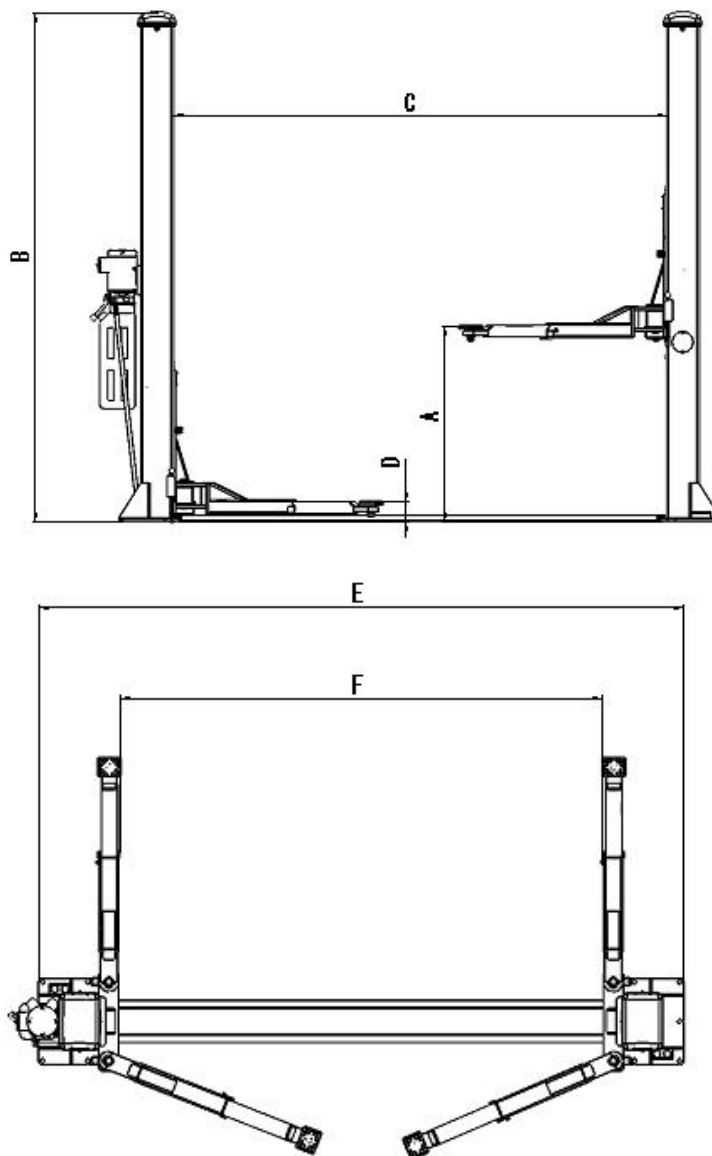


Fig 1- General Specification

See Figure 1	HP-L4G
A. Rise Height (Screw Pads Highest Position)	75 (1905mm)
B. Overall Height	113 13/16" (2891mm)
C. Inside of Columns	110 3/16" (2800mm)
D. Screw Pad Height	4 3/4"~5 15/16" (120~150mm)
E. Overall Width	134 9/16" (3416mm)
F. Drive-Thru Clearance	100 7/16" (2550mm)
G. Arm Reach	31 7/16"- 44 7/8" (800mm~1140mm)
Lifting Capacity *	9000LBS(4090kg)
Motor	2.2KW、 110/220V、 60HZ

- * Lift capacity ratings are based on loads equally distributed on all four arms.
- ** Lifting and lowering speeds may vary depending on weight of vehicle.

VERTICAL CLEARANCE

Check the height of the area where the lift is to be installed. Clearance should be calculated based on the full raised height of the lift.



Failure by purchaser to provide adequate clearance could result in unsatisfactory lift performance, property damage, or personal injury.

FLOORING

Be certain you have the proper concrete floor to properly handle the loaded lift. Floor should be in generally good condition with no large cracks, spalling or deterioration.

Minimum requirements for concrete are 4 inches minimum depth, with steel reinforcement, 3500 PSI, cured for 28 days per local commercial practice.

Floor should be level within 3/8 inch over the installation area. No anchors should be installed within 8 inches of any crack, edge, or expansion joint. If these conditions cannot be met, pads can be poured to accommodate the lift.

Check with local building inspectors and/or permits office for any special instructions or approvals required for your installation.



Failure by purchaser to provide the recommended mounting surface could result in unsatisfactory lift performance, property damage, or personal injury.

ELECTRICAL REQUIREMENTS

For lift installation and operation for single phase units, it is necessary to have a dedicated circuit with a double pole 25 amp circuit breaker or time delay fuse.

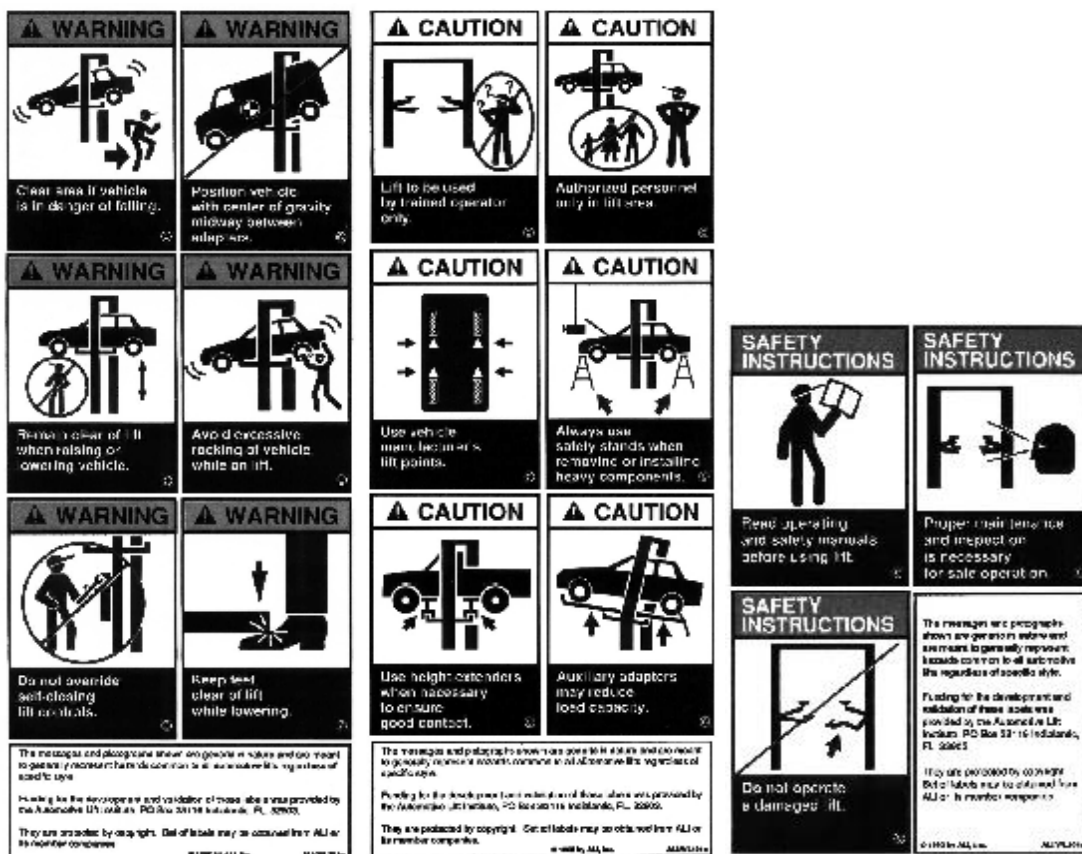
SAFETY NOTICES AND DECALS

For your safety, and the safety of others, read and understand all of the safety notices and decals included here.

READ ENTIRE MANUAL BEFORE ASSEMBLING, INSTALLING, OPERATING, OR SERVICING THIS EQUIPMENT.

PROPER MAINTENANCE AND INSPECTION IS NECESSARY FOR SAFE OPERATION.

DO NOT OPERATE A DAMAGED LIFT.



Safety decals similar to those shown here are found on a properly installed lift. Be sure that all safety decals have been correctly installed on the Power Unit reservoir. Verify that all authorized operators know the location of these decals and fully understand their meaning. Replace worn, faded, or damaged decals promptly.



Do not attempt to raise a vehicle on the lift until the lift has been correctly installed and adjusted as described in this manual.

RECEIVING

The shipment should be thoroughly inspected as soon as it is received. The signed bill of lading is acknowledgement by the carrier of receipt in good condition of shipment covered by our invoice. If any of the goods called for on this bill of lading are shorted or damaged, do not accept them until the carrier makes a notation on the freight bill of the shorted or damaged goods. Do this for your own protection.

NOTIFY our company AT ONCE if any hidden loss or damage is discovered after receipt.

Component Packing List

DESCRIPTION	QTY	DESCRIPTION	QTY
Power Column Ass'y	1	Synchronizer Cable	2
Idler Column Ass'y	1	Hydraulic Hose Pack	1
Floor-Plate Ass'y	1	Power Lock Cover	1
Arm Ass'y	4	Idler Lock Cover	1
		Hardware Box	1

INSTALLATION

IMPORTANT: Always wear safety glasses while installing lift.

TOOLS (MINIMUM REQUIRED)

- a. Banding Cutter
- b. Tape measure,
- c. Chalk line
- d. level
- e. adjustable wrench
- f. Standard open end wrenches
- g. Needle nose pliers
- h. Hammer drill with diameter carbide
- i. hammer
- j. Torque wrench
- k. Step ladder
- l. Anti-Seize lubricant (for arm pins)

LAYOUT

1. Layout the service bay according to the architect's plans or owners instructions. Be certain that the proper conditions exist.
2. Assemble column extension to column using M12×30 Hex bolt. Repeat for opposite column and extension.
3. Using the Overall Width(C) as a guideline, chalk two parallel on the concrete floor within 1/8 inch tolerance.
4. Determine the location of the Column Ass'y on either chalk line and mark the base plate dimension Overall Width(L) .

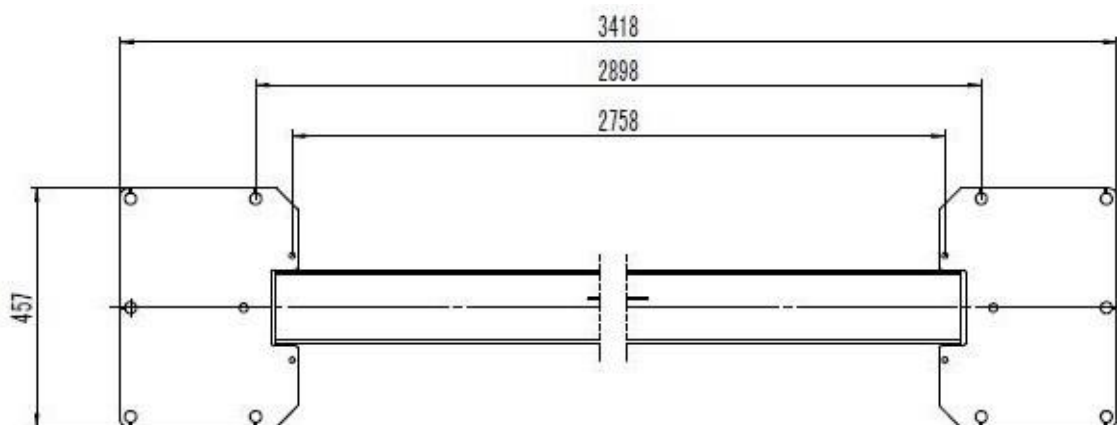


Fig 2 – Floor Plan

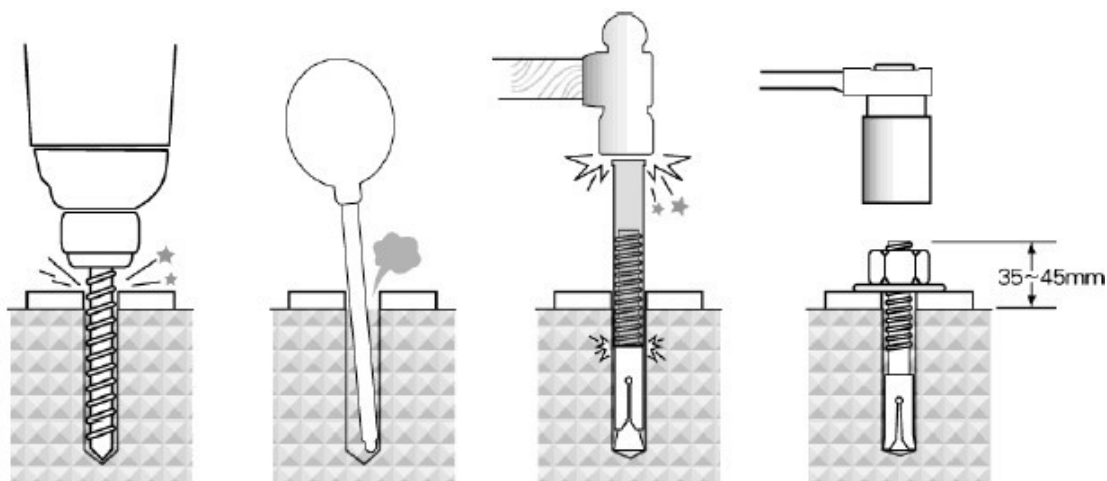


Fig 3



Be sure to stay within a 1/4 inch overall tolerance. This will eliminate any difficulty in final assembly or possible premature chain wear or misalignment.

The chalk line layout is very important. If it is not followed accurately problems may arise in final assembly and operation.

- Using a lifting device, Erect both column assemblies with the installation lines.

ANCHORING

- The anchor bolts must be installed at least 8 inches from any crack, edge, or expansion joint.
- Use a concrete hammer drill with a 5/8 inch carbide bit. Do not use excessively worn bits or bits which have been incorrectly sharpened. A core bit may be necessary if an obstruction is encountered. **Never substitute with shorter anchor.**
- Vacuum dust from the hole for proper holding power.
- Shim both columns to plumb using the shims provided. DO NOT shim more than 1/2" at any given point. Use a level no less than 24" in length to plumb columns.
- Assemble washer and nut to anchor with nut just below impact section of bolt. Drive anchor into hole until nut and washer contact base.
- Tighten power column anchors and recheck column for plumb. Reshim if necessary. Torque to 150 foot pounds to set anchors.



Never remove the lift before the columns Tightened by the anchor bolts.

FLOOR-PLATE

- Assemble floor-plate ass'y to floor.

SYNCHRONIZER CABLES

- Manually raise the carriages until each is located on the second lock position.
- Route synchronizing cables using Fig 4 and attach ends to carriages' joining using Fig's 5.
- Adjust cable tension by adjusting each cable's adjustment nuts. The cables should be tight with no slack. Each cable should be the same tension. Be sure as you are tightening the cables that they have remained in place over the pulleys. Failure to do this will result in damage to the cable.

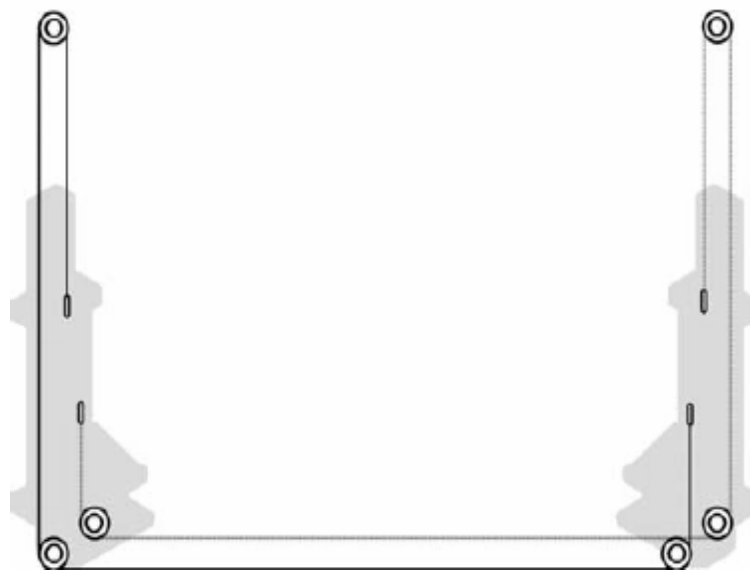


Fig 4- Cable Routing

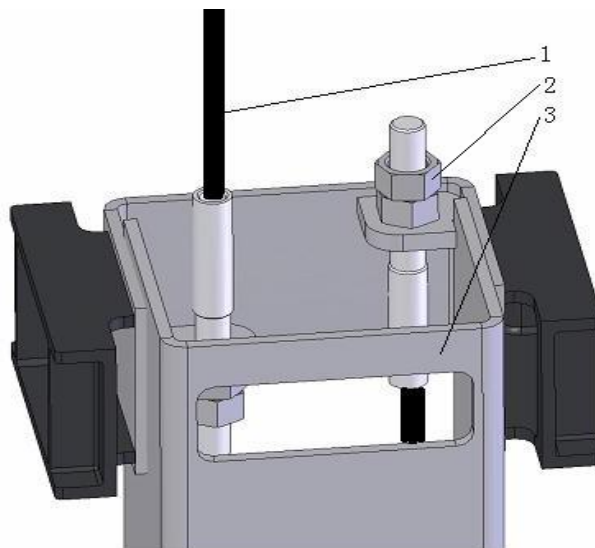


Fig 5- Attaching Cable



WARNING

Prior to operation of lift recheck equalizer cables making sure they are not crossed or routed improperly. Be sure the cables have remained in place over the pulleys.

POWER UNIT & HYDRAULIC HOSE

18. Mount Power Unit to power column as shown in Fig 6 The mounting hardware, M8 hex nuts, are pre-installed on power unit mounting bracket.

19. **IMPORTANT – To insure proper hose fitting seal without damage to the fitting follow this procedure for each hose connection:** Screw flared fitting on finger tight. Rotate flared fitting 1 1/2 hex flats (90 deg.). Back the flared fitting off one full turn. Again tighten flared fitting finger tight, then rotate flared fitting 1 1/2 hex flats (90 deg).

20. Thread power unit hydraulic hose into elbow on power unit. Route hydraulic hose from Idler column across floor plate ass’y to the Power Column.(Fig 6)

21. Once the Power Unit is secured, fill reservoir with #10 weight **HYDRAULIC OIL ONLY**. Care

should be taken to keep dirt or other contamination out of oil.

ARM INSTALLATION

22. Lubricate the arm pin or carriage arm pin hole with “anti-seize” and install the arms. Insure that the arm restraint gears engage and disengage properly. Arm restraints any binding occurs, insure that the large gear mounted to the arm has been factory installed tight against the arm pin.

FINAL ADJUSTMENTS

23. Lower the lift to the floor and raise the lift approximately one foot.
24. Start with Idler side first. Slowly and carefully loosen the bleed plug on top of the cylinder just enough to allow the entrapped air to escape. Repeat for power side.
25. Energize the power unit and raise 6 inches. Repeat previous step until no air comes out of cylinder.
26. Pressure test hydraulic system. Energize power unit, raise lift to full rise and continue to run motor for additional 10 seconds. (NOTE: pressure relief will make a high pitch squeal sound for these 10 seconds.) Check hydraulic system for leaks.
27. Energize power unit again for 10 seconds. With a clean rag, wipe down both cylinder rods. If lubricant is not wiped clean from the cylinder rod, the cylinder will appear to be leaking.
28. Cycle lift to insure that the latches operate simultaneously. Lower the lift onto the locks and insure that neither lock will wobble (it is possible for the carriages to appear to be resting on the locks when actually only one carriage is resting on its lock and the other carriage is being supported by the synchronizing cable).
29. Lower lift to the floor. Pull and release lock release handle while watching idler column lock. Adjust threaded sleeve cable adjuster nuts until idler column lock disengages and engages fully. When properly adjusted, the idler column lock should just come to rest against the back of the column when engaged and fully out against the tab when disengaged.

IMPORTANT: IF IDLER SIDE LOCK PAWL DOES NOT FULLY DISENGAGE, DAMAGE MAY RESULT TO IDLER SIDE CARRIAGE AND OR CABLE SYNCHRONIZING SYSTEM.

30. Tighten and trim wire ties.
31. Snap lock cover over each lock assembly.

OPERATION PROCEDURE

SAFETY NOTICES AND DECALS

This product is furnished with graphic safety warning labels, which are reproduced on page 3 of these instructions. Do not remove or deface these warning labels, or allow them to be removed or defaced. For your safety, and the safety of others, read and understand all of the safety notices and decals included.

OWNER/EMPLOYER RESPONSIBILITIES

The Owner/Employer shall insure that lift operators are qualified and that they are trained in the safe use and operation of the lift using the manufacturer’s operating instructions; Lifting it Right safety manual; American National Standard for Automotive Lifts-Safety Requirements for Operation, Inspection and Maintenance; ALI Uniform Warning Label Decals/Placards; and in case of frame engaging lifts, Vehicle Lifting Points/Quick Reference Guide for Frame Engaging Lifts.

The Owner/Employer shall establish procedures to periodically inspect the lift in accordance with the lift manufacturer's instructions, American National Standard for Automotive Lifts-Safety Requirements for Operation, Inspection and Maintenance; and the employer shall insure that the lift inspectors are qualified and that they are adequately trained in the inspection of the lift.

The Owner/Employer shall establish procedures to periodically maintain the lift in accordance with the lift manufacturer's instructions, American National Standard for Automotive Lifts-Safety Requirements for Operation, Inspection and Maintenance; and the employer shall insure that the lift maintenance personnel are qualified and that they are adequately trained in the maintenance of the lift.

The Owner/Employer shall maintain the periodic inspection and maintenance records recommended by the manufacturer, American National Standard for Automotive Lifts-Safety Requirements for Operation, Inspection and Maintenance.

LIFTING A VEHICLE

- 1) Insure that the lifting arms are parked, out to full drive thru position.
- 2) Position the vehicle in the service bay so that the vehicle's center of gravity is on a line between the two columns, and so the vehicle is centered between the two columns.

DO NOT ATTEMPT TO LIFT THE VEHICLE WITH ONLY TWO ARMS, AS THIS WILL VOID THE WARRANTY

INSURE THAT THE HIGHEST POINT ON THE VEHICLE WILL CONTACT THE OVERHEAD LIMIT SWITCH BAR

DO NOT PLACE THE VEHICLE IN THE SERVICE BAY BACKWARDS.

- 3) Position the arms and adapters so all four pads contact the vehicle simultaneously.

The vehicle should remain level during lifting.

- 4) Raise the lift until all four wheels are off the ground. Test the stability of the vehicle by attempting to rock the vehicle. Check adapters for secure contact with vehicle lift points. If the vehicle seems unstable, lower the lift and readjust the arms. If the vehicle is stable, raise the vehicle to a height a few inches above the desired working height.
- 5) Lower the vehicle until the safety latches on both columns engage. The vehicle should remain level when both latches are engaged. If one side engages and the other continues to descend, stop lowering the vehicle, raise it several inches, and try again to engage both latches.

Always lower lift into locks before entering the area beneath the vehicle.

Always use safety stands when removing or installing heavy components.

LOWERING A VEHICLE

- 1) Insure that the area under the vehicle is clear of personnel and tools.
- 2) Raise the vehicle until both latches are free.
- 3) Disengage the latches by pulling down and holding the lock release lever.
- 4) Lower the vehicle by depressing the lowering valve handle.
- 5) Continue to lower the vehicle until the carriages stop against the base plate. Retract the extension arms, and park them.

MAINTENANCE

To avoid personal injury, permit only qualified personnel to perform maintenance on this equipment. The following maintenance points are suggested as the basis of a preventive maintenance program. The actual maintenance program booklet for periodic inspection checklist and maintenance log sheet.

- 1) If lift stops short of full rise or chatters, check fluid level and bleed both cylinders per Installation Instructions.
- 2) Replace all Safety, Warning or Caution Labels if missing or damaged (See Installation instructions page 3.)

Daily

- 1) Keep lift components clean.
- 2) Check for loose or broken parts.
- 3) Check hydraulic system for fluid leaks.
- 4) Check adapters for damage or excessive wear. Replace as required with genuine Lifts parts.

Weekly

- 1) Check synchronizer cables and sheaves for wear. Replace as required with genuine Lifts parts.
- 2) Check lock release cable adjustment per Installation Instructions.

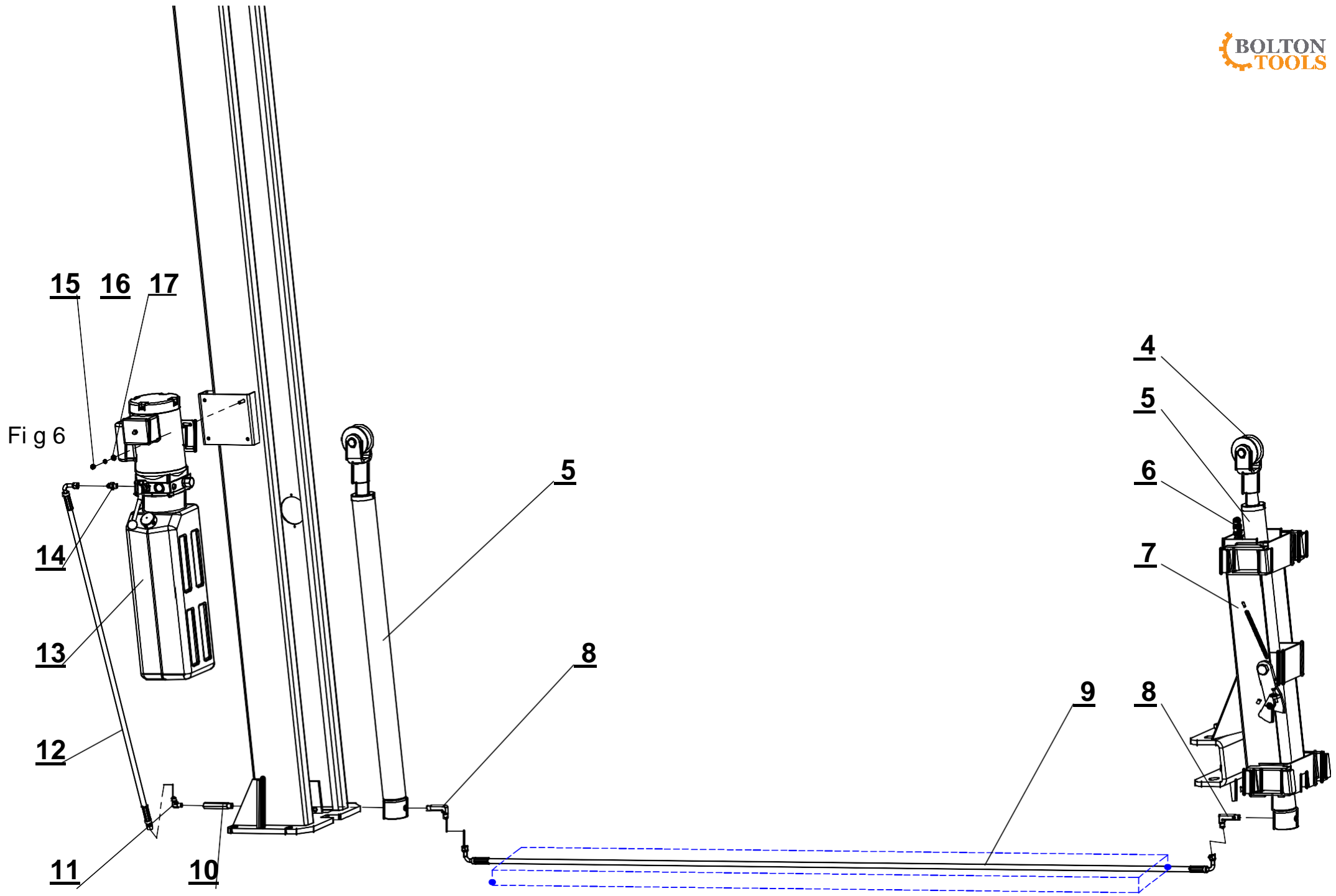
IMPORTANT: IF IDLER SIDE LOCK PAWL DOES NOT FULLY DISENGAGE, DAMAGE MAY RESULT TO IDLER SIDE CARRIAGE AND OR CABLE SYNCHRONIZING SYSTEM.

- 3) Check synchronizer cable tension per Installation Instructions. Adjust if necessary.

Monthly

- 1) Torque concrete anchor bolts to 80 ft-lbs.
- 2) Check overhead shutoff switch. While raising lift, operate overhead shutoff bar. Power Unit motor should stop when bar is raised.
- 3) Lubricate carriage slide tracks with heavy viscous grease. (Grease all (4) corners of both columns.)

If any problems are encountered, contact your local service representative.



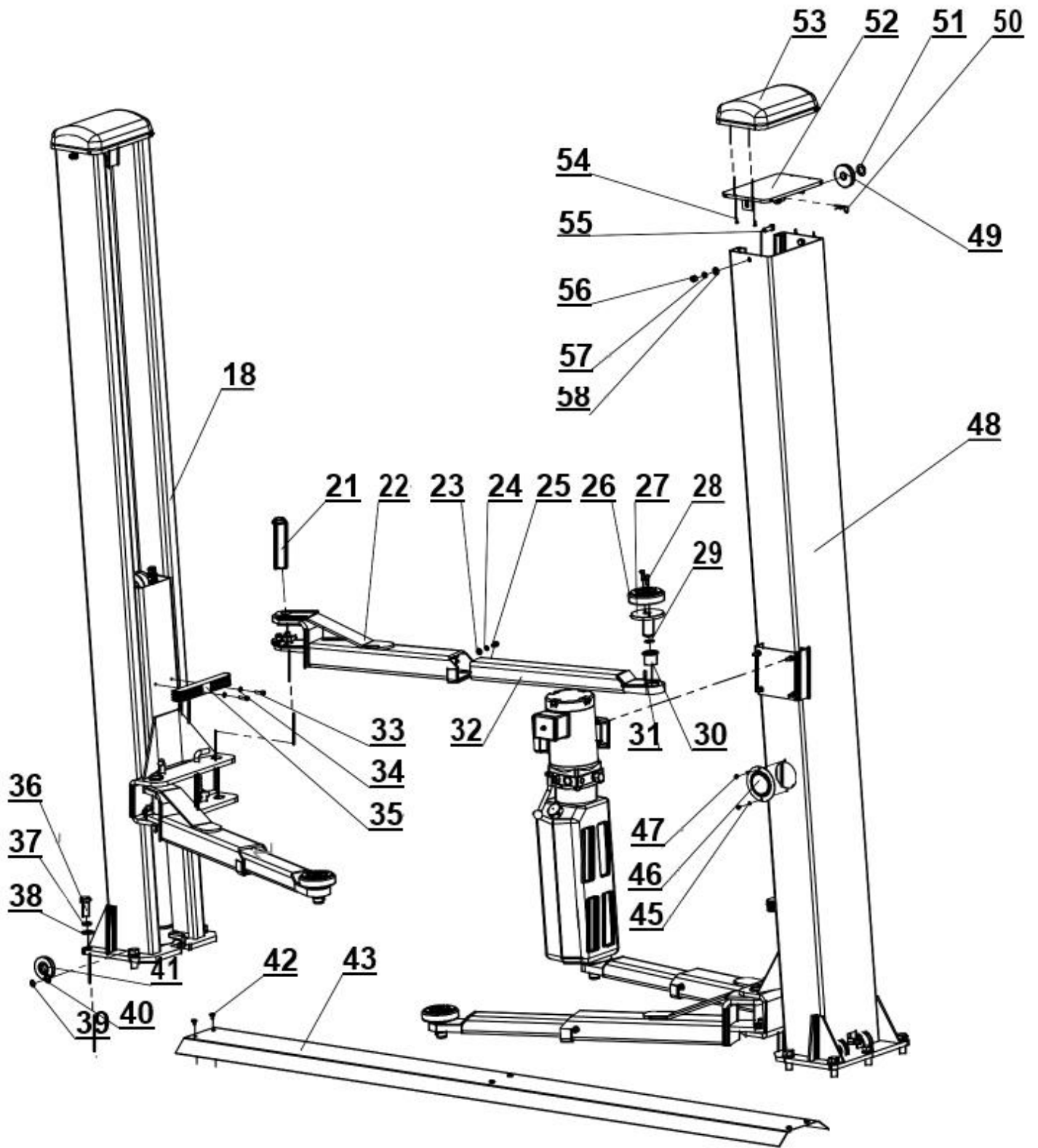


Fig 7

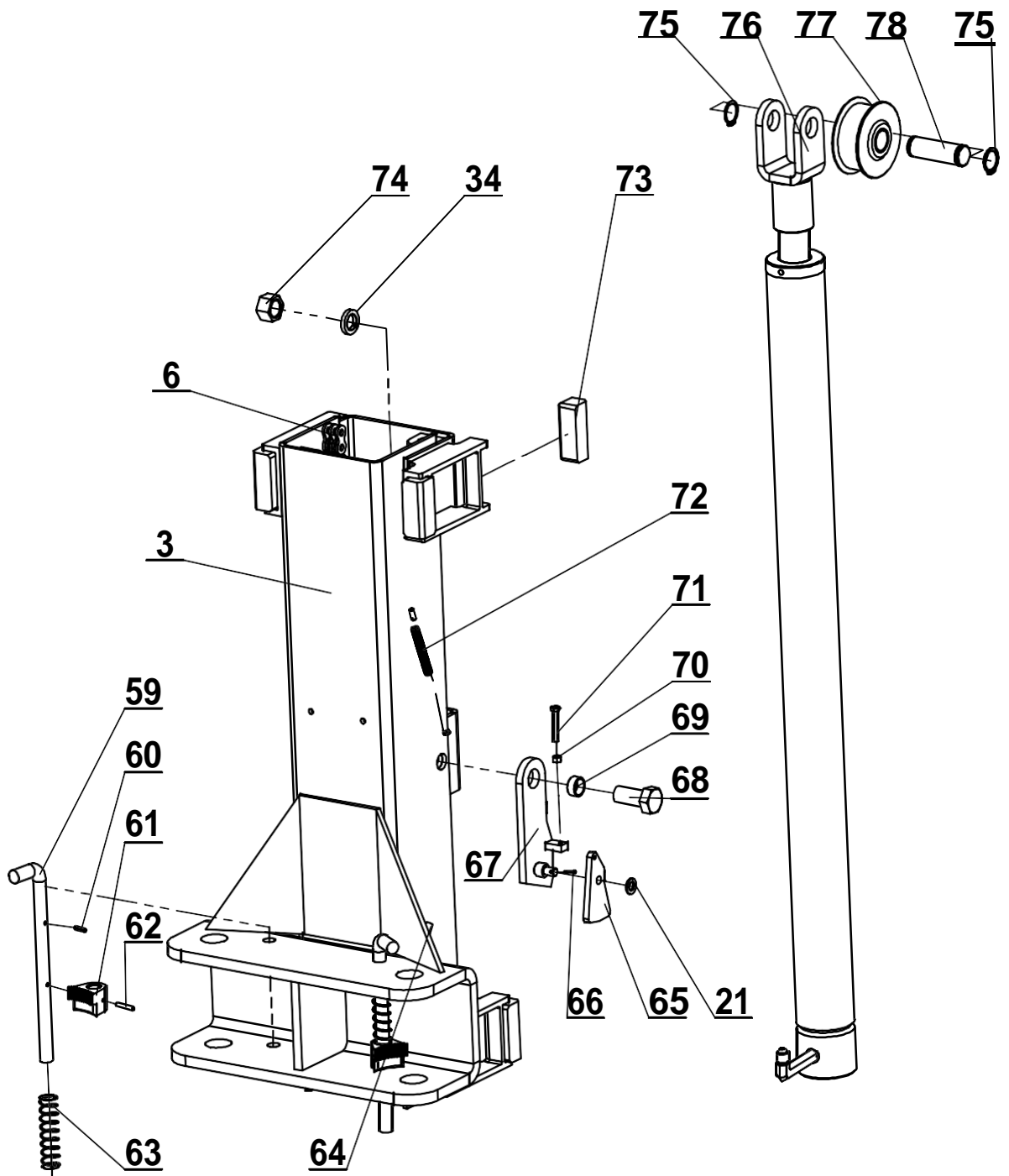


Fig 8

PARTS LIST



NO.	Code	DESCRIPTION	QTY	NO.	Code	DESCRIPTION	QTY
1	20	SYNCHRONIZER CABLES	2	41	10	PULLEY WHEEL	4
2	GB/T 41-2000	NUT M16	8	42	GB/T 818-2000	SCREW M8*12	6
3	03	LIFT ARM WELD(JSW4C)	2	43	24	FLOOR PLATE ASSY	1
	03	LIFT ARM WELD(JSW4B)			24	FLOOR PLATE	
4	17	CHAIN WHEEL	2	45	GB/T 93-2000	SPRING WASHER 6	2
5	21	CYLINDER	2	46	25	ROUND LID	1
6	GB/T6074-95	CHAIN	2	47	GB/T 818-2000	SCREW M6*8	2
7	03 (总)	LIFT ARM ASSY(JSW4C)	2	48	01 (主)	POWER COLUMN WELD	1
	03 (总)	LIFT ARM ASSY(JSW4B)			01 (主)	POWER COLUMN WELD	
8	22	45° CONNERCTOR	2	49	09	ASCENDING PULLEY WHEEL	2
	30	CYLINDER CONNERCTOR			50	GB/T 894.1-2000	
9	26	LONG VITTA(JSW4)	1	51	11	WASHER 22	2
	26	LONG VITTA(JSW4B)			52	02	
10	23	CYLINDER CONNERCTOR	1	53	28	PLASTIC COVER	2
11	22ch	VITTA CONNERCTOR	1	54	GB/T 845C-1985	SCREW ST4.8*16	8
12	30	POWER TUBING	1	55	GB/T 5781-2000	BOLT M12*35	4
13	DYBN	POWER UNIT	1	56	GB/T 41-2000	NUT M12	4
14	18	VITTA CONNERCTOR (1)	2	57	GB/T 93-2000	SPRING WASHER 12	4
15	GB/T 41-2000	NUT M8	4	58	GB/T 95-2000	WASHER 12	4
16	GB/T 93-2000	SPRING WASHER 8	4	59	12	ARM RESTRAINT PIN	4
17	GB/T 95-2000	WASHER 8	4	60	GB/T 879.2-2000	SPRING PIN 4*18	4
18	01 (副)	IDLER COLUMN WELD(JSW4)	1	61	12	OUTER GEAR	4
	01 (副)	IDLER COLUMN WELD(JSW4B)			62	GB/T 879.2-2000	
19	03-12	BAFFLE PLATE	2	63	14	ARM RESTRAINT SPRING	4
20	GB/T 818-2000	BOLT M6*10	4	64	08	RELIEVE WIRE ROPE	2
21	07	HOLDER PIN	4	65	06	RELIEVE LOCK SLICE	2
22	15-01	BACK HOLDER	4	66	GB/T 91-2000	SPRING PIN 2.5*16	2
23	GB/T 95-2000	WASHER 10	12	67	04	LOCK SLICE WELD	2
24	GB/T 93-2000	SPRING WASHER 10	8	68	GB/T 5783-2000	BOLT M20*45	2
25	09-08	SCREW M10*16	8	69	05	SPACE SLEEVE	2
26	15-05	SADDLE PAD	4	70	GB/T 41-2000	NUT M6	2
27	15-04-00	FLEXIBLE SADDLE	4	71	GB/T 5781-2000	BOLT M6*40	2
28	GB/T 70.1-2000	SCREW M8*20	8	72	08-19	SPRING	2
29	GB/T 895.2-2000	STEEL RING 30	4	73	08-15	SLIDE BLOCK	16
30	15-03	SLEEVE	4	74	GB/T 6170-2000	NUT M20	2
31	GB/T 879.4-2000	SPRING PIN 6*30	4	75	GB/T 894.1-2000	STEEL RING 25	4
32	15-02	BACK ARM	4	76	17-01	CHAIN WHEEL BASE WELD	2
33	GB/T 70.1-2000	SCREW M8*30	4	77	19	CHAIN WHEEL	2
34	GB/T 848-2000	WASHER 8	4	78	18	CHAIN AXES	2
35	05	BUMP SHIELD BLOCK	2	79			
36	GB/T 5781-2000	BOLT M20*50(JSW4B)	10	80			
37	GB/T 93-2000	SPRING WASHER 20	2/12	81			
38	GB/T 95-2000	WASHER 20(JSW4B)	10				
39	GB/T 894.1-2000	STEEL RING 16	4				
40	31	WASHER 16	4				