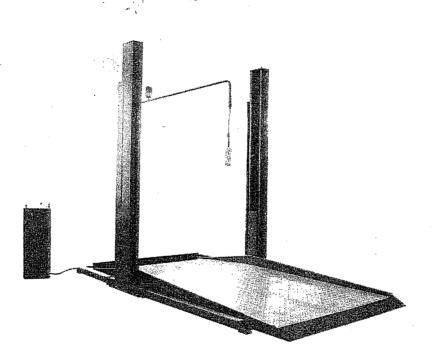
# AUTOMOBILE STACKER

## Instructions and Maintenance Manual

FOR AUTOMOBILE STACKER



#### Content

Instructions and Maintenance Manual	
PACKING, TRANSPORT AND STORAGE	
1 Abstract	
2 Uses	7
3 Important Technical Reference	7
4 Installation and Adjustment of the Equipment	8
5 Use and Operation	
6.1 Maintaining Cleanliness	14
6.2 Regular Check-ups	
6.3 Maintenance of the Hydraulic System	15
7 Troubleshooting	15
8 Important Information for the User	17
8.1 Important Information Regarding Purchase of the Machine	17
8.2 EC DECLARATION OF CONFORMITY	
Details of product(s):	18
Type designation/trademark: QYK-SZL30	18

#### PACKING, TRANSPORT AND STORAGE

ALL PACKING LIFTING, HANDLING, TRANSPORT AND UNPACKING ORERATIONS ARE TO BE PERFORMED EXCLUSIVELY BY EXPERT PERSONNEL WITH KNOWLEDGE OF THE LIFT AND THE CONTENT OF THIS MANUAL.

#### **PACKING**

The lift is shipped disassembled into following parts:

Weight (kg)

1. Complete vehicle body

1180kg

2. The rests parts including hydraulic station, washer and so on.

80kg

The gross weight of the life is 1260kg.

#### LIFTING OPERATING

The pack boxes may be lifted and moved with a lift truck (fig.1 andFig.2). If either of the latter two are used, boxes must be harnessed with at least 2 slings.

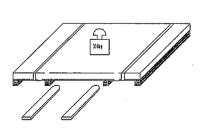


Fig. 1

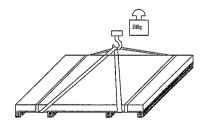


Fig. 2

#### **STORAGE**

Pack boxes always be kept in a covered ,protected place ,at a temperature between -10°And +40°And must not be exposed to direct sunlight and must not be caught in the rain.

#### **STACKING**

The type of packing allows the possibility of stacking up 5 cases.

Up to 5 cases may be stacked upon the other lorries or in containers if property positioned and provided they are restrained to prevent falling.

#### **OPENING**

When the crates arrive. Check that the machine has not been damaged during transport and that all parts listed are present ,the crates must be opened using all possible precautionary measure to avoid damaging the machine or it is parts ,make sure that parts do not fall from the crate during opening.

#### \*INTRODUCTION WARNING

This manual has been prepared for workshop personnel expert in the use of the lift (operator) and technicians responsible for routine maintenance (maintenance fitter):read the manual before carrying out any operation with the lift and /or the packing .This manual contains important information regarding:

THE PERSONAL SAFETY OF operators and maintenance works

#### LIFT SAFTY

#### THE SAFTY OF LIFTED VECHILES

3000kg

Express the rated load is 3000kg, don't allow the lift load weigh excess

3000kg.



This symbol express attention should be taken for electrical hazards

This symbol expresses connection to the ground on the earth wire of the electrical box.

Operation instruction

This symbol is on the side of motor

#### CONSERVING THE MANUAL

The manual is an integral part of the lift .which it should always accompany even if the unit is sold. The manual must be kept in the vicinity of the lift in an easily accessible place

so that the operator and maintenance staff must be able to locate and consult the manual quickly at any time.

ATTENTION AND REPEATED READING OF CHAPTER 3, WHICH CONTAINS IMPORTANT INFORMATION AND SAFTY WARNINGS IS PARTICULARLY RECOMMENDED.

Lift rack has been designed and built in compliance with the following:

**OPERATOR:** person authorized to use the lift.

MAINTENANCE FITTER: person authorized for routine maintenance of the lift.

The end user can only use the machine in correct way as defined in instruction. Loose clothes shall not be used protection cap shall also be used for long hair person, etc.

Lubricate the machine periodically according to the manual.

## IMPORTANT SAFETY INSTRUCTIONS

- Read and understand all safety warning procedures before operating equipment.
- 2. Keep hands and feet clear. Remove hands and feet from any moving parts. Keep feet clear of lifting when lowering. Avoid pinch points.
- 3. Keep work area clean. Cluttered work areas invite injuries.
- 4. Never allow untrained operators to use this equipment. Only trained users should operate this equipment. All non-trained personnel should be kept away from work area. Never let non-trained personnel come in contact with, or operate equipment.
- 5. Use correctly. Use lift in the proper manner. NEVER exceed rated capacity. NEVER use lifting adapters other than what is approved by the manufacturer.
- 6. Do not override self-closing lift controls.
- 7. Remain clear of lift when raising or lowering vehicle.
- 8. Clear area if vehicle is on danger of falling.
- 9. Always insure that the safeties are lowering vehicle.
- 10. Dress properly. Non-skid steel-toe footwear is recommended when operating lift.
- 11. Guard against electric shock. This lift must be grounded while in use to protect the operator from electric shock.

- 12. Danger! The power unit used on this lift contains high voltage. Disconnect power at the receptacle before performing any electrical repairs. Secure plug so that it cannot be accidentally plugged in during service.
- 13. Warning! Risk of explosion. This equipment has internal arcing or sparking parts which should not be exposed to flammable vapors. This machine should not be located in a recessed area or below floor level.
- 14. Maintain with care. Keep lift clean for better and safe performance. Follow manual for proper lubrication and maintenance instructions. Keep control handles and/or buttons dry, clean and free from grease and oil.
- 15. Stay alert. Watch what you are doing. Use common sense. Be aware.
- 16. Check for damaged parts. Check for alignment of moving parts, breakage of parts or any condition that may affect its operation. Do not use lift if any component is broken or damaged.
- 17. Never remove safety related components from the lift. Do not use lift if safety related components are damaged or missing.

#### 1 Abstract

The Two Post Parking Lift is a product of our research and development division: a double-cylinder. Its special features include a lifting capacity of 3175kg; Hydraulic pulling system with a hydraulic control activator providing power; power supplied by oil cylinders installed in its columns; hydraulic cylinder's reciprocating moving makes synchronized chains pulling action and slide unit movement; an electric safety locking system that backs off the lift when activated; one-way and two 2-passage exchange valves in the hydraulic system; and a hydraulic cylinder that freely positions and locks itself. It saves parking space by using the lift.

#### 2. Uses

The kind of product is used to lift vehicles that the weight is less than 3000kgs.

#### OTHER USAGES ARE PROHIBITED.

### 3. Important Technical Reference

Lifting Capacity	3000kg
Lifting Height	2160mm
Lifting time	55s
Total height	≤3323mm
Total width	2641mm
Platform width	2194mm
Platform length	≤4000mm
Motor2.2	
Rise time with three-phase motor	≤75s
Rise time with single-phase motor	≤75s
Descent time	18s≤t≤60s
Noise	≤70dB (A) 1m
Operating temperature	10/+50°C
Relative humility	

## 4. Installation and Adjustment of the Equipment

- **4.1** Installation should be carried out by trained employees of the manufacturing company.
- **4.2** The installation site should have 220V and 60Hz 1-phase power supply.
- **4.3** The incoming line should have 20A safety installation and a power supply switch. The minimum wire section area is 2.5 square millimeters.
- **4.4** The lift's foundation has the following requirements: the concrete should not be lower than **250 grade**; the area of the foundation should be **2785mm long ×4095mm wide ×** >250mm thick. (See Fig. 2)

### 4.5 Installation Steps

**4.5.1** When the concrete has solidified at the proper thickness, put down the two columns, put the platform between the two columns (see Fig.1), install the connecting wire and synchronized chains (see Fig 3, 4, 5). Check and measure the dimensions and move into the proper place as requests and then rise up the two columns. After ensuring that the columns and floor are perpendicular, use steel plates and concrete to fill in any gaps between the base plate and floor. Use M18\*160 anchor bolts to secure the base plate.

# Caution: must ensure columns should be installed stably to avoid any damage occurring.

- **4.5.2** Adjust nuts on the top of chains, and adjust the tension in the chains so that they are in the best position.
- **4.5.3** Connect the hydraulic system pipeline. (Fig 1, 6)
- 4.5.4 Add the oil: 12 Liters of Hydraulic Oil. N46 in summer, N32 in winter.
- **4.5.5** Lubricate the sliding blocks and grooves. (Use Formula 2 Grease)
- 4.6 Test for problems

#### **4.6.1** Preparing the vehicle.

Before trying goods on the lift, give the equipment a thorough check. Check that all connections are tight and reliable. Make sure the levers operate smoothly and that the ends of the hydraulic pipes are fastened securely. Check that the power source is adequate, and that the ground wire is reliable. The generator should turn in a direction consistent with that of the gear pump. When the "up" and "down" buttons are pressed on the operating lever, the two magnets in the columns should be moving together.

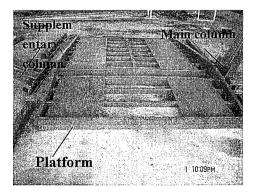
### 4.6.2 Operation with an Empty Load

Check that the two sliding blocks are moving together and meet requirements. Regulate the tension in the chains so they meet requirements. The core axle line in the hydraulic cylinders should be equal to the core axle line in the columns (if not, adjust). The movement of the sliding blocks should be normal. The hydraulic pipeline should be free of leakage. The locking installation should be normally regulated, without any obstructions. Raise and lower two times.

**4.6.3** If all is working order with an empty load, move a car onto the lift. Repeatedly raise and lift the vehicle, first bringing it to about 1000mm, checking each working part of the lift and adjusting as needed. If everything is up to standard, raise the lift to a fixed height and lower, and then repeat.

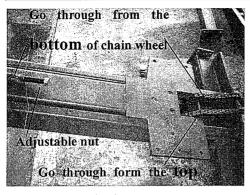
NOTE: After the lift has been installed a debugged, it can be used for normal operation.

1. Putting down the two columns and putting the platform between the two columns

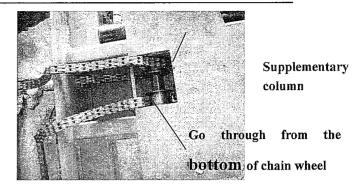


## 2. Connecting the synchronization chains

Go through form the

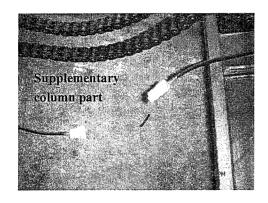


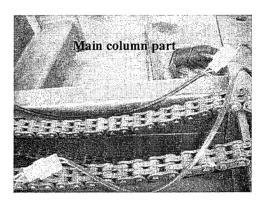
Main column



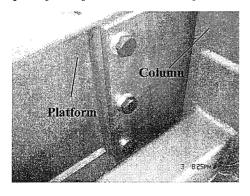
of chain wheel

3. Connecting wires (with quick coupler)

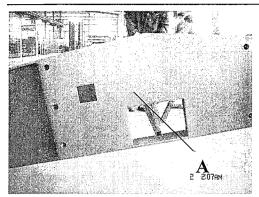




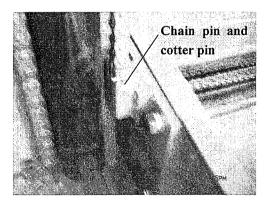
4. Check and measure the dimensions and move into the proper place as requests and then raise up the two columns

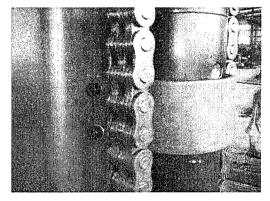


5. Put the connected wires into the A position.

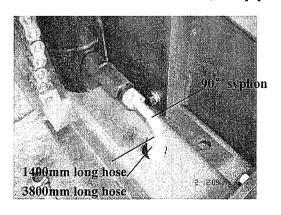


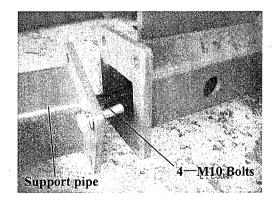
- Adjust nuts on the top of chains, and adjust the tension 6, in the chains so that they are in the best position.
- 7、 Install cylinders and driving chains

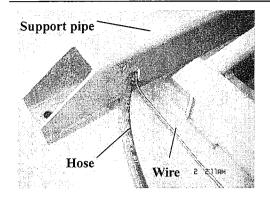


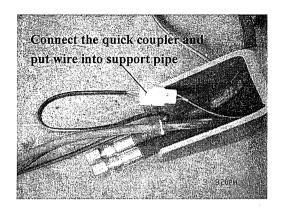


#### Connect hoses, support pipe and limited switch 8

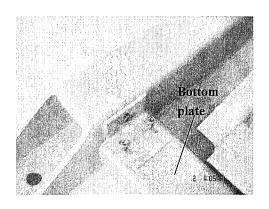


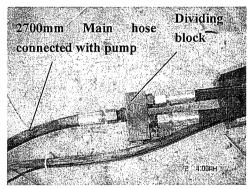




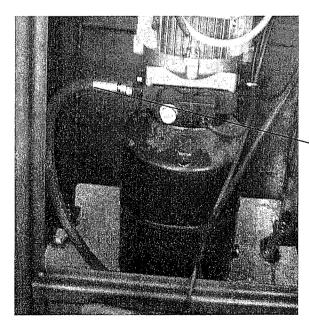


## 9. Cover the bottom plate and tighten the screws



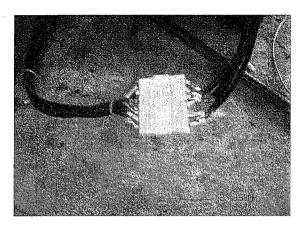


## 10. Connect the main hose and pump



Main hose

#### 11、 Connect electric wires between pump and equipment



### 5 Use and Operation

Preparation: drive the car onto the lift, lock it by handbrake, put non-slip mat on it.(user prepares it)

#### 5.1 Raising

With the power source connected, turn '0' position to '1' position, hit the "up" button and raise the vehicle.

### **5.2** Stopping

Loose the lift 'up' button and allow the lift to stop.

### 5.3 Parking

Press "Parking" button, jog in several seconds until it locks. Prohibit to press the

## button in long time to avoid the chains loosing.

## **5.4** Lowering

Jog the "Up" button and then press the 'DOWN' button to descend the lift. The motor also stop working.

## **5.5** E-stop

Once meet emergent accidents, press the red E-stop button to cut off power. If need to restart machine just need to press the E-stop button. After usage lock up the main switch (turn("1" position to "0" position).

### Pay Attention during Operation:

★Before lowering the lift you MUST raise the lift at least 2" in order to Clear the safety locks. Fail to do so may cause one side of the lift to "hang up" on descent making the lift unstable and may cause personal injury or death

★When drive car on the lift or drive away should keep the car axes synchronizing with the lift axes. Avoid any damage of lift due to inclining to one side.

★When the vehicle leaves the ground (100-150mm), rock the car a bit checking that lift is safe to operate.

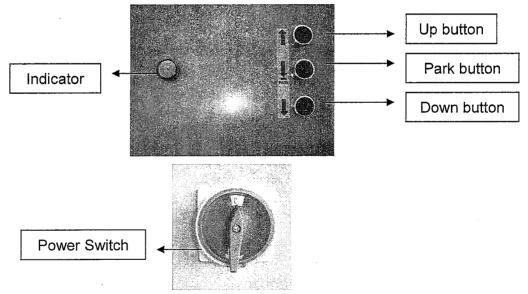
★During the lift operation no one are allowed to stay under the lift or around it.

★When lifting a certain height must keep the lift in locking position and then the other car can be driven in.

★Each week check each of the movable parts, lubricate the sliding blocks and ensure that the operating parts are lubricated and positioned properly.

★Bring the lift collar to its lowest position, checking the oil in the oil tank. Make sure the tank is filled 80% of the way.

★ If meet any troubles unsettled please inform us to get some supports and helps.



#### 6. Maintenance and Care

## 6.1 Maintaining Cleanliness

The lift should be frequently wiped down to maintain cleanliness. Before wiping, first cut the power supply.

The work area about the lift should be swept up. If large amounts of dirt should accumulate, this will accelerate the rate of wear-and-tear on the machine and reduce its

natural life span.

## 6.2 Regular Check-ups

- **6.2.1** Check the safety features of the lift every day before work. The magnets should be operating normally, the locking plate should be in position, the mounting plate of the lift collar should be free of damage, etc. If you discover something abnormal, make prompt adjustments, repairs or changes
- **6.2.2** Every day, check that the space between the collar chain and the hydraulic cylinders is correct. Check if the flat-ranged chain and the nut connecting it to the collar have become loose or detached.

## 6.3 Maintenance of the Hydraulic System

### 6.3.1 Cleaning, Oil Change

Three months after the first full usage of the lift, clean out the oil tank and change the oil. Once per year afterwards, clean the hydraulic system and change the oil.

#### 6.3.2 Replacing the Seals

After the lift has been used for a period of time, if you discover any oil leakage, make a thorough inspection. If the leakage is due to from wear of the seals, then replace parts immediately following regulations.

### 7 Troubleshooting

Traubla	Carras	Solution
Trouble	Cause	Solution

	710 : 01110 Dilling 0 : 10 : 10 : 10 : 10 : 10 : 10 : 10 :			
In mod	Generator does not work	The power source or power equipment is malfunctioning	Check the power source and other electrical components, check fuses	
	In working mode, the collar automatically	Pistons have lost effectiveness	Fix the pistons	
		Pipes are leaking oil	Change the seals and tighten the nuts on the connection	
	lowers	Seals on the hydraulic cylinders have lost effectiveness	Change the seals	
	The hydraulic system makes abnormal sounds	The oil filter is stopped up	Clean the oil filter	
		Air has entered the hydraulic system	Lift the collar to max height, keep it there for 2-3 seconds	
	The collar creeps when raising and lowering	The space between the sliding blocks and columns are not lubricated	Add lubrication	
		The space between the sliding blocks and the columns is too narrow	Select sliding blocks that will leave between a 1.5 and 2.5mm gap between the blocks and column	

## 8 Important Information for the User

# 8.1 Important Information Regarding Purchase of the Machine

Before purchasing this lift, make sure you clearly understand the product's use, feature, safety conditions, operation adjustments, etc. If there are any quality problems during shipping, installation or maintenance, please promptly contact the manufacturing company or a specializing agency.

#### EC DECLARATION OF CONFORMITY

Manufacture name: YINGKOU QISHIDA MACHINERY EQUIPMENT CO., LTD

Address: 39#, No.2 Street of Yuanjiao, Xishi Dist., Yingkou City, Liaoning Province, 115004, P. R. China

Tel: 0417-4896661, Fax:0417-4896661

Website: www. ykgsd. com

Email: Qishida co@126.com

The undersigned declares that the described products meet the essential requirements of the below mentioned standards as based on machinery directive and low voltage directive.

The item of equipments, which identified below, has been subject to internal manufacturing checks with monitoring of the final assessment by CCQS UK Ltd, 10 Nursery Close, Headington, Oxford, OX3 7AG, UK

Certificate No.: CE-C-0331-08-24-01-5A, Technique file: TF-YKQSD-0331-08-02

#### Details of product(s):

Product: Parking lift

Type designation/trademark: QYK-SZL30

#### Related directives:

98/37/EC Machinery Directive 2006/95/EC Low Voltage Directive (LVD) 2004/108/EC Electromagnetic Compatibility (EMC) Directive

#### Regulations applied according to harmonize standards:

EN 12100-1/-2:2003, EN60204-1:2006, EN1050:1997, EN1088: 1995/A1:2007, EN954:1997, EN349:1993, EN294:1992, EN982:1997, EN1037:1995, EN811:1997, EN14010:2003, EN 61000-6-2/-4: 2005

Signed on behalf of the manufacturer

Name

: AN Yuqi

Position

: President

Place / date

: Yingkou/July, 2008

Signature

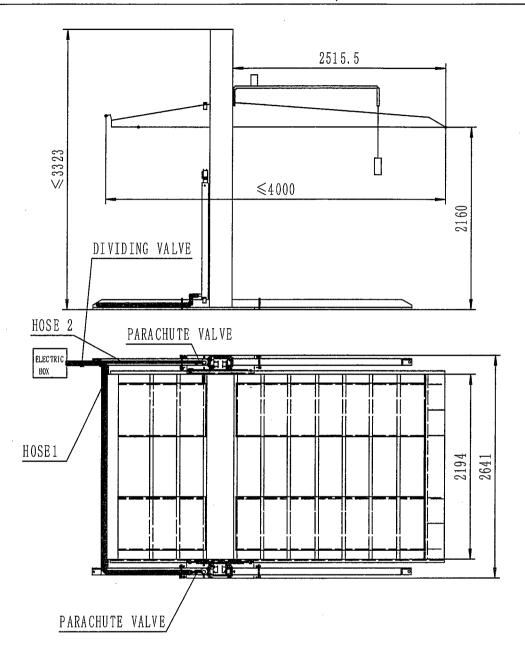
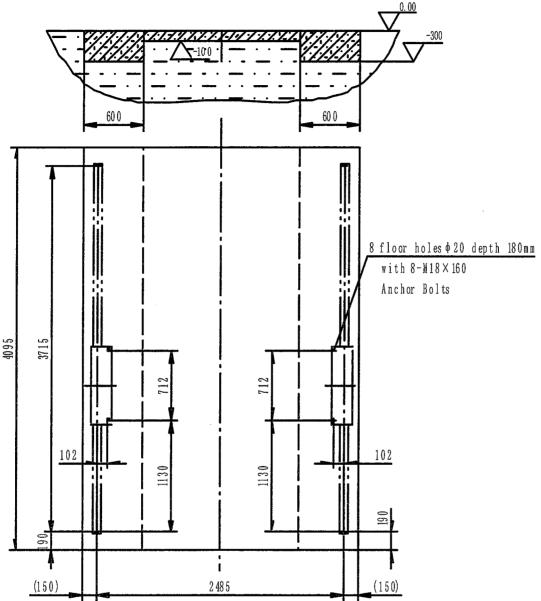


Fig.1



Note:

- 1. Cement, Cracked Stone, Sand mixture should be in the proportion 1:3:5
- 2. Cement: #350
- 3. Minimum Hardening Time: 20 days.
- 4. Pour the mortar once, leave no holes.

Fig.2

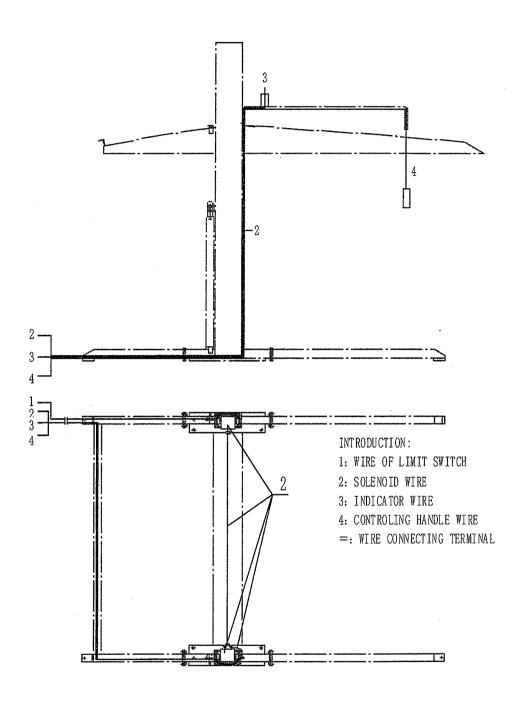


Fig.3

#### **ELECTRICAL SYSTEM**

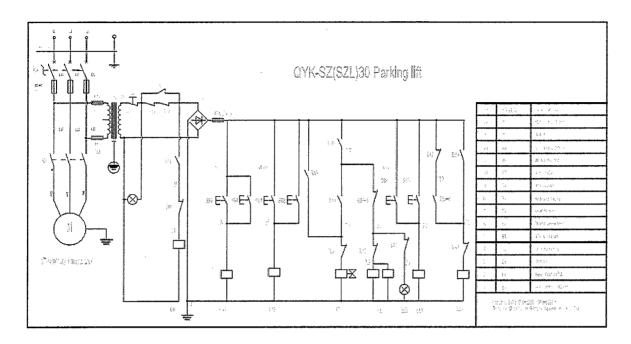


Fig.4

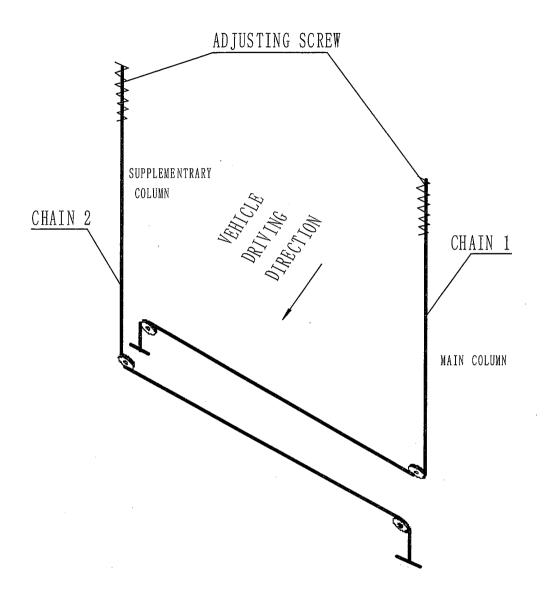


Fig.5

Tel:+86-417-4896663 Fax:+86-417-4896667

#### HYDRAULIC SYSTEM

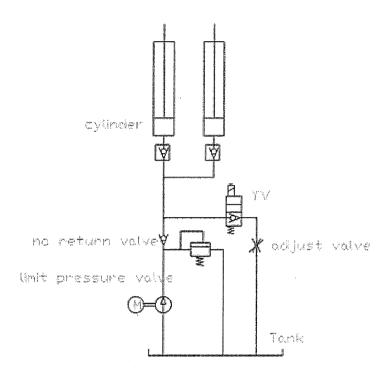


Fig.6

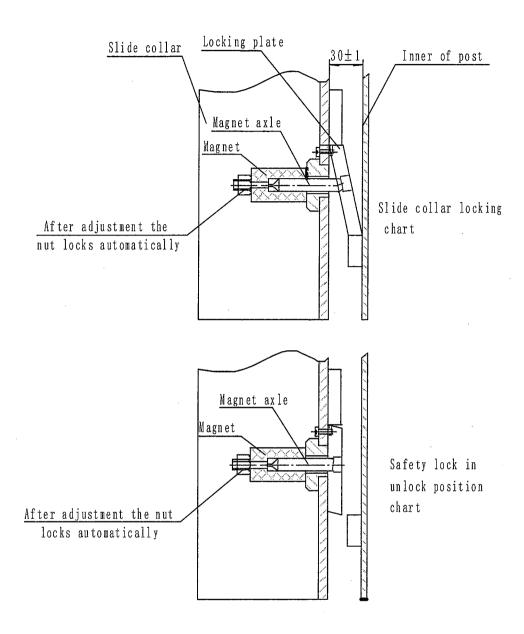


Fig.7 mechanical locking