

ATLAS TC589X TIRE CHANGER

OWNER'S MANUAL



INDIANA

GREG SMITH EQUIPMENT SALES INC. 5800 MASSACHUSETTS AVE. INDIANAPOLIS, IN 46218

PHONE: (800) 262-1950 FAX: (317) 542-1448

DELAWARE

GREG SMITH EQUIPMENT, INC. 250 EXECUTIVE DRIVE, SUITE 1 NEWARK, DE 19702

PHONE: (800) 715-1950 FAX: (302) 894-9136

GEORGIA

GREG SMITH EQUIPMENT SALES INC. 5405 BUFORD HWY. NORCROSS, GA 30071

PHONE: (800) 768-4104 FAX: (678) 781-0149

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TECHNICAL SPECIFICATIONS

ITEM	DESCRIPTION
Electric Requirements	120volt 60 Hz 1ph
Max. Wheel Diameter	
Max. Wheel Width	15" (380mm)
Outside Clamping – Rim Sizes	
Inside Clamping – Rim Sizes	
Max. Bead Breaker Opening	13" (330mm)
Max. Inflation Pressure	
Bead Breaker Force	
Max. Rotating Torque (Turntable)	795 ft·lbs (1078N·m)
	<70dB
Overall Dimensions (L×W×H)	60"×60"×84" (1524mm×1524mm×2146mm)
Net Weight	

THE MANUFACTURER RESERVES THE RIGHT TO CHANGE PRODUCT SPECIFICATIONS WITHOUT NOTICE.

PICTURES OF PRODUCTS IN PICTORIAL GUIDE MAY NOT BE PICTURES OF THE ACTUAL PRODUCT RECEIVED. GENERAL OUTLINED ASSEMBLY PROCEDURES ARE ACCURATE.

GENERAL SAFETY WARNINGS

Keep this manual in a safe place. The manual contains valuable information regarding the safe operation and maintenance of your equipment. The manual contains parts information that will help to identify tire changer parts if replacement parts are needed.

The manufacturer or distributor is not responsible for any personal injury, machine damage, or collateral damage that results from improper use of this machine. Please read and understand this manual BEFORE you begin operation of the tire changer. Improper use of the tire changer will void manufacturers and distributors warranty.

READ AND UNDERSTAND THIS MANUAL BEFORE ATTEMPTING TO USE YOUR NEW TIRE CHANGER.

- 1) THIS TIRE CHANGER OPERATES ON COMPRESSED AIR AND ELECTRICITY. YOU MUST DISCONNECT THE TIRE MACHINE FROM BOTH POWER SOURCES BEFORE ATTEMPTING TO INSTALL, REPAIR, OR MAKE ADJUSTMENTS TO THE TIRE CHANGER. COMPRESSED AIR IS STORED IN THE INFLATION TANK AND AIR SUPPLY SYSTEM OF THE TIRE CHANGER. ALL COMPRESSED AIR MUST BE EVACUATED FROM THE MACHINE BEFORE ANY REPAIRS CAN BE ATTEMPTED. COMPRESSED AIR IS VERY DANGEROUS. AIR CAN BE EVACUATED FROM THE SYSTEM BY PRESSING AND RELEASING ALL AIR CONTROL FOOT PEDALS. THE SOUND OF ESCAPING AIR WILL CEASE AS THE COMPRESSED AIR IS PURGED FROM THE SYSTEM. USE COMMON SENSE.
- 2) ALL REPAIR WORK SHOULD BE PERFORMED BY A QUALIFIED, MECHANICALLY INCLINED PERSON. ANY COMPETENT PERSON THAT IS ABLE TO UNDERSTAND WRITTEN AND SPOKEN (ENGLISH) INSTRUCTIONS SHOULD BE ABLE TO INSTALL AND SERVICE THIS MACHINE. IF YOU ARE NOT MECHANICALLY INCLINED, PLEASE EMPLOY A PERSON WITH MECHANICAL SKILLS TO HELP INSTALL YOUR TIRE CHANGER OR MAKE ANY NECESSARY FUTURE REPAIRS. REMEMBER TO DISCONNECT THE TIRE CHANGER FROM ALL POWER SOURCES BEFORE MAKING ANY REPAIRS OR ADJUSTMENTS.
- 3) KEEP WORK AREA CLEAN AND DRY. ALLOW PLENTY OF ROOM TO INSTALL YOUR TIRE CHANGER. MAKE SURE THAT ALL MOVING PARTS OF THE TIRE CHANGER REMAIN UNOBSTRUCTED WHEN THE MACHINE IS IN OPERATION.
- 4) THE TIRE CHANGER IS TO BE USED BY PERSONS 16 YEARS OR OLDER, THAT ARE SKILLED IN THE OPERATION OF AUTOMOTIVE SERVICE EQUIPMENT.
- 5) KEEP SMALL CHILDREN AWAY FROM WORK AREA. SERIOUS PERSONAL INJURY MAY OCCUR IF THE MACHINE IS NOT OPERATED PROPERLY.
- 6) STORAGE OF EQUIPMENT SHOULD BE IN A DRY AREA TO INHIBIT RUST. IF THE MACHINE IS NOT TO BE USED FOR A LONG PERIOD OF TIME. PLEASE DISCONNECT FROM BOTH THE ELECTRICAL AND AIR SUPPLY.
- 7) DO NOT WEAR LOOSE FITTING CLOTHES OR JEWELRY WHEN OPERATING YOUR TIRE CHANGER. Moving machine parts (while in operation) could become tangled with loose clothing, jewelry, or long hair resulting in personal injury or death.

- 8) PAY ATTENTION AT ALL TIMES WHEN OPERATING THE TIRE CHANGER. DO NOT USE THE MACHINE IF YOU ARE TIRED, OR UNDER THE INFLUENCE OF DRUGS OR ALCOHOL. STAY ALERT AT ALL TIMES. USE COMMON SENSE. KEEP HANDS AWAY FROM MOVING PARTS.
- 9) CHECK THE TIRE CHANGER FOR DAMAGED OR WORN PARTS BEFORE OPERATING. Damaged or worn parts will affect the performance of the tire changer. These defective parts may cause personal injury or damage to the wheel/tire assembly. REPLACE ANY DAMAGED OR WORN PARTS IMMEDIATELY; TO ASSURE PROPER PERFORMANCE OF YOUR TIRE CHANGER.
- **10)** REPLACEMENT PARTS AND ACCESSORIES. Use only authorized replacement parts for your tire changer. Counterfeit parts or accessories may result in damage to the machine, wheel/tire assembly, or personal injury. Authorized parts are only available from your distributor.
- 11) PERIODIC MAINTENANCE SHOULD BE PERFORMED AT REGULARLY SCHEDULED INTERVALS. Daily inspection of the machine and a weekly maintenance schedule will keep your machine working at optimal performance. Maintenance should be performed by qualified personnel.
- **12)** DO NOT USE THE MACHINE FOR TASKS THAT COULD CAUSE DAMAGE. The tire changer bead breaker is NOT designed to crush rims
- 13) MAKE SURE THE MACHINE CAN BE EASILY DISCONNECTED FROM THE AIR AND ELECTRIC POWER SOURCES. The electrical disconnect socket and the air disconnect coupler should be in close proximity to the operator, in case the machine needs to be quickly disconnected from either power source.

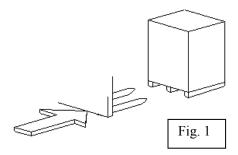
SPECIFIC PRODUCT INFORMATION

- 1) BEFORE PERFORMING ANY SERVICES OR MAINTENANCE; ALWAYS DISCONNECT THE TIRE CHANGER FROM ITS AIR SUPPLY SOURCE. DEPRESS AND RELEASE AIR ACTUATED PEDALS SEVERAL TIMES TO EVACUATE ALL COMPRESSED AIR FROM THE MACHINE AND DISCONNECT THE POWER CORD FROM ITS ELECTRICAL SUPPLY SOURCE. (Don't forget about the bead breaker)
- 2) TIRE CHANGER OPERATES ON CLEAN, DRY, COMPRESSED AIR REGULATED TO 125 PSI. DO NOT EXCEED 150 PSI INLET PRESSURE TO THE REGULATOR OR MACHINE DAMAGE COULD OCCUR. AIR REGULATOR ON THE SIDE OF MACHINE SHOULD BE SET NO HIGHER THEN 125 PSI.
- 3) THE AUTOMATIC OILER PROVIDES LUBRICATION TO THE MOVING PARTS OF THE TIRE CHANGER. IF THE AUTOMATIC OILER IS NOT USED, ADD TWO DROPS OF AIR TOOL OIL (DAILY) TO THE AIR SUPPLY LINE. THIS WILL HELP TO PROVIDE SUFFICIENT LUBRICATION TO THE MOVING PARTS AND SEALS.
- **4)** ALWAYS INFLATE THE TIRE TO THE AIR PRESSURE RECOMMENDED BY THE TIRE MANUFACTURER. NEVER OVER INFLATE THE TIRE.
- 5) MAKE SURE THAT THE TIRE AND RIM SIZE ARE A PERFECT MATCH. SEVERE PERSONAL INJURY WILL RESULT IF THE TIRE SIZE AND RIM SIZE ARE DIFFERENT AND THE INFLATED TIRE "BLOWS OFF" THE RIM WHEN INFLATED. ALWAYS DISPOSE OF OLD TIRES ACCORDING TO LOCAL AND NATIONAL TIRE DISPOSAL REGULATIONS.
- **6)** TO AVOID PERSONAL INJURY AND/OR TIRE MACHINE DAMAGE, ALWAYS MAKE SURE THE RIM IS FIRMLY SECURED ON THE TIRE CHANGER (with the clamping jaws) BEFORE REMOVING, INSTALLING, OR INFLATING A TIRE.
- 7) NEVER PLACE YOUR HANDS BETWEEN THE WHEEL RIM AND THE JAWS DURING THE LOCKING/CLAMPING STAGE. THE AIR OPERATED CLAMPING JAWS EXERT AN EXTREME AMOUNT OF PRESSURE AND SEVERE PERSONAL INJURY MAY OCCUR IF ANY EXTREMITIES ARE "CAUGHT" IN THE JAWS.

ASSEMBLY INSTRUCTIONS

TRANSPORT

The machine weighs approximately 700 lbs. You must use a forklift, pallet jack, or other machinery capable of safely moving this heavy package. See Fig. 1.

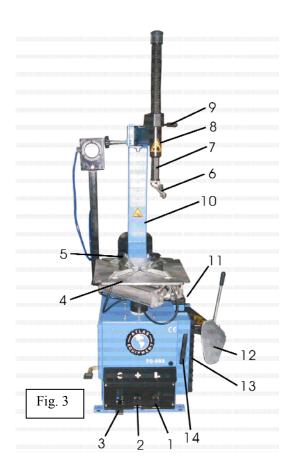


UNPACKING

The tire changer is shipped in a palletized wooden box with easy opening tabs. (Fig.2) Please use the easy opening tabs when uncrating the machine; rather than destroying the box and possibly damaging the tire changer



PRODUCT PHOTO AND PARTS DESCRIPTION



1	BEAD BREAKER PEDAL	2	JAW CLAMPING PEDAL		
3	MOTOR FWD/REVERSE PEDAL	4	TURNTABLE		
5	CLAMPING JAWS	6	MOUNT/DEMOUNT HEAD		
7	HEXAGONAL SHAFT	8	SWING ARM		
9	LOCK LEVER FOR HEX SHAFT	10	COLUMN		
11	FILTER/ REGULATOR/OILER	12	BEAD BREAKER PADDLE		
13	RUBBER WHEEL SUPPORT	14	TIRE TOOL		

WORK AREA REQUIREMENTS

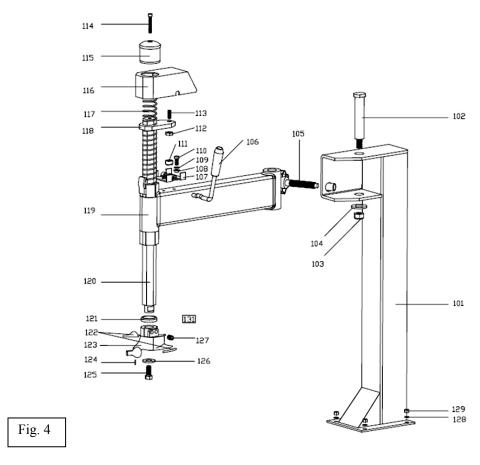
You will need a work radius of about 3 feet around the machine to operate your tire changer effectively.

Place the tire changer on a level concrete floor. (It must be off of the shipping pallet) The tire changer may be bolted to the concrete floor, but it is not required. The tire changer must be removed from the skid to operate properly.

ASSEMBLY PROCEDURE

CAUTION: This equipment requires two people to assemble.

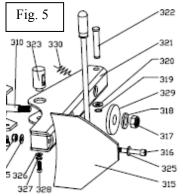
MOUNTING THE SWING ARM ASSEMBLY



- **STEP 1:** With the swing arm assembly still attached to the shipping pallet, remove the tie wrap holding the lock plate tight.
- **STEP 2:** Slide the Hex Shaft (120, Fig.4) through the lock plate until the Mount/Demount head (123, Fig. 4) is against the swing arm (119, Fig. 4).
- STEP 3: Remove the lock cover (116, Fig. 4) from the parts box and slide it over the Hex Shaft (120, Fig. 4). Carefully place the cover into position by pushing it onto the tabs of the lock plate (107, Fig.4).
- STEP 4: Remove the spring, Knob Cap and screw (117,115, 114, Fig. 4) from the parts box. Place the spring over the Hex Shaft so that it fits all the way down onto the lock plate (118, Fig. 4). Place the Knob cap and screw (115, 114, Fig. 4) on to the end of the Hex Shaft (120, Fig. 4) and thread the screw into the hex shaft.
- **STEP 5:** Remove the nuts, flat washers, and lock washers from the studs on the chassis (128,129, Fig. 4) and set them aside.
- **STEP 6:** Remove the lag bolts and the strap that secures the Swing Arm Assembly to the shipping pallet.
- **STEP 7:** With able assistance, lift the Swing Arm Assembly (101 Fig.4) and stand it upright onto the machine.
- **STEP 8:** With assistance, lift the Swing Arm Assembly (101 Fig.3) onto the studs and secure with the nuts flat and lock washers from the studs (128,129, Fig. 4). Tighten the nuts using a 16mm wrench.

BEAD BREAKER ARM ASSEMBLY

STEP 1: Remove pin, flat washer and snap-ring (322, 320, 319, Fig.5) from the hardware kit.





- **STEP 2:** Place the rubber pad (329, Fig.5) on to the Bead Breaker Cylinder shaft (310, Fig.5) and slide it up to the body assembly (2, Fig.3) such that it covers the slot (see photo).
- STEP 3: Insert the Bead Breaker Arm assembly (321, 323, 315, Fig. 5) into the bracket on the right rear of the body assembly. Slide the pin (322, Fig.5) through the body assembly and through the Bead Breaker Arm assembly (321, 323, 315, Fig5). Install the flat washer and place the snap-ring on the bottom of the pin (322, Fig.5) using snap-ring pliers.





STEP 4: Slide the Bead Breaker Arm assembly (321, 323, 315, Fig5) on to the Bead Breaker Cylinder shaft (310, Fig.5) as shown above. Place the flat washer (318, Fig5) and thread the locking nut (317, Fig5) on to the Bead Breaker Cylinder shaft (310, Fig.5).



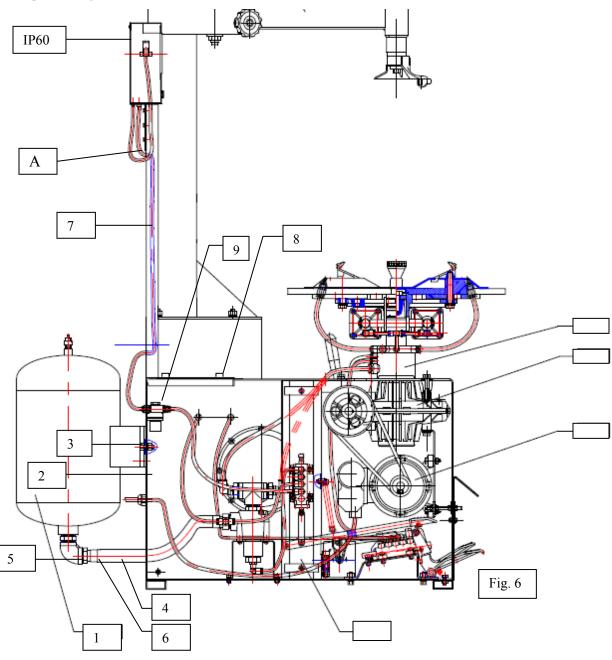
STEP 5: Thread the locking nut (317, Fig5) on to the Bead Breaker Cylinder shaft (310, Fig.5) using a 24 mm deep well socket until about a half inch of thread shows beyond the locknut.



STEP 6: Attach the spring (330, Fig.5) on to the side of the body assembly near the Bead Breaker Arm assembly pivot bolt. Insert the brake tool into the hole near the rear of the Bead Breaker Arm (322, Fig.5). Hook the spring with the tool, (330, Fig.5) and pull it toward you. Attach the spring (330, Fig.5) on to the center of the pin found within the Bead Breaker Arm (See photo below).



PNEUMATIC



STEP 1: Pull the hose (4, Fig.6) through hole on the back side of the tire changer. (2, Fig.6).



STEP 2: Slide the hose clamp (6, Fig.6) on to the rubber hose (4, Fig.6). Insert the rubber hose (4, Fig.6) from of the body to the connection (5, Fig.6) of the air tank. Make sure the other hose clamp inside the body assembly is also tight.

STEP 3: Holding the air tank, (1, Fig.6) remove the two nuts and lock washers (3,Fig.6) from the studs on the body assembly (2, Fig.6)



STEP 4: Place the air tank (10, Fig.3) on to the studs (9, Fig.3). Then place the lock washers and thread the nuts on to the two studs. Tighten the nuts (3, Fig.6) using a 16mm wrench.

STEP 5: Remove the side cover (not shown). Leave it off until the machine is completely built.

STEP 6: Fix the post (7, Fig.6) using screws (8, Fig.6) in the pre-drilled holes on the right rear of the machine.

STEP 7: Mount the inflating unit (IP60, Fig.6) to the post using the 5mm Allen head screws(10, Fig.6)

STEP 8: Press the 8mm tubing from the top of the inflator post (A Fig.6) into the push-lock fitting at the base of the pressure reading gauge.

STEP 9: Press the 8mm tubing from the bottom of the inflator post into the push-lock bulkhead fitting on the back of the tire changer (See photo).



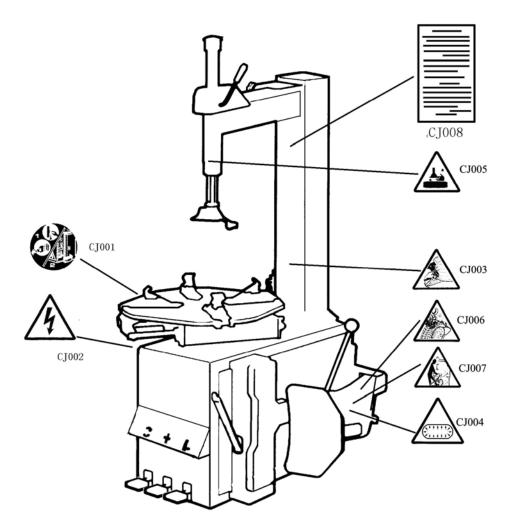
STEP 10: Connect the tire changer to a compressed air network. (Suggested supply pressure is 150psi) The connector is located on the Filter/Regulator/Lubricator at the right rear corner of the tire changer.

STEP 11: Adjust the regulator to 115psi. Check for air leaks. Correct all air leaks before installing the side cover. If OK, install the side cover and fasten with the 3 cap screws using a 5mm Allen wrench.

ELECTRICAL

Before making any electric connection, check that the supplied voltage corresponds with the motor voltage of machine (information is stamped on the information plate at the rear of the machine). For USA customers, the voltage is 110 volts and the amp requirement is 20. It is absolutely essential that the system is equipped with a good grounding circuit. **Do not use an extension cord.**

WARNING LABELS



CJ001: Caution: Disconnect the air supply and power supply cord before performing any maintenance work on the machine.

CJ002: Danger: Electric voltage present. Electrical shock hazard.

CJ003: Caution: When clamping a tire, never have your hands under the tire.

CJ004: Danger: Compressed air cylinder inside.

CJ005: Danger: Keep hands free of wheel; your hands could be crushed between the rim and the mounting head.

CJ006: Danger: During bead breaking NEVER touch the sidewalls of the tire with your hands. Bead breaking with the table top slides open can crush the operator's hands.

CJ007: Caution: Bead breaking must be done with the utmost care and attention. When the bead breaker pedal is operated, the bead beaker arm moves quickly and powerfully. Anything within its range of action is in danger of being crushed.

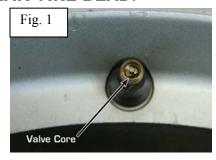
CJ008: Important safety instructions label.

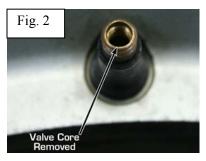
OPERATING INSTRUCTIONS

TO PRELIMINARY OPERATING TESTS

- **STEP 1:** Connect the tire changer to its air and electrical supply sources, and allow adequate time for the compressed air system to reach the recommended 150-PSI.
- **STEP 2:** Depress the Reverse Pedal (3, Fig2) down; the turntable should turn in a clockwise direction. Pull the pedal up and the turntable should turn anticlockwise.
- **STEP 3:** Press the bead breaker pedal (1, Fig2) to activate the paddle. When the pedal is released. The pedal should return to its original position.
- **STEP 4:** Press the jaw clamp pedal (2, Fig.2) once to open the four jaws. Press the pedal again to close the jaws.

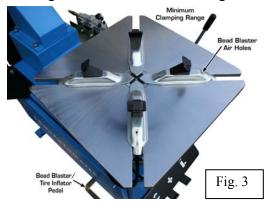
TO BREAK TIRE BEAD:





CAUTION: Before you attempt to break the bead, the tire must be deflated fully. This can be done by removing the valve core and allowing all the air to escape. Remember that old tire/wheel assemblies and "junk yard" rims require special considerations. The bead breaker system is very powerful, but certain older rims may have been galled to the tires and it may be difficult for these "beads to be broken". Rust penetrating fluid will help to "loosen" the wheel and tire assembly before the bead breaker is used. Frozen tires will also present a unique "bead breaking" experience and care must be used when dealing with frozen wheel assemblies. All wheel weights should be removed before breaking the bead or changing the tire.

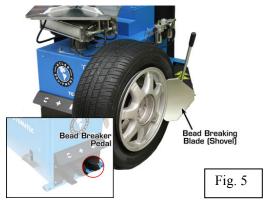
STEP 1: Close the turntable clamping jaws completely (Fig. 3). This will prevent tires from striking the turntable slides during the bead breaking process.



STEP 2: Open the bead breaker arm by hand. Place the wheel up against the Rubber Wheel Support. Position the Bead Breaker Paddle against the bead (where the tire and the rim meet...but the paddle needs to be held on the tire area...not the rim). (see Fig.4)



STEP 3: Depress the bead breaker pedal fully to activate the paddle (Fig 5). Release pressure on the bead breaker pedal when the blade has reached the end of its travel and / or when the tire bead becomes free of the rim ("Broken").



- **STEP 4:** Rotate the tire slightly, and repeat the procedure around the entire circumference of the wheel rim, until the bead is completely detached from the rim. (Fig.5)
- **STEP 5:** Repeat the above steps for the other side of the wheel / tire.

TO REMOVE THE TIRE FROM THE WHEEL:

CAUTION: Before carrying out this procedure; make sure the bead is broken free on the wheel and all wheel weights are removed.

STEP 1: Spread tire lubricant liberally on the complete circumference of the broken tire bead.

NOTE: Failure to lubricate the tire bead may cause serious damage to the bead or tire changer.

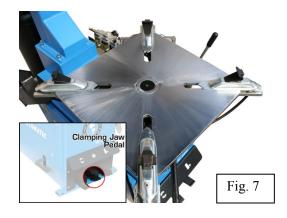
STEP 2: Place the wheel / tire evenly on the turntable.



To lock the wheel on the turntable, proceed as follows according to the wheel size:

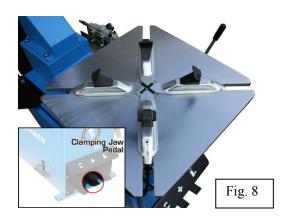
OUTSIDE CLAMPING:

- 1. Position the four jaws by depressing the jaw clamping pedal (Fig. 7) halfway down.
- 2. Place the wheel on the four jaws and, while keeping the wheel rim pressed down, depress the jaw clamp pedal as far as it will go.
- **3.** As the jaws move in they will lock the wheel. Check to make sure the wheel is firmly secured by the jaws.

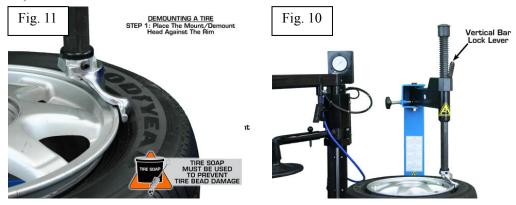


INSIDE CLAMPING:

- 1. Operate the clamping pedal until the four jaws are completely closed (Fig 8).
- **2.** Place the wheel over all four jaws. Depress the jaw clamping pedal to open the jaws, this will lock the wheel in place.
- **3.** Check to make sure the wheel is firmly secured by the jaws.



STEP 3: Lower the hex shaft until the mount/demount head (Fig. 9) rests next to the wheel and on top of the tire. Then, lock the hex shaft in position, using the lock lever (Fig. 10, 11)



STEP 4: Insert the lever between the tire bead and the front section of the mounting head (Fig. 12).



STEP 5: Move the tire bead over the mounting head by pulling the lever over the mount/demount head, and briefly pushing upward on the reverse pedal (Fig. 13).

NOTE: To avoid damaging the inner tube (if there is one), it is recommended to perform step 7 with the inner tube valve stem positioned about 1" to the right of the mounting head.

- **STEP 6:** With the lever (Fig. 13) held in position, rotate the turntable in a clockwise direction by fully depressing the reverse pedal. Continue until the tire is completely separated from the wheel.
- **STEP 7:** Remove the inner tube (if there is one), and repeat the above steps 6 through 9 for the bottom side of the wheel / tire (See Fig. 14, 15).



TO MOUNT THE TIRE ONTO THE WHEEL:

CAUTION: Before carrying out this procedure, deflate the tire fully, and remove all the wheel weights.

STEP 1: Spread tire lubricant liberally on the complete circumference of the tire bead to avoid damage to the tire bead to avoid damage to the tire and to facilitate the mounting procedure (Fig. 16).



STEP 2: Lock the wheel, using the inner part of the clamping jaws.

NOTE: When you are working with wheels of the same size, it is not always necessary to lock and unlock the hex shaft. Instead, move the swing arm sideways with the hex shaft locked.





STEP 3: Move the tire so that the bead passes below the front section of the mounting head and is brought up against the edge of the rear section of the mounting head. (See Fig. 17)

Keep the tire bead pressed down into the wheel rim channel with your hands (Fig. 18). Keep hands clear of the mounting head. Then, depress the reverse pedal to rotate the turntable clockwise. Continue this process throughout the entire circumference of the wheel and tire.

- **STEP 4:** Insert the inner tube (if there is one).
- **STEP 5:** Repeat the steps above the mount the other side of the tire.

TO INFLATE THE TIRE:

CAUTION: An over inflated tire can fail, causing serious injury or even death to the operator. Always make sure the wheel and the tire are of the same size. Check the condition of the tire, and make sure it has no defects before beginning the inflation process. Keep your hands and body as far away from the tire as possible. Inflate the tire with brief jets of air, checking the air pressure frequently.

Never inflate a tire above and or below the air pressure recommended by the tire manufacturer

STEP 1: To inflate the tire, attach the air hose nozzle to the tire valve stem with the locking lever in the "UP" position. Check the condition of the tire, and make sure the nozzle is pressed down completely over the threads of the valve stem (Fig. 19).



STEP 2: When the air gauge nozzle is firmly in place, press the locking lever down to lock onto the valve stem.

Remember to inflate the tire with brief jets of air, checking the air pressure frequently. Once the proper air pressure has been reached on the gauge, disconnect the nozzle from the valve stem and screw a valve core into the stem (Use caution when inserting the valve core, air will blow out of the stem when the nozzle is removed). Re-attach the nozzle and adjust the air pressure as needed.

NOTES:

Failure to follow all warnings and instructions may lead to serious personal injury or death to the operator or a bystander.

• **NEVER** exceed 50psi (3.5 bar) when seating beads or inflating tires.

If a higher tire inflation pressure is required, remove the wheel from the tire changer and continue the inflation procedure with the wheel inside a special protection cage (commercially available).

- **NEVER** exceed the maximum inflation pressure given by the tire manufacturer.
- ALWAYS keep hands and entire body back while inflating a tire.
- **ONLY** specially trained personnel should be allowed to perform these operations.

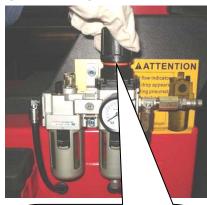
FRL INSTRUCTIONS

The FRL consists of the air filter (moisture separator), pressure regulator, and lubricator. The filter is designed to prevent excessive amounts of water (normally found in compressed air) from contaminating the moving parts of the tire changer. The pressure regulator helps to regulate pressure and prevent the valves, cylinders and other moving parts from being damaged by excessive air pressure. The lubricator provides oil to the pneumatic parts located inside the tire changer.

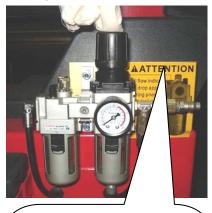
SPECIFICATION

Maximum supply pressure	150psi
Minimum ambient operating temperature	5deg. C / 41deg. F
Recommended lubricating oil	50W SAE Oil (non-detergent)
Required regulator air pressure setting	110psi to 125psi

OPERATION AND MAINTENANCE



This is the pressure regulator. Open (pull up) the knob and turn to adjust the air pressure. Set air pressure at: 110 to125psi.



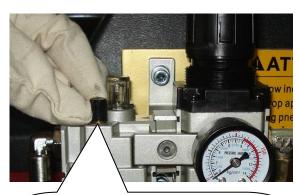
Close (Push down) the knob to lock the regulator when the correct air pressure is achieved. pressure.



The air filter separates water from the air as the air flows into the machine. When the water level reaches 50% of the glass bowl, it is necessary to drain the water by pulling the locking ring and venting the water.



Check the oil level in the lubricator at the beginning of each work day. Keep the reservoir filled with 50W SAE oil. Make sure the air supply is disconnected from the changer before removing the oil cap.



The oil indicator should be checked to make sure that one drop of oil is injected into air system every 3-4 times the Bead Breaker Pedal is depressed. To regulate the rate of oil injection, adjust the flow with the oil regulator screw. IMPORTANT: Oil is needed in the air supply system to properly maintain the seals and working parts of the tire changer.

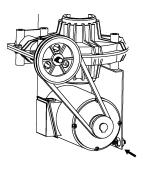
ROUTINE MAINTENANCE

CAUTION: Always disconnect the tire changer from its air and electrical supply before beginning any maintenance procedures. Press and release the bead breaker pedal and the inflation pedals several times to evacuate all compressed air that is still in the air tank or the air system of the tire changer. Before each use, inspect the general condition of the tire changer. Check for loose screws, misalignment of parts, binding of moving parts, broken parts, loose or damaged air supply hose / electric power cord, and any other condition that may affect its safe operation. If abnormal noise or vibrations are noticed, disconnect the tire changer from its air and electric supply sources immediately and correct the problem before further use. Never use damaged or unsafe equipment.

- Use pressurized air to keep the turntable clean. Make sure that there is no debris under the jaw guides to prevent their full range of motion. Clean the turntable (weekly) with a mild detergent. The jaw guides should be greased once a week.
- Filter/Regulator/Lubricator (FRL) routine maintenance is discussed in Chapter 7.
- After the first week of use, check all screws, bolts and fittings. Make sure all screws are tight. Turntable slide blots are subject to constant movement and need to be tightened regularly.

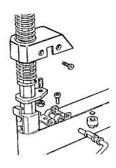
BELT MAINTENANCE

If the turntable begins to lose power, the drive belt may be loose. Remove the side cover of the tire changer to check the belt. If the belt is loose, tighten the belt with the adjusting screw located on the motor support. Leave a slight amount of deflection in the belt to prevent motor damage.



LOCK LEVER MAINTENANCE

In the event the lock lever does not properly lock the hex shaft in place, or the mounting head doesn't move slightly off the mounted rim when the lever is engaged: remove the plastic cover and adjust the nuts slightly to increase the tension.



5 PORT FOOT VALVE MAINTENANCE

To clean or replace the 5 port foot valves, remove the side cover, which is located on the left side of the tire changer body, by unscrewing the three socket head cap screws.

To remove the 5 port foot valve: Mark and remove the air lines from the foot valve. Mark the location of the valve on the bracket. Remove the four mounting screws and disconnect the rod.

Clean the 5 port foot valve, using a jet of compressed air. Or if necessary, replace the rod o-rings and exhaust mufflers.



TROUBLESHOOTING

PROBLEM 1: Turntable does not rotate.

Causes: Solutions:

	10 0 - 0 - 0 - 0 - 0 - 0 - 0 - 0 - 0 - 0		
No power to the machine.	Check the electric supply and reset breaker if needed.		
	Make sure the plug is in the socket. Do not use an		
	extension cord.		
Motor belt broken or loose.	Adjust or replace the belt.		
Switch or switch connections are bad.	Make sure the switch contacts are working properly.		
	Test switch.		
Motor or motor connections are bad.	Check for loose wires in the motor. Test motor.		
Motor pedal broken or loose object underneath	Clean under pedal. Repair or replace reverse pedal		
prevents full movement.	assembly.		

PROBLEM 2: Turntable vibrates while mounting/removing tire.

Causes: Solutions:

Belt loose or glide fasteners are loose.	Adjust belt tension and tighten all fasteners.
Delt 10050 of glide fastellers are 10050.	1 lajust beit telision and tighten an iastellers.

PROBLEM 3: Jaws clamping cylinders slow to open/close.

Causes: Solutions:

Silencer (air muffler) is clogged.	Clean or replace silencer (air muffler).
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PROBLEM 4: Clamping cylinders jaws do not lock the wheel rim correctly.

Causes: Solutions:

Jaws worn.	Replace jaws.		
Worn air cylinder	Replace cylinder or rebuild cylinder with gaskets.		
Leaking air fittings	Correct air leak, replace fitting if necessary.		

PROBLEM 5: Mounting Head touches the wheel rim during tire mounting/demounting process.

Causes: Solutions:

Locking slide for hex shaft is incorrectly adjusted or defective.	Adjust or replace locking slide.
Locking slide for hex shaft screw is loose.	Tighten screw. See section 10 for head adjustment.

PROBLEM 6: Bead Breaker Pedal and Jaw Clamp Pedal do not return to original position.

Causes: Solutions:

Pedal return spring is broken.	Replace pedal return spring.
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PROBLEM 7: Bead breaker not operating properly.

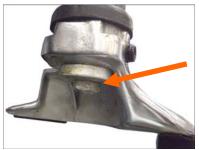
Causes: Solutions:

The pedal stop bolt is not adjusted correctly.	Adjust the height of the pedal stop bolt. (The stop bolt is under the bead breaker pedal. See photo above.		
5 port valve muffler (silencer) is clogged.	Clean or replace 5 port valve mufflers (silencers).		
5 port valve O-rings are broken or worn.	Replace the 5 port valve O-rings.		
Bead breaker cylinder piston V-seal or rod O-ring is	Replace bead breaker cylinder piston V-seal or the		
damaged.	breaker cylinder assembly.		
Insufficient air supply to the changer.	Make sure the inlet air pressure is sufficient.		
Lack of lubrication.	Fill the lubricator; adjust the lubricator as explained in chapter 7.		

MOUNTING HEAD ANGLE ADJUSTMENT

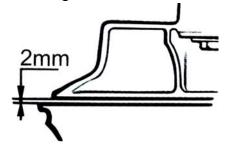
The angle of the mount/demount head is preset to accommodate rim sizes from 12" to 18". If the rim size is out of this pre-set range, an adjustment to the angle of the mount/demount head must be made. To adjust the mount/demount head angle:

STEP 1: Lock the wheel on the turntable. (using the movable jaws)



STEP 2: Loosen the retaining bolt under the mounting head but do not remove.



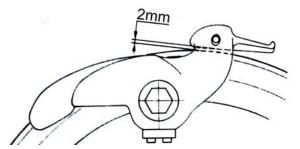


STEP 3: Lower the hex shaft (7, Fig3) until the mounting head (6, Fig3) rests next to the wheel rim and on top of the wheel. Move the locking lever back to lock the hex shaft. The mounting head will rise up approximately 2mm.



STEP 4: Loosen the adjusting screws on the side of the mounting head.





- **STEP 5:** Adjust the angle of the mounting head by hand. Maintain 2mm clearance from the edge of the wheel.
- **STEP 6:** Tighten the adjusting screws.
- **STEP 7:** Release the locking lever and allow the hex shaft to rise. Move the locking lever back to lock the hex shaft. Tighten the retaining bolt under the mounting head.

INFLATION SYSTEM

IP VERSION

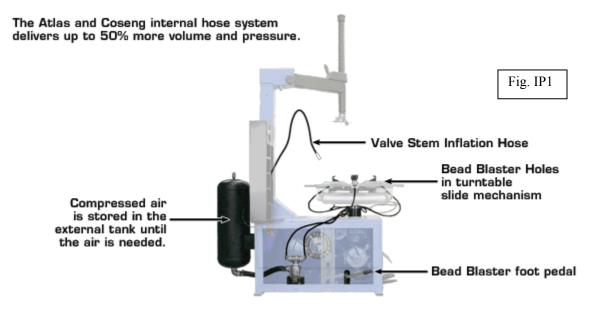
If the tire changer is equipped with the IP set, there is a tire inflator pedal on the left side of the machine. When the pedal is depressed half way, the inflator will operate. While the pedal is depressed, the air gauge on the inflator box will indicate the pressure of the air flowing through the hose into the tire. When the pedal is not depressed, this gauge will display the air pressure inside the tire (when the inflation hose is attached to the valve stem).

The accuracy of the air gauge is not absolute. It is provided as a reference only. The air pressure of the tire should be rechecked with a digital hand held gauge to assure proper inflation pressure before the tire and wheel are installed on a vehicle. NEVER INFLATE A TIRE ABOVE THE TIRE MANUFACTURER'S SPECIFICATIONS.

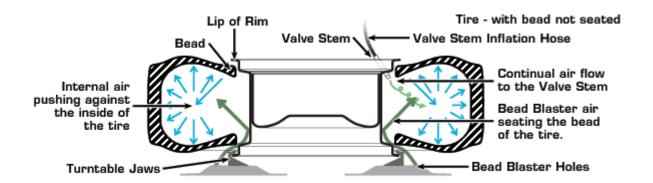
A tire changer's bead blaster system delivers a large volume of highly pressured air into the cavity of a tubeless tire to help "seat the beads" of the tire to the wheel assembly. Many tubeless tires have extremely stiff sidewalls and the beads of these tires will not seat properly by just pumping air through the valve stem. (Even with the valve core removed)

The "bead blaster" system of the modern tire changer takes the place of the "spray ether and a match technique" used by tire people with no regard for their own safety. See movie clip below.

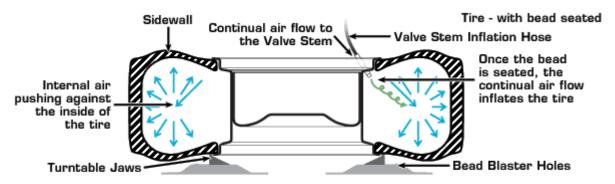
All tire changer bead blaster systems operate in the same basic way, but the Atlas and Coseng tire changers utilize a special internal hose and oversized tank system that delivers up to 50% more volume and pressure than most competitors' bead blaster systems.



Compressed air is stored in the external tank until that air is needed for the bead blaster. The delivery of the air is controlled by a foot pedal on the machine. When the pedal is partially depressed, the air flows into the tire through the hose attached to the valve stem. When the pedal is fully depressed, a large volume of compressed air is "blasted" into the cavity of the tire through holes located on the turntable slide mechanism. (Just behind the clamping jaws). This blast of air occurs while additional air is being introduced through the valve stem inflation hose. The combination of the valve stem air supply and the "bead blasted" air is usually enough to seat the beads of the most stubborn tires.



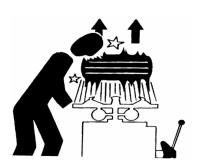
The "blast" of compressed air applies pressure to the top sidewall, temporarily seating the top bead of the tire to the rim. The large volume of compressed air is then directed toward the bottom sidewall and the lower bead of the rim. This process takes less than one second in most car and light truck cars. The continual flow of the air through the valve stem maintains the pressure against both beads; forcing them to seat permanently and allowing the tire to be inflated to the correct pressure.



BEAD SEATING AND INFLATING

WARNING: A WHEEL/ TIRE ASSEMBLY CAN EXPLODE (causing death, injury, or damage) WHEN THE FOLLOWING OCCUR:

- The diameter of the rim is different from the tire size.
- The rim or tire is defective.
- The recommended inflation pressure is exceeded during bead seating.
- The tire inflation pressure is higher than the maximum recommended by the tire manufacturer.
- The operator does not observe and follow safe procedures.



TUBE TIRES

- **STEP 1:** Remove the valve core from the inside of the valve stem.
- **STEP 2:** Clip the inflator hose air chuck to the tire valve. Make sure it is properly connected.
- **STEP 3:** Check that the tire size and the rim diameter correspond.
- **STEP 4:** Lubricate the tire and rim beads thoroughly.
- **STEP 5:** Press the tire inflator pedal down to the middle position to start inflation of tube.

CAUTION: Do NOT use the BEAD BLASTER.

STEP 6: Press and release (frequently) the inflating pedal (middle position only). Check the tire's air pressure each time the pedal is released. Make sure the inner tube is not pinched between the rim and tire. Continue to inflate cautiously until the correct air pressure is achieved. Install the valve core into the valve stem.

TUBELESS TIRES

- **STEP 1:** Remove the valve core from the inside of the valve stem.
- **STEP 2:** Clip the inflator hose air chuck to the tire valve. Make sure it is properly connected.
- **STEP 3:** Check the size of the wheel and the size of the tire. They MUST be the same.
- **STEP 4:** Lubricate the tire and rim beads thoroughly.
- **STEP 5:** Press the tire inflator pedal down to the middle position.
- STEP 6: If the tire beads do NOT seat properly; you may use the BEAD BLASTER INFLATOR SYSTEM by depressing the pedal fully. A strong jet of air will be released through the air holes located behind the turntable jaws to help seat the bead of the tire. You may need to attempt the bead seating process several times before the beads will seat. Allow the air tank (at the back of the tire changer) to fill completely with air before a new bead seating attempt is made.
- **STEP 7:** Continue to keep the pedal pressed to the middle position to allow regulated air to flow through the inflation hose and inflate the tire, releasing frequently to check the inflation pressure.

CAUTION: Always keep hands and body away from the tire when inflating.

Continue to inflate the tire to the manufacturer's recommended air pressure. Never exceed the tire manufacturer's recommended air pressure. Check the air pressure with a digital air gauge.

NOTES:

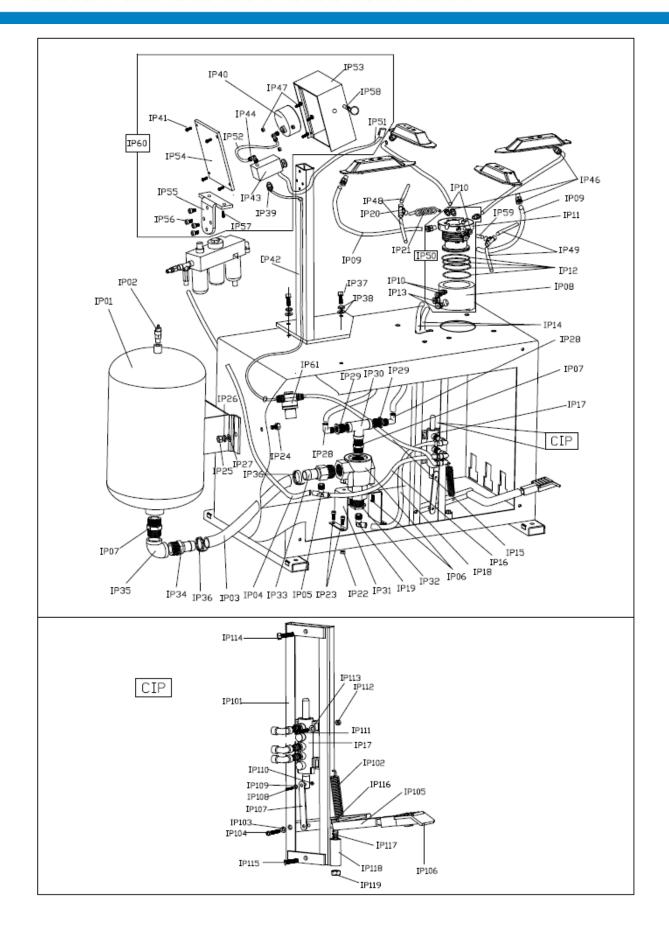
Failure to follow all warnings and instructions may lead to serious personal injury or death to the operator or any bystanders.

• **NEVER** exceed 50 psi (3.5 bar) air pressure when inflating a tire mounted on the tire changer.

If more than 50 PSI air pressure is required, remove the wheel from the tire changer and continue the inflation procedure with the wheel/tire assembly inside a special protection cage.

- **NEVER** exceed the maximum inflation pressure given by the tire manufacturer.
- ALWAYS keep hands and body away from tire when inflating.
- **ONLY** allow fully trained personnel to use the tire changer. Do not allow unqualified persons to operate or be close to the tire changer (when in operation).

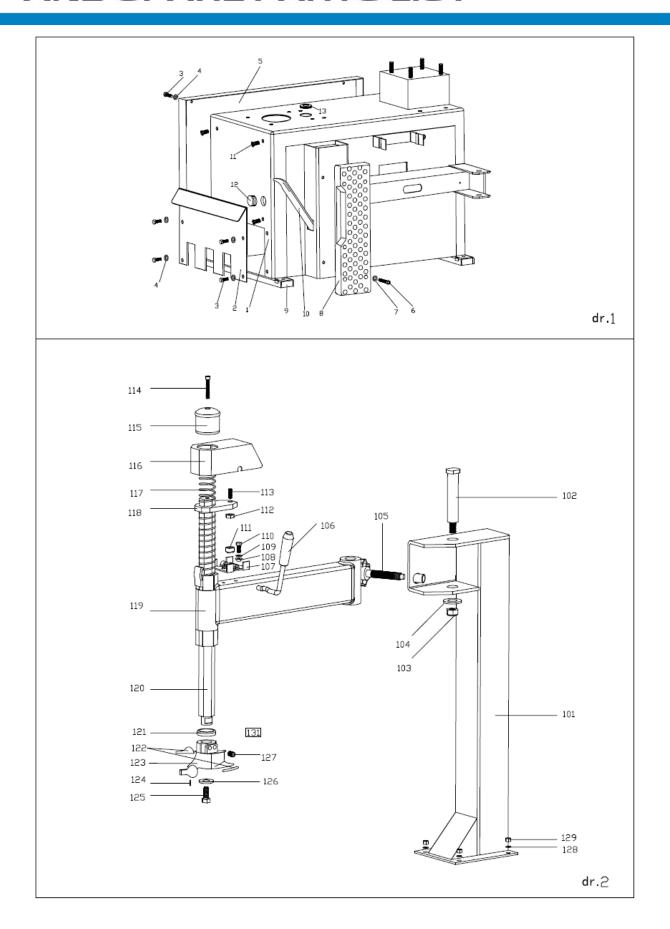
EXPLODED DRAWINGS AND SPARE PARTS LIST

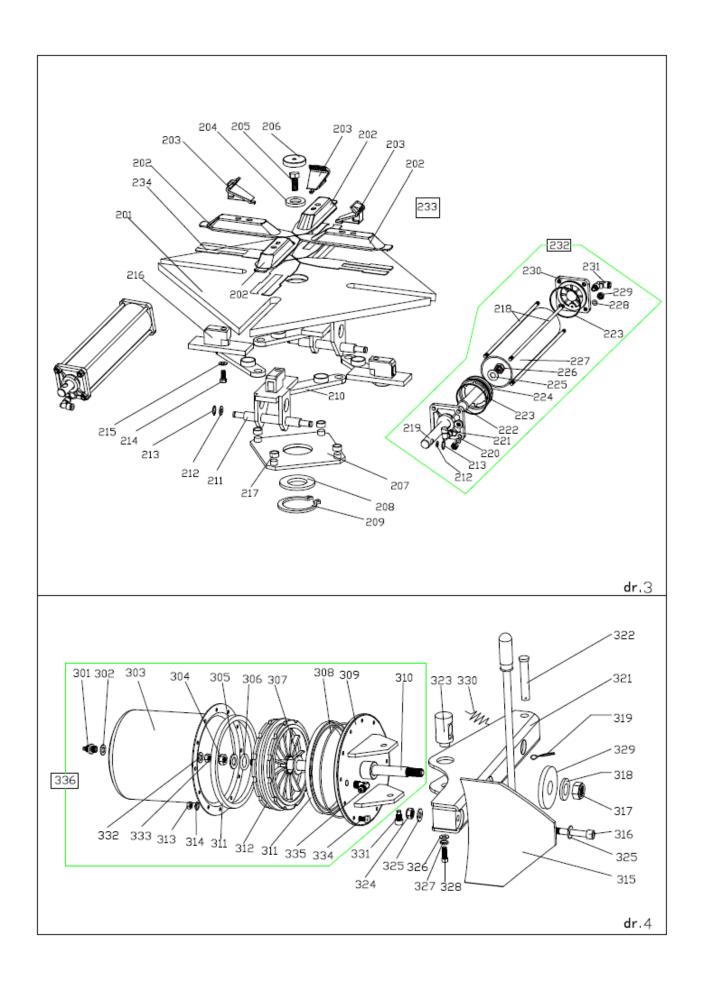


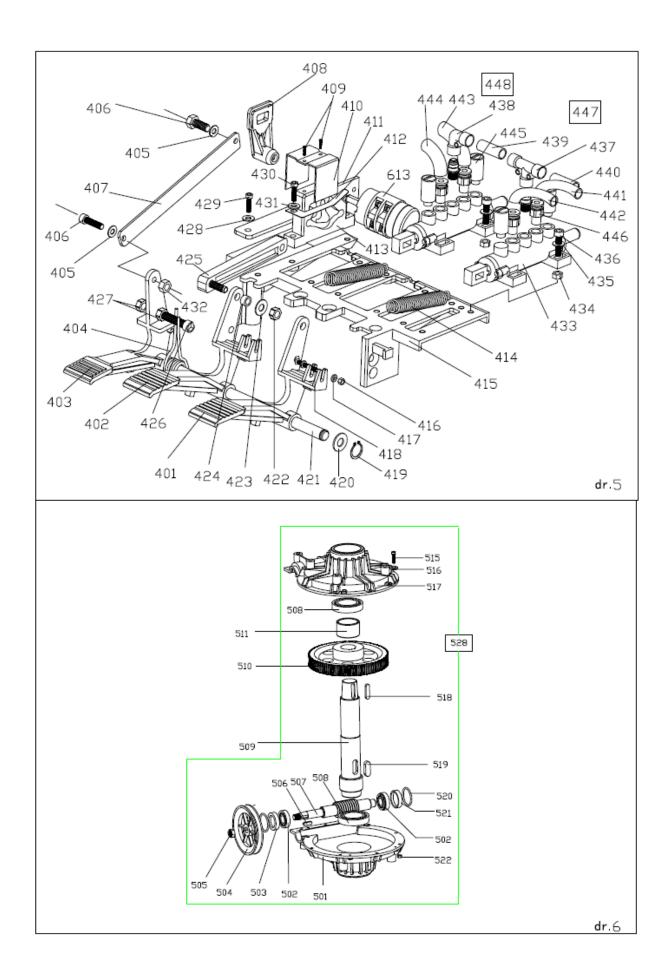
IP VERSION SPARE PART LIST

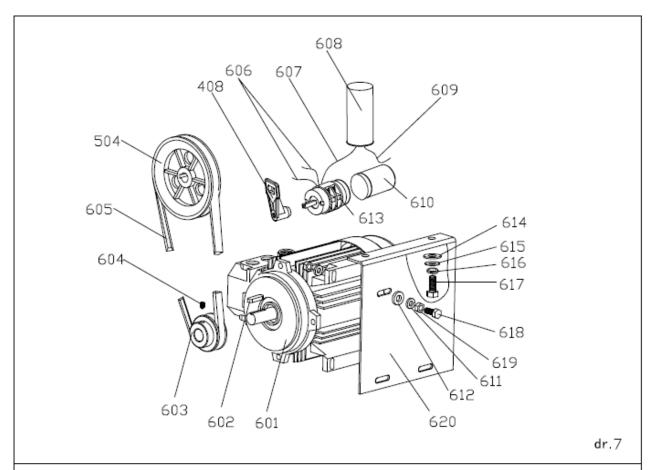
IP1 I210301	No.	Code	Qty	Description	No.	Code	Qty	Description
P3 12330341	IP1	I2110301	1	Tank	IP53		1	Front cover
P3 12330341	IP2	PQ-L10	1	safety valve	IP54		1	Rear cover
IP56 IP58-01	IP3	12330341	1	valve)	IP55		1	Support
IPO				valve)				
IP76						GB/T5781		
PB		KP-L25						
IP90								
P10 PC08-01							_	
P11				Hose(Rotating union to slide)	IP61	TC07081401	1	Pressure regulator
P12 C211011704								
P13								
P14								
IP14 IZ110314	IP13	PC12-04	2		IP103	GB/1 50	1	Washer φ8
P15	ID44	10440044	0		ID404	OD/T 5700	_	D-14 MO.: 20
P16 C211011220								
IP17 I2110316				Hose(5-way valve to IP air input)				
P18				Hose(5-way valve to air input)				
P18	IP I7	12110316	- !	Ligaç/E way valve to guick	IP 107	12110104	1	Connecting rod
P19 PC08-01	ID10	12110217	4		10100	CD/T 5790	4	Polt M4×20
P20 PC-3T-0803 2 T-union P110 GBT 1337 1 Self-locking nut M4 P21 C2110327 1 Solenoid hose P111 GBT 170 1 Screw M6×20 P22 GBT41 4 Nut M6 P112 GBT 1337 1 Self-locking nut M6 P23 GBT5781 4 Screw M6 P113 GBT 50 1 Washer ¢6 P24 GB/T5781 2 Screw M10 P114 GB/T 50 1 Screw M8×25 P25 GB/T41 2 Nut M10 P115 GB/T 68 1 Screw M8×25 P26 GB/T41 2 Spring washer P116 GB/T5781 4 Screw M10×70 P27 GB/T42 2 Washer P111 GB/T1531 4 Screw M10×70 P28 PL12-04 2 Angle connector 1/2" P118 GB/T5780 1 Spring P29 P233030303 2 Tie-in P119 GB/T41 1 Nut M10 P30 P233030304 1 T-Union P119 GB/T41 1 Nut M10 P31 P33 P333030305 1 Union P133 P333030305 1 Union P133 P333030305 1 Union P134 P33 P333030305 1 Union P136 P333030300 1 Union P136 P333030300 1 Union P137 GB/T5781 2 Screw M8 P138 GB/T5781 2 Screw M8 P139 C211016504 1 T Union P140 P23303400 1 F1 rame P140 P23303400 1 Exhaust valve P141 GB/T5781 Screw M5 P144 P1408-01 1 L-Union1/8" P1408-0								
P21 C2110327		PC00-01						
P22 GB/T41								
IP23 GB/T5781							_	
IP24 GB/T5781 2 Screw M10 IP114 GB/T 70 1 Screw M8×25 IP25 GB/T41 2 Nut M10 IP115 GB/T 68 1 Screw M8×25 IP26 GB/T41 2 Spring washer IP116 GB/T5781 4 Screw M10X70 IP27 GB/T42 2 Washer IP117 GB/T 1239.6 1 Spring IP28 PL12-04 2 Angle connector 1/2" IP118 GB/T 5780 1 Bolt M4×20 IP29 I233030303 2 Tie-in IP119 GB/T 5780 1 Bolt M4×20 IP30 I233030303 1 T-Union IP31 I2330303031 1 quick exhaust valve support CIP 1 Complete inflation pedal IP32 I233030305 1 Union IP31 I233030305 1 Union IP33 I233030302 1 Union IP34 I233030103 1 Union IP35 I233030105 1 L-Union IP36 I233030105 1 L-Union IP37 GB/T5781 2 Screw M8 IP38 GB/T5782 2 Spring washer and washer IP39 C211016504 1 T Union IP41 GB/T5781 6 Screw M5 IP42 I233017001 1 Frame IP44 I23017001 1 Frame IP45 IP46 PC10-02 8 Connector 1/4" IP45 IP46 PC10-02 8 Connector 1/4" IP47 GB/T5781 3 Screw for fixing air manometer IP48 PC10-02 8 Connector 1/4" IP49 Connector 1/4" IP49 PU59-01 1 Complete rotating union to front IP49 IP4								
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IP38 GB/T5782 2 Spring washer and washer IP39 C211016504 1 T Union IP40 I2330340 1 Air manometer IP41 GB/T5781 6 Screw M5 IP42 I233017001 1 Frame IP43 MOV-03B 1 Exhaust valve IP44 PL08-01 1 L-Union1/8" IP45 IP46 PC10-02 8 Connector 1/4" IP47 GB/T5781 3 Screw for fixing air manometer IP48 2 flange of clamping cylinder IP49 2 flange of clamping cylinder IP49 IP40 IP41 I								
IP39 C211016504								
IP40 I2330340			1					
IP41 GB/T5781 6 Screw M5					İ			
IP42 I233017001 1 Frame			6					
IP44 PL08-01			1	Frame				
IP45	IP43	MOV-03B	1					
IP46 PC10-02 8 Connector 1/4"	IP44	PL08-01	1	L-Union1/8"				
IP47 GB/T5781 3 Screw for fixing air manometer Hose(rotating union to rear flange of clamping cylinder) Hose(rotating union to front IP49 2 flange of clamping cylinder) IP50 IP2110117 1 Complete rotating union IP51 C211033002 1 Air outlet hose for IP version IP50 IP211033002 IP50 IP311033002 IP50	IP45							
Hose(rotating union to rear			8					
Hose(rotating union to rear	IP47	GB/T5781	3					
IP49	IP48		2	Hose(rotating union to rear				
IP49 2 flange of clamping cylinder) IP50 IP2110117 1 Complete rotating union IP51 C211033002 1 Air outlet hose for IP version								
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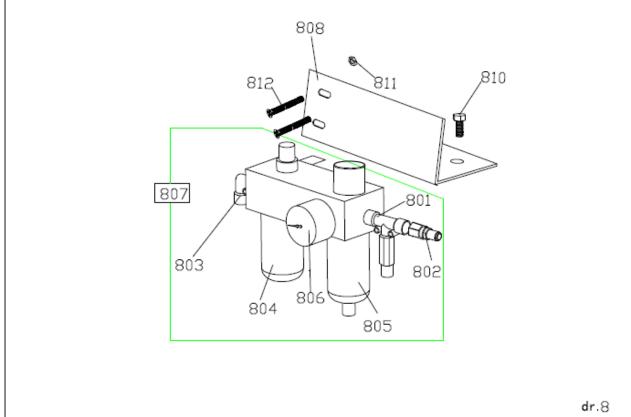
EXPLODED DRAWINGS AND SPARE PARTS LIST

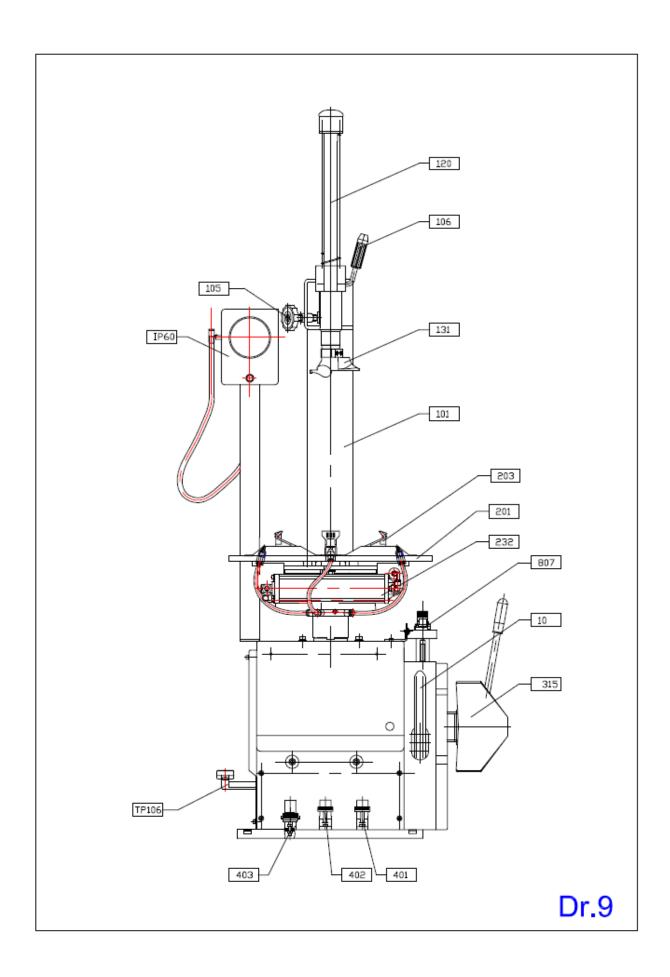


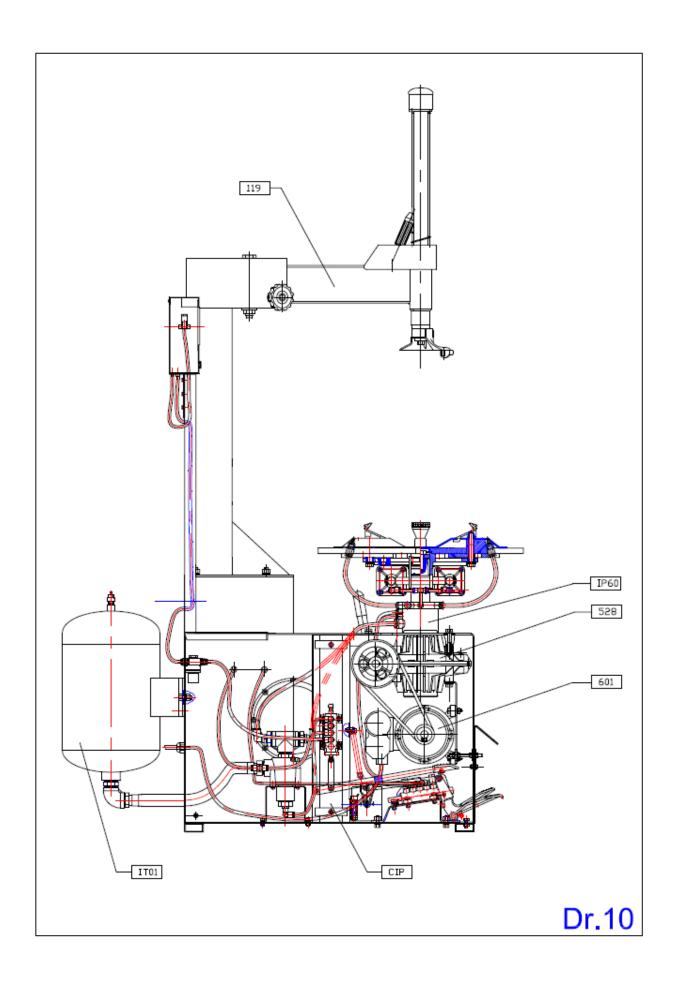


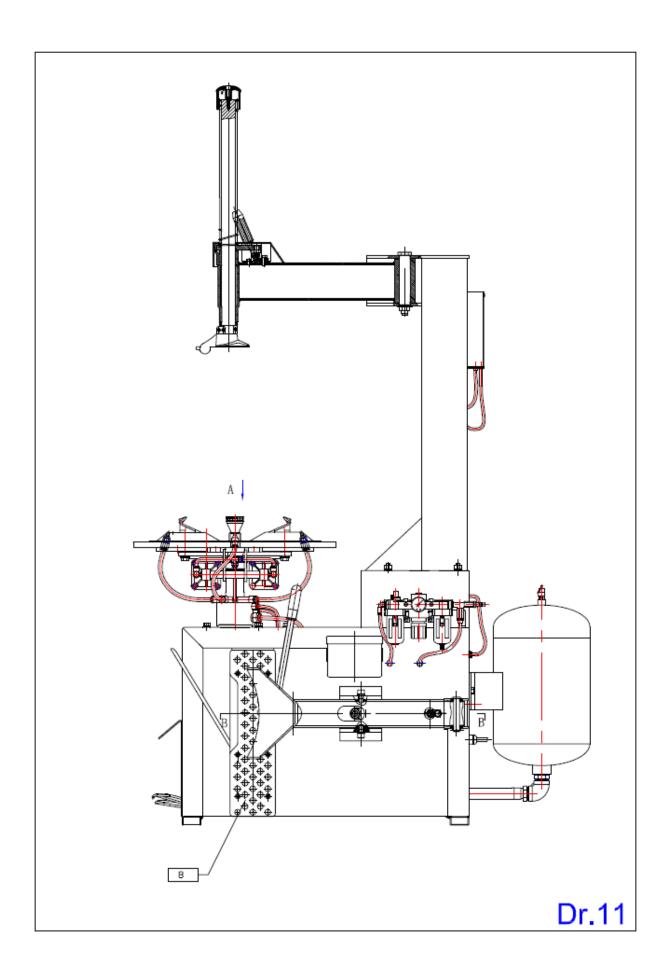


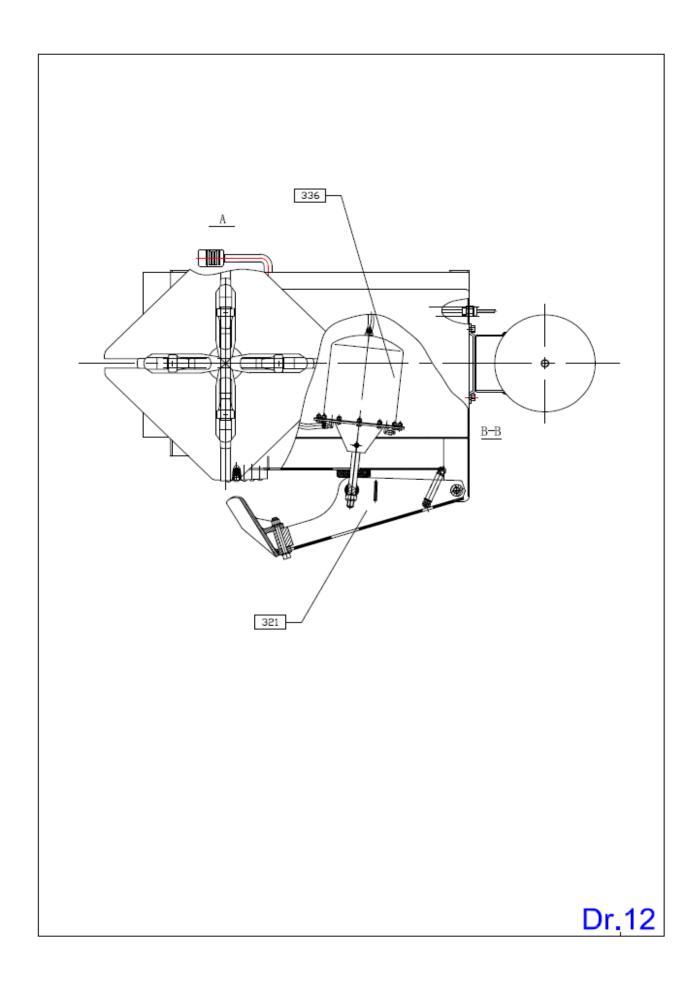












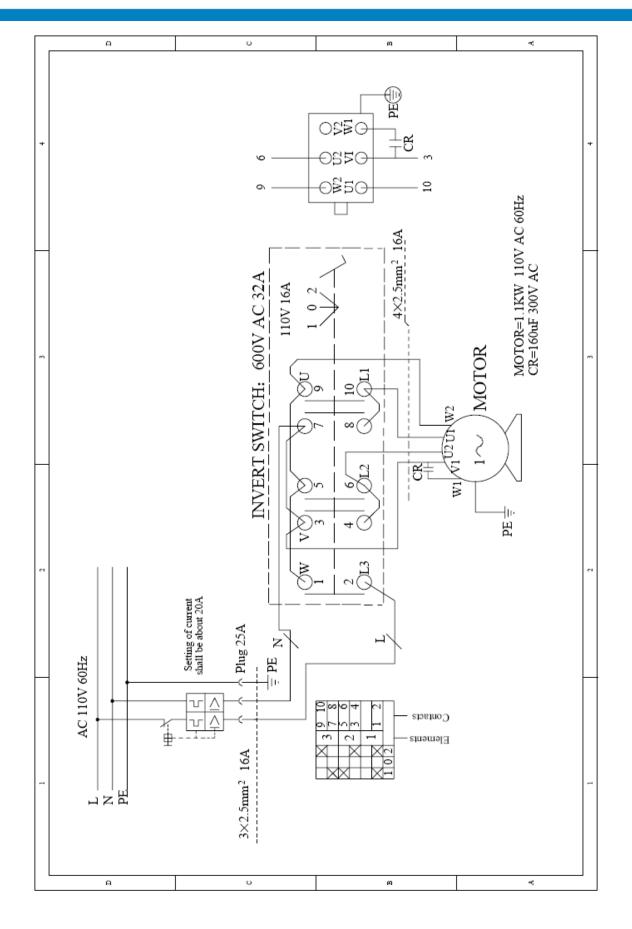
PARTS LIST

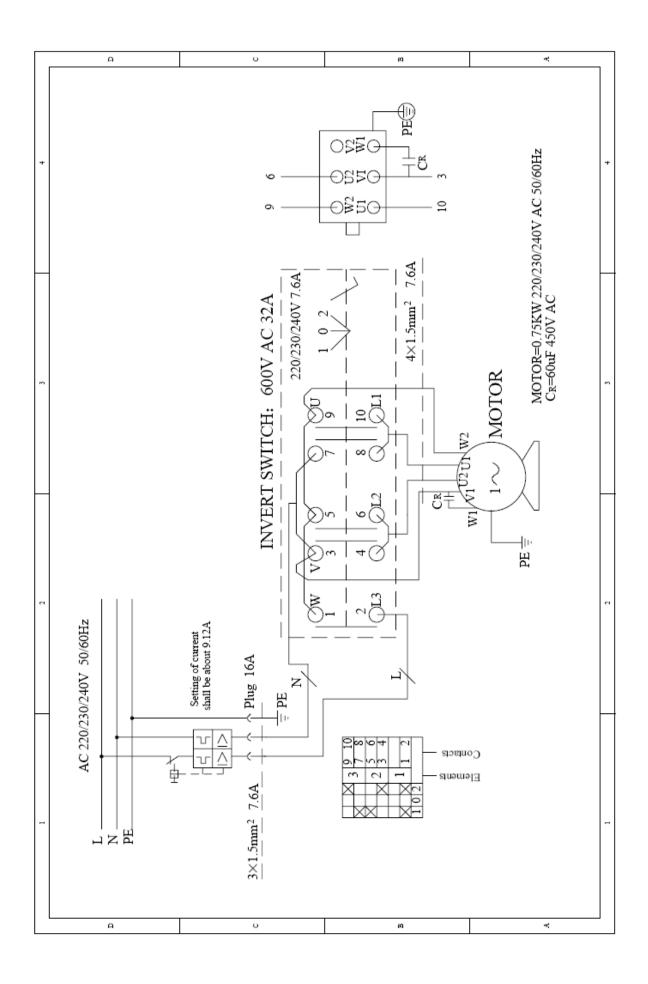
No.	Code	Qt.	Description	No.	Code	Qt.	Description
	BZ-233(A)/211		·				·
1	0101	1	Body	213	GB/T 894.1	4	Circlip φ12
2	C2110615	1	Front cover	214	GB/T 80	4	Screw M12×85
3	GB/T 70	6	Screw M6×55	215	GB/T 95	4	Washer φ12
4	GB/T 95	6	Washer φ6	216	C211012101	2	Slide guide
5	C2110102	1	Left cover	217	C2110148	4	Flat spacer for chuck
6	GB/T 70	6	Screw M6×25	218	C211011904	8	Tightener
7	GB/T 95	6	Washer φ6	219	C211011902	2	Cylinder rod
8	C2110113	1	Rubber wheel support	220	C211011901	2	Front flange
9	C211010105	4	Rubber foot	221	PC08-01	2	Union 8-1/8"
10	C2110158	1	Bead liftng lever	222	JB/T 6997	2	V-seal
11	GB/T 70	4	Screw M6x15	223	JB1092	4	O-ring φ70
12	GB/T 40	1	Rubber plug φ21	224	C211011906	2	Piston
13	GB/T 41	1	Rubber plug φ45	225	GB/T 95	2	Washer φ12
				226	GB/T 1337	2	Self-locking nut M12
101	C5030138	1	Vertical column	227	C211011905	2	Cylinder casing
102	C2110135	1	Column pin	228	GB/T 41	16	Washer φ8
103	GB/T41	1	Self-locking nut M16	229	GB/T 95	16	Nut M8
104	GB/T 95	1	Washer φ16	230	C211011903	2	Rear flange
105	C2110137	1	Column adjusting screw	231	PL08-01	2	L-union 8-1/8"
106	C2110133	1	Locking block handle bar	232	C2110119	2	Complete clamping cylinder
107	C2110127	1	Locking block support	233		1	Complete self-centering chuck
108	C2110134	1	Cone washer	234	C2110143	4	Metal guide
109	GB/T 95	1	Washer φ8				3. 3.
110	GB/T 70	1	Screw M8×20	301	C2110353	1	Union 8-1/4"
111	C2110128	1	Locking block	302	C211010607	1	Washer φ12
112	GB/T 41	1	Nut M12	303	C211010603A	1	Bead breaker cylinder casing
113	GB/T 78	1	Screw M12×30	304	GB/T 1337	1	Self-locking nut M12
114	GB/T 70	1	Screw M8×40	305	GB/T 95	1	Washer φ12
115	C2110132	1	Knob	306	JB1092	1	O-ring φ16
116	C2110129	1	Plastic cover	307	GB/T 95	1	Washer φ14
117	C2110131	1	Spring	308	JB1092	2	O-ring φ180
118	C2110130	1	Locking plate	309	C211010606	1	Bead breaker cylinder lid (front)
119	C2110126	1	Horizontal arm	310	C211010601	1	Bead breaker cylinder rod
120	C2110125	1	Hexagonal vertical arm	311	JB/T 1091	2	V-seal
121	C2110124	1	Buffer bush	312	C211010602	1	Piston
122	489244220020	1	Mounting head plastic protector	313	GB/T 41	12	Nut M6
123	C2110124	1	Munting head	314	GB/T93	12	Spring washerφ6
124	GB/T 119	1	Pin	315	C2110114	1	Shovel
125	GB/T 78	1	Screw M10×25	316	C2110111	1	Bead breaker arm pin (front)
126	GB/T 95	1	Washer φ10	317	GB/T 1337	1	Self-locking nut M16
127	GB/T 80	3	Screw M12×15	318	GB/T 96	1	Washer φ16
128	GB/T 95	4	Washer φ10	319	TC07082001	1	Cotter
129	GB/T 41	4	Nut M10	320		İ	
130	GB/T 78	4	Screw M10×25	321	C2110105	1	Bead breaker arm
131	C2110123	1	Complete mounting head	322	C2110142	1	Bead breaker arm pin (rear)
				323	C2110168	1	Rotating pin
201	C2110122	1	Turntable	324	GB/T 1337	1	Self-locking nut M12
202	C2110145	4	Slide	325	GB/T 95	2	Washer φ12
203	C2110144	4	Jaw	326	GB/T 5287	1	Washer φ8
204	C2110120	1	Turntable washer	327	GB/T93	1	Spring washerφ8
205	GB/T 5781	1	Screw M16×40	328	GB/T 5783	1	Screw M8×15
206	C2110163	1	Сар	329	C2110108	1	Cushion

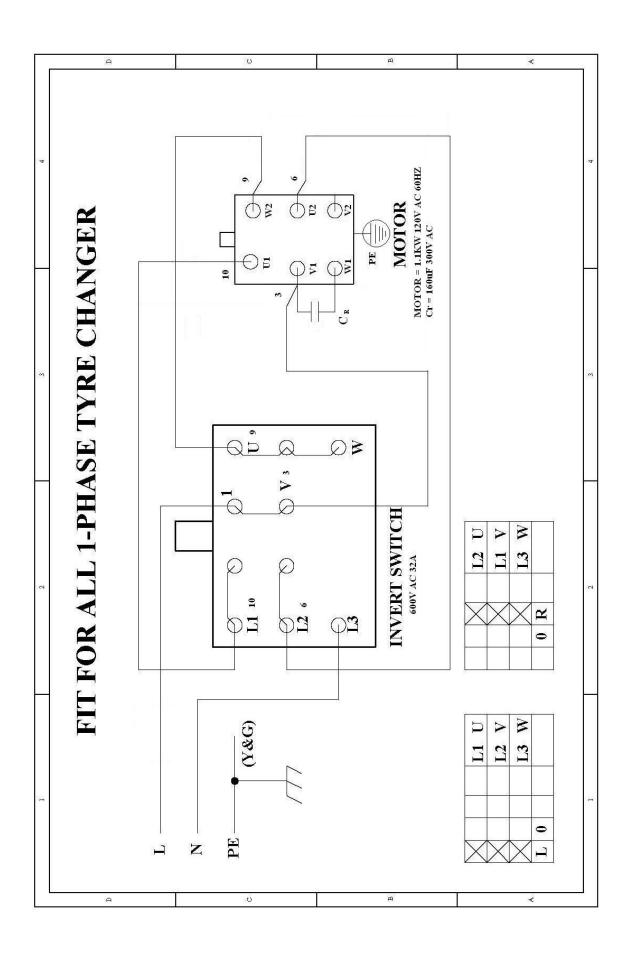
Col. Col.	207	C2110147	1	Control plate	220	C2110104	1	Chrina
209 GBT 894	207		1	Control plate	330		1	Spring
210 C2110150								
211 C2110121 2 Slide guide with pin 334 GB/16781 12 Screw M6X16	-							
212 GBF 95								
C21101106A							1	
101 C211011201 1 Bead breaker pedal 513								
A01 C211011201	336	C2110106A	1	Complete bead breaker cylinder		C211015208	1	Spacer
403 C211011201								
404 C211011202	401	C211011201	1	Bead breaker pedal	513			
405 GB/T 95 2 Washer φ8 517 C211015203 1 Upper cover	402	C211011201	1	Clamping pedal	514			
405 405 405 505 516 68/T/95 10 Washer φ6 406 68/T 70 2 Washer φ8 517 62/11015203 1 Upper cover 406 68/T 70 2 Screw M8×20 518 68/T 1096 1 Key 14×40 407 62/11011206 1 Connecting rod 519 68/T 1096 1 Key 14×40 408 62/11011207 1 Switch lever 520 38/1092 2 0-ring g34 409 62/11011215 1 Cam cover 522 68/T 1036 1 Flat spring g34 410 62/11011215 1 Cam cover 522 68/T 1337 10 Self-locking nut M8 411 62/11011216 1 Flat spring 524 524 52/T 1011216 1 Flat spring 524 52/T 1011216 1 Flat spring 52/T 5	403	C211011202	1	Reverse pedal	515	GB/T 70	10	Screw M6×20
A05			1	·			10	Washer φ6
406 GB/T 70								·
408								
409 GB/T 845 2 Self tapping screw ST3×8 521 C211015205 1 Plastic cap								
409 GB/T 845 2 Self tapping screw ST3×8 521 C211015205 1 Plastic cap			-					
410 C211011215			-					
411 C211011218								
413 C211011216 1 Flat spring 524			-			GB/T 1337	10	Self-locking nut M8
413 C211011209	411	C211011218	1	Switch support				
414 C211011211 2 Spring 526	412	C211011216	1	Flat spring	524			
415 C211011208	413	C211011209	1	Cam	525			
415 C211011208	414		2	Spring	526			
416 GB/T 1337 2 Self-locking nut M4 528 C2110152 1 Complete gearbox			1					
417 GB/T95 4 Washer φ4 529 418 GB/T 973 2 Screw M4X28 1 419 GB/T 894.1 2 Circlip φ12 601 C2110201 1 Motor MY8024 420 GB/T95 2 Washer φ12 602 GB/T 1096 1 Key 6 ×20 421 C211011203 1 Pedals shaft 603 C2110141 1 Motor pulley 422 GB/T 1337 1 Self-locking nut M8 604 GB/T 11 1 Screw M6×10 423 GB/T95 1 Washer φ8 605 GB/T 11544 1 Belt A26" 424 C211011219 1 Spacer 606 C2110211 1 Cable (switch to motor) 425 C211011210 1 Cam connecting rod 607 C2110212 1 Cable (switch to capacitor) 426 GB/T 70 1 Screw M8×50 608 C2110213 1 Cable (switch to capacitor) 427 GB/T 41 </td <td></td> <td></td> <td></td> <td></td> <td></td> <td>C2110152</td> <td>1</td> <td>Complete dearbox</td>						C2110152	1	Complete dearbox
418 GB/T 973 2 Screw M4X28				<u> </u>		02110132	'	Complete gearbox
419 GB/T 894.1 2 Circlip φ12 601 C2110201 1 Motor MY8024				·	329			
420 GB/T95 2 Washer φ12 602 GB/T 1096 1 Key 6 × 20 421 C211011203 1 Pedals shaft 603 C2110141 1 Motor pulley 422 GB/T 1337 1 Self-locking nut M8 604 GB/T 71 1 Screw M6×10 423 GB/T95 1 Washer φ8 605 GB/T 11544 1 Belt A26" 424 C211011219 1 Spacer 606 C2110211 1 Cable (switch to motor) 425 C211011210 1 Cam connecting rod 607 C2110212 1 Cable (switch to capacitor) 426 GB/T 70 1 Screw M6×50 608 C2110202 1 Capacitor 35μF 427 GB/T 41 2 Nut M8 609 C2110213 1 Cable (Switch to capacitor) 428 GB/T95 2 Washer φ6 610 C202011217 1 Switch jacket 429 GB/T 70 2 Screw M6×25 611 C2110154 2 Shock absorber washer 430 GB/T 70 2 Screw M6×25 611 C2110154 2 Shock absorber washer 431 GB/T95 2 Washer φ6 613 IEC947-3 1 Reverse switch 432 GB/T 1337 2 Self-locking nut M8 614 C2110154 2 Washer φ8 433 GZ110112200 2 5-Way valve casing 615 GB/T95 2 Washer φ8 434 GB/T 41 8 Nut M6 616 GB/T 93 2 Spring washer 435 GB/T95 8 Washer φ6 617 GB/T 70 2 Screw M6×25 618 GB/T 70 2 Screw M6×25 618 GB/T 70 4 Screw M8×25 436 GB/T 70 8 Screw M6×25 618 GB/T 70 4 Screw M8×25 437 PT08-01 2 T-union 8-8-1/8" 619 GB/T 41 4 Nut M8 438 PL08-01 1 L-union 8-1/8" 619 GB/T 41 4 Nut M8 439 C2110361 1 Hose (valve to bead breaker cylinder) 440 C2110361 1 Hose (valve to bead breaker cylinder) 441 C2110361 1 Hose (valve to bead breaker cylinder) 442 C2110361 1 Hose (valve to clamping cylinder) 445 QXS-L8 4 Silencer 1/8" 4 Silen					004	00110001		14 / 10/000/
421 C211011203 1 Pedals shaft 603 C2110141 1 Motor pulley 422 GB/T 1337 1 Self-locking nut M8 604 GB/T 71 1 Screw M6×10 423 GB/T95 1 Washer φ8 605 GB/T 11544 1 Belt A26" 424 C211011219 1 Spacer 606 C2110211 1 Cable (switch to motor) 425 C211011210 1 Cam connecting rod 607 C2110212 1 Cable (switch to capacitor) 426 GB/T 70 1 Screw M8×50 608 C2110212 1 Capacitor 35μF 427 GB/T 41 2 Nut M8 609 C2110213 1 Cable (switch to capacitor) 428 GB/T 95 2 Washer φ6 610 C2002011217 1 Switch jacket 429 GB/T 70 2 Screw M6×25 611 C2110154 2 Shock absorber washer 430 GB/T 70 2 Screw M6×25								
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427 GB/T 41 2 Nut M8 609 C2110213 1 Cable 428 GB/T95 2 Washer φ6 610 C202011217 1 Switch jacket 429 GB/T 70 2 Screw M6×25 611 C2110154 2 Shock absorber washer 430 GB/T 70 2 Screw M6×25 612 C2110154 8 Shock absorber washer 431 GB/T95 2 Washer φ6 613 IEC947-3 1 Reverse switch 432 GB/T 337 2 Self-locking nut M8 614 C2110154 2 Washer 433 C2110112200 2 5-Way valve casing 615 GB/T95 2 Washer φ8 434 GB/T 41 8 Nut M6 616 GB/T 93 2 Spring washer 435 GB/T 95 8 Washer φ6 617 GB/T 70 2 Screw M10×25 436 GB/T 70 8 Screw M6×25 618 GB/T 70			1					
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1	432	GB/T 1337	2	Self-locking nut M8	614	C2110154	2	Washer
434 GB/T 41 8 Nut M6 616 GB/T 93 2 Spring washer 435 GB/T95 8 Washer φ6 617 GB/T 70 2 Screw M10×25 436 GB/T 70 8 Screw M6×25 618 GB/T 70 4 Screw M8×25 437 PT08-01 2 T-union 8-8-1/8" 619 GB/T 41 4 Nut M8 438 PL08-01 1 L-union 8-1/8" 620 C2110110 1 Motor support 439 C2110361 1 Hose (valve to valve)	133	C2110112200	2	5 Way yalvo casing	615	CP/T05	2	Washer (18
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445 QXS-L8 4 Silencer 1/8"					1		Ì	
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447 C211011220 1 Complete 5 wear relief							· -	
447 C211011220 1 Complete 5-way valve 802 C2110351 1 Quick change adapter								
448 C211011220 1 Complete pedals 803 JSM-L-Z6 1 L-union 8-1/4"	448	GZ11011220	Т	Complete pedals				
804 C2110331 1 Lubricator					804	C2110331	1	Lubricator

501	C211015203	1	Bottom cover	805	C2110332	1	Filter and pressure reducer
502	GB/T 297	2	Roller bearing 30204	806	C2110333	1	Pressure gauge
503	GB/T 10708	1	V-seal	807	200-03-03	1	Filter and pressure reducer+lubr.
504	C211015207	1	Gear box pulley	808	C2110161	1	Gauge support
505	GB/T 41	1	Nut M10	809	GB/T 95	2	Washer φ4
506	GB/T 1096	1	Key 6×20	810	GB/T 819	2	Screw M4×10
507	C211015206	1	Worm screw	811	GB/T 41	2	Nut M4
508	GB/T 292	2	Bearing 7010				
509	C211015202	1	Worm gear shaft				
510	C211015201	1	Worm gear				

ELECTRIC SCHEMATICS







PNEUMATIC SCHEMATICS

