Atlas Copco

Air Compressor Manual





! WARNING

THIS PRODUCT CAN EXPOSE YOU TO CHEMICALS INCLUDING LEAD, WHICH IS KNOWN TO THE STATE OF CALIFORNIA TO CAUSE CANCER AND BIRTH DEFECTS OR OTHER REPRODUCTIVE HARM. FOR MORE INFORMATION GO TO WWW.P65WARNINGS.CA.GOV 2024114400

Rev. 0821 Part# 1312208400

TABLE OF CONTENTS

	PAGE
Table of Contents	1
Safety Guidelines – Definitions	2
Important Safety Instructions	
Save these instructions	2
Before using the air compressor	2
When installing or moving the compressor	
Before each use	
Follow the safety precautions for electrical connections	
Plan ahead to protect your eyes, hands, face and ears	4
When operating	4
Spraying precautions	5
Perform these maintenance operations	5
Typical Compressor Installation	6
Glossary of Terms	6
Wiring	7
Single and Three Phase with Mag Starter	8
Single and Three Phase Duplex	9
Starting the Compressor	10
Gas Drive Models	11
Battery Connection Instructions for Electric Start Engines	11
Cold Start Procedure (Gasoline Engine Units)	11
Low Oil Level Switch	13
Troubleshooting Guide	14
Pump Specifications	16
Tank Specifications	
Manually Draining an Air Tank:	17
Part Identification	
Compressor Pump T39 (4116090019)	20
Compressor Pump PAT49 (1609402495/1609402496)	
Warranty Statement	22

SAFETY GUIDELINES - DEFINITIONS

Safety is a combination of common sense, staying alert and knowing how your compressor works. Read this manual to understand this compressor.



DANGER

means if safety information is not followed someone will be seriously injured or killed



WARNING

means if safety information is not followed someone could be seriously injured or killed



CAUTION

means if safety information is not followed someone may suffer moderate or minor injury

IMPORTANT SAFETY INSTRUCTIONS

Save these instructions

Improper operation or maintenance of this product could result in serious injury and property damage. Read and understand all warnings and operation instructions before using this compressor.

Before using the air compressor

Things you should know

Air compressors are utilized in a variety of air system applications. Because air compressors and other components (hoses, connectors, air tools, spray guns, etc.) make up a high pressure pumping system, the following safety precautions should be observed at all times.

Only persons familiar with these rules of safe operation should use the air compressor

- Read the instruction manual carefully before attempting to assemble, disassemble or operate your system. Be thoroughly familiar with the controls and the proper use of the equipment.
- Review and understand all safety instructions and operating procedures in this manual.
- 3. Review the maintenance methods for this compressor throughout this manual.

Inspect your work area

- 1. Keep work area clean.
- Cluttered areas and benches invite accidents. Floors must not be slippery from wax or dust.

Inspect your compressor

- To reduce the risk of injury from accidental starting, turn switch off and disconnect the power before checking it.
- If any part is missing, bent or broken in any way or any electrical part does not work properly, keep the compressor off and disconnected.
- Check hoses for weak or worn condition before each use, making certain all connections are secure. Do Not use if defect is found



WARNING

Do not operate compressor if damaged during shipping, handling or use. Damage may result in bursting and cause injury or property damage.



DANGER

This compressor is NOT designed for and should not be used in breathing air applications.

When installing or moving the compressor



WARNING

This compressor is extremely top heavy. The compressor must be bolted to the floor with vibration pads before operating to prevent equipment damage, injury or death. DO NOT tighten bolts completely as this may cause stress to the tank welds. See **Illustration 1a**.

To reduce the risk of a dangerous environment

- 1. Keep work area well lit.
- Operate compressor in a well-ventilated area free from flammable liquids and vapors.
- Operate compressor in a ventilated area so that compressor may be properly cooled and the surrounding air temperature will not be more than 100°F (38°C).
- Never use a compressor in a wet environment.
- Protect material lines and air lines from damage or puncture. Keep hose and wires away from sharp objects, chemical spills, oil, solvents and wet floors.



WARNING

DO NOT secure compressor with toggle bolts into drywall. Drywall sheeting or plaster will not support the weight of the compressor and serious injury could result.

Always Shut Off Gas Valve before moving Gas Drive Compressors

A minimum clearance of 18 inches (46 cm) between the compressor and a wall is required because objects could obstruct airflow

- The compressor should be located where it can be directly wired to a circuit breaker. Based on design, certain compressors should be wired by a qualified electrician.
- Never store flammable liquids or gases in the vicinity of an operating compressor.
- DO NOT locate the compressor air inlet near steam, paint spray, sandblasting areas or any other source of contamination. The debris could damage the motor and pump.



WARNING

Never use plastic (PVC) pipe for compressed air. Serious injury or death could result.



CAUTION

Never use the shipping skid for mounting the compressor.



NOTICE

Electric Compressors are not suitable for outdoor installation.



NOTICE

Gasoline Compressors must be operated outdoors, sheltered from the weather.



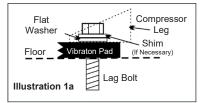
WARNING

Never install a shut off valve between the compressor pump and tank. Personal injury and/or equipment damage could occur.

Before each use

Inspect your work area

- Keep work area clean. Cluttered areas and benches invite accidents.
- The floor must not be slippery from wax or dust.



Inspect your compressor

- To reduce the risk of injury from accidental starting, turn the switch off and disconnect power.
- If any part is missing, bent or broken in any way, or any electrical part does not work properly, keep the compressor off and disconnect power. DO NOT use if defect is found.
- Check hoses for weak or worn condition before each use, making certain all connections are secure. DO NOT use if a defect is found.

Follow the safety precautions for electrical connections

- Follow all local electrical and safety codes, as well as the National Electric Code (NEC) and the Occupational Safety and Health Act (OSHA).
- Wiring and fuses should follow electrical codes, current capacity and be properly grounded.

3. Protect wires from contact with sharp objects.



CAUTION

All electrical connections should be made by a qualified electrician.

Plan ahead to protect your eyes, hands, face and ears

Dress for safety

- Wear safety glasses (meeting ANSI Z87.1 or in Canada CSA Z94.3-99) and use hearing protection when operating the unit. Everyday glasses are not safety glasses.
- 2. Wear shoes to prevent shock hazards.
- 3. Tie back long hair.

Pay attention to your hands



WARNING

Keep fingers away from running compressor. Fast moving and hot parts may cause injury and/or burns.



CAUTION

Be careful when touching the exterior of compressor, pump, motor and air lines; they may become hot enough to cause injury.



WARNING

Never operate the compressor without a belt guard. The compressor can start automatically without warning. Personal injury or property damage could occur from contact with moving parts.



CAUTION

The compressor may be hot even if the unit is stopped.



WARNING

Use of a mask or respirator per chemical manufacturers' instructions may be necessary if there is a chance of inhaling toxic fumes. Read mask and respirator instructions carefully. Consult a safety expert if you are not sure about the use of certain masks or respirators.

When operating

- 1. Do not exceed the pressure rating of any component of the system.
- Release pressure within the system slowly to prevent flying dust and debris.
- If the equipment starts to abnormally vibrate, STOP the compressor immediately and check for the cause.



WARNING

To avoid serious injury, never change the safety valve or pressure switch settings. Keep safety valve free from paint and other accumulations. See compressor specification decal for maximum operating pressure. Do not operate with the pressure switch set higher than the maximum operating pressure.

Spraying precautions



WARNING

Never point a spray gun at yourself or any other person or animal. Accidental discharge may result in serious injury.

Reduce the risk of dangerous environment



WARNING

Extreme caution should be taken when spraying flammable liquids, as the spark from a motor or pressure switch may cause a fire or explosion. Ample ventilation must be provided.



WARNING

Spray in a well ventilated area to keep fumes from collecting and causing serious injury and fire hazards.

 DO NOT spray in the vicinity of open flames or other places where a spark can cause ignition. DO NOT smoke when spraying paint, insecticides or other flammable substances.

Be informed about the materials you use

- When spraying with solvents or toxic chemicals, follow the instructions provided by the chemical manufacturer. Consult a safety expert if unsure about the use of masks or respirators.
- If the material you intend to spray contains trichloroethane and methylene chloride, do not use accessories that contain aluminum or galvanized materials, as these chemicals can react with galvanized components, causing corrosion and weakening equipment. Use stainless steel accessories.

Perform these maintenance operations

- Do regular maintenance; keep all nuts, bolts, and screws tight, to be sure equipment is in safe working condition.
- Inspect tank yearly for rust, pin holes or any other imperfections that could cause it to become unsafe.



WARNING

NEVER attempt to repair or modify a tank! Welding, drilling or any other modification will weaken the tank, resulting in damage from rupture or explosion. To avoid injury, always replace worn, cracked or damaged tanks

- Clean electrical equipment with an approved cleaning agent, such as a dry, non-flammable cleaning solvent.
- 4. Drain tanks of moisture after each day's use. If unit will not be used for a while, it is best to leave the drain cock open until such time as it is to be used. This will allow moisture to completely drain out and help prevent corrosion of inside of tank.
- Always disconnect from power source before working on or near a motor or its connected load. If power disconnect point is out-of-sight, secure it in the "OFF" position and tag it to prevent unexpected application of power.



WARNING

Disconnect power and depressurize system before servicing air compressor to avoid injury. Slightly open drain cock after shutting off compressor.

Daily

Check oil level at sight glass. Oil level should be 1/2 to slightly higher in the oil sight glass. Drain moisture from tank.

Verify the pressure switch unloader is working by listening for a brief hissing sound when the compressor shuts off.

Visually check the compressor for loose parts, excessive noise or vibration. Tighten any necessary part.

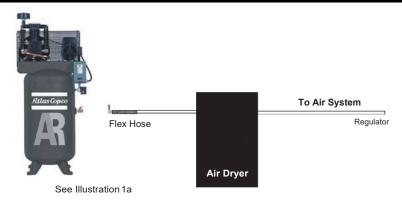
Monthly

(Make sure the main power is off.) Check the belts for tension. Belts should not move up and down when the compressor runs and when stopped, should not have more than 1/2 inch (13 mm) of play when depressed. Be careful not to over tighten belts during adjustment.

Remove and check air filter, replace if necessary.

Change oil every 3 months or 300 hours. A compressor grade 30 wt non-detergent oil should be used. Use 40 wt non-detergent for single stage.

TYPICAL COMPRESSOR INSTALLATION



Vibration Pads

GLOSSARY OF TERMS

Air Filter

Porous element contained within a metal or plastic housing attached to the compressor cylinder head which removes impurities from the intake air of the compressor.

Air Tank

Cylindrical component which contains the compressed air.

Check Valve

Device which prevents compressed air from flowing back from the air tank to the compressor pump.

Electric Motor

Device which provides the rotational force necessary to operate the compressor pump.

Pressure Gauge

Device which shows the tank or regulated pressure of the compressed air.

Pressure Switch

Device which automatically controls the on/off cycling of the compressor. It stops the compressor when the cut-off pressure in the tank is reached and starts the compressor when the air pressure drops below the cut-in pressure.

PSI (Pounds per Square Inch)

Measurement of the pressure exerted by the force of air. The actual psi is measured by a pressure gauge on the compressor.

Pump

Device which produces the compressed air with a reciprocating piston contained within a cylinder.

Safety Valve

Device which prevents air pressure in the air tank from rising over a predetermined limit.

Thermal Overload Switch

Device, integrated into the electric motor winding, which automatically "shuts off" the compressor if the temperature of the electric motor exceeds a predetermined limit.



WARNING

ALL ELECTRICAL WIRING SHOULD BE DONE BY A QUALIFIED FI FCTRICIAN

General Information

Adequate wiring and motor protection should be provided for all stationary compressors. Wiring used for other machinery should not be used. A qualified electrician familiar with local electrical codes in your area should be used. Size supply wiring per NEC (National Electric Code) requirements.



WARNING

To reduce the risk of electrical hazards. fire hazards or damage to the compressor, use proper circuit protection. Your compressor is wired at the factory for operation using the voltage shown. Connect the compressor to a power source with the correct breaker size



WARNING

Electrical connections must be properly grounded. Ground connections should be connected at the grounding screw.



CAUTION

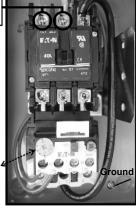
Overheating, short circuiting and fire damage will result from inadequate wiring.

Single Phase

Incoming power should be connected to L1 and L2 at the Top of the Magnetic Starter.







Three Phase



Incoming power should be connected to L1, L2 & L3 at the top of the Magnetic Starter

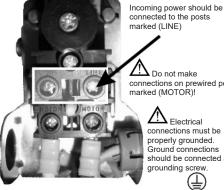
Ground

DO NOT MAKE CONNECTIONS AT THE PRESSURE SWITCH (Units with Magnetic Starters)

Duplex

Power should be brought into the left-hand starter. Do not bring power to both starters.

For Models Without Magnetic Starter

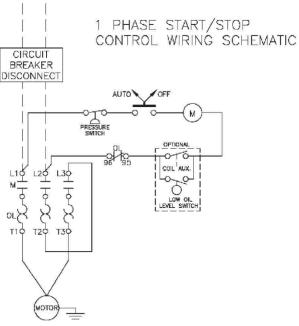


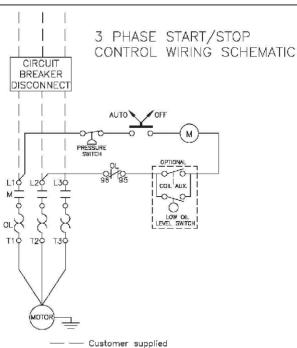
Do not make connections on prewired posts

> Electrical connections must be properly grounded. Ground connections should be connected at a grounding screw.

WIRING

Single and Three Phase with Mag Starter

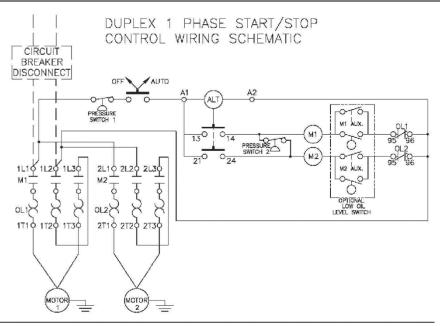


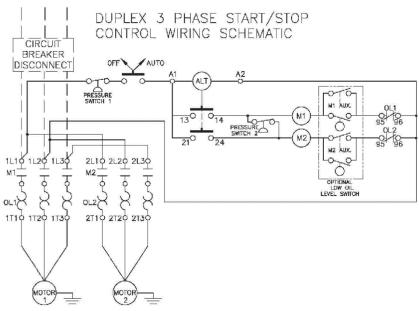


Page 8

WIRING

Single and Three Phase Duplex





— Customer supplied

STARTING THE COMPRESSOR

Prior to actually running the compressor, check the following items:

Crankcase oil - Make sure the sight glass shows 1/2 full or slightly above.

Make sure all rags, tools, oil, etc. are away from the unit.

Open the air system to free it of any pressure.

Switch the compressor on for a few revolutions to make sure the rotation is correct. Correct rotation is clockwise when facing the sight glass on the pump.

Operate the compressor for a few minutes unloaded (air system open) then allow the compressor to pump up. Make sure the electrical pressure switch properly switches off the compressor according to the setting desired. 175 psi for Two Stage and 135 psi for Single Stage.



CAUTION

Make sure the pressure in the tank does not exceed its rating: Single Stage units at 135 psi, Two Stage units at 175 psi.

If the pressure gauge indicates a pressure that is higher than these maximum pressures, shut off compressor immediately and call your distributor.

Gas Drive Models

PLEASE REFER TO YOUR ENGINE OPERATION MANUAL FOR PROPER STARTING INSTRUCTIONS.

GASOLINE DRIVEN COMPRESSORS ARE EQUIPPED WITH A COLD START VALVE FOR LOADLESS STARTS.

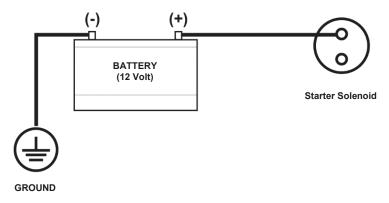
NOTE: IN SOME INSTANCES, IT STILL MAY BE NECESSARY LIFT THE TOGGLE ON THE UNLOADER/PILOT VALVE TO RELIEVE THE HEAD PRESSURE. See Page 11.

Battery Connection Instructions for Electric Start Engines

NOTE: Make sure to follow instructions carefully to avoid a short and possible damage to the starter solenoid and/or battery.

- 1. Connect the positive (+) terminal on the battery to the starter solenoid.
- 2. Connect the negative (-) terminal on the battery to an engine mounting bolt or other acceptable ground connection.

Always connect the positive (+) battery cable to the starter solenoid before connecting the negative (-) battery cable. NUMBER 2 WIRE OR LARGER IS REQUIRED.



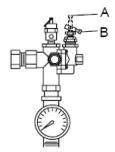
Cold Start Procedure (Gasoline Engine Units)



WARNING

DO NOT OPERATE GASOLINE ENGINE UNITS IN AN ENCLOSED AREA.

- Release any remaining tank pressure by slowly opening the manual drain valve.
- Turn on the engine gasoline supply.
- Put the choke in the "On" position.
- Close the service valve and put Unloader lever in the "unload" (A) position for Briggs and Stratton and Honda engine driven models, or the "load" (B) position for Kohler engine models.
- Start the engine, release the choke, and allow the engine to warm up for two to three minutes.
- Return the unloader lever to the "load" (B) position on Briggs and Stratton and Honda driven models



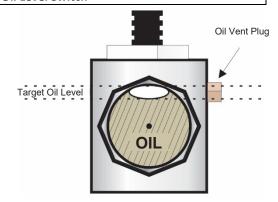
NOTE: Turn the gasoline supply off when the compressor is not being used.

Low Oil Level Switch

The function of the low oil level switch is to keep the air compressor from starting if the oil level drops beyond a certain point.

For compressors outfitted with the low oil level switch, the oil should appear in the top 1/3 of the oil sight glass.

When changing or adding oil, it is important to remove the Oil Vent Plug to allow for the oil to flow completely into the switch.



TRO	UBLESHOOTING G	UIDE
Low discharge pressure	Compressor too small for application	Reduce air demand or use a compressor with more air capacity.
	2. Air leaks	Listen for air leaks. Apply a soap solution to all fittings and connections. Bubbles will form at points of leakage. Tighten or replace fittings or connections.
	Restricted intake air	3. Clean or replace air filter.
	4. Blown gasket(s)	Replace necessary gaskets.
	5. Broken or misaligned valves	Remove head and inspect for broken or misaligned valves. Replace valves, if necessary.
		▲ CAUTION
		Install a new head gasket each time head is removed.
Excessive noise "knocking"	Loose drive pulley or flywheel	Tighten drive pulley or flywheel bolt.
	2. Low on oil	Check for proper oil level. Low or dirty oil may cause bearing damage.
	Worn connecting rod or connecting rod bearing	Replace connecting rod and/or connecting rod bearings.
	4. Noisy check valve	4. Replace check valve.
		▲ DANGER
		Do not remove check valve with air pressure in tank.
Excessive oil carryover	Worn piston rings	1. Replace with new piston rings.
	2. Restricted intake air	2. Clean or replace air filter.
	3. Too much oil in compressor	3. Drain oil to proper oil level.
	4. Incorrect oil viscosity	Use a quality non-detergent 30 or 40 wt oil specified for each model (Page 4).
Water in tank and/or discharge line	Normal amount of water will increase as humidity in the air increases.	Drain tank at least once per day.
		Add an inline filter to reduce moisture in the air line.
Will not run or motor hums	Low voltage	Check voltage with volt meter across both legs of incoming power. Check reset button on motor.
	Malfunctioning pressure switch	Repair or replace pressure switch.
	3. Malfunctioning check valve	Replace check valve or pressure switch.
		▲ DANGER
		Do not remove check valve with air pressure in tank.

TROUBLES	SHOOTING GUIDE	(Continued)
Breaker or reset repeatedly trips	Incorrect breaker size	Make sure the breaker is sized properly. See page 6 in this manual.
	2. Low voltage	Check voltage with volt meter across both legs of incoming power.
	Malfunctioning motor	3. Replace motor.
	Loose electrical connections	4. Check all electrical connections.
	5. Malfunctioning pressure switch	5. Adjust or replace pressure switch.
	6. Malfunctioning check valve	6. Replace check valve.
		▲ DANGER
		Do not remove check valve with air pressure in tank.
Tank does not hold pressure when	Malfunctioning check valve	Replace check valve.
not running and shut off valve is closed		▲ DANGER
		Do not remove check valve with air pressure in tank.
	Loose fittings or connections	Tighten or replace fittings or connections.
	Crack or pin hole in tank	Replace tank. Do not attempt to repair tank.
Pressure switch unloader constantly leaking air	Malfunctioning check valve	Replace check valve if unloader bleeds constantly.
		▲ DANGER
		Do not remove check valve with air pressure in tank.
Pressure switch not unloading	Malfunctioning pressure switch	Replace pressure switch if it does not release air pressure briefly when unit shuts off.
		▲ DANGER
		Do not remove pressure switch with air pressure in tank.
Excessive vibration	Improper installation	Make sure unit is mounted on a level surface with vibration pads.
	2. Loose belts	Replace belts. Align and tighten properly.
	Misaligned flywheel or drive pulley	3. Align flywheel and drive pulley.
Overheating	Compressor too small for application	Reduce air demand or use a compressor with more air capacity.
	2. Cooling surfaces dirty	Clean all cooling surfaces of dirt and dust.
	3. Improper cooling	Install compressor in an area with adequate cool dry air.

PUMP SPECIFICATIONS

Pump Model	Pump P/N	Cyl. No.	Stages
PAT49	1609402495	2	2
T39	4116090019	2	2

Pump	Cyl. Diam i	n. (mm)	Stroke	Max	Oil Cap.	Displacement (@ max RPM
Model	1st Stg	2nd Stg	in. (mm)	rpm	Qt. (L)	CFM	L/M
PAT49	3.74 (95)	1.97 (50)	2.48 (63)	1400	0.91 (0.86)	20.40	578.00
T39	4.13 (105)	2.05 (52)	2.95 (60)	1400	1.09 (1.03)	32.02	906.63

Dump Model	Bolt Torque FtLbs. (NM)				
Pump Model	Conrod	Head	Cylinder	Bearing Housing	Flywheel
PAT49	N/A	18-20 (24-27)	18-20 (24-27)	5-7 (7-10)	18-20 (24-27)
T39	20-22 (27-30)	30-33 (40-45)	16-19 (22-26)	19-22 (26-30)	34-37 (46-50)

TANK SPECIFICATIONS

Volume		Max Pressure		Discharge Conn.
Gal.	Liter	PSI	Bar	NPT
60V	228	170	11.774	1/2"
80V	300	200	13.793	3/4"
30H	114	200	13.793	3/4"



WARNING

Oil and moisture residue must be drained from the air receiver daily or after each use. Accumulations of oil residue in the receiver can be ignited by embers of carbon created by the heat of compression - causing an explosion, damage to property and injury to personnel.



WARNING

Do not open a manual tank drain valve on any air tank containing more than 30 PSIG of air pressure!



WARNING

Never attempt to relieve an air tank by removing a pipe plug or any other system component!

Manually Draining an Air Tank:

- Step 1) Disconnect and lockout the compressor from the power source (electric models) or disconnect the spark plug wire from the spark plug (gas engine models).
- Step 2) Tank(s) subjected to freezing temperatures may contain ice. Store the compressor in a heated area before attempting to drain moisture from the tank(s). Reduce the air pressure in the tank to 30 PSIG by pulling the pressure relief valve ring.
- Step 3) Slowly open the drain valve and allow the moisture and air mixture to drain from the tank.
- **Step 4)** Once the moisture has been completely drained, close the drain valve.

Recommended Air Tank Inspection Intervals

Tank Capacity	Horizontal or Vertical	Visually Inspect	Hydrostatically Inspect
30 Gal.	Horizontal	Yearly	10 Years
60 Gal.	Vertical	Yearly	10 Years
80 Gal.	Vertical	Yearly	10 Years

The factory recommends that all air tanks be inspected at scheduled intervals. Refer to **Recommended Air Tank Inspection Intervals Table** for relative information.

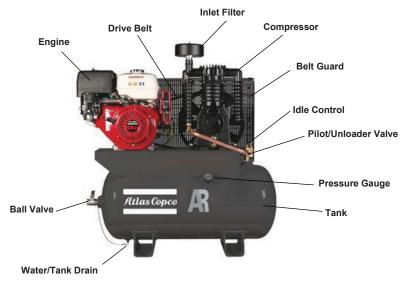
Refer to federal, state or provincial, or local codes for mandatory air tank maintenance information.

PART IDENTIFICATION

Electric



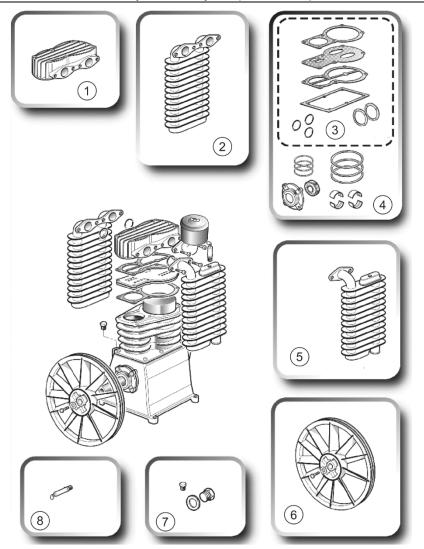
Gas Drive



Model Number	AR5EV2361P1	AR5EV2381P1	AR5V2381P2	AR5V2383P2	AR5V4603P2
Pump	1609402496	1609402496	1609402496	1609402496	1609402496
Motor	2023000811	2023000811	2023000868	2023000814	2023000814
Tank	2023106749	2023106700	2023106700	2023106700	1312204700
Check Valve	2023913311	2023913311	2023913311	2023913311	2023913311
Pressure Switch	2023738400	2023738400	2023738404	2023738404	2023738404
Safety Valve	9710533300	9710533300	9710533300	9710533300	9710533300
Pressure Gauge	2025065900	2025065900	2025065900	2025065900	2025065900
Discharge Line	2023206102	2023206101	2023206101	2023206101	2023206101
Ball Valve	1312100162	2023913804	2023913804	2023913804	2023913804
Inlet Filter	1129705841	1129705841	1129705841	1129705841	1129705841
Tank Drain	1312100360	1312100360	1312100360	1312100360	1312100360
Belt Guard	2021115700	1312101097	1312101097	1312101097	1312101097
Drive Pulley	1312100443	1312100443	2024206600	2024206600	2024220660
Drive Belt	2024200328	1312100139	1312100141	1312100141	1312100141
Magnetic Starter (230V)	N/A	N/A	2023738481	1312101276	N/A
Magnetic Starter (460V)	N/A	N/A	N/A	N/A	1312101274
Low Oil Level Switch	N/A	N/A	N/A	N/A	N/A
Auto Tank Drain	N/A	N/A	N/A	N/A	N/A
Model Number	AR7.5V2381P2	AR7.5V2383P2	AR7.5V2381P2P	AR7.5V2383P2P	
Model Number Pump	4116090019	4116090019	4116090019	4116090019	
Pump Motor	4116090019 1312100400	4116090019 1312101601	4116090019 1312100400	4116090019 1312101601	
Pump Motor Tank	4116090019 1312100400 1312204700	4116090019 1312101601 1312204700	4116090019 1312100400 1312204700	4116090019 1312101601 1312204700	
Pump Motor Tank Check Valve	4116090019 1312100400 1312204700 1312100171	4116090019 1312101601 1312204700 1312100171	4116090019 1312100400 1312204700 1312100171	4116090019 1312101601 1312204700 1312100171	
Pump Motor Tank Check Valve Pressure Switch	4116090019 1312100400 1312204700 1312100171 1312100570	4116090019 1312101601 1312204700 1312100171 1312100570	4116090019 1312100400 1312204700 1312100171 1312100570	4116090019 1312101601 1312204700 1312100171 1312100570	
Pump Motor Tank Check Valve	4116090019 1312100400 1312204700 1312100171	4116090019 1312101601 1312204700 1312100171	4116090019 1312100400 1312204700 1312100171	4116090019 1312101601 1312204700 1312100171	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845 1312100198	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845 1312100198	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845 1312100198	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845 1312100198	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163	4116090019 1312100400 1312204700 1312200171 1312100570 9710533300 1312100845 1312100163 1312100163	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163 1312100374 1312100360	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163 1312100374 1312100360	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100198 1312100198 13121000374 1312100374	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163 1312100374 1312100360	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain Belt Guard	4116090019 1312100400 1312204700 1312100171 1312100570 9710533300 1312100198 1312100163 1312100360 1312100360 131210037	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100163 1312100163 1312100360 1312100360	4116090019 13122004700 1312204700 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163 1312100374 1312100360 1312101097	4116090019 1312101601 1312204700 1312204700 1312100171 13122100570 9710533300 1312100845 1312100163 1312100163 1312100374 1312100374 1312100360 1312101097	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain Belt Guard Drive Pulley	4116090019 1312100400 1312204700 1312204700 1312100171 1312100570 9710533300 1312100845 1312100198 1312100360 1312100360 1312100360 131210097 1312100420	4116090019 1312101601 1312204700 1312100171 13122004700 9710533300 1312100845 1312100198 1312100193 1312100360 1312100360 1312100360 1312100420	4116090019 13122100400 1312204700 1312204700 1312100171 1312100570 971053300 1312100198 1312100198 1312100374 1312100360 1312100374 1312100420	4116090019 1312101601 1312204700 1312100171 1312100570 9710533300 1312100198 1312100198 1312100374 1312100374 1312100374 1312100374 1312100420	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain Belt Guard Drive Pulley Drive Belt	4116090019 1312100400 1312204700 1312204770 1312100171 1312100570 9710533300 1312100845 1312100198 1312100163 1312100360 1312100360 1312101097 1312100197 1312100197	4116090019 1312101601 1312204700 1312204700 1312100171 1312100570 9710533300 1312100198 1312100163 1312100360 1312100360 1312101097 1312100470 1312100470	4116090019 1312100400 1312204700 1312204700 1312100171 1312100570 9710533300 1312100198 1312100198 1312100163 1312100374 1312100360 1312100197 1312100360 1312100197	4116090019 1312201601 1312204700 1312204700 1312100171 1312100570 9710533300 1312100198 1312100198 1312100193 1312100374 1312100360 1312101097 1312101097	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain Belt Guard Drive Pulley Drive Belt Magnetic Starter (230V)	4116090019 13312100400 1312204700 13122204701 13122100171 1312100570 9710533300 1312100183 1312100183 1312100364 1312100374 1312100360 1312100420 1312100420 1312100430 1312100430 1312100430	4116090019 1312101601 1312204700 1312204700 13122100171 1312100570 9710533300 1312100183 1312100183 1312100363 1312100363 1312100360 1312100363 1312100420 1312100420 1312100420 1312100420	4116090019 13122004700 1312204700 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163 1312100163 1312100167 1312100420 1312100420 1312100420 1312100662	4116090019 1312101601 1312204700 1312204700 1312100171 1312200570 971053300 1312100845 1312100163 1312100163 1312100163 1312100197 1312100420 1312100420 1312100429 1312100458	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain Belt Guard Drive Pulley Drive Belt Magnetic Starter (230V) Magnetic Starter (460V)	4116090019 1312100400 1312204700 1312204700 1312100171 1312100570 9710533300 1312100845 1312100183 1312100183 1312100183 1312100374 1312100370 1312100420 1312100420 1312100420 1312100662 NA	4116090019 1312101601 1312204700 1312204700 1312100171 1312100570 9710533300 1312100845 1312100183 1312100183 1312100374 1312100374 1312100370 1312100420 1312100278 1312100278	4116090019 1312100400 1312204700 1312204700 13122100171 1312100570 9710533300 1312100198 1312100198 1312100163 1312100374 1312100360 1312100199 1312100420 1312100420 1312100420 1312100420 1312100499 1312100499	4116090019 1312201601 1312204700 1312204700 1312100570 9710533300 1312100845 1312100198 1312100163 1312100360 1312100360 1312100360 1312100199 1312100199 1312100199 1312100199	
Pump Motor Tank Check Valve Pressure Switch Safety Valve Pressure Gauge Discharge Line Ball Valve Inlet Filter Tank Drain Belt Guard Drive Pulley Drive Belt Magnetic Starter (230V)	4116090019 13312100400 1312204700 13122204701 13122100171 1312100570 9710533300 1312100183 1312100183 1312100364 1312100374 1312100360 1312100420 1312100420 1312100430 1312100430 1312100430	4116090019 1312101601 1312204700 1312204700 13122100171 1312100570 9710533300 1312100183 1312100183 1312100363 1312100363 1312100360 1312100363 1312100420 1312100420 1312100420 1312100420	4116090019 13122004700 1312204700 1312204700 1312100171 1312100570 9710533300 1312100845 1312100163 1312100163 1312100163 1312100167 1312100420 1312100420 1312100420 1312100662	4116090019 1312101601 1312204700 1312204700 1312100171 1312200570 971053300 1312100845 1312100163 1312100163 1312100163 1312100197 1312100420 1312100420 1312100429 1312100458	

	AR-13-30H-H-G
Model Number	
Compressor	1609402496
Engine	1312100219
Tank	2023106770
Unloader Valve	1312100495
Safety Valve	9710533300
Pressure Gauge	1312100378
Discharge Line	2023206026
Ball Valve	1312100163
Inlet Filter	1129705841
Tank Drain	1312100360
Belt Guard	1312900167
Belt	1312100139
Unloader Line	2014705166
Idle Control	1312100382
Drive Pulley	1312101070

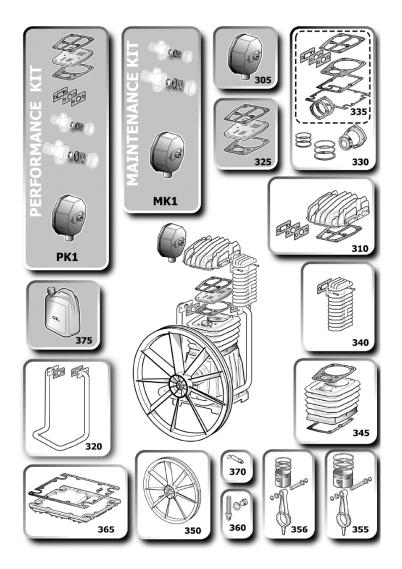
Compressor Pump T39 (4116090019)



Item Number	Description	Part Numbers
01	Head Kit	2901324971
02	Intercooler Kit	2901324972
03	Gasket Kit	1310711137
04	Overhaul Kit	1310711168
05	Aftercooler Kit	2901324973
06	Flywheel Kit	6229018800
07	Oil Level Kit	2901324954
08	225 psi Safety Valve	1312100456

Item Number	Description	Part Numbers
	Filter Assembly	1312100374
	Filter Element	FE001
	Oil Sight Glass	2236102992
	Flywheel Bolt	6211848500
	Flywheel Washer	6214242700
	Valve Kit	2901324723

Compressor Pump PAT49 (1609402495/1609402496)



Item Number	Description	Part Numbers
305	Filter Element	2236113754
310	Cylinder Head Kit	2901320419
320	Intercooler Kit	2901320421
325	Valve Plate Kit	2236113917
330	Bearing and Ring Overhaul Kit	2901320420
335	Gasket Kit	8973037937
340	Aftercooler Kit	2236112794
345	Cylinder Asembly	2236113914
350	Flywheel Kit	2901325050

Item Number	Description	Part Numbers
355	Conrod-Piston Assembly - LP	1129704957
356	Conrod-Piston Assembly - HP	1129704958
360	Oil Level Kit	2901325049
365	Crankcase Bottom Kit	2236112438
370	100 PSI Safety Valve Kit	1127190235
375	Oil	6215716300
MK1	Maintenance Kit	8973037941
PK1	Performance Kit	8973037939

WARRANTY STATEMENT

The Company warrants that the Equipment manufactured by it and delivered hereunder shall be free from defects in material and workmanship for a period of twelve (12) months from the date of initial start-up, or eighteen (18) months from the date of shipment from the manufacturer, whichever occurs first. The foregoing warranty period shall apply to all Equipment, except for the following: (A) All two stage reciprocating stationary models are warranted for the earlier of twenty-four (24) months from the date of initial operation or thirty (30) months from date of shipment from the manufacturer. (B) Replacement parts will be warranted for three (3) months from the date of shipment from the manufacturer. Should the failure to conform to this warranty be reported in writing to the Company within said period, the Company shall, at its option, correct such non-conformity by suitable repair to such Equipment, or furnish a replacement part F.O.B point of shipment, provided that the Purchaser has installed, maintained, and operated such Equipment in accordance with good industry practices, and has complied with specific recommendations of the Company. Accessories and equipment furnished by the Company, but manufactured by others, shall carry whatever warranty the manufacturer conveyed to the Company and which can be passed on to the Purchaser. The Company shall not be liable for any repairs, replacements, or adjustments to the Equipment, or any costs of labor performed by the Purchaser without the Company's prior written approval.

The Company makes no performance warranty unless specifically stated within its proposal, and the effects of corrosion, erosion, and normal wear and tear are specifically excluded from the Company's warranty. In the event performance warranties are expressly included, the Company's obligation shall be to correct in the manner and for the period of time provided above.

THE COMPANY MAKES NO OTHER WARRANTY OR REPRESENTATION OF ANY KIND WHATSOEVER, EXPRESSED OR IMPLIED, EXCEPT THAT OF TITLE, AND ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ARE HEREBY DISCLAIMED. THIS WARRANTY SUPERSEDES ALL PREVIOUS WARRANTY STATEMENTS.

Correction by the Company of non-conformities, whether patent or latent, in the manner and for the period of time provided above, shall constitute fulfillment of all liabilities of the Company and its distributors for such non-conformities with respect to, or arising out of such Equipment.

LIMITATION OF LIABILITY

THE REMEDIES OF THE PURCHASER SET FORTH HEREIN ARE EXCLUSIVE, AND THE TOTAL LIABILITY OF THE COMPANY, ITS DISTRIBUTORS AND SUPPLIERS WITH RESPECT TO CONTRACT OR THE EQUIPMENT AND SERVICES FURNISHED IN CONNECTION WITH THE PERFORMANCE OR BREACH THEREOF, OR FROM THE MANUFACTURE, SALE, DELIVERY, INSTALLATION, REPAIR OR TECHNICAL DIRECTION COVERED OR FURNISHED UNDER CONTRACT, WHETHER BASED ON CONTRACT, WARRANTY, NEGLIGENCE, INDEMNITY, STRICT LIABILITY OR OTHERWISE, SHALL NOT EXCEED THE PURCHASE PRICE OF THE EQUIPMENT UPON WHICH SUCH LIABILITY IS BASED.

THE COMPANY, ITS DISTRIBUTORS AND ITS SUPPLIERS SHALL IN NO EVENT BE LIABLE TO THE PURCHASER, ANY SUCCESSORS IN INTEREST, OR ANY BENEFICIARY OR ASSIGNEE OF THE CONTRACT FOR ANY CONSEQUENTIAL, INCIDENTAL, INDIRECT, SPECIAL OR PUNITIVE DAMAGES ARISING OUT OF THIS CONTRACT OR ANY BREACH THEREOF, OR ANY DEFECT IN, OR FAILURE OF, OR MALFUNCTION OF THE EQUIPMENT, WHETHER OR NOT BASED ON LOSS OF USE, LOST PROFITS OR REVENUE, INTEREST, LOST GOODWILL, WORK STOPPAGE, IMPAIRMENT OF OTHER GOODS, LOSS BY REASON OF SHUTDOWN OR NON-OPERATION, COST OF PURCHASE OF REPLACEMENT POWER, OR CLAIMS OF PURCHASER OR CUSTOMERS OF PURCHASER FOR SERVICE INTERRUPTION, WHETHER OR NOT SUCH LOSS OR DAMAGE IS BASED ON CONTRACT, WARRANTY, NEGLIGENCE, INDEMNITY, STRICT LIABILITY OR OTHERWISE.