Model

BAC-30RT30/BAC-30DC

Manual No. BAC012
(Rev 1 October 2002)

Operating Manual

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Overview

Low pressure breathing air compressors supply air for low pressure constant flow type respirators only. OIlless compressors produce no oil mist, oil vapor, or carbon monoxide (CO). High temperature alarms and oil/water filters are not required, as they are with conventional air compressors. Breathing air compressors do not significantly change the air quality of the ambient air and are not designed to filter carbon monoxide or other toxic gases. An optional carbon monoxide monitor is available where required. Clean, breathable air must be provided to the breathing air compressor inlet at all times. ***Note: Tight fitting constant flow respirators require 4cfm (115lpm) minimum flow rate at the manufacturer's stated pressure. Loose fitting hoods require at least 6cfm (170lpm) per respirator.***

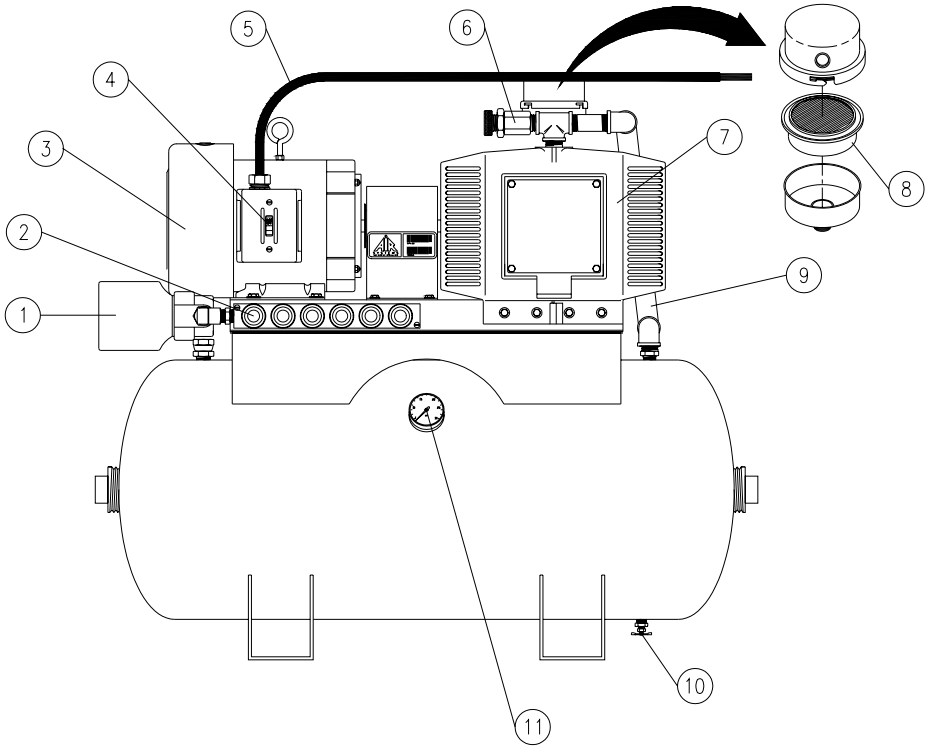
⚠ Caution: Read and Follow All Instructions ⚠

1. Do not use kerosene or any oil based solvents for cleaning these compressors.
2. Do not lubricate oilless breathing air compressors.
3. Do not run this compressor in the wrong rotation; check the rotation arrow on the compressor if you are rewiring the electric motor. Disconnect the power source before servicing the electric motor.
4. Do not run this compressor without connecting at least one hose and respirator to the manifold quick disconnect assembly.
5. Compressor must be used with constant flow, low pressure respirators only. **Pressure demand respirators will not operate on this compressor.**
6. The breathing air compressor units **cannot** be operated in an area that is Immediately Dangerous to Life or Health (IDLH).
7. The air inlet to the breathing air compressor must be located in a clean air environment where breathable air can be assured at all times. Up to 150ft of extension tubing can be used to remote the intake snorkel. Consult the factory for assistance in determining the proper size tubing for remote intake setup.
8. Vortex tubes require high pressure air, 60-100psi, and will not operate on these breathing air compressor systems. Use Air Systems' Cool-Box™ for air cooling; order model BACB-196LP. Provides approximately 50º output air temperature.
9. Pump surfaces can become very hot during operation. Do not touch these surfaces until the unit has been shut off and allowed to cool.

SPECIFICATIONS

MODEL	BAC-30
Output cfm/lpm @ 0psi	32cfm
Motor H.P. HP/kw	Electric--3HP
Amps (230/460VAC)	8.4/4.2
Max Number Masks/Hoods Usable	7/5
Maximum Outlet Pressure	15psi (1.03 bar)
Output pressure gauge	0 - 30psi (0 - 2,1bar)
Intake Filter Efficiency	99% efficiency @ 2.0 micron particle size
Compressor Filter Efficiency	95% efficiency @ 0.7 micron particle size
Relief valve	Adjustable

PARTS IDENTIFICATION



ITEM #	DESCRIPTION	PART #
1	EXHAUST FILTER	BAC-393
2	QUICK-DISCONNECT, HANSEN	QDH5SL6M
3	ELECTRIC MOTOR	MTR034
4	ON/OFF SWITCH	ELSW025
5	POWER CORD, 14-4	ELCB017
6	RELIEF VALVE	COMPA076
7	COMPRESSOR	COMP033
8	INTAKE FILTER	BAC-20F
9	CONNECT HOSE	HOS201
10	DRAIN COCK	BR2DCM
11	PRESSURE GAUGE	GA2030B

Setup & Operation

Step 1)
Wire compressor to electrical box with disconnect or attach an applicable plug to end of power cord. Compressor can be wired for 230 VAC/3 phase or 460 VAC/3 phase.
Note: Check the tag wire tied to the power cord for the proper voltage. If the voltage needs to be changed, refer to the electric motor wiring diagram.

Step 2)
Check intake and outlet filters for excessive dirt and change if necessary. Set compressor in a clean environment, away from hazardous dusts, mists, vapors, and fumes.

Step 3)
Use ***only*** constant flow Type-C respirators. Attach hose(s) and mask(s) to system before turning the unit on. Failure to do so will cause internal motor damage.

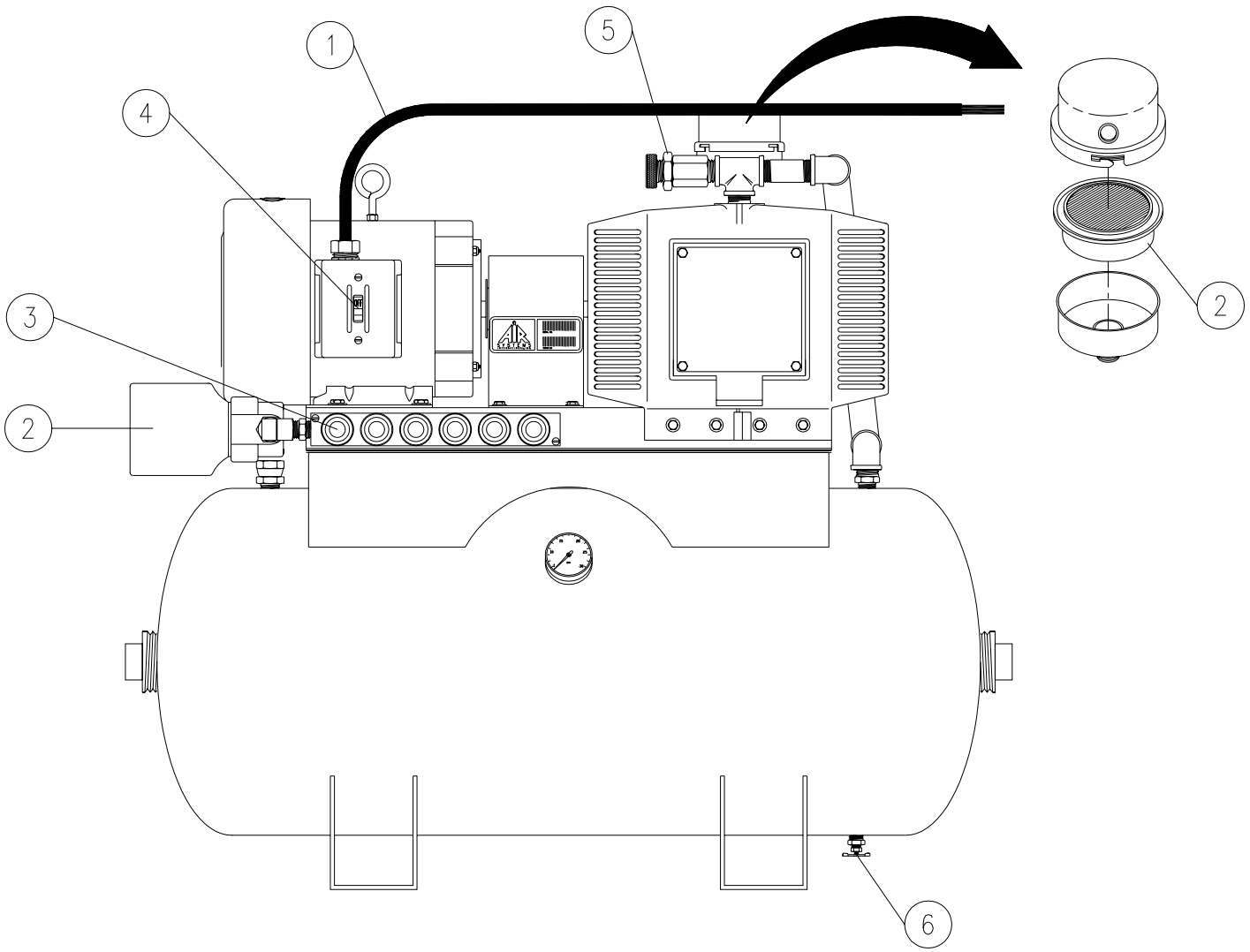
Step 4)
Assure that electrical service amperage rating is in accordance with electrical motor specifications. Turn switch "on" and check for correct motor rotation. If rotation is incorrect, disconnect power switch 2 power leads. Restart compressor.

Step 5)
With the compressor running, and respirators attached, loosen the relief valve lock nut. Adjust outlet pressure to the setting recommended by the respirator manufacturer. Turn clockwise to increase pressure, counterclockwise to decrease pressure.

Step 6)
With compressor running, open drain cock to drain any moisture which may be in receiver tank. This should be done every 2 hours of operation. Close drain cock when complete.

DO NOT EXCEED 15psi OUTPUT PRESSURE

Turn knob of relief valve clockwise to increase pressure, counterclockwise to decrease pressure and retighten lock nut. The unit is now operational.
Note: Do not back the adjustment knob all the way out while unit is pressurized. The loss of internal parts may occur.



Warranty Disclaimer

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