

DATA BULLETIN

# Synthetic PC Series Compressor Oil

ISO 32 to 150

AMSOIL PC Series Synthetic Compressor Oil is a long-life, premium compressor lubricant based on novel, proprietary technology. It incorporates the highest quality, thermally stable PAO synthetics fortified with premium non-detergent, ashless additives for maximum protection at high temperatures and pressures. It lasts up to eight times longer than petroleum oils, effectively reducing maintenance and waste oil disposal costs.



# **Improves Compressor Efficiency**

AMSOIL PC Series Oil has low friction properties and resists viscosity increase from oxidation. It helps improve operating efficiency and saves money on electrical energy consumption.

# **Controls Foam and Reduces Wear**

AMSOIL PC Series Oil contains anti-foam additives and, unlike some other compressor oils, is anti-wear fortified. Good foam control reduces heat, oxidation and wear. High contact regions are protected against wear for increased compressor life and efficiency.

### **Resists Water Contamination**

Water from condensation builds up in compressors and can cause unwanted oil/water emulsions, environmental discharge hazards and rust. AMSOIL PC Series Oil is hydrolytically stable. It resists acid formation, readily separates from water and is anti-rust fortified. Water can be easily drained for simplified environmental discharge and increased oil life.

## **Resists Heat and Oxidation**

AMSOIL PC Series Oil combines the inherent stability of premium synthetic base oils with specialized anti-oxidant additives to resist varnish, carbon and acid formation. It is formulated to protect compressors better and last longer in service than petroleum oils, especially during hot operating conditions.

# **Safety Advantage**

AMSOIL PC Series Oil is an ashless, high-flash-point formulation with very low carbon-forming tendencies that minimizes the incidence of ignition-promoting "hot spots." While PC Series Oil can provide improved fire safety, it cannot be considered non-flammable.

# **Application Recommendation**

AMSOIL PC Series Oil in the appropriate viscosity is recommended for use in single and multistage rotary screw, vane, centrifugal and reciprocating compressor crankcases and cylinders, vacuum pumps and other applications such as gears, bearings, blowers, pumps and handheld pneumatic tools. In compressor applications, drain intervals of 8,000 hours or more can be expected under normal operation. Drain intervals are subject to operating conditions and maintenance practices. Monitoring by oil analysis is recommended. For best performance when converting to AMSOIL PC Series Oil, it is recommended the compressor be drained of the old fluid prior to the installation of PC Series Oil. If carbon deposits are present on the internal components, it is recommended they be removed following the compressor manufacturer recommendations.

# TYPICAL TECHNICAL PROPERTIES

Synthetic PC Series Compressor Oil

	SAE 10W (PCH)	SAE 20 (PCI)	SAE 30 (PCJ)	SAE 40 (PCK)	SAE 50 (PCL)
ISO VG (ASTM D-2422)	32	46	68	100	150
Kinematic Viscosity @100°C (ASTM D-445	) 6.2	7.3	10.9	13.6	17.9
Kinematic Viscosity @ 40°C (ASTM D-445)	33.1	42.4	67.4	100.5	148.4
Viscosity Index (ASTM D-2270)	137	137	153	136	134
Specific Gravity (ASTM D-1298)	0.8393	0.8408	0.8468	0.8550	0.8602
Density (ASTM D-1298)	6.989	7.001	7.051	7.119	7.163
Flash Point °C (°F) (ASTM D-92)	264 (507)	254 (489)	253 (487)	264 (507)	254 (489)
Fire Point °C (°F) (ASTM D-92)	278 (532)	280 (536)	280 (536)	276 (529)	274 (525)
Pour Point °C (°F) (ASTM D-97)	-53 (-63)	-48 (-54)	-40 (-40)	-45 (-49)	-42 (-44)
Four-Ball Wear Test (ASTM D-4172)					
(40 kg, 1200 rpm, 75°C, 1 hr.)	0.45	0.45	0.45	0.45	0.45
Copper Strip Corrosion Test (ASTM D-130)	) 1A	1A	1A	1A	1A
Rust Tests (ASTM D-665 A & B)					
Fresh and synthetic sea water	Pass	Pass	Pass	Pass	Pass
Foam (ASTM D-892, Sequence I, II, & III)	0/0/0	0/0/0	0/0/0	0/0/0	0/0/0
Demulsibility (ASTM D-1401)					
[oil/water/cuff (minutes)]	40/40/0 (5)	40/40/0 (5)	40/40/0 (5)	40/40/0 (5)	40/40/0 (5)

# COMPATIBILITY

AMSOIL PC Series Synthetic Compressor Oil is compatible with petroleum oils and most synthetic oils, seals, paints and materials, including the following:

Gases

- Nitrogen Hydrogen Helium Carbon Monoxide
- Carbon Dioxide (dry) Ethylene Methane
- Propane Butane Propylene Butylenes
- Natural Gas Benzene Butadiene
- Furnace (crack gas) Hydrogen Sulfide (dry)
- Synthetic Gas Sulfur Dioxide

Paints:

• Epoxy • Oil Resistant Alkyd • Acrylic Enamel

Plastics:

• Acetal (Delrin) • ABS • Phenolic • Polyamide-imide

- Polyamide (Nylon)
- Polycarbonate (metal covered only)
- Polyester Polyetherimide (Nylon) Polyimide
- Polyphenylene oxide Polystyrene Polysulfone
- PTFE (Teflon) Terephthalate

**Elastomers:** • Fluoroelastomer (Viton) • Nitrile (Buna N)

• Polyacrylate • TFE/P • Poly Urethane

Note: Not recommended for "breathing air" or refrigeration compressors. Not recommended for use with polycarbonate plastic that is not metal covered, PVC plastic and butyl, ethylene-propylene or SBR rubber. PC Series Oil is not compatible with polyalkylene glycol or silicone oils.

## **HEALTH & SAFETY**

This product is not expected to cause health concerns when used for the intended application and according to the recommendations in the Material Safety Data Sheet (MSDS). An MSDS is available via the Internet at www.amsoil.com or upon request at (715) 392-7101. Keep Out of Reach of Children. Don't pollute. Return used oil to collection centers.

For AMSOIL warranty information, visit www.amsoil.com.



Contact your AMSOIL Dealer for more information on AMSOIL products or to place an order. You may also order direct by calling AMSOIL INC. at 1-800-956-5695 and providing the referral number listed here. ▼

Referral #		

Brian Klinkner - Direct Jobber #1642716 - Ordering - 800-985-5823 - http://www.SyntheticOilDistributor.com