BUY ONLINE FREE CATALOG SAVE UP TO 25%

DATA BULLETIN

Synthetic AW Series Anti-Wear Hydraulic Oil

Excellent Performance in Extreme Cold

Not all hydraulic oils can cut it when the temperature plunges far below zero. We formulated Synthetic AW Series Anti-Wear Hydraulic Oil to flow quickly in bitter cold to help prevent pressure spikes, erratic operation and ruptured hoses and seals. Since ambient temperatures can fluctuate wildly, we also formulated the oil to resist oxidation in the presence of high heat for the best of both worlds. It's the perfect choice for maximizing the life and reliability of equipment that operates in temperature extremes.



Excellent Cold-Weather Performance

Synthetic AW Series Hydraulic Oil doesn't contain the waxes inherent to conventional oils that thicken in cold weather. It stays fluid in sub-zero temperatures for nearly immediate flow at startup. As a result, pumps, bearings, valves and other components receive vital lubrication at startup for long life. Reliable fluid flow reduces instances of pressure spikes that can damage pumps and rupture hoses and seals, helping reduce maintenance.

Maximum Cleanliness

Synthetic AW Series Hydraulic Oil is formulated with naturally resilient base oils that resist chemical breakdown, helping keep hydraulic systems free of damaging varnish. It's fortified with a premium additive system that fights oxidation to help prevent acid formation. With Synthetic AW Series Oils, your hydraulic systems stay clean and deliver reliable, long-lasting performance.

Fights Damaging Heat

Synthetic AW Series Hydraulic Oil contains potent anti-oxidant additives that resist the damaging effects of high heat. Its synthetic base oils maintain viscosity despite elevated heat to keep components protected against wear. The oil's ability to resist heat maximizes fluid life.

- **Anti-wear** protection for high-pressure systems
- **Stays** fluid in extreme cold
- **Maintains** cleanliness
- **Promotes** maximum fluid life

All trademarked names and images are the property of their respective owners and may be registered marks in some countries. No affiliation or endorsement claim, express or implied, is made by their use. All products advertised here are developed by AMSOIL for use in the applications shown.

Order by Phone 1-800-956-5695 - Give Operator Reference #5983322

TYPICAL TECHNICAL PROPERTIES

Synthetic AW Series Anti-Wear Hydraulic Oils

	AWG ISO 22	AWH ISO 32	AWI ISO 46
ISO VG (ASTM D2422)	22	32	46
VK 100°C cSt (ASTM D445)	5.9	7.4	9.7
VK 40°C cSt (ASTM D445)	20.7	33.1	49.1
Viscosity Index (ASTM D2270)	256	200	188
SpGr - g/ml (ASTM D1298)	0.8363	0.8453	0.8463
Density - lb/gal (ASTM D1298)	6.964	7.038	7.047
Flash Point °C (°F) (ASTM D92)	174 (345)	228 (442)	230 (446)
Fire Point °C (°F) (ASTM D92)	188 (370)	248 (478)	250 (482)
Pour Point °C (°F) (ASTM D97)	<-60 (<-76)	-51 (-60)	-46 (-51)
Four-Ball Wear Test (ASTM D4172)			
(40 kg, 1200 rpm, 75°C, 60 min.)	0.45	0.45	0.45
Copper Strip Corrosion Test (ASTM D130)	1A	1A	1A
Foam (ASTM D892)			
Sequence I, II, III Test End	0/0,0/0,0/0	0/0,0/0,0/0	0/0,0/0,0/0
Dielectric Strength (ASTM D877)			
Voltage, kV AC	43.6	46.2	45.4
Demulsibility (ASTM D1401)			
Oil/Water/Cuff (min)	40/40/0 (10)	40/40/0 (10)	40/40/0 (10)
Rust Test (ASTM D665 A & B)			
Fresh Water and Synthetic Sea Water	Pass	Pass	Pass

APPLICATIONS

Use the correct viscosity of AMSOIL Synthetic AW Series Anti-Wear Hydraulic Oil in high- and low-pressure gear, vane and piston stationary and mobile hydraulic systems that require a listed specification. They are excellent for general-purpose use where extended drain intervals are desired and in severe-duty operation where temperature extremes are encountered.

AMSOIL AW Series Oils are compatible with hydraulic system seals, petroleum hydraulic oils and most synthetic hydraulic oils (**not compatible** with phosphate-ester, silicone or water-based fluids). For optimum performance, it is recommended the system be thoroughly drained and, if warranted, cleaned prior to installation. Oil analysis is recommended to maximize oil drain intervals.

Denison* HF-0, HF-1 and HF-2
Vickers* M-2950-S and I-286-S
Cincinnati Milacron* P-68, P-69 and P-70
U.S. Steel* 127
Racine*, variable volume vane pumps
DIN 51524, Parts 2 and 3 HLP22-HLP46
ASTM D-6158 HV
AFNOR* E 48-603 (*except for PM-500 series silver-containing pumps, which require R&O additive systems)*
Ford* M6C32
GM* LH-04-1, LH-06-1 and LH-15-1
Lee Norse* 100-1
Jeffrey* No. 87
BF Goodrich* 0152
Commercial Hydraulics* (*except for PM-500 series silver-containing pumps, which require R&O additive systems)*

AMSOIL PRODUCT WARRANTY

AMSOIL products are backed by a Limited Liability Warranty. For complete information visit www.amsoil.com/warranty.aspx.

HEALTH AND SAFETY

This product is not expected to cause health concerns when used for the intended applications and according to the recommendations in the Safety Data Sheet (SDS). An SDS is available online at www.amsoil.com or upon request at (715) 392-7101. **Keep Out of Reach of Children.**

*All trademarked names and images are the property of their respective owners and may be registered marks in some countries. No affiliation or endorsement claim, express or implied, is made by their use. All products advertised here are developed by AMSOIL for use in the applications shown.

AMSOIL The First in Synthetics®

AMSOIL products and Dealership information are available from your local full-service AMSOIL Dealer.

© 2018, AMSOIL INC.
Order by Phone 1-800-956-5695 - Give Operator Reference #5983322