



Hydraulic LP Oil

Low Pour Anti-Wear Hydraulic oil

Features & benefits

- Multi-grade
- HV / HVLP hydraulic fluid
- Expanded operating temperature range
- Excellent corrosion and wear protection for long pump life
- Superior foam resistance for efficient pump operation
- Excellent water tolerance where contamination is unavoidable
- Outstanding oxidation resistance for long service life



Typical results

| Test Method | 15 | 22 | 32 | 46 | 68 | 100 |
|---|-----------------|-------------------|-----------------|-----------------|-----------------|-----------------|
| ISO GRADE | 15 | 22 | 32 | 46 | 68 | 100 |
| ASTM COLOUR (D1500) | <1.0 | 1.0 | 1.0 | 1.0 | 1.0 | 2.5 |
| DYED COLOUR | - | Blue ¹ | - | - | - | - |
| VISCOSITY (D445) | | | | | | |
| cSt @ 40°C | 14.9 | 22.1 | 33.06 | 45.6 | 66.1 | 97.6 |
| cSt @ 100°C | 4.0 | 5.0 | 6.5 | 7.9 | 10.3 | 13.6 |
| VISCOSITY INDEX (D2270) | 184 | 161 | 157 | 146 | 142 | 140 |
| DENSITY @ 15°C (D4052), kg/L | 0.84 | 0.85 | 0.85 | 0.86 | 0.87 | 0.88 |
| POUR POINT, °C (D5949) | -59 | -48 (D97) | -48 | -42 | -39 | -30 |
| FLASH POINT (D93), °C | 174 | 185 | 212 | 214 | 212 | 214 |
| OXIDATION LIFE (D943), hrs | 6500+ | | | 6000+ | 4000+ | |
| ZINC CONTENT (D4951), %wt | 0.04 | | | | | |
| DEMULSE (D1401), Oil mL – water mL – emulsion mL (mins) | 40-40-0 (30) | 40-40-0 (30) | 37-40-3 (20) | 40-37-3 (25) | 40-38-2 (25) | 40-40-0 (10) |
| DIELECTRIC STRENGTH (D877), kV | 48 | 48 | 41 | - | - | - |
| COPPER CORROSION (D130) | 1B | | | | | |
| RUST TEST A & B (D665) | PASS | | | | | |
| FOAM SEQUENCE I, II, III (D892), mL/mL | ≤ 50/0 | | | | | |

¹ Hydraulic LP 22B, only. Hydraulic LP 22 is not dyed. All other performance characteristics/testing are identical.

Irving Hydraulic LP Oils are HV/HVLP multi-grade, zinc-based anti-wear fluids meeting the demands of modern, high-pressure hydraulic systems.

Irving Hydraulic LP Oils offer the same wear and corrosion protection as traditional hydraulic oils but operate over a broader range of operating temperatures.

Irving Hydraulic LP Oils are versatile, true multi-grade hydraulic oils specially formulated to withstand the high-shear environment of hydraulic pumps and motors. Their unique multi-grade nature allows for lower start-up and higher operating temperatures than comparable single-grade hydraulic oils, enhancing productivity and operational flexibility.

Irving Hydraulic LP Oils suit most hydraulic pumps and motors, from mobile to outdoor fixed machinery, even at pressures as high as 5,000 psi (350 Bar).

Irving Hydraulic LP in ISO grades 15 and 22 is suitable for snowplow applications. These grades have excellent cold-temperature fluidity and a high viscosity index to minimize viscosity fluctuations as the temperature changes. Hydraulic LP 22B is dyed blue for easy leak detection.

Irving Hydraulic LP Oils should not be used with pumps containing silver-plated parts. Instead, Irving Hydraulic ZF is recommended for such applications, while Irving D&E oils are suitable for light-duty hydraulic systems with silver-plated parts.

See next page for product specifications and codes.

Always consult your owner's manual for verification of fluid type and grade!

Supporting data available to demonstrate acceptable performance. Check with Sales Associate for the latest product approvals.

Please note these are typical performance indicators and can change without notice.

This data sheet replaces previous versions prior to January 7, 2025.

www.irvingoil.com/lubricants 1.800.574.5823



Hydraulic LP Oil

Low Pour Anti-Wear Hydraulic oil

Specifications

✓ Meets requirements

| Specification | 15 | 22 | 32 | 46 | 68 | 100 |
|--|----|----|----|----|----|-----|
| DIN 51524-3 (HVLV) | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| ASTM D6158 (HV) | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| ISO 11158 (HV) | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| SAE MS 1004 (HV) | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| Parker (formerly Denison) HF-0 | - | - | ✓ | ✓ | ✓ | - |
| Parker (formerly Denison) HF-1 | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| Parker (formerly Denison) HF-2 | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| Eaton M-2950-S, I-286-S3 and 35VQ25 ² | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| Eaton E-FDGN-TB002-E | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| Bosch Rexroth RE 90220, 90240 ³ | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| GM LS2 | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| Fives P-68 | - | - | ✓ | - | - | - |
| Fives P-69 | - | - | - | - | ✓ | - |
| Fives P-70 | - | - | - | ✓ | - | - |
| AIST 126 | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| AIST 127 | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |

² Obsolete Specification

Sizes & order codes

| Size | 15 | 22 | 22B ³ | 32 | 46 | 68 | 100 |
|-------------------------------------|----------|----------|------------------|----------|----------|----------|----------|
| 18.9 L (5 US gal) | F0081840 | F0088440 | F0088540 | F0088640 | F0081740 | F0081640 | - |
| 205 L (54.2 US gal) Plastic Drum | - | F0007550 | - | F0007750 | - | - | - |
| 205 L (54.2 US gal) Metal Drum | - | F0013550 | F0007650 | F0013650 | F0050450 | F0033450 | F0025050 |
| 1000 L (264 US gal) | F0028360 | F0007560 | - | F0007760 | F0028260 | F0028160 | - |
| 1000 L (264 US gal) Bulk Tote | - | F0108801 | - | F0108201 | F0110001 | - | - |
| Bulk | B0028301 | B0007501 | B0007601 | B0007701 | B0028201 | B0028101 | B0028001 |

³ Hydraulic LP 22B Oil is dyed blue

Always consult your owner's manual for verification of fluid type and grade!

Supporting data available to demonstrate acceptable performance. Check with Sales Associate for the latest product approvals.

Please note these are typical performance indicators and can change without notice.

This data sheet replaces previous versions prior to January 7, 2025.

www.irvingoil.com/lubricants 1.800.574.5823