



WHITE OILS

White oils are among the most versatile products in the world, making them a standard preference across diverse industries. Due to their extreme purity, white oils provide an effective use as a base, emollient, lubricant, release agent, binder, or excipient in multiple product applications.

Calumet white oils of specific viscosities are refined to meet the purity specifications of the USP/NF monographs and FDA standards.

- A trusted key ingredient for more than 100 years.
- Heavily credentialed to meet global standards.
- We use the highest quality ingredients from reliable sources to ensure traceability.
- Multiple manufacturing sites ensure dependable supply sourcing.
- Our manufacturing process delivers not only a high purity and safe product but is also very stable over time.

APPLICATIONS

- | | | |
|-----------------------|-------------------|-------------------------------|
| ■ Lubricants | ■ Water Treatment | ■ Personal Care and Cosmetics |
| ■ Metalworking Fluids | ■ Adhesives | ■ Pharmaceuticals |
| ■ Paints and Coatings | ■ Greases | ■ Plastics and Packaging |
| ■ Sealants | | |

WHITE OILS

MINERAL OIL USP

| PROPERTIES | METHOD | DRAKEOL 19 | DRAKEOL 21 | DRAKEOL 32 | DRAKEOL 34 | DRAKEOL 35 | DRAKEOL 350 | DRAKEOL 600 |
|-----------------------------|--------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|
| Viscosity @ 100 °F (SUS) | D2161 | 180/190 | 200/215 | 312/330 | 370/410 | 340/365 | 350/370 | 515/625 |
| Viscosity @ 40 °C (cSt) | D7042 | 34.9/37.3 | 38.4/41.5 | 60.0/63.3 | 72.0/79.5 | 65.8/71.0 | 66.7/71.2 | 99.0/120.0 |
| Specific Gravity @ 25/25 °C | D4052 | 0.8520/0.8760 | 0.8530/0.8760 | 0.8560/0.8760 | 0.8580/0.8720 | 0.8640/0.8810 | 0.8570/0.8730 | 0.8600/0.8780 |
| Flash Point, COC (°F) | D92 | 410 | 420 | 440 | 475 | 465 | min 400 | 505 |
| Flash Point, COC (°C) | D92 | 210 | 215 | 226 | 246 | 240 | min 206 | 263 |
| Pour Point (°F) | D97 | 5 | 5 | 5 | 5 | 5 | 10 | 10 |
| Pour Point (°C) | D97 | -15 | -15 | -15 | -15 | -16 | -15 | -12 |
| FDA 21 CFR 172.878 | FDA | PASS | PASS | PASS | PASS | PASS | PASS | PASS |

LIGHT MINERAL OIL NF

| PROPERTIES | METHOD | PENETECK | DRAKETEX 50 | DRAKEOL 5 | DRAKEOL 6 VR | DRAKEOL 7 | DRAKEOL 9 | DRAKEOL 10B | DRAKEOL 10 | DRAKEOL 13 | DRAKEOL 15 |
|-----------------------------|--------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|
| Viscosity @ 100 °F (SUS) | D2161 | 39.5/44 | 48/53 | 50.2/60 | 10.0/10.6* | 65/75 | 80/90 | 95/105 | 102/115 | 125/135 | 145/155 |
| Viscosity @ 40 °C (cSt) | D7042 | 3.9/5.3 | 6.5/7.8 | 7.0/9.6 | 9.4/10.0 | 10.8/13.6 | 14.2/17.0 | 17.7/20.2 | 19.0/21.9 | 24.2/26.3 | 28.1/30.3 |
| Specific Gravity @ 25/25 °C | D4052 | 0.8210/0.8370 | 0.8200/0.8610 | 0.8180/0.8610 | 0.8340/0.8380 | 0.8330/0.8610 | 0.8330/0.8610 | 0.8670/0.8840 | 0.8380/0.8640 | 0.8480/0.8670 | 0.8500/0.8730 |
| Flash Point, COC (°F) | D92 | 290 | 325 | 335 | 350 | 360 | 385 | 340 | 415 | 400 | 405 |
| Flash Point, COC (°C) | D92 | 207 | 204 | 212 | 173 | 196 | 182 | 177 | 168 | 163 | 143 |
| Pour Point (°F) | D97 | -25 | -20 | -20 | -20 | -10 | 0 | -25 | 5 | 5 | 5 |
| Pour Point (°C) | D97 | -33 | -12 | -12 | -29 | -26 | -26 | -31 | -16 | -15 | -15 |
| FDA 21 CFR 172.878 | FDA | PASS | PASS | PASS | PASS | PASS | PASS | PASS | PASS | PASS | PASS |

*Valued in cSt

TECHNICAL MINERAL OIL

| PROPERTIES | METHOD | PAROL® 100 | PAROL 80 | PAROL 70 | 4463 OIL | 6970 OIL | 6970 LP OIL |
|-----------------------------|--------|------------|----------|---------------|---------------|----------|---------------|
| Viscosity @ 100 °F (SUS) | D2161 | 100/115 | 75/90 | 65/75 | 42/59 | 50/75 | 50/75 |
| Viscosity @ 40 °C (cSt) | D7042 | 20.32* | 15.53* | 10.80/13.60 | - | - | 9.40* |
| Specific Gravity @ 25/25 °C | D4052 | 0.8441* | - | 0.8330/0.8610 | - | - | - |
| Specific Gravity @ 60/60 °F | D4052 | - | 0.8494* | 0.8361* | 0.8350/0.8708 | 0.8760 | 0.8200/0.8760 |
| Flash Point, COC (°F) | D92 | 400 | 380 | 365 | 325 | 340 | 330 |
| Flash Point, COC (°C) | D92 | 204 | 193 | 185 | 162 | 171 | 165 |
| Pour Point (°F) | D97 | 5 | 0 | -10 | -25 | -25 | -25 |
| Pour Point (°C) | D97 | -21 | -21 | -23 | -31 | -31 | -31 |
| FDA 21 CFR 178.3620(B) | FDA | PASS | PASS | PASS | - | PASS | PASS |

*Typical values

Calumet specializes in NICHE PRODUCT BLENDING to meet customer or monograph (including, not limited to USP/NF, EP, JP) specific requirements.

Download a digital copy of this brochure.



REGULATORY INFORMATION

- White mineral oil is included on the TSCA Inventory.
- The CAS number for all products listed above is 8042-47-5.
- See Safety Data sheet for additional health, safety and disposal information.
- All Drakeol® products, Draketex™ 50, and Penetec® meet the following FDA regulations: 21 C.F.R. § 172.878 regarding direct food additives, 21 C.F.R. § 178.3620 (a) regarding indirect food additives, and 21 C.F.R. § 573.680 regarding animal food additives and H1 food processing lubricant standards. Penreco technical mineral oils meet 21 C.F.R. § 178.3620 (b) regarding indirect food additives and 21 C.F.R. § 573.680 regarding animal food additives.
- All Drakeol products are inhibited with less than 20 ppm dl-alpha tocopherol (vitamin E).

© 2023 Calumet Specialty Products Partners, L.P.

All trademarks are owned by Calumet Refining, LLC ("Calumet"), a wholly-owned subsidiary of Calumet Specialty Products Partners, L.P., unless otherwise specified.

Rev. 11/23



CORPORATE HEADQUARTERS

2780 Waterfront Pkwy, E. Drive • Indianapolis, IN 46214
Calumet.com • (800) 437-3188 • (317) 328-5660

CUSTOMER SUPPORT
customerservice@calumet.com

PRODUCT SUPPORT
technical@calumet.com

SALES INQUIRIES
sales@calumet.com