


EFORCE X5
MINERAL
PRODUCT DESCRIPTION:

EFORCE X5 is a high-performance, heavy-duty engine oil formulated with premium mineral base stocks and advanced additive technology. It delivers exceptional dispersancy and detergency, along with robust wear and oxidation resistance. Designed for mixed fleet applications, it is ideal for a variety of heavy-duty diesel engines and accommodates fuels across a broad range of quality standards.

APPLICATION:

Recommended for modern heavy-duty engines, wide range of turbocharged or naturally aspirated diesel engines, generators, trucks, construction cars, passenger cars or mixed car group comprising diesel and gasoline cars. It is recommended for automotive diesel engine of passenger cars and light commercial vehicles where the OEM recommends API CF-4 or earlier specification.

FEATURES & BENEFITS:

- Fuel saving and reduces maintenance expenses for machines and engines.
- Very long oil changing period.
- Resists oil thickening and the formation of carbon, varnish and sludge deposits.
- Good viscosity control.
- Prolonged engine life.
- Safeguards the moving parts.
- Keeps engine Clean.

PERFORMANCE LEVELS / MEETS OR EXCEEDS:

- API CF-4/SJ
- MB 228.2
- ACEA E2-96, A3/B3
- MTU Type-2
- MAN 3275-1
- VOLVO VDS
- MACK EO/K2
- CES 20075/74/73

TYPICAL PROPERTIES:

| PARAMETERS | ASTM | UNIT | EFORCE X5 | | | | | | | |
|-------------------------------------|-------|----------|------------------|------------------|------------------|------------------|--------|------|------|------|
| | | | 15W-40 | 15W-50 | 20W-50 | 20W-60 | 25W-60 | 30 | 40 | 50 |
| Grade | | | | | | | | | | |
| Kinematic Viscosity @ 104°F / 40°C | D7042 | cSt | TBR | TBR | TBR | TBR | TBR | TBR | TBR | TBR |
| Kinematic Viscosity @ 212°F / 100°C | D7042 | cSt | 15.3 | 15.2 | 19.8 | 24.2 | 24.0 | 11.2 | 15.5 | 20.2 |
| Viscosity Index (min) | D2270 | - | 135 | 135 | 120 | 120 | 115 | 95 | 95 | 95 |
| Density@15°C/ 60°F | D4052 | g/cm³ | TBR | TBR | TBR | TBR | TBR | TBR | TBR | TBR |
| Flash Point (min) | D92 | °C | 220 | 220 | 220 | 220 | 220 | 220 | 220 | 220 |
| Pour Point (max) | D97 | °C | -33 | -33 | -24 | -24 | -21 | -9 | -9 | -9 |
| TBN | D2896 | mg KOH/g | 9 | 9 | 9 | 9 | 9 | 9 | 9 | 9 |
| CCS | D5293 | m.Pa.S | <7000 (-20°C) | <7000 (-20°C) | <9500 (-15°C) | <9500 (-15°C) | - | - | - | - |

DISCLAIMER: The test data presented above is indicative and not a strict specification, as it may vary within acceptable production tolerances. Internol reserves the right to update or modify this test data. For the most accurate and current information, please refer to the latest version of this Technical Data Sheet (TDS).

HEALTH & SAFETY, ENVIRONMENT:

Continuous or repeated exposure to oil may lead to skin problems. Avoid contact with the oil. In case of contact, wash thoroughly with soap and water. Do not dispose of used oil in drains or the environment. Dispose of it at an authorized used oil collection point. For additional safety information, please refer to the MSDS available on our website at www.internol.net.

PROTECT THE ENVIRONMENT:

Take used oil to an authorized collection point. Comply with local regulation. Do not discharge into drains, soil or water.