

*The future in motor oil will **evolve**[™]*

Product Description

D-A **evolve**[™] supports the performance requirements of the latest API SN and ILSAC GF-5 specifications for virtually all naturally aspirated, turbo-charged and super-charged gasoline fueled passenger cars and light trucks including European and Japanese vehicles. In addition, D-A offers a Commercial CJ-4 15W-40 diesel engine oil for heavy duty trucks and equipment.

D-A **evolve**[™] begins with an ultra-clean, high quality, re-refined base stock. A revolutionary process completely removes all contaminants and re-refines used oils much the same as crude oil lube stock.

Our advanced proprietary ChemGuard[™] additive technology is added to fully protect and never compromise performance. This combination of high quality chemistry will continue to provide an extraordinary high level of durability and defense against wear as you have come to expect from D-A Lubricant Company products.

The D-A **evolve**[™] advanced formula is less dependent on drilling additional crude oil to reduce the burden on natural resources and requires less energy to manufacture, thus having a considerably overall smaller environmental impact. What remains is an unchanged quality, unmatched protection and unparalleled performance.

Gasoline Powered Engines - Product Features and Benefits

D-A **evolve**[™] automotive engine oil offers excellent protection against engine deposits and high temperature thermal breakdown. ChemGuard[™] additive technology enhances oxidation stability, dispersancy, emission system protection and anti-wear performance over other mineral base motor oils.

Product Features and Benefits

- High temperature protection improves thermal stability under severe operating conditions
- High detergency keeps engine free of sludge and varnish deposits
- Anti-wear additives dramatically reduce engine wear especially during cold start-ups
- Formulated for improved fuel economy in new and old vehicles
- Additive system designed to reduce catalyst poisoning and prolong emission system life

Diesel Powered Engines - Product Features and Benefits

D-A **evolve**[™] 15W-40 is an 8 TBN oil designed specifically to support the stringent performance requirements of API Service Category CJ-4 used in 2007 and later model diesel engines running primarily on ultra-low sulfur fuel and equipped with after treatment devices. D-A **evolve**[™] 15W-40 is technologically advanced with ChemGuard[™] additives for heavy-duty diesel engine oil, designed to provide extra protection against deposits and wear for engines operating in heavy duty service.

Product Features and Benefits

- Reduced oil consumption and operating costs
- Improved control of engine wear through rapid oil flow on cold starts
- Proper metal-to-metal separation during high temperature / high load operation
- Optimum dosage of active diesel detergents keeps internal engine parts clean and operating efficiently under Exhaust Gas Recirculation conditions
- Supports the performance requirements of mixed heavy-duty diesel fleets in addition to the oil specifications for 2007 and later model diesel engines running on ultra-low sulphur diesel fuel
- Shear stable polymers result in resistance to in-service viscosity loss, providing excellent viscosity protection and reduced oil consumption under tough service conditions
- **evolve**[™] 15W-40 composition has been designed to provide extended life for exhaust after-treatment devices



PRODUCT AT A GLANCE

- Re-Refined Base Stock
- Vigorous ChemGuard[™] additive technology

API Licensed:

- API SN
- API CJ-4 (SAE 15W-40)

Supports the performance requirements of:

- ILSAC GF-5



D-A Lubricant Company, Inc.

801 Edwards Drive, Lebanon, IN 46052 • TEL: 317.923.5321 • FAX: 765.482.3065 • EMAIL: dalube@dalube.com

www.dalube.com

Typical Applications

Gasoline Powered Engines - Applications:

D-A **evolve**[™] supports the performance requirements of virtually all naturally aspirated, turbo-charged and super-charged gasoline fueled passenger cars and light trucks, including European and Japanese vehicles where API SN and/or ILSAC GF-5 oil is called for.

Diesel Powered Engines - Applications:

D-A **evolve**[™] 8 TBN, SAE 15W-40 supports the performance requirements for diesel engines requiring an engine oil meeting API Service Categories API CJ-4, CI-4+, CI-4, CF, SM, ACEA E7, Cummins 20081, Mack EO-O Premium Plus 07, Caterpillar ECF-3, DDC PGOS93K218, Volvo VDS-4, Navistar, DHD-1, and JASO DH-2. Innovative concepts have been incorporated into D-A **evolve**[™] 15W-40 to provide efficient equipment operation and improved component durability.

Typical Properties

| SAE Viscosity Grade | | <u>5W-20</u> | <u>5W-30</u> | <u>10W-30</u> | <u>15W-40</u> 8 TBN | <u>30</u> |
|--|-------------------------|--------------|--------------|---------------|------------------------|-----------|
| Viscosity | | | | | | |
| @ 100 °C, cSt | ASTM D445 | 8.3 | 10.2 | 10.7 | 15.1 | 11.4 |
| @ 40°C, cSt | ASTM D445 | 48.0 | 63.0 | 69.0 | 111.0 | 103 |
| Viscosity Index | ASTM D2270 | 147 | 149 | 143 | 141 | 98 |
| Gravity, API | ASTM D287 | 0.869 | 0.869 | 0.882 | 0.893 | 0.889 |
| Flash Point, COC, °F | ASTM D92 | 410 | 415 | 420 | 450 | 440 |
| Flash Point, COC, °C | ASTM D92 | 210 | 213 | 216 | 232 | 227 |
| Cold Cranking Viscosity — (SAE Grade Maximum: 5W- = 6600 cP, 10W- and 15W- = 7,000 cP) | | | | | | |
| @ -20°C, cP | ASTM D5293 | n/a | n/a | n/a | 4200 | n/a |
| @ -25°C, cP | ASTM D5293 | n/a | n/a | 4400 | n/a | n/a |
| @ -30°C, cP | ASTM D5293 | 5600 | 6000 | n/a | n/a | n/a |
| Sulfated Ash, Wt. % | ASTM D-877 | 0.85 | 0.85 | 0.85 | 0.98 | 1.2 |
| Lbs/Gal | | 7.2 | 7.2 | 7.3 | 7.4 | 7.4 |
| D-A Part Numbers | Drum - 55 Gal | 61402 | 61412 | 61422 | 52282 | 52232 |
| | 12-1 Qt Case, net 3 Gal | 61406 | 61416 | 61426 | 52286 | 52236 |



To Order D-A Products, Call 1-800-OIL-LUBE (1-800-645-5823) or Fax orders to 765-482-3065

D-A Lubricant Company, Inc.

801 Edwards Drive, Lebanon, IN 46052 • TEL: 317.923.5321 • FAX: 765.482.3065

Email: dalube@dalube.com • www.dalube.com

