

Product	Sinopec Fully Synthetic Heavy Duty Automotive Gear Oil GL-5
Summary	Product description Sinopec Fully Synthetic Heavy Duty Automotive Gear Oil GL-5 75W-90 and 75W140 are formulated with synthetic base oils and selected multifunctional additives. The high viscosity index, excellent oxidation resistance and high load-carrying capacity meet the lubrication requirements of hypoid gears in a variety of vehicles, providing an extended oil drain interval and ensuring excellent load-carrying ability even under shock-loading conditions. The product's performance exceeds that of a conventional mineral-oil based GL-5 quality automotive gear oil.

Applications

Sinopec Fully Synthetic Heavy Duty Automotive Gear Oil GL-5 is suitable for use in:

- Drive axles (front or rear) of heavy duty vehicles.
- Some transmission gears, especially hypoid gears, in heavy duty vehicles.
- Axles and transmission systems that require a GL-5 quality oil.

Features and benefits

- The very high viscosity index, provided by the fully synthetic formulation, ensures excellent low- and high-temperature performance, and reduces gear wear at low-temperature start up.
- Advanced sulfur-phosphorus extreme pressure (EP) additive technology provides outstanding load-carrying capacity, and protects axles and gears operating under severe service conditions (e.g. low speed, high torque and high speed, high load).
- Excellent thermal and oxidation stability protect against the formation of deposits and sludge, prolong oil service life and extend oil drain intervals.
- The low coefficient of friction and high lubricity, provided by the synthetic base oil, reduce resistance at start up and during operation, lowering power consumption and operating costs.
- Good oil film thickness protects against gear wear, scoring and pitting, and also prevents corrosion or spalling of gear surfaces.
- Good antifoaming properties ensure a good oil film is maintained during service, and avoid oil overflow and leakage.
- Fully compatible with the seal and gasket materials used in most conventional vehicles.
- Good resistance against rust and corrosion extends component life.
- The 75W-90 multigrade can be used year round, without the need for seasonal change, and so can reduce oil inventory costs.

Product Data Sheet

Typical data

Sinopec Fully Synthetic Heavy Duty Automotive Gear Oil GL-5		
SAE grade	75W-90	75W-140
Kinematic viscosity, ASTM D 445		
cSt @ 40°C	79.3	185.4
cSt @ 100°C	16.5	29.8
Viscosity, Brookfield, ASTM D 2983		
cP @ -40°C	90,000	125,000
Viscosity index, ASTM D 2270	195	187
Copper corrosion, 3 hours @ 121°C, ASTM D 130	1b	1b
Pour point, °C, ASTM D 97	-49	-45
Flash point (COC), °C, ASTM D 92	215	202
Density @ 20°C, kg/l, ASTM D 4052	0.8787	0.8787
Colour	yellow	yellow

These data are given as an indication of typical values and not as exact specifications.

Industry and OEM specifications

Sinopec Fully Synthetic Heavy Duty Automotive Gear Oil GL-5 meets the performance requirements of the following industry specifications:	
API	GL-5
API	MT-1
MIL	MIL-PRF-2105E
SAE	J2360

Product Data Sheet

Sinopec Fully Synthetic Heavy Duty Automotive Gear Oil GL-5 75W-90 meets the performance requirements of the following OEM specifications:	
Arvin Meritor+	0-76-A/B/D
DAF+	API GL-5 or J2360
Iveco+	API GL-5 or J2360
Mack	GO-J
MAN	342 M-2
Renault+	API GL-5 or J2360
Scania+	STO 1:0
Volvo+	API GL-5
ZF	TE-ML 05A – axles for off-road vehicles
ZF	TE-ML 07A – hydrostatic drives
ZF	TE-ML 08 – steering systems
ZF	TE-ML 12E – axles for buses
ZF	TE-ML 16 B,C,D – transmissions for rail vehicles
ZF	TE-ML 17B – transmissions and axles for lift trucks
ZF	TE-ML 19B – transfer and offset transmissions

Accuracy of information

Data provided in this PDS is typical and subject to change as a result of continuing product research and development. The information given was correct at the time of printing. The typical values given are subject to variations in the testing procedures and the manufacturing process may also result in slight variations. Sinopec guarantees that its lubricants meet any industry and OEM specifications referred to on this data sheet.

Sinopec cannot be held responsible for any deterioration in the product due to incorrect storage or handling. Information on best practice is available from your local distributor.

Product and environmental safety

This product should not cause any health problems when used in the applications suggested and when the guidance provided in the Material Safety Data Sheet (MSDS) is followed. Please consult the MSDS for more detailed advice on handling; MSDSs are available from your local distributor. Do not use the product in applications other than those suggested.

As with all products, please take care to avoid environmental contamination when disposing of this product. Used oil should be sent for reclamation/recycling or, if not possible, must be disposed of according to relevant government/authority regulations.

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