



RAVENOL VMO SAE 5W-40

CategoryPassenger car motor oil Item number1111133 Viscosity 5W-40 Specification ACEA C3, API CF, API SN

Oil type Synthetic

Approvals API SN, BMW Longlife-04, GM dexos2[™] (Lizenz-Nr. D20583HI081), MB-Freigabe 229.31, MB-Freigabe 229.51, VW 505 00, VW 505 01

Recommendation Chrysler MS-11106, Fiat 9.55535-GH2, Fiat 9.55535-S2, Ford WSS-M2C917-A, Porsche A40, VW 502 00

Application Passenger car

Technology Clean Synto®

RAVENOL VMO SAE 5W-40 is a synthetic Mid SAPS low friction motor oil with CleanSynto® technology for passenger car gasoline and diesel engines with and without turbo-charging and direct injection.

RAVENOL VMO SAE 5W-40 achieves a high viscosity index through its formulation with special base oils. The excellent cold start behaviour provides an optimum lubricating safety during the cold run phase.

RAVENOL VMO SAE 5W-40 extends long life of DPF and TWC. Developed for fuel economy and energy conserving in EURO VI, EURO V and EURO IV Standard engines with normal and extended oil change intervals (until 50.000 km or 2 years possible).

RAVENOL VMO SAE 5W-40 minimizes friction, wear and fuel consumption with excellent cold start characteristics. Because of a considerable fuel saving **RAVENOL VMO SAE 5W-40** contributes to protect the environment by reducing the emissions. Suitable for extended oil change intervals where recommended by manufacturer.

Application Note

RAVENOL VMO SAE 5W-40 is an universal, synthetic low friction motor oil especially developed for Pumpe-Düse-diesel engines. Moreover, this lubricant is excellent suitable for gasoline and diesel engines in passenger cars and vans with and without turbo charger. Due to the specific composition is **RAVENOL VMO SAE 5W-40** excellent suitable for use for several OEM requirements.

Characteristics

Fuel economy in part and full power operation.

- MID SAPS = reduced Sulphated Ash, Phosphorous and Sulphur.
- Excellent wear protection and high viscosity index also under high-speeddriving conditions, the long life of the engine.
- Excellent cold starting characteristics also at low temperatures below -30°C.
- The function of the hydro tappet is ensure at all temperatures.
- A safe lubricant film at high operating temperatures.
- Low evaporative tendency, so lower oil consumption.
- No deposits in combustion chambers, in the piston ring zone and valvesbecause of oil conditioned.
- Neutrality towards sealing materials.
- Extended oil change intervals to protect natural resources.

Technical Product Data

Density at 20 °C	848,0	kg/m³	EN ISO 12185
Colour	gelbbraun		VISUELL
Viscosity at 100 °C	14,4	mm²/s	DIN 51562-1
Viscosity at 40 °C	87,5	mm²/s	DIN 51562-1
Viscosity Index VI	171		DIN ISO 2909
HTHS Viscosity at 150 °C	3,75	mPa*s	ASTM D5481
CCS Viscosity at -30 °C	6375	mPa*s	ASTM D5293
Low Temp. Pumping viscosity (MRV) at -35 °C	21.100	mPa*s	ASTM D4684
Pourpoint	-45	°C	DIN ISO 3016
Noack Volatility	8,8	% M/M	ASTM D5800
Flashpoint	242	°C	DIN EN ISO 2592
tbn	7,2	mg KOH/g	ASTM D2896
Sulphated Ash	0,77	%wt.	DIN 51575

All indicated data are approximate values and are subject to the commercial fluctuations. 18.02.2022