

Product Data Sheet

Effective Date 01.08.2014

Version 1.0



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PETRONAS GEAR SYN IG

Synthetic Gear & Bearing Oil

PETRONAS GEAR SYN IG Series are fully synthetic hydrocarbon based (PAO) gear and bearing lubricants formulated with the latest additives technology.

They are fully compatible with petroleum based oils while offering outstanding oxidation stability, excellent wear and rust protection, high viscosity index, high flash point, low pour point, low foaming tendency and cleaner running systems.

Applications

- Impregnating fluid for powdered metal bearings (white metal sleeve bearings), parts, and wicks
- ISO VG 32 to 150 is specified for moderate loaded gears and bearing operating at high temperature. For heavy loaded application, ISO VG 220 to 1000 is recommended.
- Anti-friction bearings
- General-purpose medium viscosity lubricating oil

Features and Benefits

- Excellent oxidation resistance
- Excellent water separation
- Reduces friction and wear
- High temperature resistance up to 110°C
- Excellent corrosion protection
- Plastics compatibility

Typical Properties

Characteristics	32	46	68	100	150
Kinematic Viscosity, cSt					
@ 40 °C	30	43	64	96	152
@ 100 °C	5.8	7.8	10.1	13.5	20
Viscosity Index	136	152	143	141	152
Pour Point, °C	-57	-54	-51	-43	-43
Flash Point, °C	232	235	243	251	249
Evaporation, 22 hrs @ 99 °C, % loss	< 1	< 1	< 1	< 1	< 1
Copper Corrosion (24 hrs @ 100 °C)	1a	1a	1a	1a	1a
4-Ball Wear Scar, (1200 rpm, 40kg, 75 °C, 1 hr), mm	0.8	0.7	0.8	0.6	0.6
4-Ball EP Weld Point, Kg	100	100	100	100	110
Density @ 15.6 °C, Kg/L	0.84	0.84	0.84	0.86	0.87

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Characteristics	220	320	460	680	1000
Kinematic Viscosity, cSt					
@ 40 °C	218	319	470	680	1026
@ 100 °C	26.6	35.3	47.0	63.9	92.0
Viscosity Index	158	156	158	165	144
Pour Point, °C	-43	-43	-40	-40	-40
Flash Point, °C	260	240	248	242	232
Evaporation, 22 hrs @ 99 °C, % loss	< 1	< 1	< 1	< 1	< 1
Copper Corrosion (24 hrs @ 100 °C)	1a	1a	1a	1a	1a
4-Ball Wear Scar, (1200 rpm, 40kg, 75 °C, 1 hr), mm	0.35	0.35	0.35	0.35	0.35
4-Ball EP Weld Point, Kg	210	210	210	210	210
Density @ 15.6 °C, Kg/L	0.87	0.87	0.87	0.88	0.88

* All technical data is provided for reference only.

Health, Safety and Environment

For further assistance on product MSDS, recommendation or technical queries, please liaise with the regional technical services engineer or contact HQ technical engineers.