

## Castrol Magna BD 68

Slideway oils

### Description

Castrol Magna™ GC 32, BD 68 and CF 220 are specially formulated slideway lubricants to provide all-round performance with good stick-slip and load carrying performance. They combine controlled frictional characteristics with high film-strength and high load carrying properties to eliminate 'stick-slip'.

### Application

Magna GC 32 is a light viscosity, combined hydraulic and slideway lubricant. Applications include lightly loaded slideways such as found on small centre lathes and combined hydraulic and slideway systems such as in reciprocating grinding machines.

Magna BD 68 is a medium viscosity slideway lubricant suitable for use in most machine tool lubrication systems specifying an ISO VG 68 oil. It meets Cincinnati Milacron P47 specification.

Magna CF 220 is formulated for use with heavily loaded slideway applications or where there is a vertical or inclined slideway. It meets Cincinnati Milacron P50 specification.

### Advantages

- Good lubricity – prevents stick-slip of slideways.
- High load carrying capacity – prevents wear of highly loaded slideways.
- Good demulsification and cutting fluid compatibility – can be used in the presence of water or water based metalworking fluids.

## Typical Characteristics

Test	Method	Units	GC 32	BD 68	CF 220
ISO viscosity grade	-	-	32	68	220
Density @ 15°C	ISO 12185 / ASTM D4052	g/ml	0.87	0.88	0.89
Viscosity @ 40°C	ISO 3104 / ASTM D445	mm <sup>2</sup> /s	32	68	220
Viscosity @ 100°C	ISO 3104 / ASTM D445	mm <sup>2</sup> /s	5.3	8.7	19.2
Viscosity Index	ISO 2909 / ASTM 2270	-	96	99	98
Pour point	ISO 3016 / ASTM D97	°C/°F	-15/5	-12/10	-9/15
Flash point, COC	ISO 2592 / ASTM D92	°C/°F	206/403	232/450	249/480
Rust test Procedure A (Distilled Water) Procedure B (Synthetic sea water)	ISO 7210 / ASTM D665B	-	Pass Pass	Pass Pass	Pass Pass
Copper corrosion (3 hrs @ 100°C)	ISO 2160 / ASTM D130	-	1b	1b	1b
Brugger value	DIN 51347	N/mm <sup>2</sup>	-	33	-
Four Ball Wear Test (40 kg, 75°C/167°F, 1800 rpm, 1 hr), scar diameter	ASTM D2266	mm	-	0.42	0.42
Four Ball Extreme Pressure Test weld load	ASTM D2783	kg	-	280	280
Stick-slip ratio	(Cincinnati Lamb)	-	-	0.74	0.74
Cincinnati Lamb specification			-	P-47	P-50

Subject to usual manufacturing tolerances.

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