

# Product information

## Metra-flow OG4 50 L/Min oval gear meter

- Excellent chemical resistance
- Rugged construction
- Individual calibration
- High viscosity capability
- Low pressure loss
- No flow conditioning required
- Compact meter assembly
- Hall or reed switch sensor
- Accuracy 1.0% reading water  
0.5% reading oil
- $\pm 0.25\%$  reading \*
- 0.1% repeatability
- IP67/NEMA 4 protection
- Models to 400 Bar
- Non-metallic option

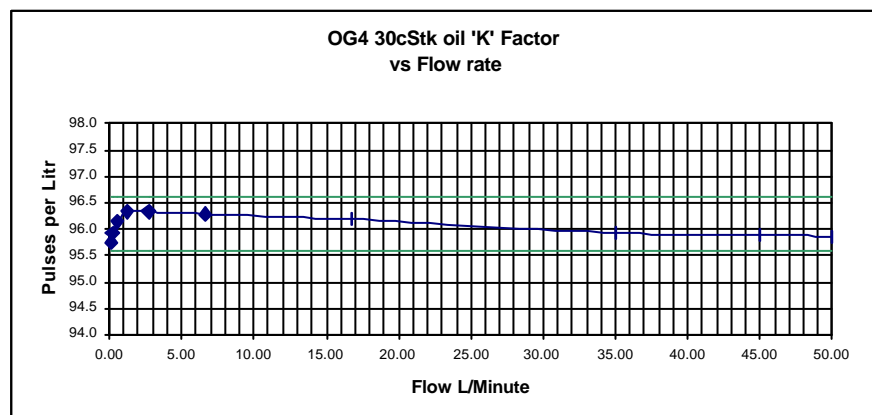
\* When used with our metra-smart instrument

### Ideal for

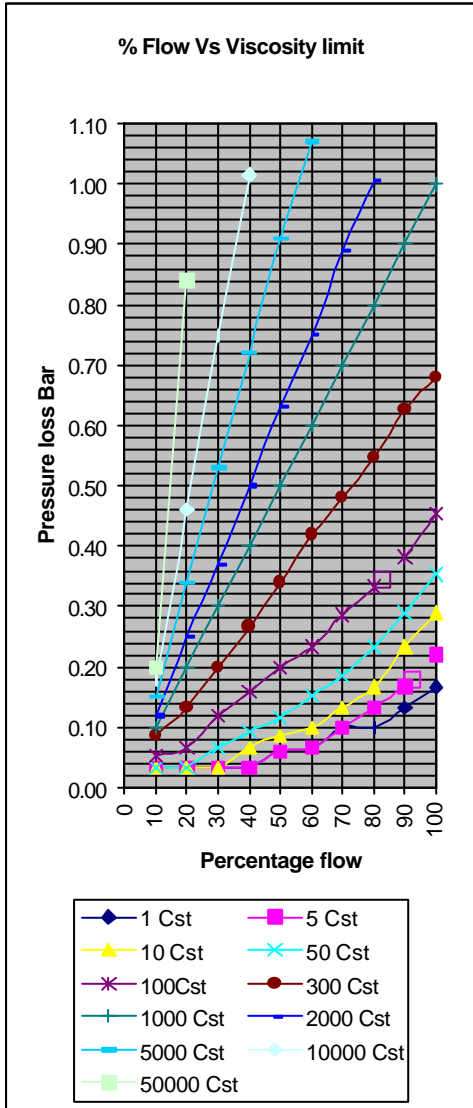
- ◆ Engine test
- ◆ Oil flow
- ◆ High viscosity fluids
- ◆ OEM equipment



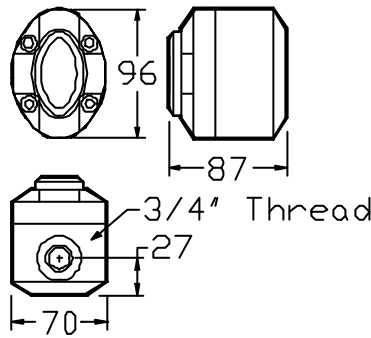
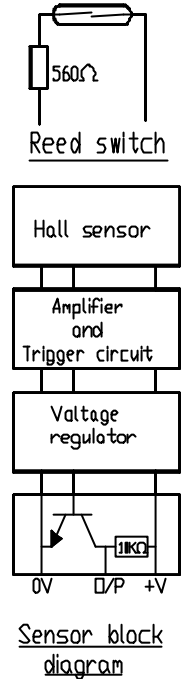
The compact rugged OG4 oval gear flowmeter is designed to give high performance with a low cost of ownership. It has a standard flow range from 0.25 to 50 L/Min on 30 Cstk oil and 2.5 to 50 L/min on water like liquids. It can have totally non-metallic wetted components, PEEK™, ceramic and an elastomer which makes this the ideal choice for the metering of aggressive chemicals. The standard inlet and outlet are ¾" female threads. For OEM use alternatives, including manifold mountings, are available. The standard model is 316 St St with Viton™ 'O' ring seal.



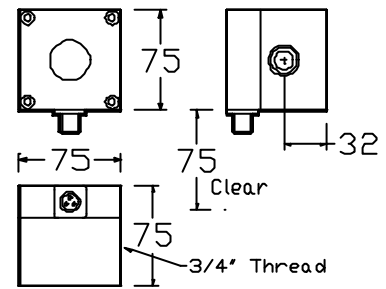
Sample product codes→	Stainless standard OG4-SS5-VHT-B	Aluminium standard OG4-AS1-VHT-B	PEEK Standard OG4-PS1-VHT-B
Flow range	2.5 - 50.0 LPM 0.25 - 50 LPM	2.5 - 50.0 LPM 0.25 - 50 LPM	2.5 - 50.0 LPM 0.25 - 50 LPM
Wetted materials - Body	316 Stainless steel	Aluminium	PEEK™
- Gears	Carbon filled PEEK™	Carbon filled PEEK™	Carbon filled PEEK™
- Seal	Viton™	Viton™	Viton™
- Magnet	Ceramic	Ceramic	Ceramic
Accuracy	± 1.0 % Reading ± 0.5% Reading	± 1.0 % Reading ± 0.5% Reading	± 0.5 % FSD ± 0.5% FSD
Repeatability	± 0.1%	± 0.1%	± 0.1%
Detector type	Hall effect	Hall effect	Hall effect
Terminations	Via M20 cable gland	MIL style instrument socket	MIL style instrument socket
Approximate 'K' factor - Pulses/Litre	100	100	100



At the heart of the meter are a pair of toothed oval gears one of which contains chemically resistant magnets, the gears rotate freely on robust bearings. Rotation is detected through the chamber wall by a Hall effect detector or a reed switch giving approximately 100 pulses per litre passed. The output is an NPN pulse or a voltage free contact closure either of which is readily interfaced with most electronic display or recording devices. This combination of materials and technology ensures a long life product with reliable, accurate operation throughout.



316 St St body



PEEK™ & Aluminium body

Model	Body material	Temp rating	Pressure rating	Seal material	Detector type	Pipe thread	Connections	Display mounting options
OG4 OG4	316 St St 50 Bar std	S 80°C 158°F S	50 Bar 750 PSI 5	Viton V	Hall effect H	1/4" (OG1&2 standard)	BSP F B	Rate & Total on meter C
	Aluminium 10 Bar max	A 100°C 212°F T	10 Bar 150 PSI 1	Nitrile N	Reed switch R	1/2" (OG3 Standard)	NPT F N	Rate & total Ex on meter E
	PEEK™ 10 Bar max	P 150°C 300°F U	400 Bar 5880 PSI 4	EPDM E Kalrez K		3/4" (OG4 standard) 1" (OG5 standard) 1 1/2" (OG6 standard) 2" (OG7 standard)	Flanged (specify) F	Rate & Total plus 4-20mA U Rate & total + 4-20mA Ex X Metra-Batch on meter B Metra-Batch remote R

A stainless steel meter rated at 80°C, 50 Bar, with Viton™ seal, Hall effect detector and a 3/4" BSP thread would have the order code :-OG4-SS5-VHT-B