

FLAMEC® OM-Series Mechanical Flowmeters

Volumetric flow measurement of clean liquids or low flows used in automotive, aviation, mining, power, chemical, pharmaceutical, food, paint, petroleum industries and environmental applications. For distribution of fuels, fuel oils, lubricants, alcohols, solvents, blending of bio and ethanol fuels, metering of chemicals, grease, adhesives, ink, insecticides and pumps or gravity fed non-conductive liquids.

Features / Benefits

- High accuracy oval gear technology with low pressure drop can be used in gravity-fed applications
- No requirement for flow conditioning or straight pipe runs makes them ideal for compact installations with limited space
- Robust aluminium mechanical registers
- Optional air eliminator/strainers

General Specifications

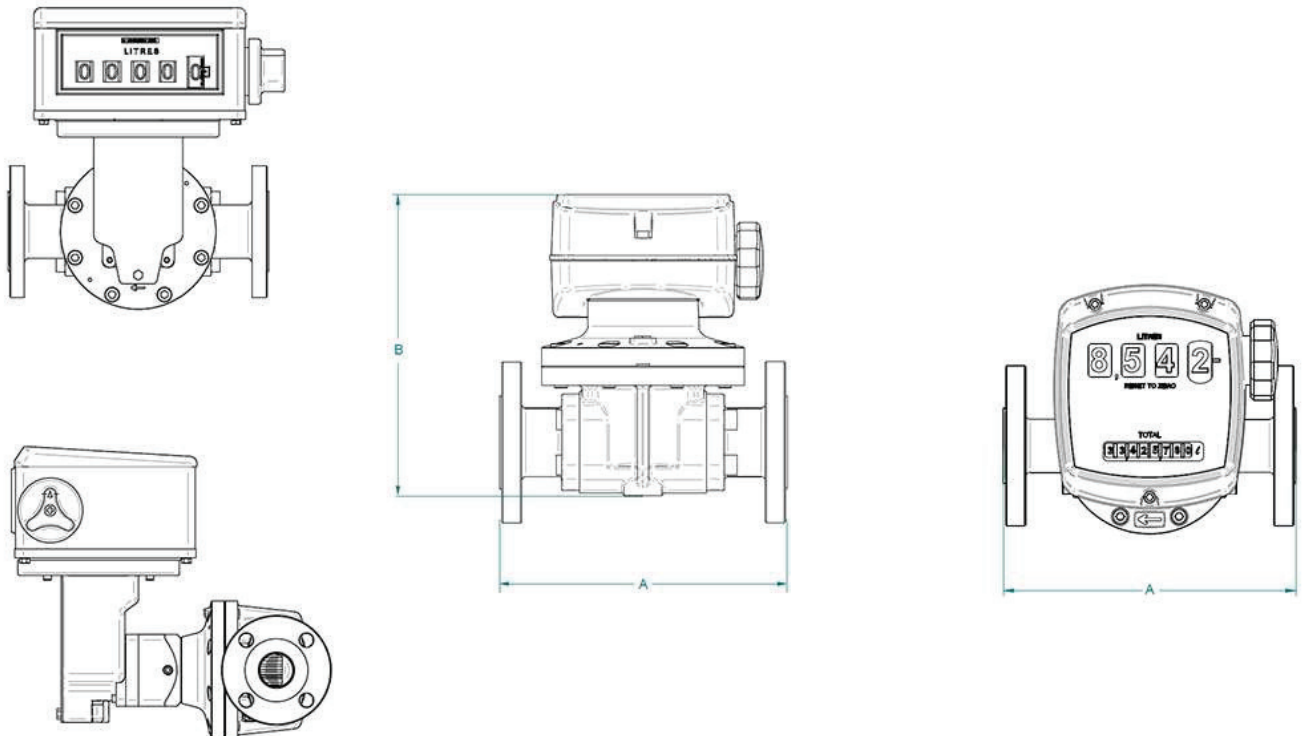
- Flow rates: 1 - 1500 L/min [0.26 - 400 USG/min]
- Sizes: ½" - 4" [15mm - 100mm]
- Materials: Aluminium, stainless steel

Meter Selection

- Aluminium meters for petroleum products (oils and grease, fuels and fuel oils)
- Stainless steel meters for the chemical, cosmetic, food and pharmaceutical industries (water based liquids)



Dimensions



Model Specification

Model	OM015	OM025	OM040	OM050	OM080	OM080E	OM100
Nominal Size	1/2" [15mm]	1" [25mm]	1.5" [40mm]	2" [50mm]	3" [80mm]	3" [80mm]	4" [100mm]
Nominal Flow range @3cP	1 - 40 L/min	10 - 150 L/min	15 - 250 L/min	30 - 500 ^A L/min	35 - 750 L/min	50 - 1000 L/min	75 - 1500 L/min
	[0.26 - 10.6 USG/min]	[2.6 - 40 USG/min]	[4 - 66 USG/min]	[8 - 130 ^A USG/min]	[10 - 200 USG/min]	[13 - 260 USG/min]	[20 - 400 USG/min]
Accuracy	±1% of reading for M registers			±1% of reading for M registers (±0.5% for V registers)			
Repeatability	Typically ±0.03% of reading						
Ambient Temp. Range	-15°C - +80°C [+5°F - +176°]						
Max. Pressure	40 [580]	40 [580]	30 [435]	20 [285]	12 [175]	12 [175]	10 [145]
Bar [psi] (threaded)							
M Register	4 digit resettable (IP65)						
V Register	N/A			5 digit resettable (IP54)			
Recommended Filtration	100 mesh (150microns)				40 mesh [350 microns]		
Face to Face Dimension A - Threaded	110 mm	137 mm Al 176 mm SS	188 mm	212 mm	266 mm	294 mm	294 mm
Face to Face Dimension A - Flanged	189 mm	198 mm Al 237 mm SS	252 mm	277 mm	354 mm	382 mm	388 mm
Meter base to register top dimension B (M)	178 mm	188 mm	227mm	237 mm	270 mm	288 mm	333 mm
Meter base to register top dimension B (V)	n/a	n/a	n/a	358 mm	395 mm	412 mm	457 mm
Meter Cap width	110 mm	120 mm	160 mm	180 mm	242 mm	292 mm	292 mm

Model Coding

Model	Size			
OM015	1/2"	(15mm)	1 - 40 L/min	[0.26 - 10.6 USG/min]
OM025	1"	(25mm)	10 - 150 L/min	[2.6 - 40 USG/min]
OM040	1.5"	(40mm)	15 - 250 L/min	[4 - 66 USG/min]
OM050	2"	(50mm)	30 - 500 L/min (PPS rotors)	[8 - 130 USG/min](PPS rotors)
OM080	3"	(80mm)	35 - 750 L/min	[10 - 200 USG/min]
OM080	3" Extended flow	(80mm)	50 - 1000 L/min	[13 - 260 USG/min]
OM100	4"	(100mm)	75 - 1500 L/min	[20 - 400 USG/min]

Body material	
A	Aluminium
E	Extended flow Aluminium
S	316L Stainless Steel

Rotor material / Bearing Type	
0 0	PPS / No bearing
1 0	Keishi cut PPS (for high viscosity liquids) / No bearing
5 1	Stainless steel / Carbon Ceramic
7 1	Keishi cut stainless steel (for high viscosity liquids) / Carbon Ceramic

O-ring material	
1	Viton (-15°C min. [5°F])
3	Teflon encapsulated Viton (includes KALREZ shaft seals on 080 to 100 sizes) (-15°C min. [5°F])
4	Nitrile, (-40°C min. [-40°F])

Temp / Process connections	
8 00	80°C [176°F] max. / No fittings
8 10	80°C [176°F] max. / BSPP (G) female threaded
8 20	80°C [176°F] max. / NPT female threaded
8 40	80°C [176°F] max. / ANSI-150 RF flanged
8 50	80°C [176°F] max. / ANSI-300 RF flanged
8 60	80°C [176°F] max. / PN16 DIN flanged

Totaliser capacities

OM015~040	OM050~100	Mechanical Registers
9999.9 litres	99999 litres	M3 4 digit mechanical totaliser - litres
9999.9 gal.	99999 gal.	M4 4 digit mechanical totaliser - U.S. gallons
N/A	999999 litres	V1 5 digit mechanical reset register - litres

Model No. Example

OM100	A	4	4	1	-	8	10	M3
-------	---	---	---	---	---	---	----	----

E&OE