

## Flush / Purge Flowmeters

Sturdy in-line, metal construction and large easy to read dial calibrated in engineering units (GPM, LPM, & cc/m) available in Bronze, and SST.

### Features and Benefits

- 3.5" (90mm) 270° analog dial for reading at a glance
- Suitable for use with opaque and clear fluids.
- Measures 6:1 range with  $\pm 3\%$  F.S. accuracy
- Dial and case factory configured for quick installation – but easily field re-configured if needed
- Liquid flow ranges from 4 GPH (15 l/h) in 1/2" flow meter to 3000 GPM (12000 l/m) in 8" flow meter.

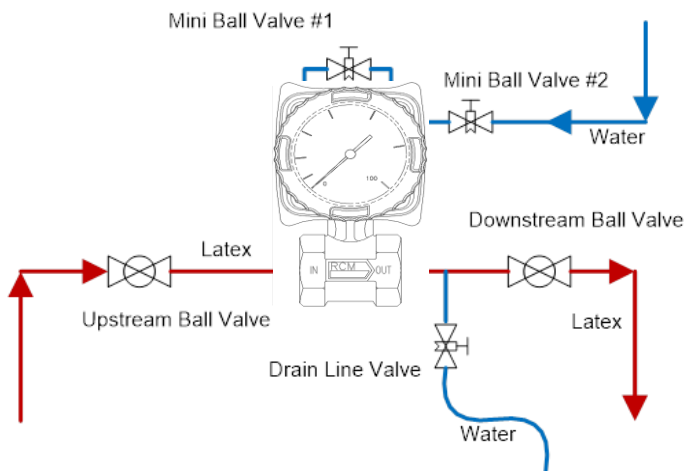
### Applications

- Water
- Latex Modified Concrete
- Water Soluble Paints and Solutions



### Principle of Operation

Our flush / purge flow meters are built around our standard rugged flow meter construction with an integrated equalizing valve and 3-way ball valve designed to flush and/or drain fluid from the flow meter pressure ports and bellows chamber which prevents the fluid from solidifying or freezing in harsh environments.



### Specifications

	Standard	Options
<b>Housing</b>	Polycarbonate	Aluminum
<b>Body</b>	Bronze 316 SS	
<b>Bellows</b>	Bronze 316 SS	
<b>Seals</b>	Buna-N	Viton
<b>Crystal</b>	Polycarbonate	Glass Plastic
<b>Gear Movement</b>	Bronze	316 SS
<b>Accuracy</b>	$\pm 3\%$ F.S.	
<b>Repeatability</b>	$\pm 1\%$ F.S.	
<b>Pressure</b>		
Maximum	180 psig	
Minimum	10 psig	
<b>Temperature</b>		
Maximum	212°F	
Minimum	-30 °F	

## Model Number System

The example **1/2"-71-R-10-ADV** describes a 1/2" pipe size, 7000 series threaded connection, bronze material, flow from left to right, flow rate of 10 GPM, Options - Viton seals (A), Gasket case (D) and calibrated for high viscosity (V).

<u>1/2"</u>	-	<u>7</u>	<u>1</u>	-	<u>R</u>	-	<u>10</u>	-	<u>ADV</u>
Pipe Size		Series	Material	Flow Direction			Flow Rate		Options
1/4"	(8mm)	7000 Series	1 - Bronze	L – Right to Left			See Flow Chart		See Table
1/2"	(15mm)	8000 Series	3 - SST	R – Left to Right					
3/4"	(20mm)			VUR - Vertical Up Flow Dial Right					
1"	(25mm)			VUL - Vertical Up Flow Dial Left					
1 1/2"	(40mm)			VDR - Vertical Down Flow Dial Right					
2"	(50mm)			VDL - Vertical Up Flow Dial Left					
2 1/2"	(65mm)								
3"	(80mm)								
4"	(100mm)								
5"	(125mm)								
6"	(150mm)								
8"	(200mm)								

## Flow Ranges – Series 7000 & 8000

### Table of Options

A	Viton Seals
C	Calibrated for Specific Gravity
D	Gasketed Case
E	Non-Standard Flow Rate
ES	Low Flow Rate (Below 2 GPM)
F	Aluminum Housing with Plastic Dial Crystal
F2	Aluminum Housing with Glass Dial Crystal
P	Panel Mount

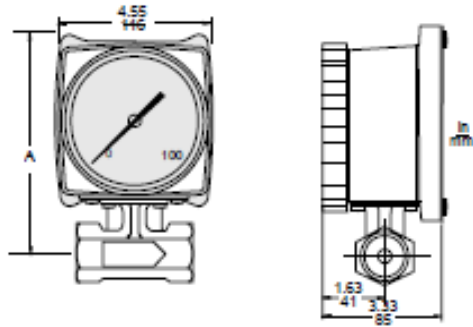
Size	GPM	LPM	Size	GPM	LPM
1/4	2	8	2 1/2	60	240
1/4	3	10	2 1/2	100	400
1/4	4	15	2 1/2	150	600
			2 1/2	200	800
1/2	2	8	3	200	800
1/2	3	10	3	300	1000
1/2	4	15	3	400	1500
1/2	6	25	3	500	2000
1/2	10	40			
3/4	6	25	4	300	1000
3/4	10	40	4	400	1500
3/4	15	60	4	600	2400
3/4	20	80	4	800	3000
1	15	60	5	300	1000
1	20	80	5	400	1500
1	30	120	5	600	2400
1	40	150	5	800	3000
1 1/2	30	120	6	600	2400
1 1/2	40	150	6	800	3000
1 1/2	60	240	6	1000	4000
1 1/2	100	400	6	2000	8000
2	40	150	8	600	2400
2	60	240	8	1000	4000
2	100	400	8	2000	8000
2	150	600	8	3000	12000
2	200	800			

### Low Flow Rates – Option ES

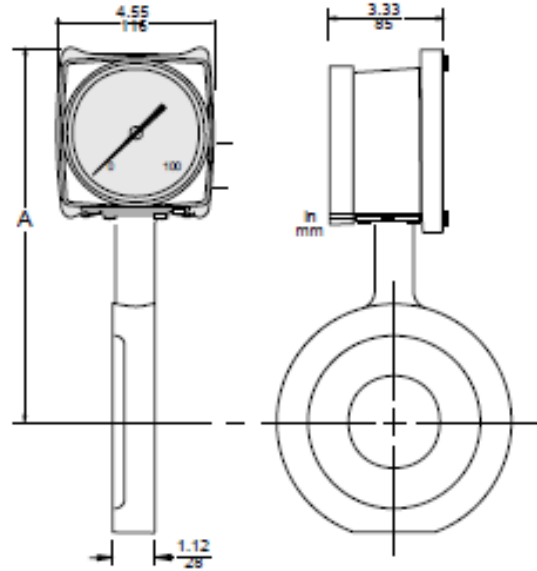
Size	GPH	l/h	cc/m
1/2	4	15	200
1/2	6	20	300
1/2	10	40	400
1/2	15	60	600
1/2	20	80	1000
1/2	30	120	2000
1/2	40	150	3000
1/2	60	240	4000
1/2	100	400	6000

Note: Available with 1/2" 7000 Series Only

## 7000 Series – 1/4" to 3" Connections



## 8000 Series – 1/2" to 8" Connection



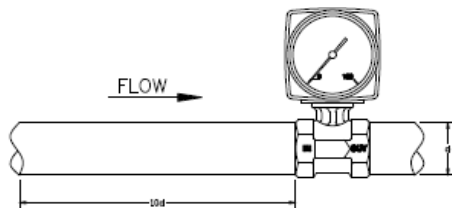
### Dimensions

Nominal Sizes		Series 7000 – A		Series 8000 - A	
In	mm	In	mm	in	mm
1/4	08	5.95	151	n/a	n/a
1/2	15	5.95	151	6.62	168
3/4	20	5.95	151	7.06	179
1	25	6.07	154	7.25	184
1 1/2	40	6.39	162	7.81	198
2	50	6.80	172	8.00	203
2 1/2	65	n/a	n/a	8.54	217
3	80	7.48	190	8.87	225
4	100	n/a	n/a	9.95	252
5	125	n/a	n/a	10.36	263
6	150	n/a	n/a	11.05	280
8	200	n/a	n/a	12.30	311

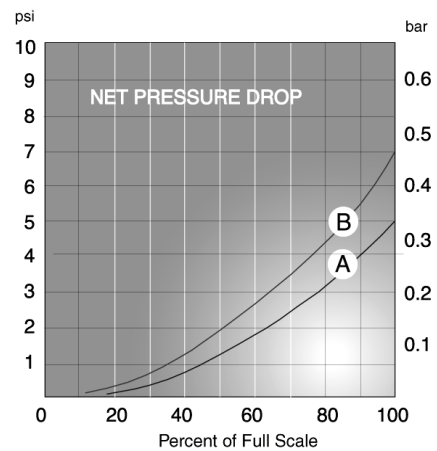
Note: Dimensions are based on bronze meters.

### Piping Requirements

The site selected should provide at least 10 pipe diameters of straight meter sized pipe between the meter inlet and any upstream fitting such as elbow, tee or valve.



### Pressure Drop Characteristics



Curve A – Bronze Bellows

Curve B – Monel, SS, Inconel Bellows

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