7430 Series

GLASS TUBE

Both 65 mm and 150 mm scales, borosilicate glass tube models feature all stainless steel frame and horizontal connections at a less expensive price than competitive products. Valve optional.

DESCRIPTION

Metering Tube	Borosilicate Kinglass
Internal Components	316L SS, black glass, sapphire, Carboloy, tantalum
Fitting Material	316L SS Optional: PVC, PVDF, Hastelloy®
Inlet/Outlet Fittings	⅛" and ¼" FNPT, horizontal Control valve optional
O-Ring	Standard: Viton® Optional: Buna N, EPR, Kalrez®

PERFORMANCE

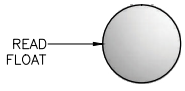
Capacities	Water 0.56 to 1,800 cc/min Air 54 to 70,000 cc/min
Scale	65 mm, 150 mm direct reading, detachable
Accuracy	± 6% of full scale flow, 65 mm ± 4% of full scale flow, 150 mm
Turndown	10:1
Repeatability	1%
Max Temperature	316L SS / Hastelloy fittings Gases 250° F (121° C) 316L SS / Hastelloy fittings Liquids 200° F (93° C) PVC fittings Gases & Liquids 110° F (43° C) PVDF fittings Gases & Liquids 200° F (93° C)
Maximum Pressure	316L SS fittings 200 psig PVC fittings 130 psig PVDF fittings 150 psig
Ambient Temperature	33° F to 125° F (1° C to 52° C)

OPTIONS

Alarm	Fiber-Optic or Inductive Ring Sensor (See page 63)
Certified Calibrations	Conform to ISA RP 16.6
Scales	Any volumetric unit
High Temp.	Ambient 250° F

FLOAT

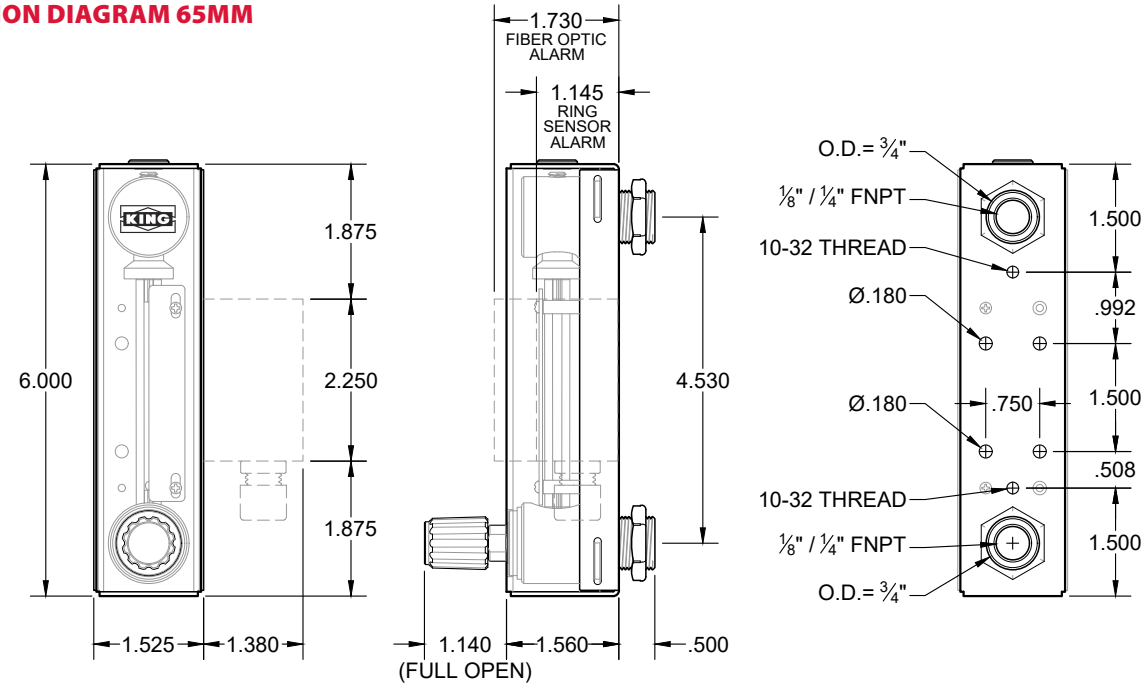
Options for rotameter float materials and designs extend flow ranges for different fluids within a given rotameter tube design.



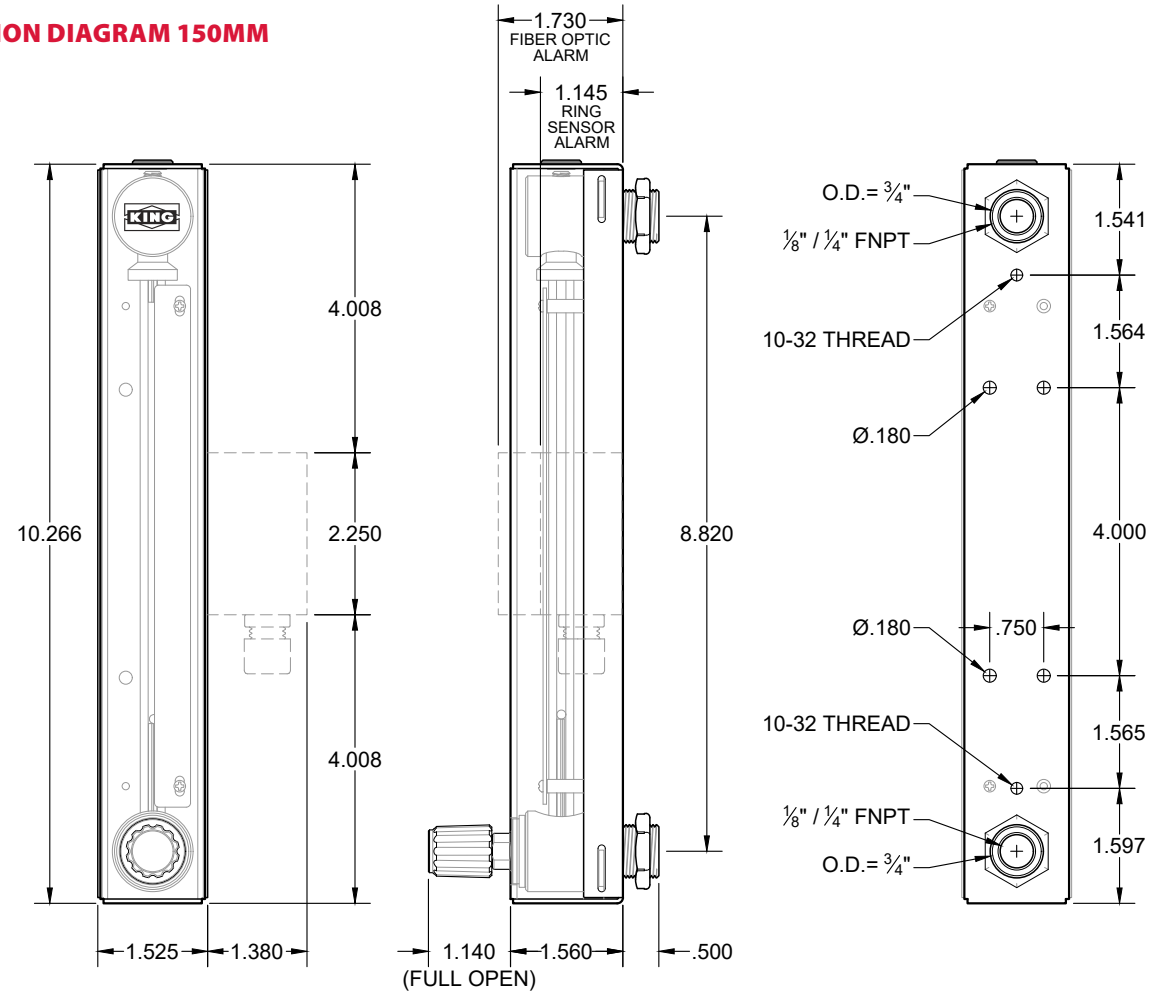
BL

7430 Specifications

DIMENSION DIAGRAM 65MM



DIMENSION DIAGRAM 150MM



7430 Specifications

65MM Scale Flow Ranges

Tube Number	Float Material	Air (STP)			Water (70° F)		
		CC/MIN	SCFH	SLPH	CC/MIN	GPH	LPH
1-02-G-021	Glass	66	.14	4.0	0.72	.011	.042
	Sapphire	105	.22	6.2	1.3	.021	.078
	Stainless Steel	200	.42	12.0	3.3	.052	.190
	Carboloy	340	.70	20.0	7.0	.110	.420
	Tantalum	350	.74	21.0	7.8	.125	.460
1-03-G-041	Glass	76	.16	4.6	1.15	.018	.068
	Sapphire	120	.25	7.2	2.10	.032	.125
	Stainless Steel	230	.50	14.0	4.20	.068	.260
	Carboloy	400	.85	24.0	9.00	.145	.560
	Tantalum	440	.90	26.0	10.00	.165	.620
1-08-G-061	Glass	525	1.1	31	9.0	.14	.54
	Sapphire	700	1.5	42	15.5	.24	.95
	Stainless Steel	1130	2.4	68	29.0	.46	1.70
	Carboloy	1600	3.4	95	46.0	.72	2.80
	Tantalum	1700	3.6	100	50.0	.78	3.00
1-23-G-081	Glass	2000	4.4	120	44	.70	2.6
	Sapphire	2600	5.4	150	68	1.05	4.0
	Stainless Steel	3800	8.2	230	110	1.70	6.6
	Carboloy	5600	12.0	340	170	2.70	10.5
	Tantalum	6000	13.0	360	180	2.90	11.0
2-14-G-021	Glass	6800	14.5	400	160	2.6	9.5
	Sapphire	9200	19.5	540	240	3.8	14.5
	Stainless Steel	13000	28.0	800	400	6.2	24.0
	Carboloy	19000	40.0	1100	600	9.5	36.0
	Tantalum	20000	42.0	1200	640	10.0	38.0
2-34-G-041	Glass	19000	40.0	1150	520	8.25	31.0
	Sapphire	25000	52.0	1500	740	11.50	44.0
	Stainless Steel	42500	90.0	2550	1200	19.00	72.0
	Carboloy	60000	125.0	3600	1700	27.00	105.0
	Tantalum	70000	145.0	4200	1800	29.00	110.0

150 MM Scale Flow Ranges

Tube Number	Float Material	Air (STP)			Water (70° F)		
		CC/MIN	SCFH	SLPH	CC/MIN	GPH	LPH
1-03-G-022	Glass	54	.114	3.2	.56	.0088	.033
	Sapphire	82	.175	4.9	1.04	.0160	.062
	Stainless Steel	160	.340	9.8	2.25	.0350	.135
	Carboloy	280	.580	16.5	5.00	.0780	.300
	Tantalum	300	.620	17.5	5.20	.0840	.320
1-04-G-042	Glass	106	.225	6.4	1.24	.0195	.074
	Sapphire	165	.35	10.0	2.35	.0380	.145
	Stainless Steel	320	.68	19.0	5.60	.0900	.340
	Carboloy	540	1.14	32.0	12.4	.1950	.740
	Tantalum	580	1.24	35.0	13.5	.2100	.820
1-07-G-062	Glass	350	.74	21.0	4.7	.074	.28
	Sapphire	500	1.06	30.0	10.0	.160	.60
	Stainless Steel	820	1.75	50.0	20.5	.330	1.25
	Carboloy	1250	2.60	76.0	34.0	.540	2.05
	Tantalum	1350	2.90	80.0	36.0	.560	2.15
1-11-G-082	Glass	850	1.8	50.0	16.5	.26	1.0
	Sapphire	1100	2.3	66.0	27.0	.42	1.6
	Stainless Steel	1600	3.4	100.0	46.0	.72	2.7
	Carboloy	2300	4.9	140.0	72.0	1.15	4.4
	Tantalum	2450	5.2	155.0	80.0	1.25	4.8
1-27-G-102	Glass	2150	4.6	130.0	52	.84	3.1
	Sapphire	2800	6.0	170.0	78	1.24	4.7
	Stainless Steel	4400	9.2	260.0	130	2.05	7.8
	Carboloy	6200	13.5	380.0	205	3.20	12.3
	Tantalum	6750	14.0	400.0	210	3.30	12.6
2-09-G-002	Glass	3800	8.2	230.0	86	1.35	5.2
	Sapphire	5000	10.6	300.0	130	2.05	7.8
	Stainless Steel	7500	16.0	450.0	220	3.40	13.0
	Carboloy	10600	22.5	640.0	330	5.20	20.0
	Tantalum	11500	24.0	680.0	360	5.60	21.5
2-17-G-022	Glass	9000	19.0	540.0	215	3.40	13.0
	Sapphire	11400	24.5	700.0	320	5.00	19.0
	Stainless Steel	17000	36.0	1000.0	520	8.20	31.0
	Carboloy	24000	50.0	1450.0	760	12.2	46.0
	Tantalum	25000	54.0	1500.0	820	13.0	49.0
2-32-G-042	Glass	20500	43.0	1220.0	470	7.5	28.0
	Sapphire	26000	56.0	1550.0	700	11.0	42.0
	Stainless Steel	38000	82.0	2300.0	1120	18.0	68.0
	Carboloy	54000	116.0	3300.0	1650	26.0	100.0
	Tantalum	60000	125.0	3500.0	1750	28.0	106.0

ORDERING:

Use the following guide to determine the specific product number you require for the 65mm or the 150mm flowmeter.

7 4 [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Meter Series
Std. Temp-74 C
High Temp-74 K

Tube Number
See Specifications above

Float
Glass - 1
Sapphire - 2
316 SS - 3
Carboloy - 4
Tantalum - 5

Fitting Material
316L SS - ⅛" F NPT - 1
316L SS - ¼" FNPT - 2
PVC - ¼" FNPT - 3
PVC - ⅛" FNPT - 4
PVDF - ¼" FNPT - 5
PVDF - ⅛" FNPT - 6
Hastelloy® C -¼" FNPT - 7
Hastelloy® C -⅛" FNPT - 8

O-Ring
EPR - 1
Buna-N - 2
Viton® - 3
Kalrez® No Valve - 4
Kalrez® Valve - 5

Scale
Millimeter - 1
GPH Water@70°F - 2
LPH Water@70°F - 3
CC/MIN Water@STP - 4
SCFH Air@STP - 5
SLPH Air@STP - 6
SCC/MIN Air@STP - 7
Non standard - 8
Dual Scale - 9

Valve
316L SS - Inlet - 1
316L SS - Outlet - 2
No Valve - 3
PVC - Inlet - 4
PVC - Outlet - 5
PVDF - Inlet - 6
PVDF - Outlet - 7
Hastelloy® C - Inlet - 8
Hastelloy® C - Outlet - 9

Alarm Switch
Without Alarm - 0
Fiber-Optic NPN (Proximity) - 1 [1]
Fiber-Optic PNP (Proximity) - 2 [1]
Inductive Ring Sensor (Proximity) - 3 [2]
Inductive Ring Sensor (Latching) - 4 [2]

[1] *Fiber Optic switch is not available for sapphire floats*
[2] *Inductive Ring Sensor is available in the following: 1/8" Floats - Stainless Steel / Carboloy 1/4" Floats - Stainless Steel / Carboloy / Tantalum*