Turbine Flow Meter
StaTurb TF400 Series - Sanitary



Introduction

The Staturb TF400 Series turbine flow meter is engineered specifically for sanitary applications across the food, beverage, and pharmaceutical industries. It is available in six distinct sizes—covering a flow range of 0.8 to 250 GPM—with a variety of process connections and sensor options to meet diverse requirements.

Characteristics

Low pressure loss

Fast response

High accuracy

High repeatability

Customization available

Applications

Food and Beverage

Pharmaceutical

Process water

Demineralized water

Hydrophilic medium

Ethanol

Specifications

Size	1/2"…2"
Applicable medium	Liquids
Accuracy	1%; 0.5% of reading
Repeatability	0.1%
Pressure rating	Up to 300 psi (20 bar)
Ambient Temperature	-40…185°F (-40…85°C)
Medium Temperature	-40…260°F (-40…126°C)
Materials	Body: 316L SS
	Flow straightener: 316L SS
	Rotor: 316L SS
	Rotor shaft: 316 stainless steel
	Bearing: Rulon
	Retaining ring: 304 SS
End Fitting	Tri-clamp 1" (25.4mm) Tri-clamp 2" (50.5mm) Tri-clamp 2.5" (64mm)
Certification	ISO 9001; CE

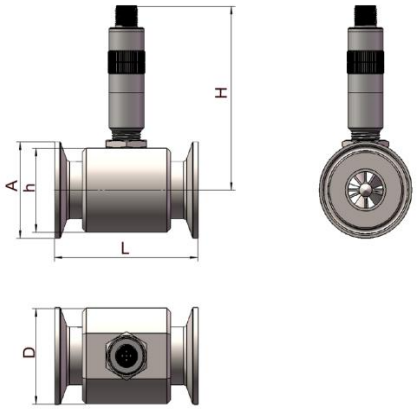
Flow Range

Part Code	Meter Size	End Fitting	Flow Range (GPM)	Max. Pressure (psi)
R15	1/2"	1"	0.8…10	290
R15A	1/2"	1"	1.6…18	290
R20	3/4"	2"	3.5…35	290
R25	1"	2"	7.1…71	290
R40	1-1/2"	2"	13…130	230
R50	2"	2-1/2"	25…250	230

* The data listed applies to a standard 10:1 turndown ratio. Extended 20:1 turndown ratios are available upon request, which reduces the lower limit of the flow range by 50% compared to the specified values.

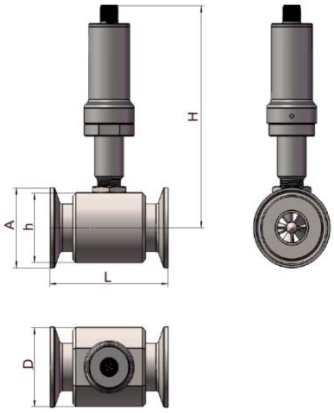
Dimensions in mm

Pulse output with M12 x 1 connector



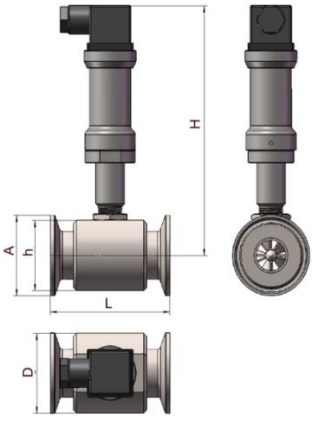
Part Code	A	h	L	H	D
R15(A)	25.4	27	64	90	33
R20	50.5	34	64	93	40
R25	50.5	44	78	96	50
R40	50.5	60	120	103	66
R50	64	72	120	109	78

Analog output with M12 x 1 connector



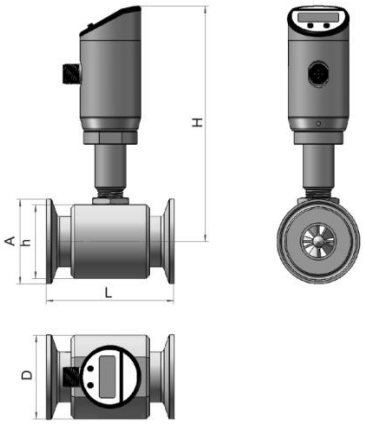
Part Code	A	h	L	H	D
R15(A)	25.4	27	64	134	33
R20	50.5	34	64	137	40
R25	50.5	44	78	140	50
R40	50.5	60	120	147	66
R50	64	72	120	153	78

Analog output with solenoid connector



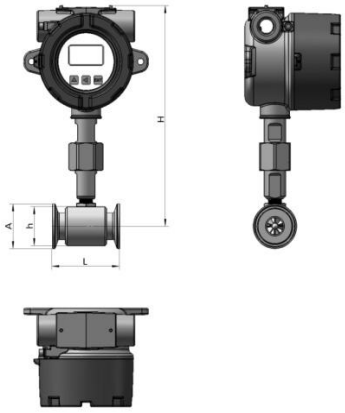
Part Code	A	h	L	H	D
R15(A)	25.4	27	64	150	33
R20	50.5	34	64	153	40
R25	50.5	44	78	157	50
R40	50.5	60	120	163	66
R50	64	72	120	169	78

Digital display



Part Code	A	h	L	H	D
R15(A)	25.4	27	64	134	33
R20	50.5	34	64	137	40
R25	50.5	44	78	141	50
R40	50.5	60	120	147	66
R50	64	72	120	153	78

Ex-proof



Part Code	A	h	L	H	D
R15(A)	25.4	27	64	243	33
R20	50.5	34	64	246	40
R25	50.5	44	78	250	50
R40	50.5	60	120	256	66
R50	64	72	120	263	78

Order Code

Example: TF400-R25B

1. Model

TF400-	Sanitary Turbine Flow Meter

2. Part Code (see flow range for details)

R15	Select a part code from flow range table.
	Other connection available on request

3. Accuracy

A	0.5% of reading
B	1% of reading

Electronics Options

S1000 Pickup Coils / Transmitters
Amplified Pulse
Linearized 4…20mA Output



DE500 Local Display
Local Display
4…20mA + Alarms Output



SA500 Pickup Coils
Intrinsically Safe
Amplified Pulse



SX500 Flow Transmitters Explosion-Proof Modbus RS485


See electronics' datasheet for details.