FREE FLOAT TLV STEAM TRAP MODEL FS3 QuickTrap®

UNIVERSAL FREE FLOAT STEAM TRAP WITH THERMOSTATIC AIR VENTING

Features

Inline replaceable 2-bolt universal flange steam trap for steam mains, tracers and light processes.

- 1. Two-bolt flange connector permits trap replacement in minutes without disturbing piping.
- 2. Universal flange allows trap to be positioned in the correct attitude, regardless of pipeline configuration.
- 3. Precision-ground float, constant water seal and three-point seating design ensure a steam tight seal, even under no-load conditions.
- 4. Thermostatic air venting with bimetal strip allows for fast start-up.
- 5. One screen located in connector and one in trap ensure trouble-free operation.



400 Q 300 ature 200

> 0 5

Temper 100 0

Max. Allowable Press./Temp. (PMA/TMA) Pressure Shell Design Conditions (NOT Operating Conditions)

> 10 15 20 25

Pressure (barg)

125

30

1 bar = 0.1 MPa

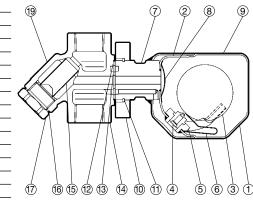
Specifications

Model	FS3			
Connection	Screwed	Socket Welded	Flanged	
Size	¹ / ₂ ", ³ / ₄ ", 1" DN 15, 20, 25			
Orifice No.	5, 10, 21			
Max. Operating Pressure (barg)	5, 10, 21			
Max. Differential Pressure (bar)	5, 10, 21			
Max. Operating Temperature (°C)	400			
Connector Unit	F46			
Trap Unit	S3*			

Designed for use with F46, F32 Connector Units and V1/V2 Trap Station. Trap and Connector Units sent as separate units for flexible installation.

To avoid abnormal operation, accidents or serious injury, DO NOT use **CAUTION** this product outside of the specification range. Local regulations may restrict the use of this product to below the conditions quoted.

No.	Description	Material	DIN*	ASTM/AISI*
Ĵт	Trap Body	Stainless Steel A240 Type 316L	1.4404	—
2 [°]	Inner Cover	Stainless Steel A240 Type 316L	1.4404	—
<u>З</u> т	Float	Stainless Steel SUS316L	1.4404	AISI316L
4 ^т	Orifice	_	_	—
<u>(5)</u> т	Float Guide	Cast Stainl. Steel A351 Gr.CF3M	1.4435	—
<u>6</u> т	Air Vent Strip	Bimetal	_	—
(7) ^T	Connector Joint	Stainless Steel SUS304	1.4301	AISI304
8 [°]	Trap Screen	Stainless Steel SUS304	1.4301	AISI304
9 ^т	Nameplate	Stainless Steel SUS304	1.4301	AISI304
10 ⁻	Connector Flange	Carbon Steel A105	1.0460	—
Ð	Snap Ring	Carbon Steel SWRH57	1.0535	AISI1055
12™	Outer Connector Gasket	Graphite/Stainl. Steel SUS304	-/1.4301	-/AISI304
13™	Inner Connector Gasket	Graphite/Stainl. Steel SUS304	-/1.4301	-/AISI304
14	Connector Body	Cast Stainl. Steel A351 Gr.CF8	1.4312	_
15	Screen inside/outside	Stainless Steel SUS304/430	1.4301/1.4016	AISI304/430
16™	Screen Holder Gasket	Stainless Steel SUS316L	1.4404	AISI316L
17	Screen Holder	Cast Stainl. Steel A351 Gr.CF8	1.4312	—
18 [⊤]	Connector Bolt**	Alloy Steel SNB7	1.7225	A193 Gr.B7
19	Connector Nameplate	Stainless Steel SUS304	1.4301	AISI304
20	Flange***	Cast Stainl. Steel A351 Gr.CF8/ Stainless Steel SUS304	1.4312/ 1.4301	-/AISI304

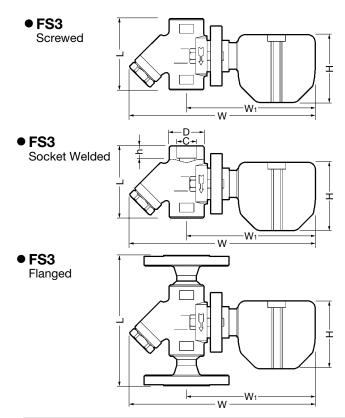


* Equivalent materials ** Shown on reverse *** Shown on reverse, shape and material depend on flange specifications Replacement kits available: (M) maintenance parts, (T) trap unit S3 Replacement parts for former connector body F32 differ from those for F46.

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Dimensions



FS3 Screwed* (mm)								
Size	L	φH	W	W1	Weight (kg)			
1/2 ″	80	77	204	140	1.7			
3/4 ″								
1″	96		206	144	2.0			

* BSP DIN 2999, other standards available

FS3 Socket Welded* (m								
DN	L	φH	W	W1	φD	φC	h	Weight (kg)
15	80 77	80 204		140	20	21.8	12	4.7
20		77	204	140	36	27.2	- 4	1.7
25	96		206	144	44	33.9	14	2.0

* ASME B16.11-2005, other standards available

FS3 Flanged (mm)								
DN								
	DIN 2501	ASME	φH	W	W1	Weight * (kg)		
	PN25/40	150RF	300RF					
15	150	150	150				3.3	
20	150	150	150	77	204	140	4.2	
25	160	160	160				4.7	

Other standards available, but length and weight may vary * Weight is for PN 25/40

Manufacturer

Kakogawa, Japan

CO. LTD.

Discharge Capacity

400 5 300 Discharge Capacity (kg/h) 10 200 21 100 70 50 30 10 0.5 0.3 3 5 20 21 0.1 1 10 Differential Pressure (bar) 1 bar = 0.1 MPa

1. Line numbers within the graph refer to orifice numbers.

2. Differential pressure is the difference between the inlet and outlet pressure of the trap.

Capacities are based on continuous discharge of condensate 6°C below saturated steam temperature.
Recommended safety factor: at least 1.5.

CAUTION DO NOT use traps under conditions that exceed maximum differential pressure as condensate backup will occur!

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ISO 9001/ISO 14001