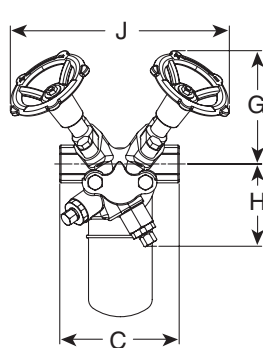




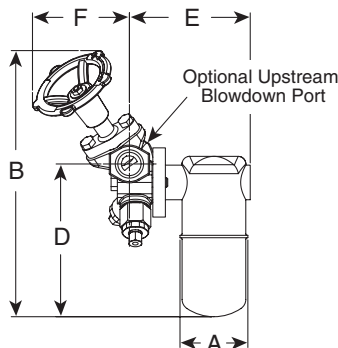
TVS 4000 Series Stainless Steel Trap Valve Station

For Pressures to 650 psig (45 barg)...Capacities to 1 300 lb/hr (590 kg/hr) (Using 2000 Series Inverted Bucket Steam Traps)

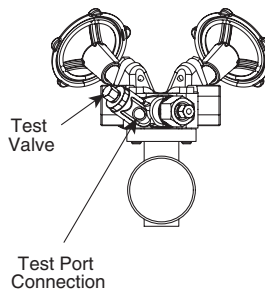
Steam Trapping and Steam Tracing Equipment



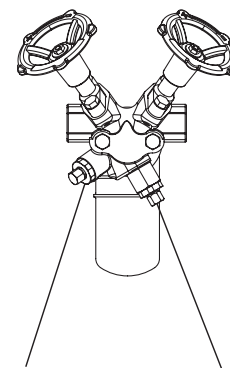
Model TVS 4000 With 2000 Series SS Trap
Front View



Model TVS 4000 With 2000 Series SS Trap
Side View



Model TVS 4000 With 2000 Series SS Trap
Bottom View



Test Valve
Used to test and evaluate trap operation

Strainer Blowdown Valve

Same principle. Different package with two piston-style isolation valves, test valve and integral stainless steel strainer with blowdown valve. Now the energy-saving performance and reliability of the inverted bucket steam trap are available in a versatile new package. You'll still enjoy all the familiar benefits. And the same efficient condensate drainage from virtually every kind of steam-using equipment. What you'll find new are all the benefits of a piston valve integrated into the same space-saving package.

Materials—TVS 4000 Connector

Connector:	ASTM A351 Gr. CF8M
Strainer screen:	Stainless steel
Screen retainer:	Stainless steel
Gasket:	Stainless steel
Retainer unit:	Stainless steel
Test valve:	Stainless steel
Blowdown valve:	Stainless steel

Isolation Valve Components

Handwheel:	Ductile iron
Nut:	Stainless steel
Stem, washers:	Stainless steel
Bonnet:	ASTM A351 Gr. CF8M
Bonnet, bolts:	DIN933, Gr. 8.8 per DIN267
Valve plug:	Stainless steel
Disc springs:	Stainless steel
Valve sealing rings:	Graphite and stainless steel
Lantern bushing:	Stainless steel
Valve washers:	Stainless steel

Materials—Series 2000 Traps

Body:	ASTM A240 Gr. 304L
Internals:	All stainless steel—304
Valve and seat:	Hardened chrome steel—17-4PH

For a fully detailed certified drawing, refer to CD #1232.

TVS 4000 Series With 2000 Series Inverted Bucket Steam Trap						
Model No.	2010		2011		2022	
	in	mm	in	mm	in	mm
Pipe Connections	1/2, 3/4	15, 20	1/2, 3/4	15, 20	1/2, 3/4	15, 20
"A" Trap Diameter	2-11/16	68	2-11/16	68	3-7/8	98
"B" Height (Valve Open)	8	203	10-1/2	268	12-1/2	318
"C" Face to Face	4-3/4	120	4-3/4	120	4-3/4	120
"D" Connection \varnothing to Bottom	4-3/4	120	6	154	8	203
"E" Connection \varnothing to Outside of Trap	4-1/2	114	4-13/16	122	5-7/8	149
"F" Connection \varnothing to Front of Handwheel (Valve Open)	3-1/2	89	3-7/8	98	3-7/8	98
"G" Connection \varnothing to Top of Handwheel (Valve Open)	3-1/4	83	4-1/2	114	4-1/2	114
"H" Connection \varnothing to Bottom of Connector	1-7/8	47	3-1/4	83	3-1/4	83
"J" Width Across Handwheels (Valve Open)	9-1/4	235	8-3/4	222	8-3/4	222
Test Port Connection	1/4 NPT	6	1/4 NPT	6	1/4 NPT	6
Weight, lb (kg)	9 (4)		9-1/2 (4.3)		12 (5.4)	
Maximum Operating Pressure (Trap)	200 psig (14 barg)		400 psig (28 barg)		650 psig (45 barg)	
Maximum Allowable Pressure (Trap)	400 psig (28 barg) @ 750°F (399°C)				650 psig @ 600°F (45 barg @ 315°C)	

Designs, materials, weights and performance ratings are approximate and subject to change without notice. Visit armstronginternational.com for up-to-date information.

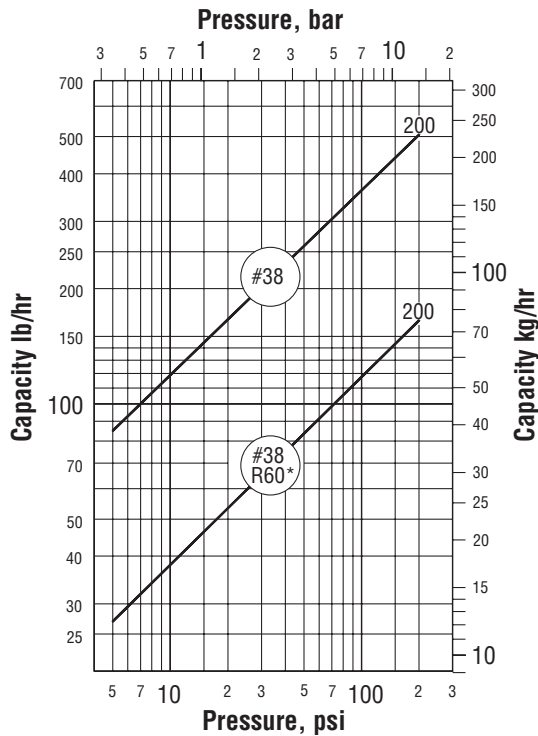
TVS 4000 Series Stainless Steel Trap Valve Station

For Pressures to 650 psig (45 barg)...Capacities to 1 300 lb/hr (590 kg/hr) (Using 2000 Series Inverted Bucket Steam Traps)

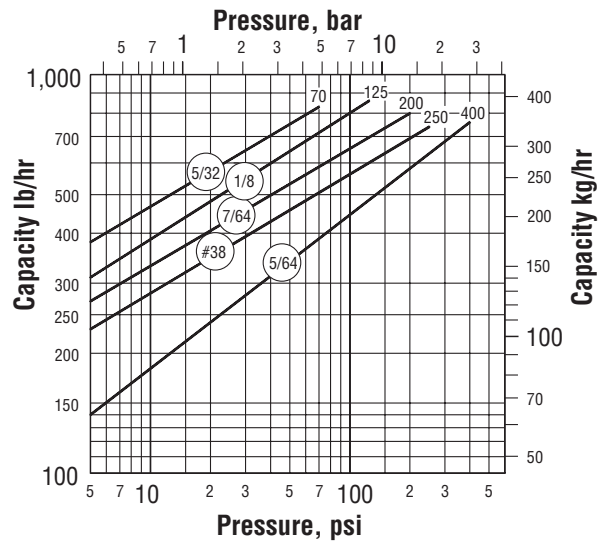


Steam Trapping and Steam Tracing Equipment

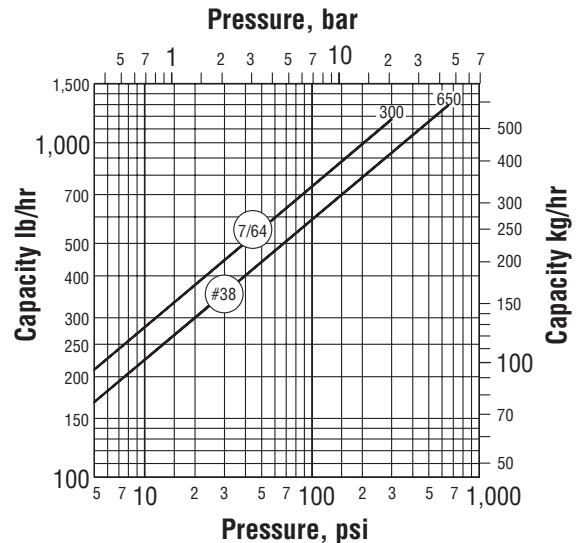
Model 2010 Capacity



Model 2011 Capacity



Model 2022 Capacity



*NOTE: Because the orifice is located at the top, inverted bucket steam traps handle dirt and scale better than other types of traps. However, in applications where extremely dirty conditions exist, care should be exercised in the use of all types of restricted-orifice, reduced-capacity traps.

Options

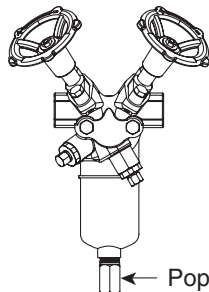
Insu-Pak™

Now you can insulate the in-line traps in your plant without complicating regular trap maintenance. Insu-Pak, a simple reusable insulation package, cuts the time and cost of in-field installation because it goes on in a snap. And it comes off just as easily. The Insu-Pak can prevent trap freeze-up when used with a properly designed condensate manifold. Designed for use with Model 2010 and Model 2011 traps.



Pop Drain

Simple but effective against freeze-up. Properly installed and maintained at low points in your system, the simple, pressure-actuated pop drain opens for condensate drainage at 5 psig (0.35 barg) for Models 2011 and 2022.



Probe Connections are available for trap monitoring on Models 2011 and 2022.

How to Order

Model	Connection	Type of Connection Inlet/Outlet	Flow Direction	Trap Type
TVS 4000	1/2" 3/4"	NPT SW BSPT Flanged*	R = Right to Left L = Left to Right	Inverted Bucket Disc Thermostatic wafer Bimetallic Float and Thermostatic

*Consult factory.

Designs, materials, weights and performance ratings are approximate and subject to change without notice. Visit armstronginternational.com for up-to-date information.