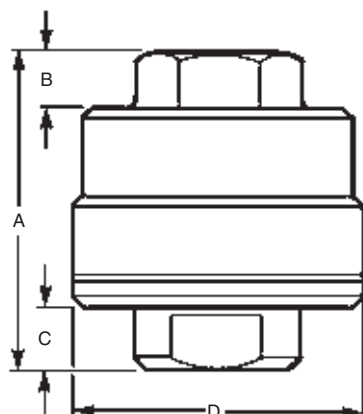
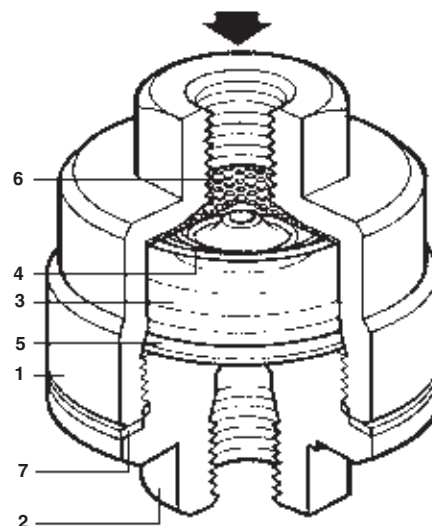


spirax/sarco®

Balanced Pressure Thermostatic Steam Trap MST21 & MST21H

The welded stainless steel element is self-adjusting over the entire operating pressure range and will discharge condensate at approximately 18°F (10°C) below saturated steam temperature on the standard Fill trap. Up to 518°F (270°C) and waterhammer can be tolerated by this trap. The MST21 can be disassembled for servicing. Trap may be installed in horizontal or vertical pipelines. Can be used on tracing, drips, sterilizers and a low capacity air vent.

Model	MST21 / MST21H
PMO	304 psig
Sizes	1/4", 1/2" MST21 1/2", 3/4", 1" MST21H
Connections	NPT
Construction	All Stainless Steel
Options	NTS Fill near to steam 7.2°F SUB Fill sub cooled 40°F



Dimensions (nominal) in inches and millimeters

Size	A	B	C	D	Weight
1/4"	2.0 50.5	0.3 8.5	0.4 10	1.8 45	.75 lb 0.34 kg
1/2"	2.4 61	0.5 12.5	.06 14	1.8 45	1.06 lb 0.48 kg
3/4"	2.7 68	0.6 14.0	.06 14.0	1.8 45.0	1.06 lb 0.48 kg
1"	3.0 75	0.6 14.0	.06 14.0	1.8 45.0	1.06 lb 0.48 kg

Typical Applications

Steam main drainage and steam tracing.

Limiting Operating Conditions

Max. Operating Pressure (PMO) 304 psig (21 barg)

Max. Operating Temperature 518°F @ 300 psig (270°C @ 21 barg)

Pressure Shell Design Conditions

PMA 362 psig/up to 248°F 25 barg/up to 120°C
Max. allowable pressure 309 psig/424°F 21 barg/218°C
188 psig/752°F 13 barg/400°C

TMA 752°F/0-188 psig 400°C/0-13 barg
Max. allowable temperature

Construction Materials

No.	Part	Material
1	Body	Stainless Steel ASTM A743 CF16F/ DIN 17440 X 10 CrNiS 18 9
2	Cap	Stainless Steel ASTM A276 Gr 431
3	Capsule	Stainless Steel
4	Spring	Stainless Steel BS 2056 302 S26
5	Spacer Plate	Stainless Steel BS 1449 304 S16
6	Strainer Screen (0.8mm perf)	Stainless Steel ASTM A240 316L
7	Gasket	Stainless Steel ASTM A276 304L DIN 17440 X 2 CrNi 19 11

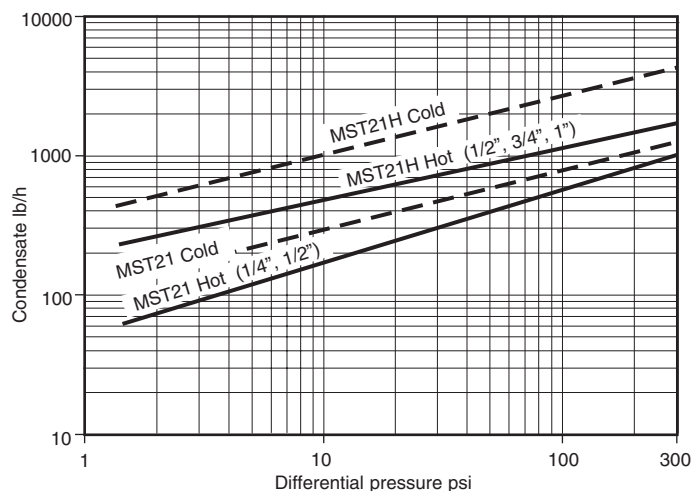
Local regulation may restrict the use of this product below the conditions quoted. Limiting conditions refer to standard connections only.

In the interests of development and improvement of the product, we reserve the right to change the specification.

TI-2-0021-US 10.09

Balanced Pressure Thermostatic Steam Trap MST21 & MST21H

Capacities



Sample Specification

Steam trap shall be Spirax Sarco MST21 balanced pressure thermostatic type, which self adjusts to all pressures to 304 psig. Trap to be of all stainless steel maintainable construction. Internal element shall be capable of resisting waterhammer and withstanding up to 518°F (270°C). Offered in standard and high capacity with choice of 3 discharge temperature options.

Installation

The steam trap is intended for installation in a vertical line with the inlet at the top and the outlet at the bottom. This will ensure that it is self-draining. Full port isolating valves should be installed upstream and downstream of the trap. If fitted in a horizontal line, the trap should be preceded by a short drop leg. Trap will be piped inverted (outlet vertical up) when used as an airvent (NTS-Fill recommended).

Maintenance

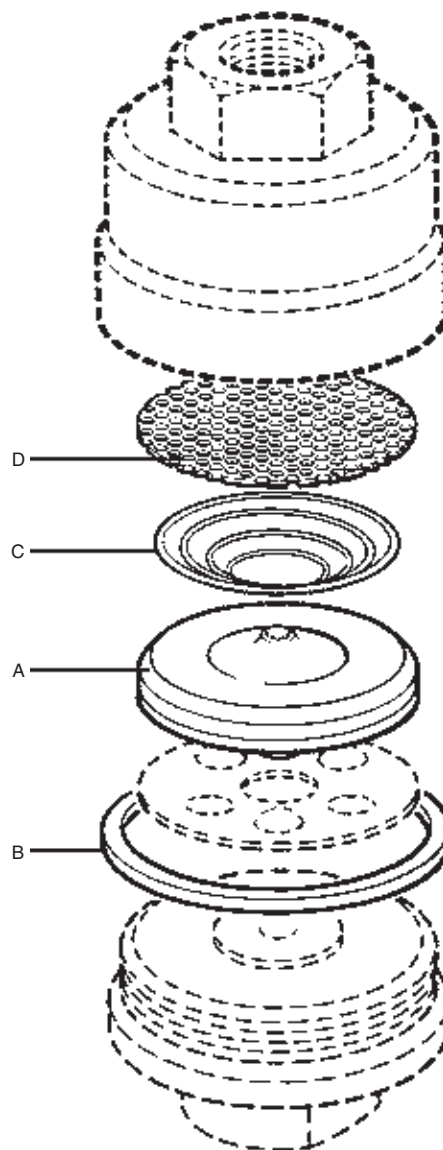
Complete isolation of the trap from both supply and return line is required before any servicing is performed.

The trap should be disassembled periodically for cleaning of the strainer screen and inspection and cleaning of the valve head and seat.

Worn or damaged parts should be replaced using a complete Capsule Assembly Set.

Complete installation and maintenance instructions are given in the IM-P125-07 sheet, which accompanies the product.

Spare Parts



Capsule Assembly Set

A, B, C, D

Available spare parts are shown in heavy outline. Parts drawn in broken line are not supplied as spares.

Please note thermostat fill when ordering spares.