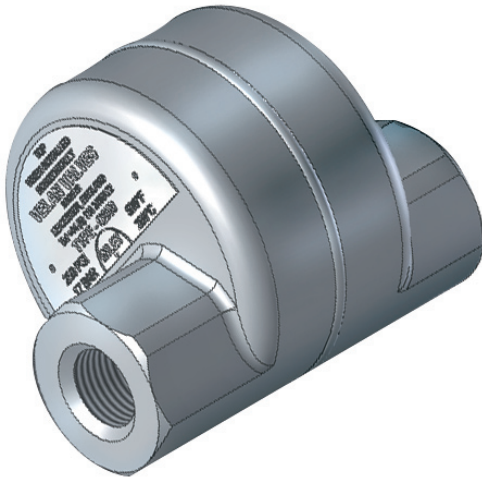


# VELAN HERMETICALLY SEALED STEAM TRAP

## HERMETICALLY SEALED UNIT ON TYPE Q250 AND UST



### HERMETICALLY SEALED UNIT

The hermetically sealed body is seal welded and contains all operating parts.

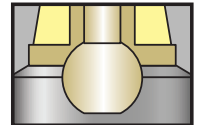


Type Q250

Type UST

### COMMON DESIGN FEATURES

- **Positive closing**  
The bimetallic element is a function of the saturated steam curve (pages 4 & 5) and its sensitivity to the temperature change assures an immediate reaction to both steam and condensate for the entire pressure range. At saturated temperature the valve is closed.
- **All-position installation**  
Simplifies piping layout for easy plant standardization.
- **Self-aligning precision ball valve**  
Single free-floating stainless steel hardened Rc 58 min. ball valve.
- **Air venting - good discharge capacity**  
Air and cold condensate is discharged through a full orifice efficiently ensuring fast warm-up of equipment.
- **Check valve operation**  
The main valve acts as a check valve preventing back flow.
- **Positive condensate drainage** for process work.
- **Guaranteed against water hammer**  
The downstream valve acts as a release valve on the excess water pressure without damage to internal parts.
- **Valve seats Stellite**  
All Velan valve seats are Stellite faced to increase their resistance to the high degree of wear through velocity of flow, dirt and scale.



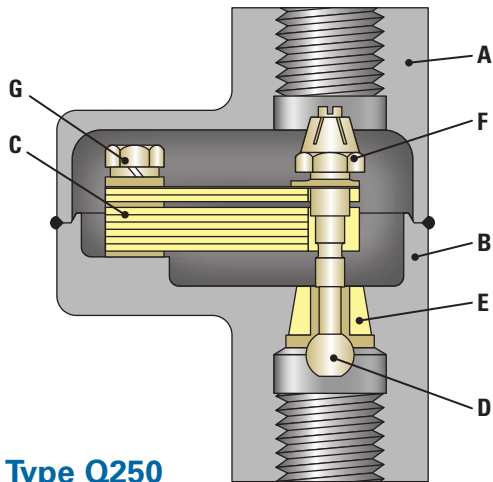
### TYPE Q250 DESIGN FEATURES

- **Freezeproof installation**  
Velan traps do not require a reservoir of priming water in the body to operate. When installed vertically with inlet on top, they drain completely when cold, and are freezeproof without insulation.

### TYPE UST DESIGN FEATURES

- **Integral strainer**  
An integral stainless steel strainer protects the trap operating mechanism from damage by dirt or scale. No extra fittings or installation costs are required. Free strainer area 26%. Perforation is 0.031" (0.8mm).
- **Compatibility**  
Compatible with most other manufacturers trap modules.
- **Easy removal**  
Steam trap can be removed and replaced in minutes by undoing 2-bolts and without having to disconnect any piping.
- NPT blow down plug
- Velan connectors are available separately with screwed and socketweld connections.
- All position installation (Swivel 360 DEG).

# VELAN HERMETICALLY SEALED Q250 STEAM TRAP



Type Q250

## STANDARD MATERIALS

PART		MATERIALS
A	Inlet shell	Stainless steel CF8M
B	Outlet shell	Stainless steel CF8M
C	Bimetal element	Truflex GB-14
D	Stem and ball	S/S, ball valve 58Rc min.
E	Seat	Stellite 6
F	Self locking adjustable nut	Stainless steel
G	Fixing screw	Stainless steel

## APPLICATIONS

Steam tracing, line drain and most general process applications.

## CONNECTIONS:

- Screwed
- Socketweld

## SIMPLE PRINCIPLE OF OPERATION

A single free-floating ball valve:

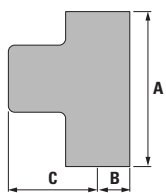
- Vents air
- Discharges condensate
- Traps steam
- Acts as a check valve.

## ENGINEERING DATA

PRESSURE RANGE psi/bar	PMO psi/bar	MATERIAL	MAX TEMP °F/°C	ORIFICE in/mm	MAX CAPACITY lb/hr/kg/hr
0-250 (0-17)	250 (17)	S/S CF8M	500 260	3/8 9.5	2,700 1,227

Maximum design condition: ANSI/ASME 300  
 PMA = Maximum allowable pressure: 720psi@100°F (49bar@38°C)  
 TMA = Maximum allowable temperature: 500°F (260°C)  
 Maximum cold hydrostatic test pressure: 1100psi (75bar)  
 TMO = Maximum operating temperature = TMA  
 PMO = Maximum operating pressure: (See Table)

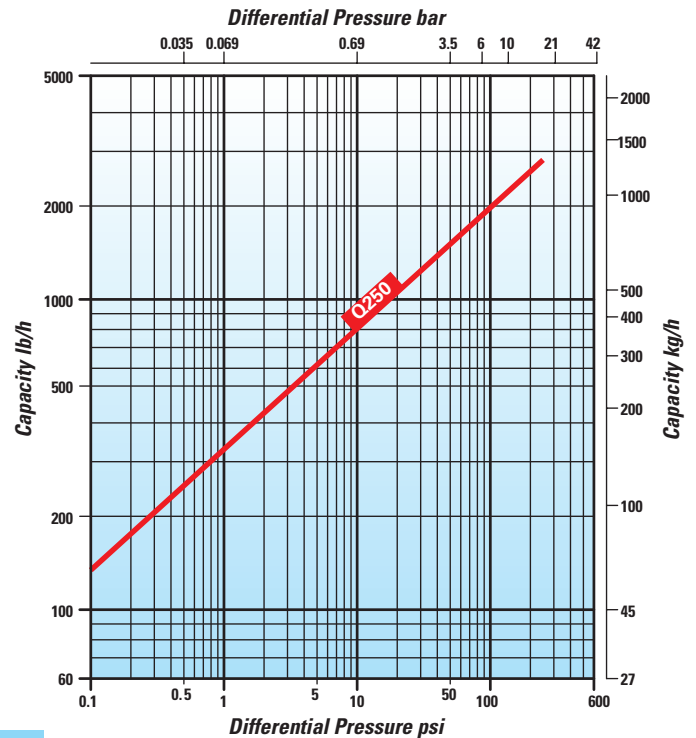
## DIMENSIONS & WEIGHTS



SIZE in/mm	A FACE TO FACE	B CENTER TO BOTTOM	C CENTER TO TOP	WEIGHT lb/kg
1/2 15	4	3/4	2 1/2	3 1/2
3/4 20	102	19	64	1.5

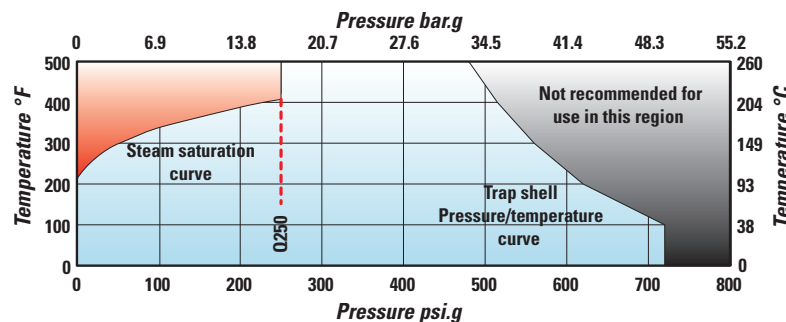
## CONDENSATE CAPACITY

The performance graph indicates the continuous discharge capacities of condensate per hour at various pressure differentials across the trap.



Maximum cold water capacity x 3.5

## PRESSURE / TEMPERATURE LIMITS



----- Pressure limit for trap type