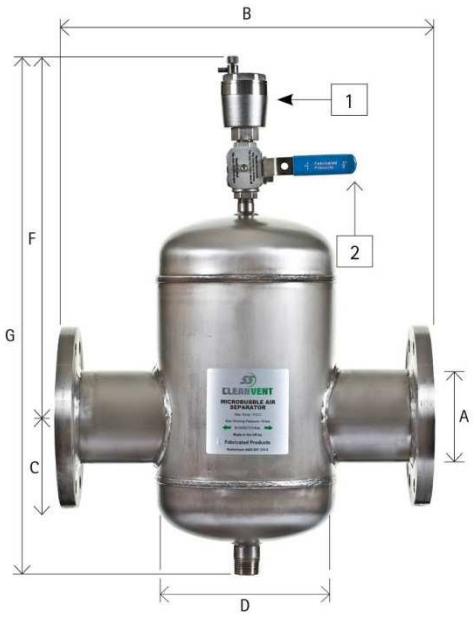
CLEANVENT

An Air (Deaerator) Separator.

1 High capacity auto air vent

2 Fast bleed Valve



Dimensions (mm)							
Model No.	A	B	C	D	F	G	Tested to
SS CVA-50	50	430	114	170	390	504	21 bar
SS CVA-65	65	430	120	170	384	504	21 bar
SS CVA-80	80	490	141	220	459	600	21 bar
SS CVA-100	100	490	154	220	446	600	21 bar
SS CVA-125	125	630	193	325	585	778	21 bar
SS CVA-150	150	630	207	325	571	778	21 bar
SS CVA-200	200	810	251	410	649	900	21 bar
SS CVA-250	250	880	303	510	835	1138	21 bar
SS CVA-300	300	1100	353	610	947	1300	21 bar
SS CVA-350	350	1500	406	770	1025	1431	21 bar
SS CVA-400	400	1500	432	770	1262	1694	21 bar
SS CVA-450	450	1750	495	920	1218	1713	21 bar
SS CVA-500	500	2000	595	1220	1230	1825	21 bar

Dearation

The word Dearation describes the removal of dissolved gases from liquids such as air from water. When water is heated or the pressure reduced gas microbubbles are released into the system. Microbubbles can be the cause of major problems such as pump failure, corrosion and energy loss.

The Solution

The stainless steel CleanVent combines the removal of air through a single unit. Installed at the hottest point in the system the stainless steel CleanVent will eliminate these micro bubbles from heating and chilled water systems.

Features and Benefits

- Greatly reduced commissioning times after initial fill.
- Longer system life （through air elimination）
- Low-pressure drop
- Bi-directional flow
- Maximum Temperature. 110 °c. Higher temperature units available on request.
- Tested to 21 bar
- All stainless steel construction.
- Air collects in the air chamber before being automatically vented
- An internal stainless steel concentrator to aid removal of air
- Smooth surfaces with Stainless Steel lead to lower friction
- Stainless will not degrade in service thanks to its excellent resistance to corrosion.
- Stainless Steel is extensively more resistant to oxidation by water and biocides than carbon steel. Therefore Stainless Steels are not contributing to oxidation, sludge's etc;
- Thermal properties of stainless steel. They are far superior to iron or carbon steel.
- Maximum flow rate up to 3m/sec

Stainless Steel: Safe, Clean, Efficient and Hygienic

- Stainless is highly resistant against micro bacteria attacks plus lower bacteria colonization
- Hygienic and cleanable material (Smooth surface internally & externally). Due to their very high passive film (protecting the surface)
- Lower adhesion of deposits (dirt and sludge) with the smooth internals of Stainless Steels. Sludge & magnetite is washed/ removed from the collection chamber far easier than the inferior iron/ carbon steel
- Stability, Stainless Steel is basically inert in water. Leaching of alloying elements is within safe limits. As a result, they provide better quality water. No turbidity problems. All resulting in less bacterial slime, low energy consumption, low cleaning costs, good for conveying wet solids.
- Excellent durability and abrasion resistance, as Stainless Steels are resistant to crevice corrosion, cavitations and wear in pure and polluted waters as well as in atmosphere (even polluted), they are cost effective for long term use and do not cause environmental pollution.

CleanVent location

This unit (our model ref SS CVA) must be installed at the hottest part of the system (before the pumps). In a heating system this is the main flow from the boilers.
In a chilled water system the unit must be located in the return close to the chiller.
The static head must not exceed 60 metres in a Heating system.
Maximum static head must not exceed 40 metres in a chilled water system.
N.B. if the static head is greater than these figures the efficiency of the SS CleanVent & MagVent is reduced

Commissioning

The CleanVent requires no special commissioning. All units are fitted with a fast bleed valve, which should be used when initially filling the system. The same valve is used for draining off floating scum and also prevents the possibility of dirt clogging the air vent.
Most of the dissolved air will be removed in a few days. However this may vary from system to system, In large systems it may take several weeks.

Flanges

All flanges are drilled to BS4504 PN16 as standard. Other flange ratings are available on request.