



DEGASSING VALVE 61411 APPLICATIONS DATA SHEET For Relieving Gas from Gas-Bearing Liquid Deliveries

Liquids that will release gas in the pumping process such as NaOCl or H₂O₂ require the generated gas be removed from the head where generally the gas is generated. The 61411 assembly will provide a suitable vent for the gas without compromising the integrity of the pumped solution.

The installation of the degassing assembly is straightforward as shown below:



Getting the generated gas out of gas-bearing liquids. The degassing valve (2) fits in between the check valve (1) and the pump head (3), allowing the gas, when generated, to be relieved out and away from the process liquid being transported. Note this arrangement relieves the gas when it occurs, maximizing the fluid transport process.

Figure 1- Installation

Overview

The 61411 degassing assembly works in a simplistic manner by inserting a vent or bleed between the head and the check valve. The check valve (1) fits into the adapter block. The degassing valve (2) provides an outlet for the generated gas released by the actions of pumping.

Because there will be fluid conveyed with the gas, the valve body is recommended to be hard-piped back to the supply tank. This hard piping is required in many places by local and regional environmental regulations.

Theory of Operation

A floating pin governed by two ceramic balls located in the degassing valve body controls the bleeding of gas and retains fluid in the conveyance desired. The action of the floating pin against the two ceramic balls limits the amount of vented liquid and allows the generated gas to exit the head. This allows maximum pumping of incompressible fluids while allowing an exit path for the generated gas.

Be sure to allow for up to 10%-20% bypass depending on stroke and flow rate. Lower flows and stroke will have higher bypass percentage. Consult factory for sizing and ratings.

Advantages

Gas is released when generated and this system is not dependent on timers or other release mechanisms, internal or external. This provides relief when the gas is generated maximizing venting of the head.

Periodic Maintenance

The valve assembly should be cleaned and inspected when regular periodic maintenance is performed on the pump. The only two serviceable items in the valve are the ceramic balls and the floating pin.