

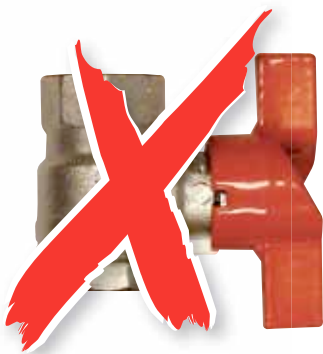
# BLOW OFF STEAM?



## NOT WITH US!

# WORLD FIRST!

The first and only steam secure solar deaerators!



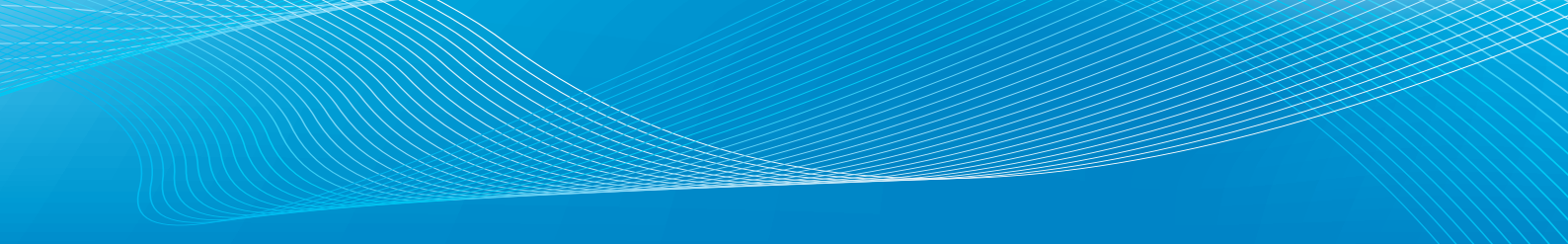
- Automatically distinguishes between AIR and STEAM.
- Continuous deaeration at the ideal spot.

SPIROTOP SOLAR AUTOCLOSE  
SPIROVENT SOLAR AUTOCLOSE



OPEN WHEN POSSIBLE,  
CLOSED WHEN NECESSARY.

**SPIRO**  **TECH**  
FOR BETTER PERFORMANCE



## Also truly continuous deaeration in solar installations

In a solar installation very high temperatures may occur, leading to steam formation. In order to prevent vapour release - even up to the point of boiling dry - the deaerators required to keep the system free of air are mostly always placed behind shut off valves. As a result, the system is hardly deaerated, even though air is continuously entering the system. As a solar installation usually includes a secondary heating source, it is often not even noticed that the solar section is not functioning properly due to excess air in the system.



*Escaping steam is dangerously hot and boiling dry would be the end result.*

## AUTOCLOSE

Thanks to a patented invention, Spirotech offers solar deaerators with the so-called AutoClose function. They automatically close when it is really needed. The result is a **permanent deaeration in the ideal location**. Shut off valves will no longer be required. Thanks to the AutoClose principle, it is now also possible for solar installations to remain **permanently** air free. This **increases** system efficiency and **prevents** all kinds of discomfort and complaints.

### IN SHORT:

- ALWAYS AN AIR-FREE INSTALLATION
- ALWAYS OPTIMUM EFFICIENCY
- LESS DEGENERATION OF THE LIQUID
- SUITABLE FOR NEW AND EXISTING INSTALLATIONS



After periods of limited solar activity, the collectors will contain large amounts of air. Especially then, but also when starting up, the system should be properly deaerated at the highest point. For practical reasons, this is not at all always done or not done adequately. Start-up problems and permanent circulation issues are the logical result of this. Air also accelerates the degeneration of the solar fluid. This can lump and clog to such an extent that complete panels are damaged beyond repair.

Air in the collectors, therefore, will result in "false stagnation" or blocking. The collector is unable to release its heat, whilst the pump is operating without circulating liquid. Under such circumstances, the efficiency of the energy-saving installation will even be less than zero.



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