

Maxiflo tops 120 conversions

Over 120 conversions in the timber industry elevate the Maxiflo to market leaders.



No spares or maintenance required on 206 Maxiflo units at Boskor, since installation in 2008

Over the past few years, 25 sawmills in southern Africa have improved their drying efficiency, with the conversion of 121 kilns collectively, to the Maxiflo Ejector System. Maxiflo is a highly efficient condensate removal system, which replaces conventional steam traps. It operates by harnessing kinetic energy from steam to eject condensate, air and non-condensable gases from process coils, as soon as they're formed.

Live steam is simultaneously retained in the coils, where heat transfer is maximised. This continuous ejection process results in higher thermal efficiencies of up to 20%. What's more, the Maxiflo system has no moving parts and therefore requires only low maintenance.

The Maxiflo was first implemented in the timber industry with the major conversion of Swartland Boudienste in 2007. Immediate benefits included a significant drop in fuel consumption and more consistent steam pressures. To date, all prior steam trap maintenance has also been eliminated.

A typical Maxiflo conversion begins with a plant feasibility study to establish potential savings and performance. This is followed by application engineering where the Maxiflo is individually sized for each application. The turnkey project ends with the installation and commissioning of the system. All Maxiflo units also carry an unconditional 10 year guarantee against workmanship, defective materials, performance and wear.

The Maxiflo system spread rapidly throughout the sawmilling industry, from small privately owned mills to the country's larger groups such as Merensky, York Timbers and MTO

Forestry. Maxiflo has subsequently become the market leader in the industry, with thousands of units in continuous operation, over a wide variety of applications.

The obvious benefits of the Maxiflo didn't escape the attention of main-stream kiln manufacturers, some of which have subsequently specified the system as a standard for new installations, both locally and internationally.

More recent Maxiflo conversions include Steinhoff's Thesen sawmill in George, who have converted all their kilns with startling results. Swaziland Plantations and Peak Timbers have also followed suit, with the total conversion of 10 kilns.

Other benefits resulting from Maxiflo conversions are that proportional control valves are less inclined to hunt during operation, as explained by Industrial Steam Products chief engineer, Max Scaravaggi. An inherent advantage is that the Maxiflo responds immediately to varying upstream pressures, which reduces the hysteresis from that of random cycling steam traps.

A leading plywood processing plant bears testament to this, after all their daylight presses were converted to the Maxiflo ejector system. Temperature profiles of the plattens were substantially improved, which is of paramount importance to the manufacturing process.

The Maxiflo is a permanent condensate removal solution, without the complexities of conventional steam traps. The system is virtually maintenance free and has a proven lifespan in excess of 22 years.