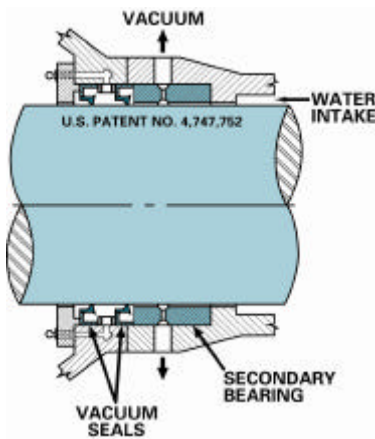


Somarakis Vacuum Pumps and Compressors Provide Unmatched Features and Performance

"Somarakis liquid ring vacuum pumps, with their numerous patented and maintenance friendly design features, have set new standards for what the pulp and paper industry has come to expect from vacuum pumps these days," says company president John Somarakis. "Each of our pumps is furnished standard with features that cut the cost of pump operation, and which save our customers thousands of dollars each year in electricity and seal water. Our pumps actually pay for themselves."

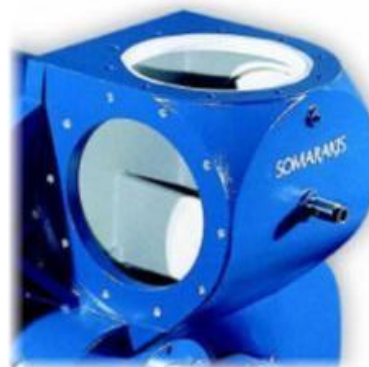
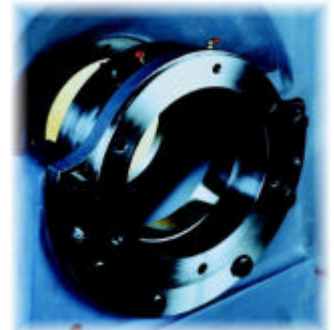
One of these unique features that Somarakis supplies with each of their pumps with is their patented Secondary Bearing. If the primary bearing should ever fail the Secondary Bearing will catch and support the rotor and shaft assembly, and allow the pump to keep operating for a short period of time until the primary bearing can be replaced. More importantly, by catching and supporting the shaft and rotor, the rotating assembly will not fall and make contact with the cones. Rotor to cone contact can cause significant and costly damage. "Our Secondary Bearing allows our customers, who rely on our equipment to maintain production, to replace damaged bearings during their next scheduled shutdown" says Somarakis. Somarakis can also license and retrofit other manufacturer's equipment with this feature when a pump or compressor is sent to them for rebuild.

Another important feature of the Somarakis SV series vacuum pump is their patented Vac-Seal sealing arrangement, which takes the place of conventional packing materials or costly mechanical seals. The Vac-Seal is used with both liquid ring vacuum pumps and compressors, and operates with no external leakage of sealant around the shaft. A return passage to the inlet (vacuum) portion of each pump head pulls water from the pump body through the Secondary



Bearings, and a slight amount of atmospheric air inward beneath the lip seals. The lip seals and lip seal spacer are split to facilitate installation. This feature greatly reduces horsepower consumption of Somarakis vacuum pumps, as there is little or no friction between the seals and the shaft. And since the seals do not touch the shaft while the pump is operating under vacuum, there is no shaft wear to speak of.

Somarakis now has several unique features available on their larger pump models. A 20-vane Rotor, available on 700 CFM and larger vacuum pumps, improves efficiency over 16-vane rotor designs. A cast steel Removable Bearing Assembly, which is available on pumps 1500 CFM and above, makes replacing or repairing bearing housings fast and easy, as the entire vacuum pump does not need to be disassembled. Somarakis' most recent addition to their lengthy feature list, the Tri-Point Inlet Connection, is now



available on select SV series pumps, and will be standard on all of their new low-profile Poseidon SVP series pumps scheduled for formal introduction early next year. This multiple port inlet connection allows users to connect to the top of the pump, as with most current installations. However, if overhead constraints exist, the Tri-Point Inlet Connection will provide the option of connecting to either side of the pump inlet instead. This feature may also prove itself to be a convenient tie-in option for future services as well, as connecting to more than one inlet port is an option.