

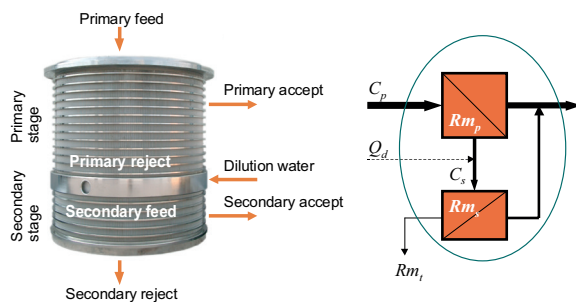
Efficient utilization of screens

Valmet Screen Dilution Belt

Valmet Screen Dilution Belt converts your existing screen into a two-stage system. A Screen Dilution Belt unit consists of two individual baskets, joined together with a dilution belt. Screen Dilution Belt improves screening efficiency by utilizing the available screening area more effectively.

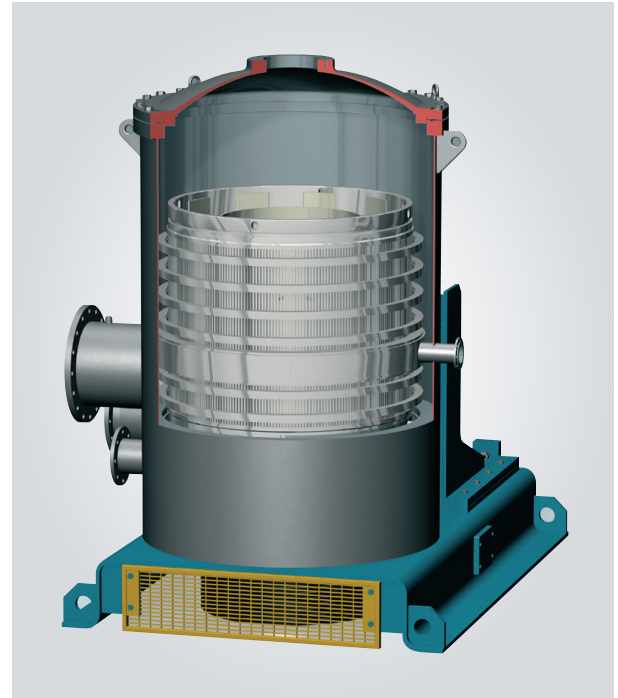
One basket – two stages

Many large and tall screens have to be operated with wide slots and high rotor speed to compensate poor utilization of the reject end of the basket due to thickening. Nimax db overcomes this problem by using the lower part of the basket as a second stage. The integrated dilution belt separating the two stages dilutes the primary stage reject to correct feed consistency for the secondary stage.



Ideal for large outflow screens

Screen Dilution Belt can be made to fit any outflow screen on the market. The minor screen modifications required are simple and fast. Dilution water can be fed to the dilution belt via two inlets through the screen housing.



Benefits

- An additional screening stage is added without adding a new screen. No additional piping, motors or chests
- Increased capacity and screening efficiency
- Reduced fiber losses at maintained screening efficiency because of the addition of another screening stage
- Reduced and controlled reject thickening

References

A Swedish market pulp mill

A Swedish market pulp mill produces groundwood pulp from spruce and aspen. The use of Screen Dilution Belt brought shive removal efficiency to levels that were previously unobtainable at the mill. By adding the correct amount of dilution water in the correct position, a lower rotor speed could be used. Energy was saved and screen basket service lifetime increased due to reduced wear.

The mill has received positive comments on the new improved pulp quality it has achieved with Screen Dilution Belt screen basket technology.

A Canadian TMP mill

A Canadian TMP mill has reported excellent results after the installation of its first Screen Dilution Belt basket. In spite of wider slots in both the primary and the secondary stage, the Screen Dilution Belt basket has proved superior to the reference basket.

The results were achieved by comparing two parallel D9 screens in the reject line of the TMP mill. Testing was carried out using three different testing methods. Regardless of the method used, the Screen Dilution Belt basket reduced shive levels to about two-thirds of the previous levels.

