

Roll covers in the paper machine Press section



Press section

Roll cover technology in the press section plays an essential role for a smooth production and is a key factor for improving dewatering performance, ensuring consistent production and efficiency.

The various applications of the roll covers in the press section require a variety of designs and materials. Materials range from rubber over composite and polyurethane to thermal coatings. The surface design is always optimized for the various applications by experienced specialists with the support of a modern nip calculation program.

Polyurethane roll covers for the press section

Polyurethane is the preferred cover material for the press section. Voith has developed extremely wear resistant and reliable polyurethane covers with a unique bonding system and fully hydrolysis resistant base. Voith Paper's polyurethane product line is comprised of roll covers for all applications. The Aqua and Solar series are proven qualities for suction press rolls and blind drilled and/or grooved press rolls. SupremeFlow has a high chemical resistance due to the chemistry in the Polyurethane functional layer. This provides a stable cover surface over the full runtime. SupremeFlow is suitable for all graphical, board & packaging applications with suction press rolls who want to achieve longer grinding intervals. The InForce polyurethane roll cover has been especially developed for high speed/load applications and as a steel roll replacement.

In pulp machines roll covers have to withstand harsh conditions. High temperatures and especially aggressive chemicals stress the roll covers. Therefore, Voith has developed the IntensePress roll cover for pulp machines that meets precisely these demanding requirements.

Rubber roll covers for the press section

Voith developed a broad range of high performance rubber covers for the various demands of the paper industry. All rubber covers provide a very high reliability based on the excellent wear resistance, low heat generation and a superior, long-lasting bonding system. The product portfolio holds a range of proven rubber covers for every application. The latest developments in the rubber cover series complete the range, with a superior wear-resistance cover coming closer to polyurethane than any other rubber cover and providing the best profile maintenance for uniform dewatering during the run cycle.

Thermal coatings for the press section

The need for roll coatings with excellent sheet release properties has been steadily increasing as paper machines have reached elevated speed and press loadings. The Terra series, an innovative thermal coating family, allows machines to operate with a very low draw, keeping sheet breaks to a minimum, even at very high speed. Voith Paper has continuously developed the thermal coating product line. Therefore, product innovations combining the best release properties with very high durability and resistance to aggressive environments and harsh operating conditions were brought to the market and belong to this successful product portfolio.

NipMaster

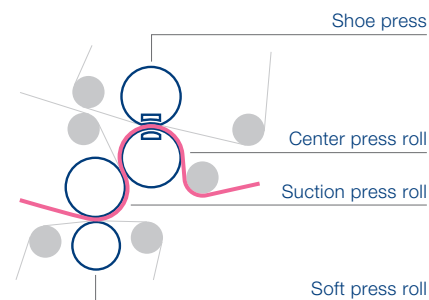
Voith Paper can optimize dewatering with appropriate roll cover surface design by means of a specific nip calculation program. It has proven significant success, such as an increase in dry content and machine speed and elimination of shadow markings.

Modern press section



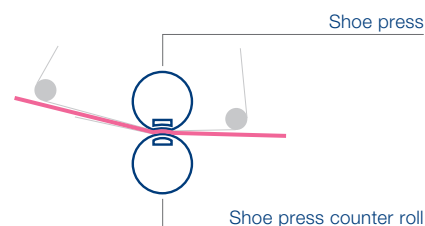
Product range DuoCentri NipcoFlex

| | Suction press roll | Center press roll | Soft press roll (felted) |
|------------------------|---|--|--|
| Rubber | MajorFlow MegaFlow | MagnaRock II MagnaRock II R | MajorPress MegaPress |
| Polyurethane | AquaFlow SolarFlow SupremeFlow IntenseFlow | – | AquaPress InForce SolarPress IntensePress |
| Thermal coating | – | TerraSpeed System TerraSpeed Trend TerraSpeed Surpreme | – |
| Resin | – | TopRock | – |



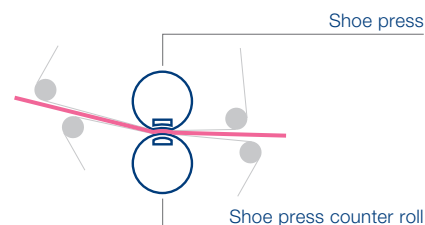
Product range single-felted shoe press

| | Shoe press counter roll | Shoe press |
|------------------------|--|------------|
| Rubber | MagnaRock II MagnaRock II R | – |
| Polyurethane | – | QualiFlex |
| Thermal coating | TerraSpeed System TerraSpeed Trend TerraSpeed Surpreme | – |
| Resin | TopRock | – |



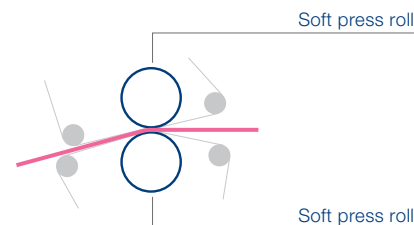
Product range double-felted shoe press

| | Shoe press counter roll | Shoe press |
|---------------------|------------------------------|------------|
| Rubber | Drill Press HD MaxVent II | – |
| Polyurethane | InForce IntensePress | QualiFlex |



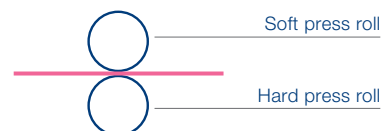
Product range long nip press (double felted)

| | Soft press roll |
|---------------------|---|
| Rubber | MegaPress |
| Polyurethane | AquaPress SolarPress IntensePress |



Product range smoothing press

| | Hard press roll | Soft press roll |
|------------------------|--|---|
| Rubber | MagnaRock II MagnaRock II R | MegaPress R |
| Polyurethane | – | AquaPress SolarPress IntensePress |
| Thermal coating | TerraSpeed System TerraSpeed Trend TerraSpeed Surpreme | – |
| Resin | TopRock | – |



How can we support you?
Just contact us via our
webform.



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