

Optimal Consistency Control in Tissue mill

Consistency transmitters recommendations

BEST CONSISTENCY TRANSMITTERS FOR TISSUE

Considering process speed, final paper thickness and properties, consistency control is even more crucial in tissue than for other grades. Creping efficiency, downtime, process & quality stability depends a lot on optimal mass flow measurement and regulation.

Consistency transmitters using shear-force measuring principle are particularly suitable for tissue application to secure accurate fibre consistency measurement maintaining a low Total Cost of Operation:

- **AmpliForce™ consistency transmitter ACT-2500** from pulper to mixing or machine chest
- **Rotating shear-force consistency transmitter MEK-3000** for mixing and machine chest application

ACT FROM PULPER TO INLET MACHINE CHEST

From pulpers to inlet of the machine chest, accurate fibre consistency measurement is important to perform efficient dilution and consistency control for screening and refining. **ACT-2500** combines measurement of shear force and viscoelastic properties to obtain higher sensitivity and better signal quality than any conventional blade consistency transmitters. It benefits from several key features:

- Application versatility and installation easiness with only one sensing element needed, short calming pipe length allowed, and one sample calibration only
- Accurate fibre consistency measurement in the range of 1 to 7%
- Simple but robust design for extended longevity

With a yearly installation and calibration check and a minor preventive maintenance every 5 years, ACT-2500 offers an unbeatable cost/efficiency solution for consistency measurement.

MEK AFTER MACHINE CHEST

Consistency measured after machine chest, before tissue machine headbox, is often used as feed forward information in the basis weight control. This measurement is essential for reaching optimum tissue process performance and quality, and lowest operating cost.

MEK-3000 is recommended for this position as it provides accurate and stable fibre consistency measurement:

- Fit all measuring range and pipes construction thanks to a wide range of sensing elements and mounting accessories
- Extremely reliable and accurate consistency signal with down to 0.2%-point variation with virgin and recycled fibres, DIP
- Robust and durable construction with over 20 years lifetime with preventive maintenance planning

After proper installation and calibration, performance sustainability of **MEK-3000** is ensured by a yearly calibration check and a preventive maintenance every 3 years. Other applications like inlet refiner can also take significant benefit from **MEK-3000**.

Combination of rotating shear-force consistency transmitter MEK-3000 with AmpliForce consistency transmitters ACT-2500 is a simple and safe choice which lays the foundations for optimal consistency control in tissue process.