Millmate Thickness Gauge (MTG) successfully installed at Turnils in Alingsås, Sweden

Turnils’ aluminium rolling mill is running with an MTG Foil thickness gauging system

Turnils was founded in 1953 and is today one of the world leaders on the market for window coverings. Turnils has more than 650 employees and the total sales are 120 million Euros. Turnils designs and manufactures systems, components and machinery for window covering solutions including systems and components for awnings, venetian blinds and fabric blinds. Turnils also supplies support services in manufacturing and marketing. Components are manufactured on several sites in Sweden and abroad. The company sells through its own sales units in more than 100 countries. (For more information, visit www.turnils.com)

What has been achieved?
We ask Mrs. Christina Lindgren, Production Manager, about the new MTG Foil installation:

“The MTG thickness gauge is very beneficial to us. The non-contact MTG-gauge is very flexible and we reach a much higher quality level than before. We are totally alloy-independent meaning that we can mix any alloys without any re-calibration. Also, there is no radiation that we have to think about.

The previous isotope gauge we had to set up and calibrate all the time which is a source for human failures. Environmentally the MTG-gauge is superior. We do not need to train people how to handle radiation issues and we do not have to pay the annual fee to the Swedish Radiation Protection Authority anymore.

The MTG thickness measurements are very stable and reliable and we can use very close tolerances. This is a very important feature to us when we meet demanding customers requiring a perfect product with perfect thickness measurement. MTG is contributing to our quality improvements.”

“We can mix any alloys without any re-calibration.”
Mr. Per Andréasson, Project Engineer, adds his opinion about the MTG Foil installation:

"The installation and commissioning of the MTG-gauge went very well. All together it took only 5 days from disassembly of the old thickness gauge to full production with the new MTG-gauge. The commissioning was done in a very smooth and professional way. Everything was running according to plan and we are very happy with the ABB assistance during the gauge and sledge installations. In general, it is easy to handle the MTG-gauge.

For Turnils it is very important to have confidence in suppliers of vital production equipment. At Turnils we do not have all the knowledge and competence in-house and we feel secure working with ABB as a supplier.

**Supplied equipment**

ABB Force Measurement has supplied the following equipment to Turnils’ aluminium rolling mill in Alingsås, Sweden:

- **One Millmate Thickness Gauging System, MTG Foil**
- **A custom designed sledge for horizontal movement of the gauge**

Operator Mr. Peter Lindström: "The MTG-gauge works very well. The only thing you have to think of is to do a new set up when you change strip thickness. The HMI screen is working well and is easy to operate".

"We produce venetian blinds in 7 widths and 6 thicknesses with 3 different alloys and in 1000 different colors."

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**Mill data**

<table>
<thead>
<tr>
<th>Mill data</th>
<th>4-hi Single stand, Fröhling</th>
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</thead>
<tbody>
<tr>
<td>Rolled material</td>
<td>Aluminium</td>
</tr>
<tr>
<td>Tonnage</td>
<td>5000 tons/year</td>
</tr>
<tr>
<td>Coil weight</td>
<td>2.5 tons</td>
</tr>
<tr>
<td>Strip width min./max.</td>
<td>215 – 380 mm</td>
</tr>
<tr>
<td>Exit strip thickness min./max.</td>
<td>0.14 – 1.1 mm</td>
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<tr>
<td>Max. rolling speed</td>
<td>350 mpm</td>
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<tr>
<td>Work rolls</td>
<td>180 – 170 mm</td>
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<tr>
<td>Backup rolls</td>
<td>500 – 480 mm</td>
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<tr>
<td>Mill motor</td>
<td>1440 kW</td>
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</tbody>
</table>

**Contact us**

**ABB AB**

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