

## Coating Service Solutions Metco PRINT

### Coating systems for the printing industry

#### The situation

Coated rolls and cylinders are widely used in printing machines. The increasing requirements for better printing quality, higher printing speeds and improved environmental compatibility require that coating systems and process technologies are continuously improved.

For example:

- Coatings with finer surface structures
- Improved ink wettability
- Use of environmentally-friendly, water-based inks
- Minimized use of solvents
- Minimized maintenance and cleaning
- Extended roll service life
- Use of wear-resistant rolls and sleeves made of fiber-reinforced composites

#### Our solution

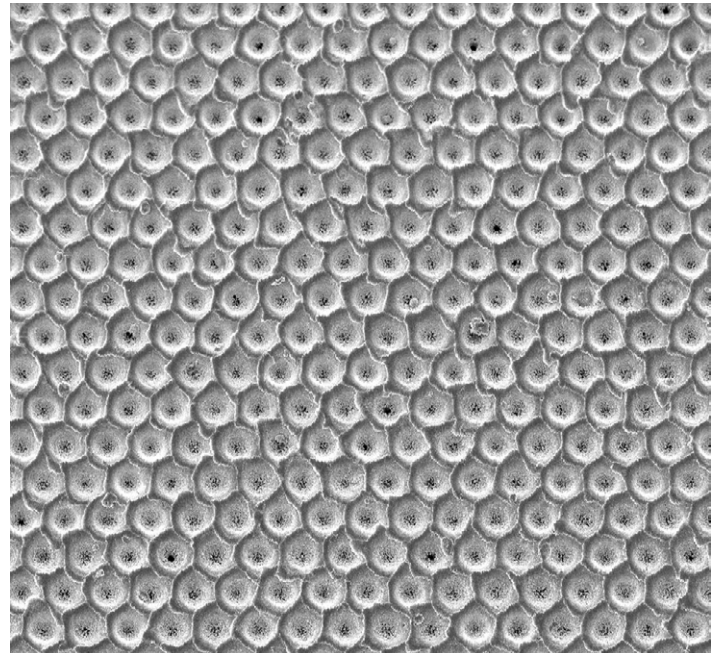
Our Metco™ PRINT coating systems for printing components, such as anilox rolls or central impression drums, have been cooperatively developed with leading companies in the printing industry. These coatings solutions have been used successfully for many years.

Oerlikon Metco is developing environmentally friendly alternatives to chromium oxide, as well as advanced sealers for ceramic coatings, together with Sulzer Innotec, the central research and development laboratory.

#### Customer benefits

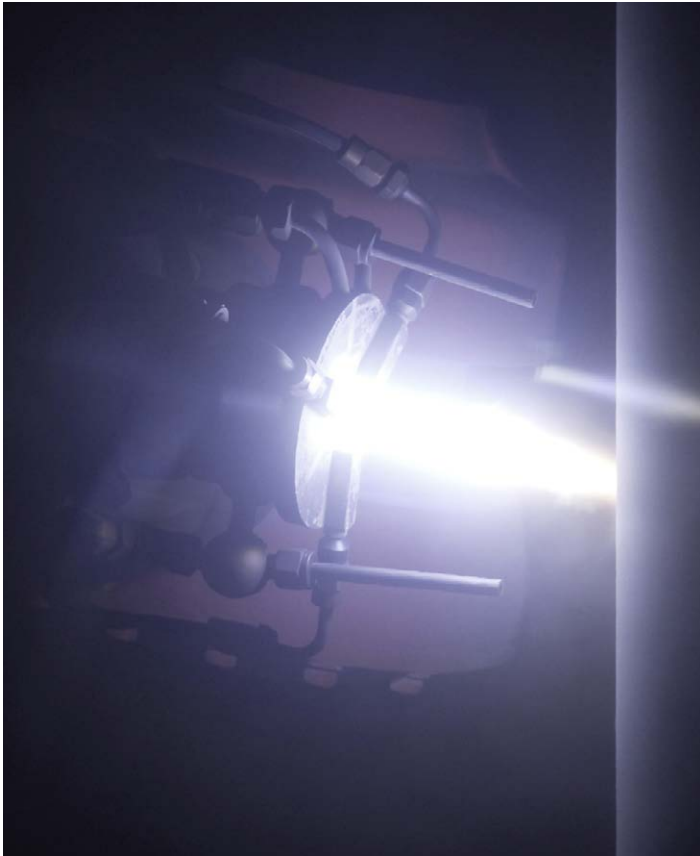
Based on surface requirements, the customer can select the optimum solution from a variety of specific Metco PRINT coatings.

The use of the most modern, high-performance coating equipment combined with the application of customized materials means that Oerlikon Metco is able to provide the highest performance quality within the shortest delivery time.



New functional surfaces are being developed, optimized with regard to their wear properties, cost of manufacture and ease of laser engraving.

Oerlikon Metco offers a complete roll service: repair of worn rolls, coating and post-coat grinding and polishing. Our operations are ISO 9001 certified and the work of the coating personnel is inspected regularly by the German Association of Thermal Sprayers (GTS). A constantly high work standard is therefore guaranteed.



Plasma spraying of an anilox roll

### Metco PRINT AX

For laser engraved anilox rolls

- Plasma sprayed chromium oxide coating with a very uniform structure for fine, high density engraving
- High resistance against ink chamber wear
- Optimized wettability

### Metco PRINT ID

For central impression drums

- Nickel based coating produced by High-Velocity Oxy-Fuel spray (HVOF)
- Optimized corrosion and wear resistance
- Locally damaged coatings can be repaired through out-sourced electroplating

### Metco CER AX

For anilox rolls and sleeves of fiber-reinforced composites

- Same top coat composition as Metco PRINT AX
- Special bond layer

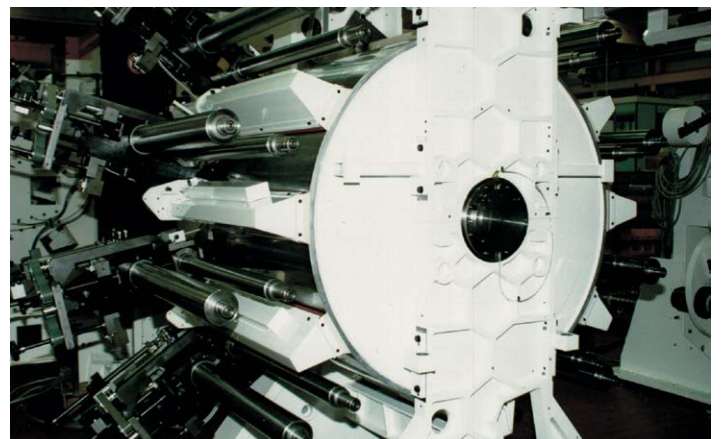
### Metco CER PR

For lightweight guide rolls

- Plasma sprayed aluminium oxide coating
- High wear resistance



Metco CER PR on fiber-reinforced composites  
(Picture: inoceramic Hermsdorf)



Flexo printing machine



Information is subject to change without prior notice.