

Low temperature cure PU powder coatings

VOC-free and low-temperature curing powder coating systems mark a significant advancement in sustainable coatings technology aligning with industry demands for eco-friendly and cost-effective solutions. They reduce environmental impact, enhance workplace safety, and lower energy consumption and operational costs while broadening the applicability of powder coatings to more heat-sensitive substrates.

With Evonik's VESTAGON® BF binder series this concept can also be enabled in polyurethane-based powder coating systems offering additional options to formulators and end users besides TGIC and HAA powder coating systems. Based on internally blocked Isocyanates VESTAGON® BF-series represent a unique class of blocking agent-free and therefore VOC-free high performance polyurethane binders that typically cure in a temperature range of 180 to 200 °C. However, by the application of a catalyst and appropriate choice of polyester resins VESTAGON® BF-based powder coating systems can be easily tuned to cure at 160 °C and below without compromising performance.

Discover the potential and versatility of Evonik's VESTAGON® BF binder series in low temperature curing high performance polyurethane powder coatings with us.

Presenter: Dr. Sebastian Clermont, Applied Technology, Evonik Operations GmbH

