

## METALLIC COATINGS

In a “Metallic Coating” the metallic particles influence the final color appearance or color perception. The Particle’s shape and how it is positioned in the cured coating are both factors relative to color appearance. The position of the particle is determined by several factors in the coating application process including applicator roll configuration. Set-up, roll speed, nip pressure, and paint viscosity.

In **NON**-metallic coating applications, color is usually measured numerically with some type of CDM (Color Difference Meter). CDM’s read color from light diffusion. In METALLIC coating applications, the metallic particles can disrupt normal or consistent light diffusion and therefore CDM’s are not typically used for metallic coatings. For this reason, metallics are regarded as “visual match only” to the customer approved color standard. This means the color is approved “visual match only” with no numerical values applied by the CDM.

Every user of Metallic Coated products should be aware of the following points and implement internal process procedures in order to successfully use metallic coated products:

**Directional Coating** – metallic coatings are regarded as a “directional coating”. This means that the coating color appearance will appear different when viewed from different angles. All material should be processed in a manner that will ensure and allow the exposed coated surfaces to be in a consistent direction. (On one side of the metallic coated products, Aleris will typically apply stenciling under the clear backer to assist in maintaining consistent direction.)

**Inter-Mix of Suppliers** – Never inter mix coated sheets or pieces from different suppliers. Due to all the coating application process variables, **you will not get a consistent visual color match.**

**Lot to Lot Match** – even from the same supplier, material coated at one period of time may not match material coated at a different time. This is the result of numerous process variables and also the fact that metallic coatings are a visual match to the approved standard – and we all see colors differently!

***We hope you find this information helpful. If you have questions or concerns, please do not hesitate to contact your Aleris Rolled Products Sales Representative.***