

# Making complex color and paint line application, simpler.

Colors are becoming more complex and harder to match and apply. Painters and shops today are challenged with the growing complexity in automotive color application.

## Understanding complex paint lines

Wet-on-wet paint lines can **help boost productivity and increase efficiency** compared to traditional coat-dry paint lines, but the **application can be significantly more technical**. Here are some factors to consider:



Avoid creating runs or sags as wet coats of base are applied and stacked on top of each other.



These paints are thicker so they need to be atomized finer than what is typically needed for basecoat.



Wet-on-wet paint lines can be difficult to blend, extra steps or additives may be needed.




“Basecoat splashing,” a defect that resembles fisheyes, can be caused by overapplying basecoat.




Being cautious of the potential challenges that can arise when applying wet-on-wet paint lines, can help painters avoid rework. With these complicated paint lines, proper spray gun settings coupled with highly technical application and blending techniques are key.

## Applying complex colors


Complex colors which often include **limited use toners, specialty additives and ultrafine metallics**, can be **challenging to replicate** in a body shop. When applying these colors, consider the following:




Use finer abrasives during paint prep, as a single sand scratch could ruin a paint job.




Some colors include limited use toners which can drastically affect the cost of materials.



Specialty additives modify a paint's properties to perform optimally in specific environments.




Metallic colors could shift if applied too heavily, but can be avoided with proper spray gun setup.




As the OEM's use of specialty colors continues to expand, the demands on expert painting techniques and proper equipment become more important. Additionally, it is crucial to make sure that these specialty colors are properly captured on the repair estimate, as they take additional time to spray and could have a significant financial impact if not accounted for.

## Proper repair planning on the paint side.


As vehicles advance, the need for meeting OEM requirements for paint is essential. Failure to meet these requirements could put your shop and customers at risk.




**Mil Thickness Requirements:** OEM position statements and technical bulletins specify critical mil thickness requirements, especially near sensors and across entire panels. Failure to meet these standards can lead to calibration issues for ADAS-equipped vehicles, resulting in potential liability and safety risks.



**Radar-Safe Paint Formulas:** Certain toners can affect long-range radar, and some paint companies' mixing software can alert users to these issues, providing radar-safe formulas. If a radar-safe formula is unavailable, shops may need to sublet the job or use a different paint line that meets OEM standards.



**Non-Repairable Areas and Repainting Limitations:** Manufacturers' guidelines specify non-repairable areas and limitations on repainting certain parts, such as bumpers. Ignoring these guidelines can lead to significant liability and additional costs, as some parts may need to be replaced rather than repainted.



Adhering to OEM requirements and Standard Operating Procedures (SOPs) is essential for compliance and cost-efficiency. Shops must regularly check mil thickness before and after painting using ferrous and non-ferrous mil gauges. Staying updated on frequently changing guidelines can help ensure quality repairs and avoid costly errors.

## Spray the smarter way with the 3M™ Performance Spray Gun System.

Each replaceable nozzle is optimized for consistent atomization and excellent transfer efficiency, making it easier to tackle these complex colors. Swap out the replaceable nozzle and experience like-new spray performance each time.



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