Refinish Material Application And Blending



Module 1 - Refinish Application And Blending





Video: Learning Objectives

In this course, we'll start by discussing the purpose of sealers and when sealers are applied.

We'll then discuss the purpose and use of basecoats, including the particular needs of waterborne basecoats.

Basecoat blending will be a highlight of this course, including the different techniques of blending.

We'll then disucss tri-coat refinishes and how to blend tri-coats.

There will be a discussion on the proper use of clearcoat, including the different types of clearcoat now available.

Finally, we'll discuss the requirements for refinishing plastic parts.

Video: Blending Into An Adjacent Panel With Waterborne

We've applied sealer and basecoat to the entire fender off the vehicle. It has been installed and the vehicle has been masked for us to demonstrate how to blend the fender into the front door.

Blending is done by fanning the spray gun onto the adjacent panel. This applies a light coat on the door so part of the original finish still shows through. This helps trick the eye into seeing only one color.

We'll start by triggering the spray gun ON while it's off the fender, and spray across the length of the fender into the edge of the door. The spray gun is then fanned out across the door to perform the blend and triggered off at the end of the fanning motion.

It's easiest to maintain control when blending by going in one direction keeping the same distance and travel speed with each successive pass.

It's important not to make the blend edge on the door a straight line, but stagger the edge out so it's not noticeable. Venturi blowers are used to speed up the flash time of waterborne basecoat.

Once flashed, a mist coat is applied over the entire fender and blend area. This helps with metallic orientation and is accomplished with this basecoat by lowering the air pressure on the spray gun as well as decreasing the travel speed and increasing the distance of the spray gun from the panel.

Two coats of clearcoat are then applied to the entire fender and door.

Video: Blending Within A Panel With Waterborne

This bedside has been repaired, and following paint maker recommendations we applied a blending bed. Now, we're ready for basecoat. To do a conventional blend on this panel, I would extend the first pass to just beyond the damage, fanning out on each side. Each successive pass would extend a little further.

However, we're going to be doing a reverse blend. As the name implies, it's done in reverse order of a conventional blend. I will start at the outermost ends of the panel, and end just over the repair area. A reverse blend can be beneficial when blending within a panel. This is because it allows you to control the edges of the blend area.

On the first coat, we'll concentrate on starting and ending at the outermost edge of the blend area.

After allowing the first coat to flash, we'll apply the second coat and concentrate on keeping within the area covered by the first coat.

On the third coat, we'll do the same thing only this time we'll stay within the confines of the repair area. The desired effect is the same as blending into adjacent panels, tricking the eye into seeing one color.

Video: Blending A Waterborne Tri-Coat

This hood has a pearl white tri-coat finish. There was damage to the very center, so there's enough room to confine the blend to this panel, even though we'll be blending two materials, a groundcoat and a midcoat.

The groundcoat, which has been mixed to a blendable match, is applied to just beyond the repair area. We've determined with a sprayout panel that two coats will achieve the needed coverage. After allowing the first coat to flash, the second coat is extended slightly out from the first.

Once the second coat has flashed, the midcoat, which is a translucent pearl basecoat, can be applied. We've determined from our letdown panel that two-and-a-half coats will achieve the proper color match. The first coat is applied just beyond the outer edges of where the groundcoat was blended. After flashing, the second coat is then applied extending slightly beyond the first coat of midcoat. The control coat, or half coat, is then applied across the entire blend area.

As we've shown, a tri-coat blend requires a bit more room than a regular basecoat blend. If we would've had any less room, we may have had to blend into one of the adjacent panels.

