The Perfect Paint Job

Written by Barry Kives September 2001

Our goal is to accomplish a paint job that with a strong foundation, with a maximum gloss that will last for many years. This type of painting is not practical for the everyday production shop but will serve you well when you do a restoration or a street rod job. We are going with the assumption that the metal, or fiberglass has been stripped of all paint. Bare metal is always best cleaned with #700-1 waterborne wax and grease remover. Mix enough #6600 series epoxy to spray two wet coats over the entire car. Spray one wet coat and let flash about 30 minutes, then apply a second wet coat. Let the epoxy set overnight and then apply body, or fiberglass filler and glazing putty over the epoxy. It is not necessary to sand the epoxy before applying the fillers, as they will bite into the epoxy, and feather great. When you have finished sanding all of the bodywork, you are likely to have some bare metal spots from sanding. Spray one wet coat of epoxy over all filler spots and over any bare metal spots. Let the vehicle set overnight.

The next day, you can start spraying the 2K primer over the epoxy. Once again, it is not necessary to scuff or sand the epoxy before applying primer. The most important thing to remember at this point, is spray one wet coat of primer, and let it set for 30 minutes before applying the second coat. Follow this procedure between coats of primer. This step, when abused, messes up more paint finishes than anything else! When all of the primer blocking and any necessary primer repairs have been done, it is always best to use the epoxy as a sealer. Mix up enough epoxy to go around the car with one wet coat, adding a double shot glass of SPI #885 urethane reducer, per quart. Let the epoxy set for 30 minutes. Stir one more time, and strain. Spray one full wet coat of epoxy over the entire car. The epoxy should set for 24 hours, then wet sand as needed, with 600-1500 grit paper and then you are ready to base.

Next to rushing the 2K primer, rushing the basecoat is the second cause for the final gloss and depth of a paint job to look bad. It is very important use the slowest urethane reducer in your base that you can get away with, no matter what the outside temperature is. Just allow enough extra time for the basecoat to dry. The difference between a very slow grade and medium grade reducer will show up in the final gloss. The slower grade also has better solvency and will give you far better adhesion. Spray the first coat, and let it totally dry, before spraying the second coat. It is best to wait 45 minutes between coats. After two coats, the vehicle should set overnight, then do minor wet sanding with 1500 grit sandpaper to remove any orange peel or trash. Apply the next two coats with 45 minutes of flash time in between. Some colors require additional coats. If this is the case, again, wait 45 minutes between coats. Let the basecoat set overnight. Tack off the next day, apply a wet coat of SPI MS or SPI HS clear, and let the clear flash as needed. Let the first coat of clear set until you can lightly run you finger across it. Spray the second wet coat of clear, let it flash until stringy, or lightly dry to the touch, then spray the third coat of clear.

From two days to two weeks after the job has been completed, wet sand the clear with 600-1000 grit sandpaper, blocking out any orange peel or dirt. After wet sanding, let the car set in sun for a day then apply a wet coat of clear. Let the clear flash until it is dry to a light touch. Apply a second coat of clear, then immediately come back with a third coat.

Let the vehicle set two or three days in the sun to help to get all of the solvents out and settle the paint job. If any wet sanding is required before buffing, sand with 1500 grit sandpaper, then set the vehicle in sun for two to three hours. Bring the car back into the shop, and allow it cool to room temperature, then buff.

If you follow these directions, you will have a durable paint job, with maximum depth and gloss over a solid foundation, which will last for years to come.