



Fact Sheet - HVLP Paint Guns

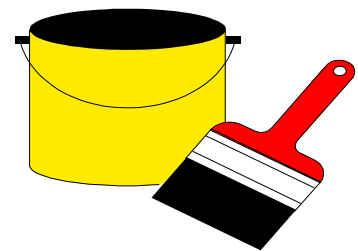


Many auto body shops are already successfully using high volume, low pressure (HVLP) paint guns. If you have not yet tried HVLP guns in your shop, now would be a good time to look into this.

What are the advantages of HVLP? HVLP guns can achieve a much greater transfer efficiency than conventional guns, ~50-65% for HVLP vs. ~25-40% for conventional. Assuming an increase in transfer efficiency of 30% with conventional to 50% with HVLP, this would mean a decrease in paint costs of 40% ($1 - .3/.5$), as well as a 40% decrease in emissions of volatile organic compounds (VOCs). For example, if you currently use 20 gallons of (sprayable) paint and thinner per month at \$100/gal, you could save \$800/month (8 gal x \$100/gal) or \$9600/yr on your paint costs. In addition you would save on your booth clean-up costs and paint filter costs, since there would be less overspray. Your employees would also enjoy a healthier work environment, with 40% less VOC emissions. If your emissions are reduced to below the threshold of 1 ton per year of VOCs, you would no longer need to file an APEN or pay air pollution fees.

Are there any disadvantages? Operators must be trained to properly use the new guns, and the atomization may not be sufficient for fine finishes. Also, high production rates may not be possible. Some people advocate using HVLP for the primer and clear coats (to achieve the associated cost savings and emissions reductions), while still using conventional guns for the color coat, at least until any quality concerns with HVLP can be overcome. Some shops use HVLP for the color coat without any major difficulties.

How do I know it will work in my shop? Talk to a few body shops already using HVLP guns. Ask your trade association or the CDPHE P2 Program for a few names if necessary.



How much will it cost to make the change? HVLP guns cost about \$250-500 each, depending on the specific model and manufacturer. Call your painting equipment supplier for more detailed information. Training your staff in the proper use of HVLP guns will also require some staff time.

This fact sheet was prepared by the CDPHE Pollution Prevention Program, with the assistance of Painters Supply Co. For more information call Kirk Mills at (303) 692-2977.