## New Booth or Better Processes

Recently I was asked to help a shop find room for a second booth in their already crowded shop. I was surprised because this shop was usually too busy to talk with me. But they were continually behind in the paint shop and knew a second booth was the answer to their problems.

As I looked around the shop I didn't see space for a second booth, but I also didn't see a productive paint shop. While measuring the shop, I saw the booth flip off of bake, the lights came on and only one bumper in the booth.

I showed this to the manager and said, "I don't think you need another booth, I think you need better processes." He replied, "I know you've been trying to talk to me for a year or so, but you can see I'm jammed up here and now I need a quick solution." As the discussion continued I gave him some price ideas of what it would cost for his quick solution and he was astounded. Paint booths are not cheap, and they cost more when you are using them as a band-aid for poor production processes. The more we talked the more he understood that another paint booth was not going to give him immediate help with his problem; they are not quick fixes. It would take $30-45$ days at a minimum to get one installed.

I questioned the manager about his booth cycle time, how many vehicles he was moving through the booth a day and how many days of work were backlogged in the paint shop. The only answer he really knew was that he had ten cars that were not going to be painted that day and he needed help. We started talking about process solutions.

The first thing we talked about was ensuring the booth was full each cycle. With masking tape, I made a true-to-size outline of his booth right outside the booth door. I spent some time going through his ten repair orders, moved some things around, and we filled that outline with parts from three cars. I stayed at the shop most of the day and by staging repairs in that outline to maximize the booth cycles we were able to paint eight of the ten cars.

We have all heard the adage, Proper Planning Prevents Poor Performance, and all we did that day was properly plan the booth cycle. I am sure you are watching KPIs such as Cost per Paint Hour, P\&M Gross Profit and Paint Hours per RO, but what about Booth Cycle Time and Number of Vehicles per Booth per Day? Those KPIs are just as important and can make a huge difference in your paint shop.

If you can improve your Booth Cycle Time and Number of Vehicles per Booth per Day you will be well on your way to eliminating the common choke point of the paint shop. The calculation for Booth Cycle Time is fairly simple:

Daily booth operating hours * \# of workdays * \# of booths
\# of ROs completed
If you are outside of $1.5-1.8$ hours per cycle, you are not being efficient with your current paint booth.

Booth Cycle Time has a direct relation to Vehicles per Booth per Day and the calculation is similar:

$$
\frac{\# \text { of booths } * \# \text { of workdays }}{\# \text { of ROs completed }}
$$

This should be an average of $4-5$ per day. This means that some days you might have 6,7 or 8 like the example above, while on other days larger jobs could reduce the average to $3-4$.

The key with any process improvement is to be better today than you were yesterday and plan today for a better tomorrow. Watch your paint booth cycles. How many times is there only one bumper in the booth? How often is the booth sitting empty? Do the baking times coincide with breaks, lunchtime and end of day? These are all ways to tell at a glance if your paint shop is being efficient and it can be fixed very easily.

I will leave you with a favorite quote of mine from Glen B. Alleman, "A plan is the strategy for the successful completion of a project, any project without a plan is a project wandering in the wilderness." Don't let your paint shop be the wilderness, buy a paint booth when you have grown to need it, pick one thing in the paragraph above as your focus - fix it and move on to the next.

