

In every profitable screen printing company there is a thread of good practice running through the organisation. The amount of profit that is made is dependent on whether that thread is just a guide wire or is woven throughout the establishment as a culture of best practice.

Let us imagine you have the situation that the quality of your work is acceptable most of the time but you don't feel you are getting the returns you would hope to achieve. Occasionally the wheels come off and you produce rubbish for no apparent reason. People will say "Shit happens" and shrug their shoulders. Tempers get frayed "I can't send this crap to the client" and everybody has a bad day. So you run the job again. This time it is fine. "Nothing has changed" say production. "It's screen printing it just happens." "Oh no its not. It is your methods." Being a psychologist in my business is not essential but it sure helps. When dealing with people in organisations if you do not provide a sound structure the organisation will degenerate into chaos and anarchy. This is not a wilful act it "just happens". No matter how competent an individual is in his own particular field without a linkage to others of similar competence that individual can become frustrated disillusioned and disruptive. If that person can see an improvement in methods, communication and competence he/she will be a tremendous asset. Helping to weave best practice through the company. How many times has it been said for every person you employ you get a brain for free. You might be one of those people who knows it all, just wait until you do make a mistake and see others turn away to let you sort it out.

Take the example of four colour process screen printing. We have all the tools available to us to make this technique eminently controllable and predictable. In the UK where air conditioning is the exception rather than the norm the only aspect out of your control is ambient conditions. Even so it is still possible to compensate for changes in temperature and humidity as long as you are working from a firm base. So what is the firm base or the thread of certainty that you knit into a culture of best practice throughout the company? It starts with the origination follows through stencil production, onto the press with consistent settings and careful ink management. Finally the drying or curing system you employ. "But we haven't got time to get it right." Is the cry! Take a risk get it right first time.

If I were a minister of religion it is unlikely I would recognise the words that came into my head when people say they haven't got time. My response would be: "Of course you have time. You will save a considerable amount of this perishable commodity should you engage the cogs to your rear and cease attempting to personally water flowers in the face of a gale."

Every point of sale screen printer suffers from the same problem "Customers". Wouldn't it be lovely if we didn't bother with them and were to print what we liked when we liked to the quality we found acceptable. Unfortunately this will never be the case but in the past some of those fantasies were rather close to reality. The customer didn't know what he was looking at and he was grateful to get whatever quantity you could produce when it was available.

In those days all you needed were a couple of hand benches and a semi and you could buy your Porsche. Now you have a three million pounds of investment 50 staff 300 miles of red tape a massive overdraft, high blood pressure and an estate car. Your client (a Print Broker) has a telephone a leather armchair and a Porsche. It might not be fair but you can turn the tables.

Back to that thread of good practice. It starts with the customer; he/she wants particular images printed onto fairly standard substrate. What information is provided? A “tranny”, a colour print off a desktop printer, a colour laser, a chromalin, digital proof matched to the screen printing process or digital files. Which ever you receive the closer to the final printed result the better. If it is a digital file ask for the format that best suit your system. If you can't get that have means of converting it to suit your production requirements. With the exception of possibly the digital proof matched to the screen printing process all the other proofs are only a guide. Put the onus back on the client by producing your own digital proof and supply it to them for acceptance. Not as easy as just saying it. Fortunately our ink suppliers are getting better at providing digital inks to us for proofing work that has to be screen printed and the digital printers can output images with similar calibrations to those used in our screen print repro. The alternative is to proof on the screen printing press and this is horrendously expensive. Digital proofing though not perfect gives everyone a target to aim for. The most important people in house being the screen print team. In the studio such digital proofs help to avoid the major cock ups that can occur if a job is sent to production where bits are missed off or the calibration is all wrong producing snow with a “lovely” tinge of magenta.

Following that thread of certainty from Studio onto Stencil Production has become easier of late with the availability of devices that can measure the dot actually on the stencil. The one I have used was pretty impressive, capable picking up faults in exposure and development. You really do need to know what image you have on the stencil. Especially if you are using direct to screen imaging where you don't really know you have a problem until it's on the press. You stand a much better chance with conventional photopositives because you can measure them with a transmission densitometer. Even so poor vacuum, incorrect exposure and development can still screw it up.

Then onto the press, a real opportunity to bung in some variables. Not if you have standard set up and operating procedures and that accurate proof that has been agreed by Studio and hopefully the customer. If you want to make a printer happy show him/her a reliable proof. To be honest if you are not giving them accurate proofs you are gambling with your own money every time you print a job. The trouble is this is a gamble where you only get your stake back if you win. If you lose you lose at least ten times your stake, because the cost of a reject comes straight off your bottom line.

Use a densitometer to check densities and tonal range with each colour. Your grey scale will tell you if the colours are balanced. If you are fortunate to have a multi-colour line then the final result is virtually immediate but the cost of down time is much more painful. The proof is there to give you that comfort factor. Yes I know a skilled printer can see where the problems are and deal with them as they occur but we are not all fortunate

enough to have a shop full of highly skilled printers. Even these printers can better spend their time improving the productivity and maintaining more consistent quality.

Excuses are running out on the press as ink systems become increasingly reliable. Even those that in the past were somewhat unstable such as water based conventional inks and water based UV are now much more stable. Low build conventional UV varieties are becoming more readily available. Even so can you believe it but many printers have never been shown or read the Technical Data Sheets, there is so much information on these that can make life easier. Everything is being aimed at being able to match the Proof and exceed the customer's expectations.

That Proof is the thread of certainty. You simply have to get it right in the Studio, and then every item that is produced from that must be controlled. Mesh, emulsion, coating, drying, imaging system (Photopositive or DTS), exposure, development, machine set up, machine operation, squeegee, flood coater, substrate and of course ink. Look at every part of the sequence individually and how it interacts with other parts. It is always the simple things that let you down.

One simple problem recently recounted to me was when some coated mesh had been left out during this recent hot spell. It rained during the night the humidity rose up the dry emulsion absorbed moisture, it altered their exposure requirement, they were underexposed and the highlight dots dropped off on the press. All that was needed was to pop them back in the dryer for a few minutes before exposure. This resulted in a significant loss of substrate and machine time. Probably £700.00, equivalent to £7000.00 in sales, just for the cost of 5 minutes in the dryer. Well they "didn't have time" you see.