

TOOL TYME

By Mick Orr
Applications Training Specialist

Mick: Welcome to Tool Tyme. My name is Mick and this is my partner in crime the lovely Plaid Clad Lad, Kyle. Today we are going to explore all the really cool toys and gizmos that today's screenmaker should not be without.

Kyle: Ya know, many screenmakers are required to make some incredibly difficult screens and they don't have many of the basic tools that would make their job easier. Like a microscope that's at least 25 power.

Mick: That's good but what's better is the Chromascope 5000. It's so strong you can see which atom is goofing off.

Kyle: Ya know folks, you do need a good quality scope that will let you see the finest details that you are supposed to reproduce. If you are required to reproduce a 5% dot on a 65 line screen wouldn't it be better to see if you accomplished your objectives before it was printed?

Mick: Another essential basic tool is a good thickness gauge.

Kyle: Ya know, most people call them a micrometer.

Mick: Just like this little baby, the Chromameter 6000. It can measure the thickness of Kyle's most intricate thought. (Wait for the laughter to die down.)

Kyle: Can we be serious? Ya know, stencil thickness is very important. If it's too thick you will either deposit too much emulsion or possibly won't be able to deposit a sufficient amount of ink in the finer lines and details.

Mick: Huh?

Kyle: Think about the mesh and stencil as being tiny wells. As the flood bar passes it fills up the well. The squeegee then pushes the ink through these tiny wells. If the well is too deep for the amount of ink deposited by the flood bar the ink will not be deposited onto the substrate, ya know.

Mick: What you are printing will be the determining factor on how thick the stencil should be. CD printers are usually looking for a stencil thickness above the mesh of 3 to 4 microns. Without a micrometer how are you going to know if the stencil is thin or thick enough?

Kyle: Ya know, these little tools can be pretty pricey, but they are worth every penny.

Mick: What's the real price of producing high quality stencils? Truth is, it costs more than the equipment to produce stencils that are out of control. Poor reproduction will usually result in remakes and possibly lost business.

Kyle: Getting a micrometer, and a microscope will help you control the variables in screenmaking. But, ya know, there are lots of other tools that should be considered by today's screenmaker.

Mick: That's right. Today's screenmaking shop should also have a tensometer to measure mesh tension, a thermometer and hygrometer to measure your room conditions, and possibly a surface meter to measure how smooth the stencil is.



Looking for insight on the wonderful world of screen making? Consult the writings of Chromaline's Technical Guru, Mick Orr, Applications Training Specialist.

Mick has been in the screen printing industry since 1970 with printing experience in a wide range of applications from membrane switches, to textiles, specialty graphics to faceplates and more. His hands-on seminars have been appreciated by screen makers around the world.

Kyle: Auto mechanics need to have the right wrench to tighten bolts. Well, screen makers need to have the proper equipment to do their jobs correctly, don't ya know?

Mick: Well folks, that's about it for now. Remember, you can improve your stencils by controlling the variables and the only way to do that is by having the tools to measure them.

Kyle: Talk to your distributor or Chromaline. They can get you information on where to buy the tools. Maybe, even in Fargo. You betcha.