Society of Manufacturing Engineers

WHERE MANUFACTURING COMES TOGETHER™

Mold Matrix: Requirements for a Production-Ready Mold

The Mold Matrix: Requirements for a Production-Ready Mold is a joint project between William J. Tobin and SME's Injection Molding Technical Group, part of SME's Plastics, Composites & Coatings Community. This product was designed as a guideline to show the protocols necessary to release different types of injection molds to production. This matrix was created as a reference document, which will commonly establish what a production-ready mold is and will be of great interest and help to all moldmakers, molders, mold buyers and customers.

The best use of this information
The purpose of this product (document and matrix) is to act as a guideline for the definition of when an injection mold is capable of full production. Misunderstanding and miscommunication are the most common stumbling blocks to the agreement of when a mold is ready for production. This guideline will help serve as the foundation for a policy manual (forms, quality manuals, checklists, signoff sheets and so on) that can be developed and signed by the molder and co-signed by the customer. Feel free to copy the definitions as well as sections of the charts that will fit your particular need into your own policy manual.

How it works
Based on the number of cycles (defined as the cycle of the mold closing, plastic being injected into it, the mold opening and parts being ejected) recommended criteria are determined for various production phases, including: prerequisites, sample run, qualification run and prerelease. The terms and definitions outlined herein represent the historic and customary practices prevailing in the plastics industry. Without duplicating industry standards and copy-written publications, they are referenced at the end of the document.

Price: $24/Members: **FREE**
Click here to order your copy.

Thank you to the technical group members who contributed to this project:
Mark Manzoni, Harbec Plastics Inc.; Richard Peters, GE Advanced Materials, Plastics; Arthur Raymond, Gaming Partners International; Ken Ross, Entegris Inc.; Steven Sabol, Rubbermaid Commercial; Scott Skurdalsvold, SAS Plastic Design; and Glenn Anderson, Southco Inc.

And a special thanks to project leaders
William J. Tobin, WJT Associates, and Aldo Balatti, Evolve Design Solutions Inc.

Thank you to the entire 2006 & 2007 Injection Molding Technical Group:
Rob Hickman, Shadow Polymer Industries Inc.; Daniel Hilfiker, Flambeau Inc.; Mark Manzoni, Harbec Plastics Inc.; David Meeks, Imperial Tool & Manufacturing Co. Inc.; Richard Peters, GE Advanced Materials, Plastics; Gary Plencner, Johnson Wax; Arthur Raymond, Gaming Partners International; Ken Ross, Entegris Inc.; Steven Sabol, Rubbermaid Commercial; Brian Scappaticci, Single Source Equipment; Scott Skurdalsvold, SAS Plastic Design; Raghu Vadlamud, Donatelle Plastics Inc.; Glenn Anderson, Southco Inc; Aldo Balatti, Evolve Design Solutions Inc.; and Barbara Arnold-Feret, Enviro Plastics Inc.