

# Process Modeling for Metal Forming Die Stress Analysis

Industry leaders have learned that traditional methods of designing and troubleshooting tools and dies are not competitive. The cost and time associated with die failure is not a "cost of doing business". Forging and heading tool and die costs typically range from 5 - 15% of total sales when all of the cost elements are included. Improvements made in tooling performance go straight to the bottom line!

Simulation software is used to help "connect the dots" between the science of tooling failure and the practical issues on the shop floor. Die life and failures are directly related to stresses. This workshop provides information on the fundamentals of stress, setting up computer models and interpreting the results. Information provided can help novice engineers or experienced designers improve tool life before the dies are cut!

The 18th offering of this workshop is being offered at SFTC in Columbus, Ohio, with Professor Joe Domblesky and John Walters as the instructors. The fundamentals and application to industrial problems will be emphasized. Each attendee will have an opportunity to reinforce the concepts by reviewing specific cases using DEFORM™. A wide range of industrial examples involving significant life improvement and cost savings will be presented.



**Itinerary:** - overview - industrial examples - stress and strain - elastic & plastic deformation - analysis methods - die failure fundamentals - interobject interactions - die wear - thermal fundamentals & applications - interference theory & applications - troubleshooting die problems - material selection - practical analysis considerations -

**Logistics:** - August 20 & 21, 2014 - Scientific Forming Technologies Corp. - Columbus, OH - 8:30 a.m. to 4:30 p.m. -  
- \$ 875 / person - enrollment limited to first 20 applicants - lunch will be provided -

*For registration information, contact:*

**Nancy Welling at SFTC**

**(614) 451-8330 X-100    nwelling@deform.com**

~ for technical information on course content ~

**John Walters at SFTC**

**(614) 451-8323    jwalters@deform.com**

**Professor Joseph Domblesky Ph. D. at Marquette Univ.**

**(414) 288-7832    joe.domblesky@marquette.edu**

**Scientific  
Forming  
Technologies  
Corporation**



- ~ The fee of \$875 / person with payment received prior to the workshop. The course fee is \$950 for payments received after the workshop starts. A \$50 per person credit is applicable for 2 or more prepaid attendees from the same company.
- ~ Attendees are responsible for all travel expenses.
- ~ 100% refund will be made for cancellations two weeks before the workshop. A \$100 administrative fee will be deducted for cancellations before the first day. No-shows or cancellations afterwards are responsible for the full registration fee.
- ~ SFTC reserves the right to cancel or reschedule this workshop without any penalty for travel or lodging cost penalties as a result of rescheduling/cancellation. In this event, you will be notified ASAP. If cancelled, fees will be refunded.
- ~ Information on available lodging near the office will be included with the registration confirmation.

**Mail or fax registration to:**

**Nancy Welling  
Scientific Forming Technologies Corporation  
2545 Farmers Drive - Suite 200 - Columbus, Ohio 43235  
Tel: (614) 451-8330 X-100    Fax: (614) 451-8325**

## Registration Form

Company Name: \_\_\_\_\_

Attendee Name: \_\_\_\_\_

Title / Position: \_\_\_\_\_

Address: \_\_\_\_\_  
\_\_\_\_\_

Phone: (\_\_\_\_)\_\_\_\_ - \_\_\_\_\_ X- \_\_\_\_\_ Fax: (\_\_\_\_)\_\_\_\_ - \_\_\_\_\_

e-mail: \_\_\_\_\_

Check Enclosed      Total Amount Enclosed: \$ \_\_\_\_\_

Bill Company      P.O. Number: \_\_\_\_\_

Credit Card - instructions will be provided with registration confirmation - subject to nominal administrative fee -