

September Meeting**ASME Dinner in Honor of Past Chairpersons and Presentation of****“New Product Development Approach at Metaphase”****Wednesday, September 10th, 2003****Sridhar Condoor, ASME Program Captain**

You are invited to join ASME for a very interesting presentation on handheld products development approaches. **Metaphase** is the world's leading company for the research, ergonomics and design of handheld products. The Wall Street Journal, CNN, ABC, and the Discovery Channel are a few of major media sources that identify Metaphase at the forefront of innovative breakthroughs for new product development.

Metaphase worked with **Microsoft** to design the first ergonomic computer Mouse, which set the standards for the industry and changed the perception of hand to mouse interface. It is the most widely recognized Mouse ever built!

Metaphase defined a new sports drink bottle for **Gatorade**, with the E.D.G.E. (Ergonomically Designed Gatorade Experience). The design is all gear with a choke-hold, grip zones and a mouthpiece that's shaped to fit your lips precisely.

Metaphase solved the comfort equation in the innovative **KI-Einstein** educational furniture collection, providing both an ergonomic and economic solution. Market demand for the Einstein furniture collection has exceeded all predictions and KI has increased manufacturing capacity to 24x7 to meet the enormous demand.

Speaker: Bryce Rutter, Ph.D.

Bryce Rutter is the founder and CEO of Metaphase Design Group. A graduate of Carleton University in 1979 in Toronto. He earned his doctorate in kinesiology – the study of the mechanics of human movement – from the University of Illinois at

Urbana-Champaign. He became a faculty member in the department of industrial design at University of Illinois. He founded Metaphase in 1991 and became the leading expert on handheld product design

Date: Wednesday, September 10th, 2003**Place:** The Engineers' Club of St Louis
4359 Lindell Blvd., St. Louis, MO 63108**Directions:** From I-64-40 exit at Kingshighway. Take Kingshighway north to Lindell, then follow Lindell east to the Engineers Club (314) 533-9333.**Time:** 5:30 PM Social Hour

6:30 PM Dinner

7:30 PM Technical Presentation

Cost: \$20.00 Members and Guests
\$10.00 Student Section Members
Past Chairs are guests of ASME

Dinner includes salad, butter rolls, and entrees: Beef bordelaise on risotto with sauteed vegetables; Chicken cordon bleu on rice with Hawaiian carrots; Apricot pork roast with sweet potato and snap peas, Coffee, iced tea and carrot cake dessert.

Reservations are required by **noon, Friday, September 5th, 2003**. For reservations, call the ASME Reservation Service at **(314)-353-2463**. For details contact Sridhar Condoor, (314) 977-8444 or email, condoor@slu.edu

Message from the Section Chair Tom Mull



As we begin the 2003-2004 program year for the **St. Louis Section of ASME**, the economy still remains slow and employment prospects for mechanical engineers remain poor. Although the job market of mechanical engineers is still tough, there are many things that you can do, whether you are in the job market or

not. One of the best things you can do is network with peers. Attending regular monthly St. Louis Section meetings and becoming involved in the Section provides an excellent opportunity to network with other engineers, peers and prospective employers.

For those of you who are licensed engineers, both Missouri and Illinois have begun requiring continuing education for engineers in order to renew licenses. Attendance at the regular ASME meetings counts toward the required professional development hours (PDH) and provide an excellent opportunity to expand your technical knowledge.

On behalf of the Section officers, I would personally like to invite each of you to attend the Section meetings and enjoy the benefits of membership in the St. Louis Section of ASME. Just two of the many benefits are mentioned above.

I would like to thank last years Section officers for a job well done and for another successful year. **Jim LaBlance**, **Swami Karunamoorthy** and **Jim Campbell**, as well as the other Board members, provided effective leadership for the Section. **Dave Henkelmann** also deserves thanks for a job well done as the editor for the Section newsletter. Thanks also to **John Saufnauer** for putting together an excellent piping seminar in April. Please welcome **Sridhar Condoor** as this year's treasurer and **Duane Meyer** as the newsletter editor. I am confident that they will continue the fine tradition of leadership of the St. Louis Section.

I would like to especially thank **Jim LaBlance** who was the Section Chair for last year. This was the second time Jim was Chair of the St. Louis Section. When a previous Section officer had to withdraw, Jim unselfishly stepped forward to fill the void in the Section leadership. Thanks Jim!

Although some of the meetings this year are not completely confirmed, our programming committee chaired by Swami Karunamoorthy has put together an interesting variety of meetings. The first meeting on **New Product Development** at Metaphase will be Wednesday September 10 at the Engineers Club. Other meetings this year will include a wide range of topics from a tour of a microbrewery to discussion of the **X-Prize**. What is the X-Prize you ask? Come join us and find out what this cutting edge engineering venture is all about.

Again, I would personally like to invite each of you to and look forward to seeing you at our meetings this year. If you know of someone who does not receive this newsletter but may be interested in ASME, please give him or her a copy of our newsletters and invite them to join us.

Sincerely,
Thomas E. Mull
St. Louis Section Chair

ASME St. Louis Section E-newsletter Update

Each month, the St. Louis Section downloads your membership data from ASME National to update our E-mailing and paper mailing distributions. The fastest method to change your E-mail and regular mail addresses, is to visit the ASME website, www.asme.org in the "Change of Address" section under "Members only." Your sign-in ID is your ASME member number.

If you do not have E-mail or if you have preference for a paper version of the newsletter, please contact Jim Campbell at 618-283-4700 x260 or jcampbell@polymersealing.com. You can also view the current ASME St. Louis Section information and newsletter at www.siu.edu/asme.

Message from the Program Chair



Dear Members of the St. Louis Section,

We have an exciting list of programs for this year. Thanks to all the members of the program committee for developing programs for the year 2003-04.

This year begins with a kickoff in September to

honor our past Chairmen of the ASME St. Louis Section. The dinner will be at the Engineer's Club with Dr. Bryce Rutter as the speaker. In October we will tour the Ethanol Plant at Southern Illinois University – Edwardsville.

Some of you mentioned that you were not able to attend all meetings on Tuesdays due to prior commitments. We listened to your comments. This year, the meetings will be rotated among Tuesdays, Wednesdays, and Thursdays so that everyone would have an opportunity to attend meetings in spite of your busy schedules. A brief overview of this year's program is given below.

September – Handheld Products Developed by Metaphase (Cool Stuff! see full details above)

October – National Ethanol Research Plant Tour .

November – X-Prize Foundation (Joint meeting with AIAA on Space Launch Contest)

December – Christmas Social and Awards (Surprise Presentation!)

January – Aviation History in Greater St. Louis (Centennial of Flight event)

February – Schlafly Micro Brewery Tour (Free Samples!!)

March – South-Side Machines and Gear Manufacturing Company Tour

April – New Materials from Nooter Co.

May – Aston Martin (Cars will be on display; No test drives!)

For detailed information about a specific event, look for the Newsletter of appropriate month.

ASME meetings are educational, as well as a great opportunity to network with peers. ASME can provide the necessary PDH for your professional advancement. What is PDH? Stay tuned for the next newsletter.

I personally invite all professional members as well as the student members to participate in our program events. It is a great opportunity for the students to have an exposure on contemporary issues and appreciate the need for life-long learning.

Swami Karunamoorthy

St. Louis Section Vice Chair and Program Chair

National Corn-To-Ethanol Research Plant Tour

Wednesday, October 15, 2003

The National Corn-to-Ethanol Research Pilot Plant, located on the campus of SIUE, is the only facility in the world that fully emulates both a corn-wet mill and corn-dry mill commercial fuel ethanol production facility. The plant will be used for commercializing new technologies that will produce ethanol more cost effectively from corn. Look for more information on this exciting tour in next month's newsletter.

Kudos for Piping Design Seminar

The Piping Seminar presented by the St. Louis Section last spring at the Engineers' Club in April was quite successful. The attendance of 118 people set a "record" for technical seminars, which the section has presented over the past 20 years. An excellent presentation was made by speakers **Don Frikken** and **Guy Jolly**. The largest portion of proceeds from the seminar will be directed as financial aid to four ASME Student Sections which are affiliated with the St. Louis Section, as well as various awards to members of those student sections. The student sections are located at Washington University, University of Missouri at Rolla, St. Louis University, and SIU Edwardsville. Some seminar manuals are available. For more history on excellent seminars, please contact John Saufnauer at jjsauf@solutia.com

**Please Join Us at the Next
St. Louis Section Board Meeting
August 26/27. Contact Tom Mull for time and
place or see postings on www.siue.edu/asme**

**Piping Seminar Manuals
For Sale**

We have several “left over” manuals from the Piping Seminar held last April. These manuals are available to anyone interested, at a cost of \$25.00, which covers the cost of preparation and assembly of the manuals. Each manual contains copies of the 184 slides used by the speakers in their presentations, as well as the following (all in a sturdy 3-ring binder):

- 40 pages of data and information on pipe, fittings, valves, accessories, etc.
- copy of the “the Copper Tube Handbook”
- copy of “Tubing Data”, by Swagelok Company
- copy of “Gasket Design Criteria“ by Flexitallic.
- copies of “Choosing the Right Valve”
- “Piping Pointers”, by Crane Valve Co.
- copies of two technical papers on water hammer
- copy of “Intro to Fluid Flow”, by Vogt Valve Co.
- copy of “Pipe Fitters Handbook”, by Anvil Corp.
- a CD ROM on selection and sizing of valves from Vogt-Edward Valve Co.

If interested in obtaining a copy of the manual, contact John Saufnauer at (618) 482-6530, or via email at jjjsauf@solutia.com, or Jim LaBlance at (618) 397-1301 or via email at Jim.LaBlance@Edm-Inc.com. Copies of the manuals will be available on a first come, first serve basis.

Historic Engineering The Philo Unit 6 electric power facility, the first commercial power plant in the world to use supercritical steam for higher efficiencies, has received a special recognition from the American Society of Mechanical Engineers (ASME International).

ASME named Philo 6 a historic mechanical engineering landmark at a ceremony Aug 7th, at American Electric Power Co., in Columbus, Ohio. Philo 6, which was in commercial operation from 1957 to 1975, used steam at 4500 psi and temperatures of 1,150° F to generate electricity at thermal efficiencies approaching 40 percent, a significant jump from the 30 percent attained by the average fossil-fueled power plant of the time. Philo incorporated a double-reheat cycle, a major innovation in steam-electric power plant cycles. Other pioneering developments included a turbine and steam generator capable of operating at the extremely high pressure and temperature, water purification systems, high-pressure pumps and piping, and integrated unit controls. These innovations enabled Philo 6 to make the leap from sub-critical to supercritical steam. The Philo 6 power facility became the trailblazer for many that followed. American Electric Power, operated the plant on the Muskingum River approx. 55 miles from Columbus, Ohio. Philo 6, a 120,000-kilowatt coal-fired facility, was deactivated in 1975 and officially retired in 1979. The plant was dismantled in 1983. Babcock & Wilcox Co. and General Electric Co. manufactured the steam generator and turbines of Philo 6.

University Student Sections

The ASME St. Louis Section makes invitation to the Student Sections each year to attend the St. Louis meetings. If interested in these meetings please contact one of the officers.

ASME St. Louis Section

Mailing Address:

ASME - St. Louis Section
The Engineer’s Club of St. Louis
4359 Lindell Blvd.
St. Louis, MO 63108

ASME 2003/2004 St. Louis Section Board

Chair Thomas Mull	Vice Chair Dr. Swami Karunamoorthy	Secretary James Campbell	Treasurer Sridhar Condoor	First Past Chair James LaBlance	Second Past Chair David Henkelmann	Newsletter Editor Duane Meyer
Thomas Mull & Associates 636-938-6173 mullt@worldnet.att.net	St. Louis University 314-977-8442 karunamoors@slu.edu	Forsheda Engineered Seals 618-283-4700 x260 jcampbell@polyme-rsealing.com	St. Louis University 314-977-8444 condoor@slu.edu	EDM Incorporated 314-231-5485 Jim.lablance@edm-inc.com	General Electric Co. 314-579-7089 David.henkelmann@indsys.ge.com	Atkins Americas 314-542-9604 dgmeyer@gtw.net