

SYSTEMICO

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FORWARD LOOK

Architecture Analysis & Design Language

April 27, 2006

Mr. John Mettenburg

Kirkwood Training and Outreach Services Center in Cedar Rapids, IA

Event Details
www.incose.org/heartld

Please [RSVP](#) to John Povacz (jfpovacz@RockwellCollins.com) in order to have enough food for everyone.

Six Sigma Presentation

May 25, 2006

Mr. Paresh M Vinchi

Kirkwood Training and Outreach Services Center in Cedar Rapids, IA

Event Details
www.incose.org/heartld

President's Message – INCOSE Heartland Chapter recognized Silver Circle Award

President's Message

Congratulations Heartland for a job well done. It was through dedicated membership, friends, and leadership that the INCOSE Heartland Chapter was recently awarded the Silver Circle Award.



This award recognizes chapters that meet and exceed INCOSE's standards for local service and contributions.

The Heartland Chapter was the first in the Region I to have received such an award three years in a row. The Northwest North America Region I includes U.S. states of AK, IA, ID, KS, OR, MO, MN, MT, ND, NE, SD, WA, WY Canadian provinces of NW territories, BC, Alberta, Saskatchewan, and Manitoba.

There are three levels, Heartland had 6498 points

- Gold Circle 8,000 points
- Silver Circle 5,000 points
- Bronze Circle 2,500 points

Best regards,



Magnetic Levitation – A “Repulsive” Demonstration

By Ray Jorgensen

During National Engineers Week, several INCOSE Heartland members and friends participated in a demonstration of Magnetic Levitation (MAGLEV) Vehicles. The INCOSE Heartland Chapter purchased a MAGLEV demonstration kit this year to use for K-12 educational programs. The kit includes two 8-ft tracks and materials to build MAGLEV cars that “float” down the track.

During National Engineers Week, about 150 students from around Eastern Iowa participated in the MagLev demonstration at the Iowa Children's Museum, Cedar Rapids Science Station, and Linn-Dale Mall.

Thanks to Tony Thompson, Ray Jorgensen, Jorge Buenfil, Ray Rhadar, Bill Pearson, Greg Johnson, and Stephen Morford for stepping out and taking INCOSE into the “classroom”!

If you would like to borrow the MAGLEV Demonstration as an INCOSE sponsored activity for your local classroom, contact Ray Jorgensen at rwjorgen@rockwellcollins.com. We've already used it at Indian Creek Elementary School in Marion, IA with an enthusiastic audience!

April Presentation: AADL – Architecture Analysis and Design Language

Architectural constructs provide the basis for effective system design. A well conceived architecture also provides a foundation for a product definition that can be effectively adapted and reused across many different project instantiations.

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March 8, 2006

Jorge Buenfil
3630 Windemere Way
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Dear Jorge:

On behalf of the International Council on Systems Engineering (INCOSE), we are pleased to recognize the Heartland Chapter as a Silver Circle Award Chapter based upon its contributions and accomplishments in 2005. This annual award recognizes chapters performing to the highest goals and standards established by our organization.

For many, chapters provide the primary day-to-day interface with INCOSE. Chapters organize technical and social programs, communicate key information about our organization and discipline, support technical activities, and enhance the member experience by facilitating an open, inviting environment where members receive valued products and services that enhance their careers. In fulfilling this mission, Heartland Chapter leaders and members have committed significant time and energy to further the goals of our organization.

To honor these efforts and achievements, this Silver Circle Award will be presented at the 2006 INCOSE International Symposium in Orlando, Florida. In doing so, INCOSE recognizes and celebrates the contributions and achievements of the Heartland Chapter, its leaders, and its sponsors.

High quality, vibrant chapters are essential in INCOSE's drive to enrich, educate, and enlighten the INCOSE membership while improving recognition of INCOSE and the systems engineering profession. The Member Board and INCOSE extend heartfelt thanks and appreciation to the Heartland Chapter for its contributions towards attaining these goals.

Paul Robitaille
INCOSE President

Michael Eagan
Member Board Chair

Bruce Shelton
Member Board Co-Chair



AADL – Architecture Analysis and Design Language

(continued from page 1)

What makes up a complete system architecture? Is one block diagram illustrating the arrangement of physical components "the architecture"? Or, are there other dimensions of a system architecture that are needed to complete the picture?

The Architecture Analysis & Design Language (AADL), an SAE AS5506 Standard released in 2004, has a growing and diverse user base, driven by both the well-defined meaning and the language extensibility. The growing interest in architecture modeling, driven by the complexity of systems and the need for safety, security and performance, has created a strong demand for an architecture modeling standard. Similarly, cycle time reduction is provided through architecture analysis, which can be considered "early integration" – in contrast to waiting for physical integration of hardware and software to find out resource allocation and timing issues. The language is precise, yet abstract to support modeling and analysis from concept throughout the life cycle and complements other related efforts like the OMG MARTE, SysML and DoDAF.

Mr. John Mettenburg is a Systems Engineer in the Advanced Technology Center at Rockwell Collins will be presenting this topic at our monthly meeting on April 27th, at 5:30 pm at the Kirkwood Training Center (KTOS). Come join us in this presentation!

INCOSE Heartland E-Mail Reflector

Did you know that the INCOSE Heartland Chapter maintains an e-mail reflector? It's your resource to communicate with the rest of the chapter and share insights, observations, or ask questions.

Ideas on reflector usage

Ask questions or share information about:

- INCOSE
- System Engineering Practices
- Educational Opportunities
- Books and References
- Standards and Publications

Send your request to: HeartlandMembers@incose.org

Use the reflector for a local discussion forum!

Engineers vs Managers...

A group of managers were given the assignment to measure the height of a flagpole. So they go out to the flagpole with ladders and tape measures, and they're falling off the ladders, dropping the tape measures - the whole thing is just a mess. An engineer comes along and sees what they're trying to do, walks over, pulls the flagpole out of the ground, lays it flat, measures it from end to end, gives the measurement to one of the managers and walks away. After the engineer has gone, one manager turns to another and laughs. "Isn't that just like an engineer, we're looking for the height and he gives us the length."