

President's Message

Written by Linda Preisen, 2010-2011 ITS Minnesota President



Linda Preisen

As the new ITS Minnesota Board of Directors begins its activities for the 2010-11 rotation year, it is timely to recall the mission of our organization; that is “to foster grassroots participation and public-private partnerships in Intelligent Transportation Systems (ITS), which generate interest, excitement, cooperation and progress focused on implementation results.” This mission is demonstrated through the work of our member organizations, which include state agencies, cities, counties, public universities, consulting firms, and industry vendors. Since its inception in 1995, the ITS Minnesota chapter has utilized the strengths of its diverse membership to advance cutting-edge research, conduct field tests, deploy new technologies, and implement large-scale ITS solutions. The strong integration of technology into Minnesota’s Urban Partnership Agreement is proof that great things can be accomplished when public and private sector partners work toward common goals.

At the Annual Meeting in March, I had the opportunity to provide an overview of the chapter’s current leadership structure. The newly elected officers and directors, joined by our committee chairs and committee participants have hit the ground running, moving forward with new ideas and initiatives. Tina Roelofs, chapter vice president, has compiled an “Operations Handbook” that documents the roles and responsibilities of officers, directors, and committees. The handbook will help ensure that the organization’s intended outcomes are met by providing information to assist with transitions as new volunteers join the Board of Directors and committees. Committees are beginning to plan programs and products, including the Fall Forum, Annual Meeting, luncheon programs, professional training sessions, newsletters, website updates and enhancements, student scholarships and awards, and other activities.

I look forward to working closely with the newly elected Board of Directors and committees to serve our membership and advocate for the organization’s mission. Our efforts in the coming year will be guided by our desire to continue ITS Minnesota’s strong tradition of advancing intelligent transportation systems in Minnesota.

JOIN ITS MINNESOTA TODAY!

ITS Minnesota membership is open to any public agency, private company, academic organization, professional association or other group with an interest in ITS.

For information:

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Featured ITS Minnesota Project City of Minneapolis Event Management

Written by Greg Stumpf, City of Minneapolis Traffic and Parking Services Division

The Minneapolis Downtown Management Team has recently implemented an action plan to help guide motorists throughout the downtown area in anticipation of the opening of the new Twins ballpark (Target Field). This plan included installing nine VMS signs as part of the larger system.

Target Field brought 40,000 Plus fans to an area which has never seen crowds of this magnitude.

The action plan, which is geared towards servicing large crowds visiting the ballpark, may accommodate other events which might occur in Minneapolis as standalone events or occur concurrently with the ball field. These other venues include at Target Center (Minnesota Timberwolves, concerts, etc), Convention Center, Downtown Theater District and local activities. The signs also need to make drivers aware of the new rail lines, newly constructed two-way streets, Metro Transit exclusive bus lanes, parking information and to provide better bicycle access downtown.

The signs display messages before events such as “Event Parking Ahead”, “Ramp Full Ahead”, and “Traffic Congestion Ahead” using the Full Color Matrix in accordance to ramp colors. There are several ways to display messages through the Vangaurd Software. The Scenario Manager will send and display various messages on many different signs with the click of the mouse. The Schedule Studio allows the City to program in advance, the messages that will be displayed during and after each event. Post event messages guide motorists to the nearest freeways utilizing the Full Color

Matrix that displays the freeway symbols in accordance with the MUTCD guidelines.

Currently, the City of Minneapolis has a total of 42 Daktronics VL3500 Variable Message Signs in various areas throughout downtown. These signs are all mounted on the signal pole mast arms and guide people to their destination as conveniently as possible. This ultimately reduces congestion and improves safety for drivers and pedestrians. The signs are also used to guide drivers to open parking on major event days and advise them of any street closures and parking restrictions.

Minneapolis is also introducing a Dynamic Parking Lane on 1st Avenue North which will utilize 23 Variable Message Signs to convey to motorists parking restrictions required to meet the many needs of this main corridor. The signs would display time sensitive messages such as “No Parking, 7a – 9a” or “Event Today, No Stopping, 4p – 10p”. These restrictions relate to peak periods or events. The advantage of having VMS signs as opposed to static signs are that the City can adjust these restrictions as necessary and we do not have to send out crews to install temporary signage or constantly hood and unhood meters. This also allows minimal closure time to help the bars and restaurants get valuable on-street parking before and after the event.

The signs communicate through various communication methods including Fiber Optics, 900 MHz Wireless Antenna’s and the City of Minneapolis’s Wi-Fi system.

So far, the plan has worked well as we have strategically placed these signs throughout Minneapolis and have future plans to add additional signs in area’s deemed necessary.



Variable Message Sign in Minneapolis

Featured ITS Minnesota New Member Firm Egan Company

Written by Reid Golyer, Egan Company Project Manager



UPA Real-Time Display

Since its inception in the 1940's, Egan Company, located in suburban Minneapolis, Minnesota has enjoyed a rich and colorful existence as one of the state's oldest, most successful specialty contractors. Through hard work and a commitment to deliver excellence and integrity, what started as a three person plumbing shop has grown to a diversified company with more than 600 employees representing 18 different trade unions.

Locally owned and operated, Egan provides complete mechanical, including on-site pipe and metal fabrication, along with electrical, service, Fire/life/safety, industrial controls, and building automation systems.

In addition, Egan provides curtainwall, glass and glazing, through its INTERCLAD Group, and operates in Rochester, Minnesota through its wholly owned, Neitz electric and mechanical group.

Using a corporate mission statement of "Building on Promises Kept," the Company prides itself on quality work, attention to detail, fairness to all and absolute, iron-clad follow through.

Nowhere has this "Commitment to Quality" been demonstrated more, in recent months, than by Egan's Outside Electrical Group through their contribution to a variety of intelligent systems projects around Minnesota.

Currently the company is installing a SCOOT (split cycle and offset optimization technique) traffic system at 39 signals around the University of Minnesota's new football stadium. In addition, Egan's outdoor group just completed an RTMC video display wall replacement project replacing smaller, at the end of their life cycle monitors with new 67" LCD display monitors. As part of this project, Egan also installed 5,100 8" LED signal indicators in all metro ramp control meters.

Similar work was also done recently in the Rochester area, and suburban Chaska with Egan's Craig Carlson leading the way. Although ITS work is relatively new, this was not Egan's first foray into this kind of challenge.

It all started with an intelligent traffic monitoring system installed for the Metropolitan Council and its Transportation Committee in the Twin Cities of Minneapolis and St. Paul, Minnesota area in 2009. This work included installation of Real Time Displays (RTD) showing expected bus arrival/departure times for passengers waiting to depart the Minneapolis downtown area. It also gives expected times for busses leaving Park and Rides in suburban Blaine, Roseville, Burnsville and Lakeville.

In another phase, Egan installed Transit Customer Information Systems (TCIS) consisting of "real time" signage along Interstate Highway 35W and other major arterials showing Park and Ride lot status for those commuters planning to pull off at some point in the outer suburbs to take the bus the remainder of the way to Downtown.

For the last piece of this puzzle, Egan installed a Transit Signal Priority System (TSP) which allows busses traveling the routes the ability to extend or shorten traffic signal duration in order to avoid traffic delays caused by excessive stopping.

With only one similar system operating in the entire country, this was a real learning experience from start to finish for the Outside Electrical Group. By all accounts they performed flawlessly.

On this work, Paul Becklin handled the Transit Customer Information System, Craig Carlson oversaw the Transit Signal Priority work, and Reid Golyer had the Real Time Display project.

Interdisciplinary Transportation Student Organization Update

Written by Josh Pearson, 2009-10 ITSO President



The Interdisciplinary Transportation Student Organization had a successful spring semester. During the semester, ITSO held our monthly TransTalk meetings, inviting different speakers to address topics in transportation. At the February TransTalk, Ethan Fawley, from the Minnesota Complete Streets Coalition, spoke about the concept of complete streets and the new legislation introduced at the state legislature involving complete streets. In March, Tim Mitchell and Greta Alquist, from Mn/DOT, spoke about the work done by the department in the area of bicycle and pedestrian planning. For the April TransTalk, Jupe Hale, from the WSB & Associates, gave a presentation about the planning, design, and implementation of roundabouts. For each of these three TransTalk, average attendance was around 50 students and faculty.

In March, ITSO held the 6th Annual Student Paper Conference and joint NCITE-ITSO Luncheon. The event had six students presenting their research on transportation related topics. The six presenters were Brad Utecht, Rose Ryan, Xiaozhen He, Shaker Rabban, Arthur Huang, and Shanjiang Zhu. There was a wide range of research topics from a bicycle-motorist crash analysis in Minneapolis to solutions to system optimal congestion pricing problems. During the joint luncheon, Professor Henry Liu gave a keynote speech on the future of traffic monitoring. The event was well attended with around 75 students and professionals attending.



6th Annual Student Paper Conference

Even though the spring semester and academic year are coming to a close, ITSO still has two events to end the year. ITSO is planning a tour of Metro Transit's Transit Control Center and Heywood Garage. In addition, on May 7th, ITSO will be hosting its End of the Year Social. At the social, ITSO will also present the 2010 Kasia Winiarczyk Award to one undergraduate and one graduate student. The award consists of a \$500 scholarship to the students. ITSO has already received several applications and expects many more applications before the April 30th deadline. ITSO will be taking a break during the summer months and will return in September for its monthly TransTalk. At that time ITSO will hold elections to determine the new ITSO Board.



ITSO Board

From left to right: Andrea Long, Vice President; Josh Pearson, President; Michael Collins, Secretary; Heng Hu, Communications Officer; and Avital Barnea, Treasurer

For more information about the University of Minnesota's

Interdisciplinary Transportation Student Organization visit the soon-to-be-updated

www.tc.umn.edu/~itso

16th Annual Meeting & Information Exchange

Written by Dan Nelson, URS Corporation

ITS Minnesota held its 16th Annual Meeting and Information Exchange at the University of Minnesota Continuing Education and Conference Center on March 9th, 2010. With nearly 70 attendees registered, the event was a valuable opportunity for members of the Minnesota ITS community to network and listen to presentations from a variety of technical experts.

ITS Minnesota President Jeff Lutz of URS Corporation started the day-long event with a review of the ITS MN Committees and their accomplishments over the past year. Highlights included, the *Education Committee* coordinating and conducting two ITS workshops, the *Membership Committee* encouraged new companies and local agencies to become ITS Minnesota members, and the *Communications Committee* updated and redesigned the ITS MN web site. ITS MN Vice President Linda Preisen also developed the first ITS MN Annual Report, with sections written by chapter officers and committee chairs. The Career Guidance Committee also coordinated ITS Minnesota's 2009 undergraduate scholarships and graduate student awards process, with nine undergraduates and four graduate students applying.

Ray Starr, Assistant State Traffic Engineer for Mn/DOT, moderated the first session of presenters who spoke on the subject of Safety and ITS. Todd Foster, Vice President of Sales & Marketing with Jam-Logic (a division of Ver-Mac, Inc.) presented ITS Work Zone Safety. Jon Jackels, ITS Program Manager with Mn/DOT, presented ITS Intersection Conflict Warning Activities. Lastly, John McClellan, RTMC Freeway Operations Supervisor with Mn/DOT, presented a video of lessons learned from common crash causes as captured by Mn/DOT traffic cameras.

The second session included presentations from University of Minnesota Research staff and was moderated by Jan Lucke, Manager of Research Administration Services for the Center for Transportation Studies. Rajesh Rajamani, a Professor of Mechanical Engineering with the University presented on Battery-Less Wireless Traffic Sensors. Xun Yu, an Assistant Professor with the Department of Mechanical and Industrial Engineering at the University of Minnesota Duluth presented on Real-Time Nonintrusive Detection of Driver Drowsiness. Lastly, Frank Douma, a Research Fellow and Assistant Program Director of the State and Local Policy Program at the Humphrey Institute of Public Affairs presented on the Implications of Current and Emerging Privacy Law for ITS.

The keynote lunch speaker was James Pol from the ITS Joint Program Office with the U.S. DOT spoke on the ITS Strategic Plan and ITS Evaluation Program.



Presentation by Terry Haukom, Mn/DOT

The third and final session of the day was moderated by James Kranig, Director of the Mn/DOT RTMC. This session focused on the Urban Partnership Agreement (UPA) Project Results in the Twin Cities. Terry Haukom, RTMC Design Supervisor with Mn/DOT, provided an overview of Mn/DOT's role in the UPA program. Terry provided a summary of the Mn/DOT led implementation of HOT Lane technology along I-35W south of Minneapolis, specifically, conversion of I-35W HOV lanes to HOT lanes and implementing a system of Priced Dynamic Shoulder Lanes. Craig Lamothe, UPA Senior Project Manager with the Metropolitan Council presented on the Transit Technology Projects led by Metro Transit. These projects included: 1) Transit

Customer Information Systems (TCIS), which provide real-time parking availability at select park-and-ride facilities to drivers along I-35W; 2) Real-Time Signs (RTS), which provide real-time bus departures from bus stops in downtown Minneapolis and park-and-ride facilities using Dynamic Message Signs, LCD Monitors, and audio-enabled Annunciators for the visually impaired; and 3) Transit Signal Priority (TSP), which provides buses with the ability to extend green lights and shorten red lights at traffic signals along Central Avenue in Minneapolis and Columbia Heights.

Linda Preisen closed the meeting as the incoming president of ITS Minnesota with an award to Jeff Lutz the outgoing ITS Minnesota President. Other awards included the Private Sector Recognition Award going to Craig Carlson of Egan Company, the Public Sector Recognition Award going to Nick Thompson of Mn/DOT, and a Lifetime Achievement Award for Ferrol Robinson of the University of Minnesota Humphrey Institute.



*Craig Carlson, Egan Company
Private Section Award*



*Jeff Lutz, URS Corporation
Past President*



*Nick Thompson, Mn/DOT
Public Sector Award*

CALENDAR OF EVENTS

May 3 rd to 5 th , 2010	ITS America 20 th Annual Meeting & Exposition	Houston, TX
May 10 th , 2010	ITS Minnesota Board Meeting	Minneapolis, MN
June 14 th , 2010	ITS Minnesota Board Meeting	Minneapolis, MN
July 12 th , 2010	ITS Minnesota Board Meeting	Minneapolis, MN
July 15 th , 2010	ITS Minnesota Quarterly Luncheon <i>Experiences in the Tolling Industry</i> Presented by John Sabala, TxDOT	Minneapolis, MN
July 15 th , 2010	Educational Seminar <i>Tolling – Today & Tomorrow</i>	Minneapolis, MN

The most current calendar of events is found on the ITS MN website at
www.itsmn.org/plugins/calendar_menu/calendar.php

Do you have a great idea for an upcoming edition of the update? Would you like to see your firm or project featured? Send article submissions to any member of the Communications Committee:

Tom Jensen, Chairperson
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Andy Terry
aterry@sehinc.com

Dan Nelson
dan_nelson@urscorp.com

Brett Steinocker
brett.steinocker@daktronics.com

2010-2011 ITS Minnesota Organizational Structure



Durga Panda, *Image Sensing Systems*
(ITS America State Chapters Council)

<p>Officers Linda Preisen, CTS (President) Tina Roelofs, Athey Creek (Vice President) Matt Gjersvik, Mn/DOT (Secretary) Erik Minge, SRF (Treasurer) Jeff Lutz, URS (Past President)</p>	<p>Ex-Officio Directors Jim McCarthy, FHWA Max Donath, U of M ITS Institute/CTS Rick Kjonaaas, Mn/DOT Office of State Aid Sue Groth, Mn/DOT Office of Traffic, Safety & Technology Connie Kozlak, Met Council Kristi Sebastian, NCITE Amber Nord, WTS Al Smith, Dept. of Public Safety Henry Liu, U of M Dept. of Civil Engineering Gary Nyberg, Metro Transit Josh Pearson, U of M ITS</p>
<p>Board of Directors Eric Drager, Hennepin Co. Tom Jensen, Alliant Don Sobania, City of Minneapolis</p> <p>1st Year Roger Walz, Collisys Sue Sheehan, Mn/DOT Andy Terry, S.E.H.</p> <p>2nd Year</p>	

C o m m i t t e e s

<p>Program Event Planning <u>Chair</u> Mike Granger, Jr, StreetSmart Rental <u>Co-Chair</u> Heidi Rudh, Wilbur Smith <u>Committee Members</u> Ming-Shiun Lee, URS Dharam Bobra, Hennepin Co. Stephanie Malinoff, CTS Catherine Flannery, U of M</p>	<p>Membership Recruitment and Member Services <u>Chair</u> Lisa Raduenz, Iteris <u>Co-Chair</u> Brandon Bourdon, Kimley-Horn</p>	<p>Communications Newsletter/Website <u>Chair</u> Tom Jensen, Alliant <u>Co-Chair</u> Andy Terry, S.E.H. <u>Committee Members</u> Dan Nelson, URS Brett Steinocker, Daktronics</p>	<p>ITS Technical Joint Committee with NCITE <u>Chair</u> Dean Deeter, Athey Creek <u>Co-Chair</u> Brian Scott, SRF</p>	<p>Scholarships & Career Guidance Student Scholarships/Awards and Outreach <u>Chair</u> TBD <u>Co-Chair</u> Shawn Haag, CTS <u>Committee Members</u> Don Sobania, City of Minneapolis Jim Kranig, Mn/DOT Henry Liu, U of M</p>	<p>Education Professional Development <u>Chair</u> Rashmi Brewer, Mn/DOT <u>Co-Chair</u> Ralph Adair, Mn/DOT <u>Committee Members</u> Terry Haukom, Mn/DOT Roger Walz, Collisys</p>
		<p>Liaison TBD in cooperation with Minnesota Guidestar Board</p>			



Educational Seminar

“Tolling – Today & Tomorrow”

Everyone is talking about how to solve transportation funding shortfalls and manage congestion. Today, more and more agencies are considering and moving towards an increased use of tolling. Is this really a viable transportation and funding solution? Understanding the types of tolling systems, applications, integration, and back office operations are key to being able to answer this question. This half-day seminar is designed to provide you or your agency the information to understand the various aspects of tolling and can help in determining how or if tolling may part of your future transportation solutions.

Thursday, July 15, 2010

Agenda

Registration: 7:30 AM

Tolling Seminar: 8:00 to 11:15 AM

Technology ~ Applications ~ Operations

ITS Minnesota Quarterly Luncheon: 11:30 to 1:00 PM

Keynote Speaker: John Sabala, TxDOT

Location

Ramada Plaza Minneapolis

1330 Industrial Boulevard, Minneapolis, MN 55413

Cost

\$40.00 per participant payable at door (Includes seminar and luncheon)

PRE-REGISTRATION REQUIRED

ITS Minnesota wishes to provide this educational experience to as many members as possible. As such, attendance is limited to a maximum of three participants from each member organization. Confirmations will be e-mailed to participants by July 8th, 2010.

Name: _____

Organization: _____

Address: _____

City/State/Zip: _____

E-mail: _____ Phone: _____

Circle Payment type: Check / PO / Cash

Return completed form via FAX or E-MAIL by **Thursday, July 1st, 2010** to:
Rashmi Brewer, Mn/DOT, RTMC – Fax: 651-234-7042 or Rashmi.Brewer@state.mn.us

NOTE: NO-SHOWS WILL BE BILLED.