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2011 Annual Meeting

Memphis, TN
September 28-30, 2011



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Dear Friends, Colleagues, and Industry Partners:

On behalf of the Board of Directors of the ITS Tennessee Chapter of ITS America, I welcome you to our fifth annual meeting in Memphis. I am pleased to see participants from Tennessee and surrounding states joining us this year.

As roadway construction costs rise and the availability of funds to construct highways decreases, many state and local agencies across the United States are developing programs to manage their infrastructure through ITS technologies. Tennessee is proud of its accomplishments over the past ten years, including the cutting-edge technology of the traffic management centers (TMC) located in all four major cities.

Please take the time to tour the exhibit area to learn more about ITS technologies, applications, and services. Additional highlights this year include the annual golf event, several valuable sessions in our technical program, a tour of the Tennessee Department of Transportation's Memphis TMC location, and a tour of the Memphis Traffic Signal Shop. Hopefully we will also see you at our social outing, a riverboat dinner cruise on the Mississippi.

I would like to extend my gratitude to this year's speakers for sharing their time and ITS knowledge with all of us. A very special thanks to all of our sponsors and vendor exhibitors for their support in making the 2011 Annual Meeting a success.

Finally, I would like to express my sincere gratitude to the meeting planning committee chaired by Mr. Gerald Bolden. The outstanding program is a result of many hours of hard work by an excellent group of volunteers.

I hope this 2011 meeting provides you with an opportunity to learn more about the ITS in place across our great state. Welcome back to ITS Tennessee!

Best regards,

Ali Farhangi

Ali Farhangi, PE
President, ITS Tennessee



Schedule at a Glance

Wednesday, September 28

- 11:00 – 2:00 — Technical Tour (Open House Style) — TDOT Region 4 Traffic Management Center
- 11:30 – 5:00 — Golf Event at The Links at Galloway (Lunch at 11:30; tee times begin at 1:00)
- 12:00 – 6:00 — Registration Open (Ballroom Foyer)
- 3:00 – 6:00 — Exhibitor Set-up (Pyramid Ballroom)
- 3:00 – 5:00 — Technical Program — Emerging Technologies (Salon E, F, G, H)
- 6:00 – 7:30 — Welcome Reception (Salon E)

Thursday, September 29

- 7:00 – 8:00 — Continental Breakfast (Salon E, F, G, H)
- 7:00 – 5:00 — Registration Open (Ballroom Foyer)
- 8:00 – 5:00 — Exhibit Hall Open (Pyramid Ballroom)
- 8:00 – 8:30 — Welcome Session (Salon E, F, G, H)
- 8:30 – 10:00 — Technical Program — Performance Measures Roundtable (Salon E, F, G, H)
- 10:00 – 10:30 — Break in Exhibit Hall (Pyramid Ballroom)
- 10:30 – 12:00 — Technical Program — Adaptive Transportation Systems (Salon E, F, G, H)
- 12:00 – 1:45 — Keynote Luncheon (Salon D)
- 1:45 – 3:15 — Technical Program — Innovation Beyond State Lines (Salon E, F, G, H)
- 3:15 – 4:00 — Break in Exhibit Hall (Pyramid Ballroom)
- 4:30 – 8:00 — Social Event (Memphis Riverboat)

Friday, September 30

- 7:00 – 8:00 — Continental Breakfast (Salon E, F, G, H)
- 8:00 – 12:00 — Exhibit Hall Open (Pyramid Ballroom)
- 8:30 – 10:00 — Technical Program — ITS Programs, Tools & Techniques (Salon E, F, G, H)
- 10:00 – 10:30 — Break in Exhibit Hall (Pyramid Ballroom)
- 10:30 – 12:00 — Closing Session (Salon D)
- 12:30 – 2:00 — Technical Tour — City of Memphis Traffic Signal Shop

About the Extras...

TDOT Region 4 Traffic Management Center Tour

When: Wednesday, September 28
11:00 - 2:00 p.m.



See firsthand the epicenter of this multimillion dollar transportation management center. The TDOT Memphis Smartway System covers over 80 miles of centerline interstate and includes 42 dynamic message signs, 115 closed-circuit television cameras, 16 highway advisory radio transmitters along with 41 HAR beacons, and over 350 radar detection units. All of these ITS devices communicate directly with this 16,000 square foot transportation management center located on TDOT's Region 4 Boswell Campus, which serves as the focal point for traffic management operations and communications for the Memphis region. The transportation management center has 16 offices, 2 large conference rooms, 8 operator workstations, and two HELP dispatcher workstations.

Memphis Riverboat

When: Thursday, September 29
4:30 - 8:00 p.m. (Transportation provided)



Join us for a privately-chartered cruise down the Mighty Mississippi on the Island Queen Riverboat. This cruise is included with your ITS Tennessee Annual Meeting registration, and it includes dinner and a cash bar with one complimentary drink.

The Island Queen has three decks. The first deck will have enclosed dining, the cash bar, and a bow stage. The second deck is open-air with some covered outdoor dining. The third deck opens to a moonlit sky with a forward area sheltered under the pilothouse. This is a Memphis event that you don't want to miss!

City of Memphis Traffic Signal Shop

When: Friday, September 30
12:30 - 2:00 p.m.



This complimentary tour of Memphis's Traffic Signal Shop will take 15 attendees on a tour of the facility, which may include a presentation or a Q&A with the facility director. Transportation will be provided.



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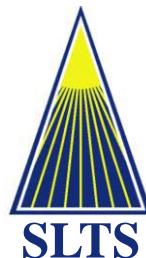
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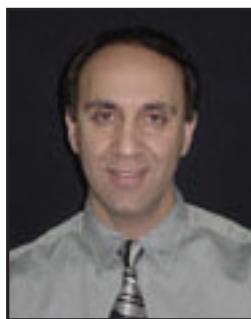
In-state warehouse
with traffic signal equipment and controller/cabinet inventory
Providing local pole engineering services, field support / training
and installation assistance

Meet the Featured Speakers

What: Welcome Session

When: Thursday, September 28, 8:00 - 8:30 a.m.

Where: Salon E, F, G, H



Ali Farhangi, ITS Tennessee

Ali Farhangi is the Traffic and ITS Manager for Tennessee Department of Transportation (TDOT). He has been with TDOT for 30 years. In March 2000, he took the lead in ITS for TDOT. He has a Bachelor of Science in Civil Engineering and is a registered Professional Engineer. Ali is the TDOT representative in the National Transportation Management Center Pooled Fund Study and president of the ITS Tennessee Chapter.



Bill Moore, Gresham Smith & Partners

Bill Moore joined Gresham Smith & Partners in 2004 after a 36-year tenure with the TDOT. As chief engineer with TDOT, he was responsible for the planning, design, maintenance, and operation of TDOT's statewide transportation system. In this position, Bill directed the activities of eight divisions and four regional offices.

Notable projects completed under his stewardship include the construction of I-26 from Johnson City, Tennessee to North Carolina, the Nashville Intelligent Transportation "Smartway" System and the Freeway High Occupancy Vehicle (HOV) Lanes in Nashville and Memphis. In recognition of Bill's many years of service, the Tennessee General Assembly designated the administrative building in the Jackson complex as the Bill Moore Office Building.



Mayor Mark H. Luttrell, Shelby County

Mayor Mark H. Luttrell, Jr. took office as Shelby County Mayor on September 1, 2010. He received a Bachelor of Arts degree from Union University and a Masters in Public Administration from the University of Memphis. Mayor Luttrell is a Leadership Memphis graduate and a distinguished recipient of the Outstanding Alumni Award of the University of Memphis, College of Arts and Sciences.

What: Keynote Luncheon Speakers

When: Thursday, September 29, 12:00 - 1:45 p.m.

Where: Salon D



Jeffrey A. Lindley, USDOT, FHWA

In August 2008, Jeffrey A. Lindley was named Associate Administrator for Operations for the Federal Highway Administration (FHWA). He directs a staff responsible for development and delivery of FHWA policies and programs designed to reduce congestion and improve highway operations.

Immediately prior to this appointment, he served as the Associate Administrator for Safety from

2006-2008. Mr. Lindley is a civil engineering graduate of Virginia Tech and received his Master's degree in Transportation Engineering from the University of Maryland.



Tom Kern, ITS America

As Executive Vice President, Tom Kern provides oversight and support for all technical programs, business development activities, legislative initiatives, meeting planning, member sales and service, and communications. Prior to joining ITS America, Tom was a senior associate at the Annie E. Casey Foundation, overseeing knowledge management and organizational learning. He holds a BA in Government

and Economics from Georgetown University, earned his MPA from the London School of Economics, and attended Oxford University where he did graduate work in the Department of Politics.

What: Closing Session

When: Friday, September 30, 10:30 a.m. - 12:00 p.m.

Where: Salon D



Daniela Bremmer, Washington State DOT

Daniela Bremmer is the Director of WSDOT's Strategic Assessment Office, where she is responsible for the agency's strategic planning, performance management and system performance analysis and, most recently, ARRA Stimulus reporting functions. Over the past years, much of her work has been focused on measuring highway system

performance and the effectiveness of both capital improvements and systems operations strategies as well as developing comparative performance measurement approaches for state DOTs in collaboration with AASHTO and FHWA.

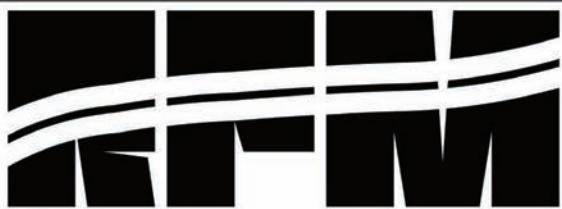


Pam Kordenbrock, FHWA Tennessee Division

In February 2010, Pam Kordenbrock became the Division Administrator for the FHWA Tennessee Division. She leads a multi-disciplinary staff of 24, responsible for an \$800 million federal-aid program and provides policy guidance to FHWA's state, local, and other federal partners. Pam has a Bachelor's degree in Civil Engineering and a Masters degree in Transportation Engineering from the University of Virginia.

Technical Program

		Salon Salon E, F, G, H			
September 28		3:00 - 5:00 a.m.			
Emerging Technologies	Jan Seigler (Cohu) Advancement of CCTV Technology and the Principles of Encoding Video	Paul Misticawi (Blue Toad) <i>Bluetooth Travel-Time System</i>	Chris Copeland (Flir) Thermal Imaging	Craig Franklin (Trichord) Work Zone Monitoring Systems	
Moderator: Joe Warren (TDOT, retired)	This presentation focuses on the advancements in CCTV technology and the principles of encoding video.	This presentation will discuss what Bluetooth is and how this standard allows travel-time and speed calculations. The different form factors in the Bluetooth travel-time market and challenges that exist with this technology will also be discussed. Existing customer data will be shared live to better understand the type of information that can be attained from a Bluetooth travel-time system.	This presentation focuses on advanced technologies in thermal imaging.	Lessons learned in deployment and operations of portable work zone monitoring systems will be discussed in this presentation—beginning with an overview of available work zone monitoring systems. Technical and functional specifications used by various states in procuring and deploying these systems and present lessons learned from deployments in Virginia, Delaware, New York, New Hampshire, and Illinois will also be discussed.	
Performance Measures Roundtable	Intelligent transportation systems generate tremendous data archives that have the potential to be mined and transformed into treasures of information. Join us for a roundtable discussion with a diverse panel of guests to share their perspectives on performance measures.				
Moderator: Charles Lattimer (Atkins)	Speakers: Terry Gladden (TDOT) Tommy Wallace (MATA) Thomas Fowler (Kimley-Horn) Frank Horne (TDOT)				
Adaptive Transportation Systems	Eddie Curtis (FHWA) Systems Engineering as Applied to Adaptive Traffic Signal Control	Jay Calhoun (Gannett Fleming) Using ITS for Safety: I-75/Alligator Alley	Tom McKeon (Rhythm Engineering) Real-Time Artificial Intelligence Delivering Real-World Results	Ashlyn Morgan (Atkins) Nashville Signal Timing Optimization	
Moderator: Mark Washing (GS&P)	This presentation will provide an overview of FHWA's Every Day Counts Technology and Innovation Initiative for Adaptive Signal Control Technology (ASCT).	A discussion of the 75-mile rural segment of I-75 in South Florida, which connects the metropolitan Miami/Ft. Lauderdale areas.	This presentation illustrates the InSync adaptive traffic control system using artificial intelligence to optimize traffic signals at individual intersections and coordinate signals along arterial corridors to reduce traffic congestion.	This presentation includes the development and implementation of coordinated signal timing plans for over 300 traffic signals in eight networks.	
Innovation Beyond State Lines	Gary Millsaps (Delcan Corporation) STIX: Southern Transportation Incident Exchange Program	Mike Stokes (MDOT) MDOT Digital Video Migration	Pete Salgado and Zia Yusuf (Streetline Inc.) Sensors, Networks, and Apps: How Technology is Redefining the Way We Park	Pete Costello (INRIX) Cost Effective Implementation to the new Real-Time System Management Information Program	
Moderator: Dowell Hoskins (GS&P)	This presentation looks at the strides states and local jurisdictions have made in developing and deploying ITS programs in recent years.	A look at MDOT's statewide transportation communications network.	This presentation reveals how sensor technology, ultra low-power wireless mesh networks, and smart mobile apps are making smart parking a reality across the country.	This presentation discusses how states and metropolitan areas can leverage work being done in the private sector to cost effectively meet the goals of the Real-Time System Management Information Program.	
ITS Programs, Tools, & Techniques	Robert Rupert (FHWA) The Real-Time System Management Information Program	John Hall (TDOT) / Cary Vick (Telvent TDOT 511)	Daniela Bremmer (WASDOT) Performance Measures		
Moderator: Michael F. Rebick (Gannett Fleming)	This presentation provides background information on the Real-Time System Management Information Program, provisions of the regulation, and the next steps toward implementation of the program.	This presentation explores what is new in the realm of 511—where it is heading and what initiatives TDOT is pursuing.	This presentation focuses on WASDOT's experience in developing a comprehensive performance management program, which provided the agency the opportunity to receive two gas tax revenue increases, defeated an anti-gas tax referendum, and continues to create a supportive legislative climate for future asks and revenue increases.		
September 29		8:30 - 10:00 a.m.	10:30 a.m. - 12:00 p.m.		
ITS Programs, Tools, & Techniques	Robert Rupert (FHWA) The Real-Time System Management Information Program	John Hall (TDOT) / Cary Vick (Telvent TDOT 511)	Daniela Bremmer (WASDOT) Performance Measures		
Moderator: Michael F. Rebick (Gannett Fleming)	This presentation provides background information on the Real-Time System Management Information Program, provisions of the regulation, and the next steps toward implementation of the program.	This presentation explores what is new in the realm of 511—where it is heading and what initiatives TDOT is pursuing.	This presentation focuses on WASDOT's experience in developing a comprehensive performance management program, which provided the agency the opportunity to receive two gas tax revenue increases, defeated an anti-gas tax referendum, and continues to create a supportive legislative climate for future asks and revenue increases.		
September 30		8:30 - 10:00 a.m.	2:00 - 3:30 p.m.		



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Join Us For Breakfast!

When: Thursday and Friday, September 29 & 30
7:00 - 8:00 a.m.

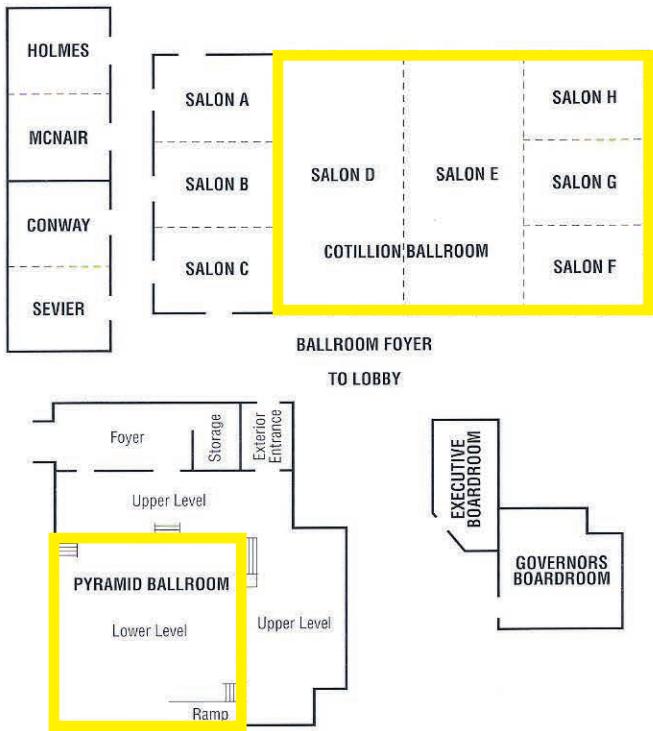
Where: Salon E, F, G, H

Don't Miss Lunch
with our keynote speaker

When: Thursday, September 29
12:00 - 1:45 p.m.

Where: Salon D

Hotel Layout



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