

**4th International Symposium on Dynamic Traffic Assignment:
4-6 June 2012 on Martha's Vineyard, Massachusetts, USA**

Conference Agenda

Monday, June 04, 2012	
7:50 to 8:00	Opening Remarks (Terry L. Friesz).
8:00 to 9:40	Session 1- Fundamental Issues in DTA. Session Chair: Satish Ukkusuri. <ul style="list-style-type: none"> • Probability in Traffic: a Challenge for Modelling (<i>Simeon Calvert; Henk Taale; Maaïke Snelder; Serge Hoogendoorn</i>) NETS307 • Linear Programming Formulation for Strategic Dynamic Traffic Assignment (<i>S. Travis Waller; Melissa Duell; David Fajardo; Vinayak Dixit</i>) NETS354 • Multiple Equilibria in a Dynamic Traffic Network in General Settings (<i>Takamasa Iryo</i>) NETS342 • Existence and Properties of State Operators in DUE Models (<i>Ke Han, Terry Friesz, Tao Yao</i>) NETS347A
9:40 to 11:20	Session 2: Advances in Dynamic Traffic Models. Session Chair: David Watling. <ul style="list-style-type: none"> • Managing Morning Commute with Tradable Mobility Credits (<i>Yu (Marco) Nie</i>) NETS333 • Dynamic User Equilibrium Based on the Hydrodynamic Model (<i>Terry Friesz; Ke Han; Amir Meimand; Pedro Neto; Tao Yao</i>) NETS347B • A Cell Transmission Model with Lane Changing and Incorporation of Stochastic Demand and Supply Uncertainties for Freeway Traffic State Estimation (<i>Renxin Zhong; Agachai Sumalee; Tianlu Panl; William H.K. Lam</i>) NETS339 • A Network Level DUE Model with an Embedded Cell Transmission Model (<i>Satish Ukkusuri; Kien Doan; Lanshan Han</i>) NETS310
11:20 to 11:35	Coffee Break
11:35 to 13:15	Session 3- Traffic Flow Models for DTA. Session Chair: Michael Zhang. <ul style="list-style-type: none"> • A Case for Advanced Traffic Flow Models in DTA (<i>Ranju Mohan; Gitakrishnan Ramadurai</i>) NETS316 • Lagrangian-based Hydrodynamic Model: Freeway Traffic Estimation (<i>Ke Han; Tao Yao; Terry Friesz</i>) NETS348 • The Cell Transmission Model with Multiple Lanes and Lane-changing (<i>Malachy Carey; David Watling; Chandra Balijepalli</i>) NETS355 • The Dynamics of Traffic Flow, Traffic Routing and Traffic Control (<i>Michael John Smith</i>)
13:15 to 14:25	Lunch. Keynote Lecture 1, Kai Nagel: Large-Scale Network Simulation.
14:25 to 16:05	Session 4- DTA for Network Control. Session Chair: Camille Kamga. <ul style="list-style-type: none"> • Investigating Undesired Spatio and Temporal Boundary Effects of Congestion Charging (<i>Ying-en Ge; Kathryn Stewart; Bingrong Sun; Xuegang (Jeff) Ban</i>) NETS299 • Distributed Signal Control Based on Tradable Network Permits: Design and Evolutionary Implementation (<i>Kentaro Wada; Takashi Akamatsu</i>) NETS335 • Formulation of a Risk-Aver System Optimal Dynamic Traffic Assignment (<i>Solmaz</i>)

	<p><i>Haji; Panagiotis Angeloudis; Michael G H Bell; Valentina Trozzi</i>) NETS329</p> <ul style="list-style-type: none"> • A Behavioral Model for Dynamic Evacuation Traffic Assignment (<i>Dung-Ying Lin; Bao-Syuan Zou</i>) NETS366
16:05 to 16:25	Coffee Break
16:25 to 18:05	Session 5- Network Loading Models. Session Chair: Travis Waller.
	<ul style="list-style-type: none"> • A Continuous DUE Algorithm Using the Link Transmission Model (<i>Nezamuddin Nezamuddin; Stephen Boyles</i>) NETS371 • Convergence of Time Discretization Schemes for Continuous-Time Dynamic Network Loading Models (<i>Rui Ma; Xuegang (Jeff) Ban; Jong-Shi Pang; Henry Liu</i>) NETS349 • A Semi-Dynamic Traffic Assignment Model with Unique Network Quasi-Equilibrium (<i>Shoichiro Nakayama; Richard Connors</i>) NETS305 • An Anisotropic Discrete Packet Approach for Modeling Traffic Flow in Dynamic Network Loading (<i>Hilmi Berk Celikoglu; Mauro Dell'Orco</i>) NETS334
18:05 to 19:45	Session 6 - Transit and Urban Freight Applications of DTA. Session Chair: Mark Hickman.
	<ul style="list-style-type: none"> • Demand-Priority Routing for Dynamic Traffic Assignment in Evacuation Problems (<i>Yu-Ting Hsu; S. Peeta</i>) NETS302 • Integration of Dynamic Traffic Assignment with Schedule-Based Transit Assignment and Simulation of Congested Multimodal Networks (<i>Alireza Khani; Hyunsoo Noh; Mark Hickman; Yi-Chang Chiu; Brenda Bustillos</i>) NETS358 • Logit-based Congested Transit Assignment Using Hyperpaths on a Scheduled Transit Network (<i>Hyunsoo Noh; Mark Hickman; Alireza Khani</i>) NETS330 • Urban Freight Transportation Planning: A Dynamic Stackelberg Game-Theoretic Approach (<i>Bo Zhang; Tao Yao; Terry Friesz; Hongcheng Liu</i>) NETS332
20:00 to 22:00	Dinner
Tuesday, June 05, 2012	
7:20 to 8:00	Breakfast
8:00 to 9:40	Session 7- Route Choice Models. Session Chair: WY Szeto.
	<ul style="list-style-type: none"> • Route Choice Model for Public Transport Networks with Passenger Queues and Online Travel Information at Stops (<i>Valentina Trozzi; Michael G. H. Bell; Guido Gentile; Ioannis Kaparias</i>) NETS337 • Combining Disaggregate Route Choice Estimation with Aggregate Calibration of a Dynamic Traffic Assignment Model (<i>Moshe Ben-Akiva; Song Gao; Lu Lu; Yang Wen</i>) NETS327 • An Excess-Demand Dynamic Traffic Assignment Approach for Inferring Origin-Destination Demand Matrices in Cell-Based Networks (<i>Chi Xie; Jennifer Duthie</i>) NETS311 • Correcting the Effects of Asymmetric Interactions in Work Trips with Staggered Work Hours (<i>Wilfredo Fernando Yushimito; Xuegang Ban; Jose Holguin-Veras</i>) NETS338
9:40 to 10:40	Roundtable Session 1: What Are The Emerging Trends in DTA Research?
10:40 to 11:00	Coffee Break
11:00 to 12:40	Session 8- Simulation-based DTA Models. Session Chair: Carolina Osorio.

	<ul style="list-style-type: none"> • Large-Scale Simulation-Based Traffic Signal Control (<i>Carolina Osorio; Linsen Chong</i>) NETS343 • Improving the Convergence of Simulation-Based Dynamic Traffic Assignment Methodologies (<i>Natalia Ruiz Juri; Michael Levin; Travis Owens; Matthew Pool; S.Travis Waller</i>) NETS386 • Agent-Based Approach for Integrating Departure Time and Dynamic Traffic Assignment Models (<i>Lei Zhang; Mostafa Mollanejad; Chenfeng Xiong; Shangjiang Zhu</i>) NETS365 • Integrated Agent-Based Dynamic Traffic Simulation Model for Hurricane Evacuation (<i>Satish Ukkusuri; Samiul Hasan; Kien Doan; Rodrigo Mesa-Arango; Binh Luong</i>) NETS357
12:40 to 14:00	Lunch. Keynote Lecture 2, David P. Watling: Model Representation & Decision-Making in an Ever-Changing World: The Role of Stochastic Process Models of Transportation Systems.
14:00 to 15:40	Session 9- Day-to-day Dynamic Traffic Models. Session Chair: Mike Smith.
	<ul style="list-style-type: none"> • On the Stability of a Boundedly Rational Day-to-day Dynamic (<i>Xuan Di; Henry X. Liu; Jong-Shi Pang; Xuegang Ban</i>) NETS374 • Traffic Control in a Day-to-day Dynamical System (<i>Lin Xiao; Hong K Lo</i>) NETS301 • Extending Prospect Theory for Modeling Day-to-day Traffic Dynamics: Risk Aversion and Equilibrium Stability (<i>Jing Bie; Jaap Vreeswijk; Eric van Berkum</i>) NETS336 • Day-to-Day Dynamics & Equilibrium Stability in a Two-Mode Transport System with Responsive Bus Operator Strategies (<i>Giulio Erberto Cantarella; Pietro Velona; David P. Watling</i>) NETS308
15:40 to 16:40	Round Table Discussion 2: Canonical Forms, Benchmark/Test Problems, and Data
16:40 to 17:00	Coffee Break
17:00 to 18:40	Session 10- Continuous Models for DTA. Session Chair: Terry Friesz.
	<ul style="list-style-type: none"> • Modeling and Solving Continuous-Time Instantaneous Dynamic User Equilibria: A Differential Complementarity Systems Approach (<i>Xuegang (Jeff) Ban; Rui Ma; Jong-Shi Pang; Henry Liu</i>) NETS328 • Approximating Time Delays in Solving Continuous-Time Dynamic User Equilibria (<i>Rui Ma; Xuegang (Jeff) Ban; Jong-Shi Pang; Henry Liu</i>) NETS350 • A Comparison of Dynamic User Optimal States with Zero, Fixed and Variable Tolerances (<i>Ying-en Ge; Bingrong Sun; Xizhao Zhou; Hongjun Michael Zhang; WY Szeto</i>) NETS318 • Explicit solution to Vickery's Model in Continuous-time with Application to DTA (<i>Ke Han; Terry Friesz; Tao Yao; Pedro Neto</i>) NETS344
20:00 to 22:00	Dinner. Keynote Lecture 3, Mike Marsico: MTM: NYCDOT's Sustainable Modeling Platform.
Wednesday, June 06, 2012	
7:00 to 7:40	Breakfast
7:40 to 9:20	Session 11 - Advances in DTA Modeling. Session Chair: Kaan Ozbay
	<ul style="list-style-type: none"> • A Cell-based Stochastic Dynamic Traffic Assignment Model and Solution Procedure to Capture Endogenous Network Degradation Risks during Evacuations (<i>Jian Li; Kaan Ozbay</i>) NETS353 • Trip-Based Path Algorithms Using Transit Network Hierarchy (TBPATh) (<i>Alireza</i>

	<p><i>Khani; Mark Hickman; Hyunsoo Noh</i>) NETS312</p> <ul style="list-style-type: none"> • Capturing Dependency among Link Boundaries in a Stochastic Network Loading Model (<i>Carolina Osorio; Gunnar Floetteroed</i>) NETS352 • An Intersection-movement-based Dynamic Traffic Assignment Problem (<i>Jiancheng Long; Wai Yuen Szeto; Hai-Jun Huang; Ziyou Gao</i>) NETS315
9:20 to 10:35	Session 12- Stochastic Models for DTA. Session Chair: Agachai Sumalee.
	<ul style="list-style-type: none"> • The Evolution of Driver Route Switching Behaviour in Stochastically Perturbed Networks (<i>James Robert Snowdon; Ben Waterson; Hans Fangohr</i>) NETS351 • Challenges to Stochastic Process Modeling of Transportation Systems (<i>David P. Watling; Giulio E Cantarella</i>) NETS321 • Simultaneous Optimization of Fuel Surcharges and Transit Service Runs in a Multi-Modal Transport Network: a Time-Dependent Activity-Based Approach (<i>Zhi-chun Li</i>) NETS306
10:35 to 10:45	Coffee Break
10:45 to 12:00	Session 13 – Sustainability and Behavior in DTA. Session Chair: Terry Friesz/Satish Ukkusuri.
	<ul style="list-style-type: none"> • Ecological User Equilibrium in Traffic Management (<i>Michael Behrisch; Yun-Pang Floetteroed; Daniel Krajzewicz; Peter Wagner</i>) NETS320 • Energy-Efficient Traffic Management: a Microscopic Simulation-Based Approach (<i>Carolina Osorio; Kanchana Nanduri</i>) NETS331 • A Sustainable Road Network Design Problem with Land Use Transportation Interaction over Time (<i>Wai Yuen Szeto; Yu Jiang; Agachai Sumalee; S.C. Wong</i>) NETS319
12:30 to 17:30	Boxed Lunch and Extramural Events.
18:00 to 22:00	Gala Dinner, Special Session, Next Venue Proposal Presentations and Closing Ceremony.
18:15 to 20:20	Session 14 – Special Focused Session on DTA Applications. Session Chair: Michalis Xynatarakis. Contemporaneous Dinner Service.
	<ul style="list-style-type: none"> • Research Experience and Challenges for Integrating Dynamic Traffic Assignment with Activity-Based Models (<i>Yi-Chang Chiu</i>) • Impact of Intersection Modeling on Mesoscopic DTA Applications (<i>Jen Duthie; Kyriacos Mouskos; Natalia Ruiz Juri; Karen Karasevich; Wanching Huang</i>) • Large-Scale Microscopic Simulation-Base Dynamic Traffic Assignment (<i>Dan Morgan</i>) • A Quantitative Comparison of Dynamic Traffic Assignment Modeling Packages for Heterogeneous Traffic Composition (<i>V. S. Parvathy; Gitakrishnan Ramadurai; Michail Xynatarakis</i>) NETS315 • Refining Toll Analyses Through Use of DTA Modeling: the Alaskan Way Viaduct Project in Seattle (<i>Chris Wellander; Michael Mahut; Youssef Dehghani; Andrew Natzel; Michail Xynatarakis</i>)
20:20 to 21:30	Presentation of Next Venue Proposals.
21:30 to 21:45	Open Microphone.
21:45 to 22:00	Closing Remarks.