Department of Civil & Environmental Engineering: Transportation Engineering & Science Program
http://tesp.engr.utk.edu/

325 John D. Tickle Building
Knoxville, TN 37996-2313
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Fax: (865) 974-2669
cee@utk.edu
Background

- Transportation program in CEE Dept. & concurrently at CTR
- Addressing wide variety of transportation issues
- Building educational infrastructure
- A nationally known transportation program
People

• CEE Faculty
  – Dr. Chris Cherry
  – Dr. Lee Han
  – Dr. Asad Khattak
  – Dr. Shashi Nambisan

At CTR
  – Dr. David Clarke
  – Dr. Steve Richards
  – 30 staff members

Affiliated Faculty
  – Dr. Baoshan Huang (pavements)
  – Dr. David Greene (energy)
  – Several other faculty in various departments

CEE Graduate Students in Transportation Area (2014)
  - 8 Ph.D., ~10 Masters
Scholarship (Examples)

• Memberships in four TRB Committees
  – E.g., User Information Systems committee
• Editorial responsibilities
  – Editor, Journal of Intelligent Trans Systems (SCI)
  – Associate Editor, International Journal of Sustainable Transportation (SCI)

Annual publications/presentations (CEE Faculty)
  ~15 journal papers per year
  - 12-15 TRB & other conference presentations
  - Best paper award-ITS World Congress, 2011
Transportation Engineering & Science Faculty

Dr. Christopher Cherry
Associate Professor

Dr. Lee D. Han
Professor

Dr. Asad J. Khattak
Beaman Professor

Dr. Shashi Nambisan
Professor

✧ Transportation Safety
✧ Sustainable Transportation
✧ Technology Solutions including Intelligent Trans Systems
✧ Planning and operations
✧ Modeling, simulation and visualization
Dr. Cherry’s research

Dr. Christopher Cherry
Associate Professor

- Sustainable Transportation
- Non-Motorized Transportation Safety
- Travel Behavior and Demand
- Transportation Economics
- Commercial Vehicle Safety
- Transportation and the Environment
- Multimodal Transport, Planning & Operations
- Transit Security and Shared Vehicles
Dr. Han’s Research

Dr. Lee D. Han
Professor

- Application of Advanced Technologies to Transportation
- Intelligent Transportation Systems (ITS)
- System Modeling and Simulations
- Traffic Flow Theory, Traffic Operations
- Transportation Data and Information Systems
- Emergency Evacuation and Management
- Crash Records and Analysis
- Transportation Logistics, Operations Research, and 3D Visualizations
Dr. Khattak’s Research

Dr. Asad J. Khattak
Beaman Professor

Joined UT in 2013
Editor-in-Chief, Journal of Intelligent Transportation Systems, Taylor & Francis Publishers, 2003-to date
Editor-in-Chief, International Journal of Sustainable Transportation, Taylor & Francis Publishers, 2006-to date

- Intelligent Transportation Systems
- Transportation Safety
- Transportation Planning and Sustainable Transportation
Dr. Nambisan’s Research

- Joined UT in 2014
- President for Council of University Transportation Centers (CUTC) in 2014-2015
- Authored or co-authored 110 peer reviewed journal and conference publications
- Highly active in presenting work at international, national, and regional conferences and at universities
- Transportation and infrastructure systems management
- Safety and risk analysis
Related transportation faculty: Dr. David Greene & Dr. Baoshan

- Technological and economic potential for fuel economy improvement
- Impacts of fuel economy policies
- Potential to mitigate greenhouse gas emissions from transportation
- Modeling energy transitions for transportation
- Estimating the costs of oil dependence

- Infrastructural Materials
- Pavement Engineering and Geotechnical Engineering
UT Center for Transportation Research

- 30 staff + many students
- ~$6 million expenditures/yr
- http://ctr.utk.edu/

Dr. David Clarke-Director CTR:
- Rail Track, Structures, and Operations
- Transportation Demand
- Transportation Safety
- Transportation Planning
- Freight Transportation Systems
- Network Modeling

Dr. Steve Richards-Director Southeastern Transportation Center (part of CTR):
- Accident Data Analysis
- Congestion Management
- Construction Zone Safety
- Pedestrian/Bicycle Facilities and Issues
- Railroad-Highway Grade Crossings
- Roadside Design, Traffic Models
- Truck Safety
Potential for collaboration with UT

• UT capabilities in transportation research include:
  • Safety, intelligent trans systems, sustainability, planning & operations
  • Modeling, simulation, and visualization of transportation systems
• Application of these capabilities to addressing transportation issues nationally and locally
• Faculty has national and international expertise...
Thank you!!

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