Transportation Research Board Midyear Meeting

Meeting Minutes

Committee on Traffic Flow Theory and Characteristics (AHB45)

10:30-12:00 pm, July 23, 2017

Evanston, IL

Chair: S. Ahn

Minutes prepared by: V. Gayah

Welcome and Call to Order

S. Ahn

Introductions – Members & Friends

S. Ahn

• 20 in attendance

TRB Report

R. Cunard

• TRB deadline in 8 days
• 2017 Annual Meeting
• 13,000+ attendees
• 6000+ papers submitted
• New policy: authors can submit an extended abstract in lieu of full paper to conference proceedings
• Online portal will be kept up to date for past 5 years, any years outside of the 5 year period will only be available in the compendium
• 2017+ TRRs will only be electronic (no paper version); because of this papers will be available earlier (available once a paper is edited); papers will be cited in the same way and there will be individual issues (records) just like always
• International access is an issue; international scholars generally do not have access to the TRR online (no subscription); a little more aggressive marketing to international audiences might help with revenue AND impact of TRR
• 2020 is 100th anniversary of TRB; there will be an extended celebration, TFTC might want to think of any activities that they would like to do for this
FHWA Report

- Project to develop connected and autonomous vehicle analysis framework forthcoming
- Allows modeling on strategic and technical level
- Second project will examine tactical level
- Guidance document to be published first quarter of 2018 to scope inputs/modeling efforts
- Traffic analysis toolbox Volume 3 to be published first quarter of 2018
  - Reliability concepts incorporated
- Other forthcoming guidance documents:
  - Data analytics
  - Reliability data
  - Post-deployment empirical analysis
  - How to calibrate models based on different roles

Chair Report

- 4 call for papers (CFPs) submitted for 2018 Annual Meeting
  - Crowd and pedestrian dynamics
  - Connected multimodal traffic systems
  - Multimodal traffic flow
  - Large-scale traffic network dynamics
- CFPs are due in mid-May; contact Sue if any ideas for future CFs
- Workshops at TRB
  - Data-driven simulation to support decision making in 21st century
  - Data collection, experiments, and instrumentation in connected MM transportation systems
  - Crowd and pedestrian modeling

TFTC Subcommittee Reports

SimSub
- Will need help with review of the Transportation System Simulation Manual (TSSM)

Crowd flow dynamics
- Workshop on topic at 2018 Annual Meeting
• Plans in place to write a book on the topic; will be discussed at both ISTTT and TRB workshop

**Connected Automated Vehicles**

S. Hamdar

- CFP for 2018 Annual Meeting on connectivity with both cars and across all modes
- Workshop at 2018 Annual Meeting
- Automated Vehicle Symposium (AVS) 2017
  - Report being prepared
  - 2016 AVS book chapter being published
- Traffic and Granular Flow 2017: Role of technology in traffic flow modeling
- Data exchange platform and expertise library are works in progress (see website tftcav.seas.gwu.edu)
- Subcommittee name will be adjusted to reflect multimodal nature of committee not just vehicles (Connected and Automated Traffic Flow Modeling)

**Greenshields Prize & Awards**

L. Leclercq

- Greenshields award:
  - Paper number 6081: Traffic state estimation with link-queue models
- Theoretical paper award:
  - Paper number 6294: Framework for deriving macroscopic demand function from microscopic models
- Recommendations made for TRB-wide paper awards; should hear back in early Fall
  - Cunard award
  - Mickle award
- L. Leclercq will step down and M. Menendez will chair committee after this year

**Outreach and Diversity**

A. Talebpour

- ISTTT paper webinars will continue
- Bi-monthly online journal club will be started soon geared toward students; survey expected soon to see what papers should be included
- Newsletter every 2 months or so *(please send news)*
• “Documentaries” to be created on pedestrian, vehicle and bicycle traffic to share state of knowledge and get new ideas

Midyear Meeting

S. Ahn

• 2018: to be held at Woods Hole in June or July
  o will last approximately 2 days with a 3rd day for a potential classical paper retreat
  o Organizing committee formed chaired by Christine Buisson; would like to add more international members to the organizing committee, contact Sue or Christine if interested

• 2019: in Lausanne, Switzerland in conjunction with ISTTT23

• 2020: looking for options

Liaison with Other Committees

• HCQS committee (AHB40)

• Midyear meeting in Minneapolis in June
  o Just released 6th edition of HCM
  o Includes SHRP2 LO8 methodology for reliability metrics
  o Focus: how does HCM stay relevant; what metrics are we using to validate HCM; sales of HCM dropped significantly
  o How can C/AVs be integrated
  o New Vol 4 is open access to anyone online; includes historical HCM versions and include supporting documents
  o 2018 summer meeting in July 2018 (late) in Austin

• Task force on System Simulations (AHB80T)
  o Transportation Systems Simulation Manual to be developed that addresses all aspects of simulation (using many existing sources and new material and putting it together)
  o Data requirements
  o How it is performed
  o Practical aspects faced by agencies
  o Targeting mid-late 2019 for completion

Adjourn