

TRANSPORTATION TECHNOLOGY COMMITTEE

Wednesday, January 30, 2019, 8:30 am Northern Virginia Transportation Authority 3040 Williams Drive, Suite 200 Fairfax, Virginia 22031

SUMMARY NOTES

I. Call to Order/Welcome

Chairman Snyder

- Chair Snyder called the meeting to order at 8:40 am.
- Attendees:
 - TTC Members: Chair David Snyder (City of Falls Church); Jim Kolb (Authority Member and Summit Strategies), Leonard Wolfenstein (Fairfax County); Bee Buergler (Arlington County); Robert Schneider (OmniRide); Kamal Suliman (VDOT); Andrew Meese (TPB/COG); Jana Lynott (AARP); Richard Mudge (Compass Technologies); Nicholas Zabriskie (Uber); Tim Melrose (EY); Myra Blanco (Virginia Tech).
 - NVTA Staff: Monica Backmon (Executive Director); Keith Jasper (Principal, Transportation Planning and Programming); Harun Rashid (Transportation Planner); Sree Nampoothiri (Transportation Planner); Michael Longhi (Chief Financial Officer); Peggy Teal (Asst. Finance Officer); Erica Hawksworth (Communications & Public Affairs Manager).
 - Other: Cheryl Lowrance (VHB); Sean Schweitzer (FCDOT); Ciara Williams (DRPT); Peggy Tadej (NVRC).

Agenda

II. Member Introductions/Purpose of TTC

- Each member briefly described their professional backgrounds/areas of expertise. Chair Snyder elaborated on Ms. Backmon's description of NVTA's background and history, and then invited Mr. Jasper to detail purpose, scope, and objectives.
- Mr. Jasper explained NVTA's planning and programming activities, and outlined three main topic areas for the Transportation Technology Committee (TTC):
 - o Supporting the NVTA's Five-Year Strategic Plan;
 - o Providing recommendations to consider in the development of the region's long-range transportation plan (TransAction); and
 - o Developing a body of knowledge to guide planning/programming in NVTA.

III. TransAction Recap and Innovation in NVTA

• Mr. Jasper highlighted major findings from the current version of TransAction. In his presentation, Mr. Jasper explained NVTA's planning and programming activities, with major NVTA-funded transportation technology projects highlighted, which included NVTA's recent funding application to initiate a regional multimodal mobility program. Ms. Backmon explained the legislative structure of NVTA, and how the TTC fits in the overall context of other committees. She also stressed that NVTA has always been proactive regarding upcoming technology trends.

IV. Key Topic Areas and Discussion

- Mr. Jasper highlighted the following areas of discussion for the TTC members:
 - NVTA's outreach/education goal in terms of transportation technologies and messaging;
 - o Technology-related policy areas to explore from regional perspective and how to highlight the positives of new technologies and mitigate the negatives;
 - o Technology investments to support NVTA's vision and goals What should NVTA consider? What are the benefits?
 - o Technology-related grant opportunities to consider pursuing;
 - o Technology topics and scenario planning for the next TransAction; and
 - o Any skill/expertise gaps that need to be addressed.
- Chair Snyder then invited each member to share their ideas and thoughts on these topics.
- In response to questions from Mr. Zabriskie and Ms. Lynott related to NVTA's mission, its project prioritization process, current performance measures, and rapidly-developing technologies and travel behaviors, NVTA staff explained the historical and legislative legacy of its current set of performance measures, and that because the TTC is the NVTA Executive Director's committee, it is not bound by existing NVTA legislative mandates, but the goal is to come up with new ideas/suggestions. Committee members then discussed the potential shortcomings of measures that may over-emphasize vehicular congestion, and may not fully account for a holistic picture of personal mobility and human services transportation issues.
- Ms. Lynott mentioned an FHWA technical grant opportunity for AV deployments.
- Given the unique opportunities and challenges that the Northern Virginia area faces, Chair Snyder asked What are current technology issues in Northern Virginia and what are the needs of the region? Ms. Blanco opined that the approach should be to not chase the technology, but to target problems to solve, with which the technology will be aligned. This committee should identify priorities and realistic goals for this region, e.g. transit, managed/tolled lanes, human service transportation and paratransit. On Connected and Autonomous Vehicle (CAV) technologies, members clarified the role and scope of such vehicles. Mr. Melrose suggested that this committee may consider to conduct surveys; to identify applicable case studies of successful transportation technology applications; to create an information base for the region that would list needs, issues, and gaps; and to prioritize technology solutions that can address local congestion and the most congestion-reducing outcomes.

- Mr. Zabriskie raised the following questions for discussion how do we focus on personal mobility based on economic incentives, how can we build choices and get people to places as quickly as possible, and how do we influence people's mode choice in the realm of shared mobility and mobility-as-a-service (MaaS)? Members discussed the need to eliminate the political and administrative barriers to create a seamless MaaS platform. In an integrated scenario, a traveler with a single smartphone app would be able to access multiple modes/services to fulfill all travel needs, without owning a car. NVTA can play a regional coordinator role to create such a platform. NVTA staff mentioned the proposed Regional Multimodal Mobility Program (RM3P) project has the potential to address this issue. Mr. Suliman emphasized that we should not chase the tech, but rather chase the problem.
- Ms. Blanco and Ms. Lynott highlighted how European systems are efficiently run by for-profit entities, and in the process, technology is intuitively implemented in transit services making these systems all the more attractive to travelers. At the same time, public sectors effectively regulate these systems, to ensure equitable distribution of benefits among all users. A successful transit system is also market-driven, and culturally ingrained in the society, with an effective public-private partnership. Mr. Schneider asked whether it is possible to have a flat rate commuter service via multiple modes using technology. He suggested letting the customer decide and give options.
- Mr. Mudge opined that as a regional body, we should consider accessibility, not just mobility. Committee members identified that accessibility to jobs and other quality-of-life aspects is also a consequence of land use decisions, although it is generally understood that land use issues are not in this committee's purview.
- Mr. Mudge suggested that private-sector economic incentive packages, tied with technological solutions, could address commuting issues. Many employers offer benefits to employees to eliminate single-occupancy-vehicle commute trips. Businesses can assess the labor force requirements for commuting, and government entities can plan solutions to address that, based on reasonable cost assessments. Travel time reliability is also a major issue, and members opined that MaaS has the potential to address this. During the conversation, it was suggested to talk to businesses and find out their needs, e.g. telecommuting, transit, carpooling, etc.
- Do we know all the unknowns? What roles do freight traffic and parking management play? How will the CAVs impact the overall mobility and accessibility of the population? Will all income and race groups be equally served? Mr. Meese pointed out that automated freight vehicles running overnight can ease up substantial roadway capacities during the peak periods, together with an effective curbside management policy in dense urban areas. He continued to suggest that an effective CBD parking policy can also reduce vehicle traffic; there are lessons to be learned from other parking policy implementations in the nation. Mr. Meese also asked whether NoVA will be safer because of technologies or more vulnerable, and how will communities be impacted and changed, e.g. jobs and people getting driven around when they can't drive.
- Any transportation solution needs to consider the rapid changes in demographics, and the resulting shifts in travel behavior - opined Ms. Lynott. For example, car ownership, and corresponding single-occupancy car trips are on the decline among

millennials. But on the flip side, an overall aging U.S. population may adversely impact transit ridership, since the Baby Boomer generation historically relies on car trips more than public transportation. These issues should be considered in the next TransAction planning process. It is important not to leave the aging population behind as new technologies are explored. Ms. Lynott also asked how we will maintain streets with freight, rideshares, scooters, automated vehicles, etc.

- Mr. Zabriskie suggested that there exist gaps among mass transportation options, even in dense urban areas in the region. New micro-mobility modes, like e-bikes and scooters, in addition to ride-hailing services, can fill these gaps. Public investments in transit need to be aligned with these private sector solutions, so that they do not compete with each other. Mr. Suliman highlighted VDOT's parking management policies and projects, and the need for effective curb-side management policies in urban areas. Most members identified that parking management is a major factor in urban transportation planning. Ms. Lynott suggested that demand-response paratransit services can be linked with private TNC companies for more cost efficiency. NVTA can play a regional coordinator role to achieve that.
- Committee members emphasized the importance of including a freight representative in the conversation. How is freight impacting livability? Also, how do we maintain streets with freight, ride-shares, scooters, bikes, AVs, etc. sharing the same space? There is a need to find space and parking solutions.
- To recap, how do we synthesize and articulate all these thoughts to derive actionable solutions? What role can the TTC and NVTA play? Some suggestions, include:
 - a. Committee members can draft a strategic plan identifying issues and realistic solutions;
 - NVTA can play advisory role in forming effective public-private partnerships –
 Ms. Blanco suggested looking at an organization called Partners for Automated
 Vehicle Education (PAVE), which educates the public on automated driving
 systems and debunks myths;
 - c. NVTA can act as a regional coordinator to create a seamless technological platform for an effective MaaS solution.
- Chair Snyder concluded the meeting by thanking everyone for a thoughtful discussion and invited committee members to present on topical items during future meetings. He validated the needs/purpose of this committee, recognizing all the members' expert insights and feedback, stressing that this group will not only foster intellectual discussions, but also offer realistic ideas and solutions to transportation issues impacting the region. He said we need to meet the needs that need to be met and the objective is to give people more options and more trips.

Adjournment