Summary of Transit and Public Mobility Activities at the 2014 Automated Vehicle Conference

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The Automated Vehicle Symposium (ARV) was hosted in San Francisco the week of July 14, organized by Transportation Research Board committees and in conjunction with the Association for Unmanned Vehicle Systems International (AUVSI). The conference consisted of plenary sessions with speakers from automobile manufacturers, tier one systems suppliers, Google, and leading research and thought leaders. While much of the conference was focused on vehicle automation for personally owned automobiles, a breakout session concentrated on the impact of vehicle automation for public transit and shared mobility. Organized by a team that includes several ATRA members, the session explored evolutionary and revolutionary pathways to leverage automation in public transportation. Eleven speakers shared perspectives and thought over the gamut, including the influence of current ride and vehicle sharing momentum, and how automated vehicles may intersect with that. Sam Lott noted that this year marks the 50th anniversary of the introduction of full automation in transit, and stressed that there are many lessons learned that are applicable to the vehicle automation world, and also advocating the transit is an excellent testbed for many automation concepts. Christer Lindstrom shared Stockholm’s interest in Automated Transit Networks to avoid any more ‘rubber on the roadways’ in their land constrained city with complex networking of islands. In fact ATN’s were mentioned in several contexts, including the USDOT’s research agenda. Vincent Valdez, Associate Administrator for FTA, initiated the breakout session advocating a concept termed ‘Mobility on Demand’, a public transit perspective the puts a premium on the person. That set the stage for thought provoking interaction with presenters and participants including Adriano Alessandrini, Rod Diridon, Neil Hose, Joseph Kopser, Christer Lindstrom, Sam Lott, Jerry Lutin, Brian O’Looney, Louis Sanders, Susan Shaheen, and Vincent Valdes. Presentations will be made available through the ARV conference web site, and conference proceedings are currently being compiled. Breakout session organizers included Dan Fagnant, Reuben Juster, Alain Kornhauser, Walt Kulyk, Scott LeVine, Rachel Liu, Shannon Sanders McDonald, Nazy Sobhi, and Stanley Young.

The week was capped by an ancillary workshop on Friday entitled ‘Envisioning Automated Vehicles within the Built Environment: 2020, 2035, 2050’. The workshop was targeted to staff from Metropolitan Planning Organizations, County Transportation Agencies, and other Regional Planners and therefore has a strong planning contingency. The workshop was a design charrette, examining various aspect of the built environment, and how they may be impacted (hopefully for the better) by anticipated proliferation of driverless vehicle technology in various forms. The mini-charrette held at the ATRA Technix conference in 2014 provided inspiration for hosting this larger event, attended by over 85 professionals from the Bay Area and drawing from the ARV symposium. Attendees broke into smaller groups, each addressing a specific concern or aspect, one even dedicated to ATN. Look for a summary of this workshop later in this edition (or possibly future edition) by Shannon McDonald, ATRA VP, and chair of the workshop. The workshop was organized by a team consisting of Shannon Sanders McDonald, Caroline Rodier, Kati Rubinyi, Ramses Madou, Marco Anderson, Reuben M. Juster, Dimitris Milakis, Susan Shaheen, Ray Traynor AND sponsored by a number of organization, among which were ATRA and University of Maryland Center for Advance Transportation Technology (an ATRA Academic Council member).

Lastly, while at the workshop Alain Kornhauser (ATRA Chairman) announced the Princeton Research Center at Fort Monmouth that will be dedicated to driverless vehicle technology to support transit and public mobility. This differs from Google and Detroit research centers which primarily focus on driverless technology for personal vehicles.

Plans are in place for ARV 2015, which is rumored to be held near DC to afford convenient access to demonstrate capability to Congress and other branches of the US Government.