

UTC Project Information	
Project Title	MPC-608 – The Impact of the Mobility as a Service Mode on Transit Access
University	University of Utah
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Funding Source(s) and Amounts Provided (by each agency or organization)	USDOT, Office of the Assistant Secretary for Research and Technology \$40,000 Utah Department of Transportation \$50,000
Total Project Cost	\$90,000
Agency ID or Contract Number	69A3551747108
Start and End Dates	February 18, 2020 to July 31, 2022
Brief Description of Research Project	The objective of this project is to estimate the effect of the combined AV-MaaS technology, as a first mile-last mile mode, on future transit ridership and, as a consequence, on VMT. As noted by the existing practice, having Mobility as a Service (MaaS) travel mode has impacted the transportation industry in recent years and this impact (mode share) is expected to grow significantly in future. It is expected the introduction of Connected or/and Autonomous Vehicles (CAV) will boom the MaaS mode by lowering the cost of the mode through elimination of driver’s cost for “as-service” providers (e.g. Uber and Lyft).
Describe Implementation of Research Outcomes (or why not implemented)	Modeling Mobility as a Service as an access mode to transit involves seven steps detailed in this research. The pipeline provides a solid foundation for including MaaS as an access mode to transit.
Place Any Photos Here	This work aimed to reconstruct and understand the spatio-temporal patterns of microtransit activity in portions of Salt Lake City, Utah. The framework is generalizable and can provide additional insights for UTA Via as it grows or inspires applications to pilot programs in other cities.
Impacts/Benefits of Implementation (actual, not anticipated)	By understanding the patterns and possible causal factors for microtransit network development, use, and underlying spatio-temporal patterns, one can enhance the transferability of microtransit programs without additional cost. Furthermore, spatio-temporal structures of microtransit usage reveal that the usage is uneven. Understanding these structures of microtransit activity can help with possible customer segmentation and vehicle dispatching for all microtransit programs.

	<p>Lastly, by comparing results between pre- and post-COVID periods, it is possible to inform transit agencies on people's behavioral changes and the evolution of their travel patterns to guide operational strategy adjustments further.</p>
<p>Web Links</p> <ul style="list-style-type: none">• Reports• Project Website	<ul style="list-style-type: none">• MPC Research Report – Impact of Mobility as a Service on Transit Access• Journal Article – Unravel the Impact of COVID-19 on the Spatio-Temporal Mobility Patterns of Microtransit