

| <b>UTC Project Information</b>  |  |
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| Project Title   | MOBILITY-ON-DEMAND TRANSIT FOR SMART, SUSTAINABLE CITIES (Project D4)  |
| University  | Team: University of Florida, University of North Carolina at Chapel Hill, University of Alabama at Birmingham, Florida International University, Auburn, and Ford Motor Company  |
| Principal Investigator  | Xilei Zhao, Ph.D., University of Florida   |
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| Funding Source(s) and Amounts Provided (by each agency or organization) | STRIDE: \$413,430  |
| Total Project Cost  | \$413,430  |
| Agency ID or Contract Number  | 69A3551747104  |
| Start and End Dates   | September 1, 2020 to August 31, 2021   |
| Brief Description of Research Project                                   | <p>The popularity of shared mobility services such as ridehailing and micromobility has triggered the development of Mobility-on-Demand (MOD) initiatives by transportation agencies at the federal, state, and local levels. Integration of these services with more conventional transit services is key to the success of the MOD initiatives, but gaps in knowledge exist in their spatiotemporal usage patterns, how they shape individual travel behavior and attitudes, and under what conditions these new mobility options can be effectively integrated into the existing transit network. To fill these gaps, the team of researchers will leverage big data analytics to analyze scooter trip characteristics and apply machine learning to predict scooter use across different neighborhoods in Washington, D.C. and Gainesville, FL. They will also conduct a four-city (Gainesville, FL; Miami, FL; Birmingham, AL; and Auburn, AL) stated preference survey to investigate traveler preferences for MOD transit systems. It is expected that the results will inform the design of MOD transit systems and contribute to building smart, sustainable, and equitable cities in the Southeastern U.S. More specifically, the following will be created: Predictive models (and the accompanying software codes); MOD transit simulator; Individual behavioral insights derived from survey results; Policy recommendations for transit and health agencies.</p> |

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| Describe Implementation of Research Outcomes (or why not implemented)<br><br>Place Any Photos Here | Not available. Research is in progress.   |
| Impacts/Benefits of Implementation (actual, not anticipated)                                       | Not available. Research is in progress.   |
| Web Links <ul style="list-style-type: none"><li>• Reports</li><li>• Project website</li></ul>      | <a href="https://stride.ce.ufl.edu/stride-project-d4/">https://stride.ce.ufl.edu/stride-project-d4/</a> |