

Grant Deliverables and Reporting Requirements for UTC Grants

| UTC Project Information | |
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| Project Title | The effects of land-use policy on commuting distance and road related adverse health outcomes |
| University | Cornell University |
| Principal Investigator | H. Oliver Gao |
| PI Contact Information | hg55@cornell.edu 607-254-8334 |
| Funding Source(s) and Amounts Provided (by each agency or organization) | USDOT: \$44,907 Cornell: \$12,888 |
| Total Project Cost | \$57,795 |
| Agency ID or Contract Number | Sponsor Source: Federal Government CFDA #: 20.701 Agreement ID: 69A3551747119 |
| Start and End Dates | Start date: 01/01/2019 End date: 12/31/2019 |
| Brief Description of Research Project | <p>Research shows the use of roadway networks generate health risks thus, the amount of time people use these networks has direct implications for public health. Our research hypothesizes a credible link exists between commuting distance, land use policy, and health outcomes. To date, the primary means of investigating commuting distance has been regarding socio-economic status and the primary means of investigating land use policy has been regarding changes in travel behavior. In both cases researchers have neglected the domain of public health linking to structural policy factors. Our research advances this topic by hypothesizing that minimum lot size policy directly affects commuting distance which, in turn, increases exposure to road related adverse health outcomes. We use econometric analysis on county/city level data to estimate the effects of commuting distance on emissions, accident rates, and cardiovascular disease, as well as, the effects of minimum lot size on work-trip length.</p> |

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| <p>Describe Implementation of Research Outcomes (or why not implemented)</p> <p>Place Any Photos Here</p> | |
| <p>Impacts/Benefits of Implementation (actual, not anticipated)</p> | <p>Expected results implicate land-use policy as a key driver of public health by not only exposing the public to unnecessary health risks but also creating these system dynamics as well. State and metropolitan areas can take immediate action to decrease road related health risks by altering current land use policy to allow for smaller minimum lot sizes. Future policy should seek to incentivize spatial work-home nearness to further benefit public health.</p> |
| <p>Web Links</p> <ul style="list-style-type: none"> • Reports • Project website | <p>http://ctech.cee.cornell.edu/final-project-reports/</p> |