

Research at a Glance

Technical Brief

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Transit Usage Impacts of NJ Transit-Oriented Developments (TODS)

This research aimed to better understand the relationships between (a) Transit-Oriented Development (TOD)—concentrated real estate development around transit facilities—and the travel behaviors of those who live near those facilities, and (b) TOD characteristics and its appeal to customers of retail establishments within TODs. Additionally, the study examined both of these areas to assess the impacts of the COVID-19 pandemic and to understand transit usage and motivations before, during, and after the pandemic.

Research Problem Statement

TOD clusters dense, mixed-use development around transportation hubs, such as train stations, major bus terminals, or light rail stops, to promote public transit use and pedestrian access. By focusing growth around these hubs, municipalities can leverage public investment, boost local economic activity, and create safer, more sustainable communities. While TODs are generally believed to increase transit ridership, the net impact in New Jersey remains unclear. NJ TRANSIT sought to better understand TOD residents' transit usage and motivations over time, examining trip patterns before and after the COVID-19 pandemic. This research surveyed TOD residents and potential TOD retail customers to assess how TOD characteristics influence transit ridership, the use of nonmotorized modes, and local shopping behavior.

Research Objectives

The study aimed to examine the relationship between TOD characteristics (e.g., location, density, unit types) and residents' transit use as well as use of nonmotorized modes (walking, cycling, using a scooter, etc.). The research also examined TOD's relationship with local shopping behavior and changes in behavior during and after the COVID-19 pandemic.

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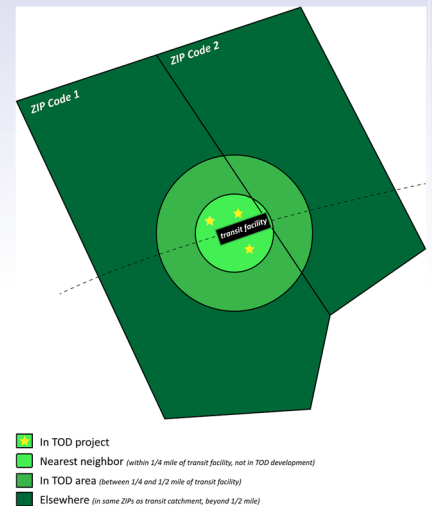
Postcard used to solicit responses to the online survey. The research team designed unique postcards for each of the six study areas using local images. Pleasantville mural depicted in left image is by the artist Kelley Prevard and used with permission.

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Methodology

The research used a mixed-methods approach, combining quantitative survey data and qualitative focus groups to provide an understanding of TOD impacts on mode choice, local shopping behavior, and other outcomes of interest. Methodologies included: a literature review of TOD effectiveness in increasing transit ridership, reducing vehicle miles traveled (VMT), and fostering mixed-use environments; an online survey that gathered responses from 341 New Jersey residents in TODs or near transit hubs, covering demographics, relocation motivations, mode use for various trips, and parking availability; and focus groups at six New Jersey transit hubs, which offered qualitative insights into residents' experiences, motivations, and challenges with TOD living. The study's sample comprised four groups: (a) individuals who moved into a TOD project within 0.25 miles of the primary transit node, (b) their nearest neighbors who do not live in a TOD project, (c) residents slightly further out (between 0.25 and 0.50 miles of the transit node), and those further out (beyond 0.5 miles but within the same ZIP code). Analysis spanned four time periods: before the move to the TOD area, post-move but pre-COVID, during COVID, and after COVID.



*Geographic overview of research design;
four locations visualized*

Results

TODs promote transit use and non-motorized travel, though high-income residents frequently maintained automobile ownership and use. Focus groups revealed that TOD residents appreciate multiple characteristics and benefits, including the convenience of transit access, walkable amenities, and a sense of community. They expressed TOD shortcomings, including concerns over transit reliability, security, and local shopping limitations, particularly for heavier loads. COVID-19 altered transit dependency, with many shifting to remote work while continuing to find TODs appealing in providing access to transit for occasional commuting and other trips. Quantitative findings show that transit proximity by itself has a limited direct impact on transit use, while additional factors such as parking constraints and income levels significantly influence mode choice. Key recommendations include unbundling parking costs from rent, expanding affordable housing in TODs to diversify resident demographics, and conducting community outreach to address security and transit service needs. These measures aim to reinforce sustainability and accessibility of TODs, fostering transit-oriented communities that support diverse resident needs across New Jersey.

