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Transit-Oriented Development in the Chicago Region

Efficient and Resilient Communities for the 21st Century

PREPARED BY
THE CENTER FOR NEIGHBORHOOD TECHNOLOGY
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COVER: METRA HEADING NORTHWEST FROM CHICAGO Photo Credit: Jim Watkins (Flickr user phototravell/Jim Watkins)

Executive Summary

Transit-Oriented Development in the Chicago Region, 2000-2010

Mixed-use centers anchored by public transit are essential to the triple bottom line, or the economic, environmental, and social sustainability of the Chicago Region. With the publication of GO TO 2040 in 2010, the Chicago Metropolitan Agency for Planning (CMAP) put forth a vision to grow the transit-oriented development (TOD) areas of the Region and make them communities of choice. In 2012 the Center for Neighborhood Technology (CNT) built on this vision with the publication of Prospering In Place, which honored GO TO 2040 for its commitment to reconnect land use, transportation, and the economy, and recommended the locations in the Chicago Region that had the best prospects for growth and hence warranted priority access to public and private resources. Prospering in Place was also a cautionary story of how a blueprint alone, without a place-based framework for development, will not reverse the Region's undesirable trend toward sprawl and disinvestment. This report builds on that story, melding those lessons learned with our new understanding of Regional trends to yield a set of recommendations to optimize the promise of Chicago's historically magnetic transit zones.

Between 2000 and 2010, four of the nation's five metropolitan regions with extensive rail transit systems (those with 325 or more stations)—New York, Philadelphia, Boston, and San Francisco—achieved growth and development within their transit zone, or the land area within one half-mile of their fixed passenger rail stations. Only Chicago, the fifth region in this extensive system cohort, saw a decline in development around transit relative to growth in the broader region. During the last decade in the Chicago Region, a household's typical transportation costs, one of a household's two largest expenses, rose at a faster rate than median household incomes. As a result, Chicago Region residents are paying higher transportation costs and experiencing reduced access to jobs. This report compares development in the areas around the Chicago Region's passenger rail transit stations to that of the Chicago Region as a whole, as well as to its four peer regions with extensive rail systems on several TOD performance metrics, including household growth, vehicle miles traveled (VMT), and jobs. We are conducting this comparison to illustrate how Chicago compares with national trends and then delving



CHICAGO SKYLINE
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Chicago Region transportation costs rose faster than incomes

into the causes of any shortcomings in order to make policy recommendations. These recommendations seek to get the Region on track towards maximizing the return on public investment in transit and creating a ripple of benefits for the communities that it serves.

Changes in TOD demographics and development patterns from 2000 to 2010 were not the same throughout the Chicago Region. The differences are often explained by the characteristics of each transit station area. Using the National TOD Database, ¹ Transit-Oriented Development in the Chicago Region: Efficient and Resilient Communities for the 21st Century evaluates the dynamics of each of the Region's 367 CTA and Metra stations and identifies those transit zones that are performing well: anchoring vital, walkable communities that possess an affordable, high quality of life with minimal impact on the environment.

Transit zones that have performed well are the first step in pointing us in the right direction. They teach us the importance of setting policies and priorities that will grow our economy by connecting people to jobs and strengthening our communities through spatial efficiency. Understanding the challenges of transit zones with flawed development patterns is yet another step. This report quantifies and qualifies the performance of TOD in the Chicago Region in order to establish our strengths and weaknesses in optimizing the tremendous transit assets that we have.

Our examination recommended that the Chicago Region needs to make these fundamental commitments:

- **1. Create TOD zones.** A transit zone is an area defined by a half-mile radius around a fixed rail station. Many of the barriers to TOD are embedded in the land use policies of local governments, and are further complicated by regional, state, and federal policies. Creating TOD zones helps eliminate barriers to development.
- **2. Preserve affordable housing.** To realize the full regional benefits of quality transit and TOD, mixed-income housing must be preserved and expanded in TOD zones. This may be accomplished through a combination of policies that prioritize housing assistance to TOD communities and enforce existing state requirements for affordable housing in all communities.
- 3. Match jobs and transit. Many limitations of metropolitan Chicago's transit system—as well as high transportation costs, traffic congestion, and air pollution—stem from job centers moving away from mixed-income neighborhoods. A more efficient and healthier pattern may be established through systematic efforts to expand transit services to job centers, site new employers in existing transit-served communities, and promote incentives to commute through transit, biking, or walking.
- **4. Provide alternatives to car ownership.** Even dedicated transit users often are forced to buy cars to meet transportation needs that transit cannot efficiently fill. To provide alternatives to car ownership, the Region should support the growth of carsharing services, build more extensive bicycle infrastructure, and establish more pedestrian-friendly streetscapes.
- **5. Prioritize TOD across agencies.** While public agencies can set favorable conditions for TOD, public investments of more than \$1 billion are needed through 2040 to remove impediments to redevelopment and attract the much larger private investments that will build the mixed-income housing, mixed-use buildings, and functioning businesses that constitute TODs.² Coordinated priorities and investments among a range of public agencies are needed to generate these effective public investments.

By taking these actions, transit and transit-oriented development can become the pillars of the Chicago Region's economic development strategy over the next decade, improving the Region's competitiveness and making it a better place to live and work.

WHY DOES TOD MATTER?

Benefits of TOD

The benefits of TOD are many. Individuals, communities, local governments, and businesses in the Chicago Region all receive value from TOD. The Center for Transit-Oriented Development (CTOD) describes some of the benefits of well-designed TOD as follows:

- Reduced household driving and thus lowered regional congestion, air pollution, and greenhouse gas emissions
- 2. **Walkable communities** that accommodate more healthy and active lifestyles
- 3. **Increased transit ridership for trips to work** and fare revenue
- Potential for added value created through increased and/ or sustained property values where transit investments have occurred
- 5. Improved **access to jobs** and economic opportunity for low-income people and working families
- Expanded mobility choices that reduce dependence on the automobile, reduce transportation costs, and free up household income for other purposes³

These benefits convey the potential of TOD. Transit-Oriented Development in the Chicago Region: Efficient and Resilient Communities for the 21st Century compares this potential with the reality of TOD development in the Region. It tracks the performance of the Region's 367st fixed Metra and Chicago Transit Authority (CTA) rail stations and station areas that were operating from 2000 to 2010. It asks whether these zones are attracting households more successfully than the Region as a whole and whether residents near transit take full advantage of this transportation asset.

Introduction

What is Transit-Oriented Development?

The concept of TOD was defined by planners in the 1980s who sought to develop communities with mixed land uses, dense residential development, and high-quality pedestrian connections. According to the Center for Transit-Oriented Development (CTOD), "Transit-oriented development, or TOD, is a type of community development that includes a mixture of housing, office, retail and/or other commercial development and amenities integrated into a walkable neighborhood and located within a half-mile of quality public transportation." TOD's mix of residential, retail, office, open space, and public land uses in a walkable environment make it convenient for residents and employees to travel by transit, bicycle, foot, or car. This dense mix of uses is designed to attract residents, workers, and visitors.

TOD is not only about proximity to transit; the Regional Transportation Authority (RTA) defines TOD as "Moderate to high density, mixed use communities generally located within a half-mile radius (10 minute walk) of a rail or bus station designed to maximize walkability and transit access."

CNT estimates that in 2012 typical annual car ownership per vehicle in the Chicago Region cost \$8,946,6 as compared with transit costs of \$1,032, a difference of \$7,914. The benefits of transit use also include an increased quality of life,7 enhanced social capital, and a healthier environment, to name a few. TOD is the product of intelligent urban design and growth; it is an antidote to traffic congestion, a reversal of suburban sprawl, and a tool to reverse inner city blight.

TOD is characterized, in part, by its dense and compact nature. TOD includes a mix of housing, retail, and institutional and other land uses that are near each other so that people can walk, bike, or easily reach them by transit. TOD locates destinations within easy and affordable access at a fraction of the cost of using an automobile.

TOD In The Region

The Chicago Region has been concentrating its development around transportation since the 1850s; first there were horse-drawn trolleys, then street cars and then rapid transit and buses. Chicago's development has always been oriented around transit. One of Chicago's first elevated rail lines, the Lake Street "L," was constructed in 1894 by developers intent on drawing residents to their Garfield Park development. "L" stations became the anchors of neighborhood shopping districts, providing a predictable, steady stream of customers. Developers located multi-family buildings near "L" stops, giving their tenants ready access to jobs. The "L" was the mobility backbone of Chicago.

With the end of World War II, the United States embarked on a prolonged love affair with the car, constructing an interstate highway system to speed up the commute between the city and the suburbs. Auto ownership skyrocketed—and transit systems were allowed to deteriorate. By 1958, Chicago's extensive streetcar system had been dismantled in favor of buses, but the rail system, fortunately, continued to move tens of thousands of Chicagoans every day.

Thirty years ago, the City of Chicago announced its intention to tear down the Lake Street elevated "L" train line. The response to this plan was a watershed for transit in the Chicago Region. Residents of Chicago's West Side and Oak Park came together to fight for the preservation of the "L." Bethel New Life and the Center for Neighborhood Technology created Chicago's first Transit-Oriented Development Plan for the Pulaski "L" Stop to demonstrate what the transit-centered revitalization of that neighborhood could accomplish.

Transit is valued throughout the Chicago Region. A recent study conducted by the real estate agency RE/MAX found that Chicago suburbs with Metra train service saw home prices rebound by 2012 at greater rates than the suburbs as a whole. The study also found that the decline in home sales for suburbs with Metra service was smaller than in the suburbs as a whole. TOD in the Region has thrived even in the housing market downturn. Suburban developers have

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90/94 EXPRESSWAY
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reported that suburban infill development near Metra stations has been a successful building pattern because people want to live near transit. While transit has been an asset, the expansion of the Chicago Region has disconnected transportation, land use and economy from one another. Suburban sprawl has complicated the role that transit service plays in our daily routines. The RTA understands this complexity and believes that TOD is an effective strategy to address the growing divide in population, employment, recreation and home.

The RTA is committed to providing a public transportation system that protects the environment and supports the livability and economic vitality of the Region. The RTA has demonstrated that commitment, in part, by its extensive TOD initiatives throughout the Region, including:

The Regional TOD Working Group was formed by the RTA in June 2008 to provide a forum for regional government and nonprofit agencies to discuss and coordinate numerous TOD initiatives underway in the Region. The Working Group meets quarterly, with its primary focus on TOD implementation strategies and efforts, and a secondary focus on planning efforts. Strategies and initiatives developed by the Working Group guide the RTA's work plan related to TOD.

Setting the Stage for Transit Guide. Local communities can be proactive in creating an environment conducive to transit through transit supportive planning and by channeling local financial investments into transit service. To be more competitive for increased transit service, communities are encouraged to plan for transit by supporting development that has sufficient densities, mix of land uses, and available land for transit facilities. The RTA created the *Setting the Stage for Transit* guide as a resource for municipal officials looking to make their communities more transit-friendly.

TOD Value Capture. The RTA created Tools and Techniques for Facilitating Effective TOD Value Capture – A White Paper, which identifies best practices of transit agencies from around the country that have sought to capture enhanced land values resulting from transit service and leverage it for investment in the transit system.

Policies. The RTA Board of Directors adopted a Housing and Jobs Policy as an amendment to the RTA's Strategic Plan in September 2009, and a Transit-Oriented Development (TOD) Policy in November 2010. These policies address improving the spatial disconnect between job centers and housing in the Region by advancing TOD to provide mixed-use development and mixed-income housing near transit centers. The goals of the policies have been incorporated into the Community Planning Program's evaluation criteria.

Streamlining the Entitlement Process for TOD. The RTA created a best practices report that outlines ways to streamline the entitlement (or approval process) for TOD projects. This document can be used by communities as a guide to explore ways to adjust and reduce the submittal and review requirements for development proposals.

TOD Funding Sources. The RTA provides a list of available funding sources to help implement TOD, the *Municipal Funding Opportunities for Transit-Oriented Development*, which includes local, regional, state, federal, and private foundation sources which is updated twice a year.

TOD Parking and Access Report. The RTA created Access and Parking Strategies for Transit-Oriented Development as a resource for municipal officials looking for innovative strategies to support multi-modal access to their transit station and the surrounding TOD area. While providing parking options in these areas is important, this guide focuses first on assessing multi-modal access strategies as a whole and placing a priority on pedestrian, bicycle and transit access. The RTA has also produced an associated PowerPoint for municipal staff to utilize in explaining the principles of the Access and Parking Strategies

Report. The PowerPoint concisely summarizes the main points of the report and provides talking points for the presenter.

TOD: The Future of Development. The RTA created a brochure promoting the importance of transit-oriented development. The brochure describes TOD's target demographics and positive effect on housing, retail, office and restaurant markets, and developer testimonials on the increased interest in TOD.

Zoning and TOD. The RTA created *Zoning and Transit-Oriented Development: A Best Practices Report* outlining the most common types of zoning ordinances and the best practices of each as related to TOD. This document can be used as a guide for communities to help further implement TOD by incorporating transit-supportive zoning regulations and standards in their transit area.

RTAMS Transit-Oriented Development Map Viewer, an interactive online tool that maps the development of ongoing and completed RTA TOD Studies.

TOD helps to maximize the use of the existing transit system and increase ridership for trips to work. TOD should encourage growth in corridors that connect vibrant and interconnected centers, discourage sprawl, and reduce the cost of new infrastructure. The Region's rich TOD legacy can be the basis for future development.



Performance Measures

Development in the Chicago transit shed (the half-mile radius around all of the Region's train stations) has not performed as well over the last ten years as transit sheds in peer regions. If the Chicago Region had robust regional transit-oriented development, we would see the transit shed compared with the Region as a whole characterized by:

Increased number of households living in transit zones;

Lower transportation costs and Vehicle Miles Traveled (VMT); and

Increased employment opportunities.

The reality, however, has been very different:

The Chicago transit shed lost households from 2000 to 2010;

The Chicago transit shed did indeed have lower household VMT than the regional average, but over the past decade household VMT rose in all parts of the Region, including near transit; and

Though all areas lost jobs in the past decade due to the nationwide economic decline, the Chicago transit shed lost jobs at a rate almost three times faster than regional losses.

In order to evaluate the performance of the Metra and CTA stations in the Chicago Region and find ways to improve their performance going forward, this study analyzes these trends and others to determine how well Chicago's TODs provide economic vitality, sustainability, and equity, as well as location efficiency. Compact neighborhoods with walkable streets, access to transit, and a wide variety of stores and services have high location efficiency. These features represent TOD best practices because they require less time, money, and greenhouse gas emissions for residents to meet their everyday travel requirements.

METRA UNION STATION ENTRANCE
Photo Credit: Flickr User Mike Miley, CC license

Methodology

Evaluating TOD Performance in the Chicago Regions

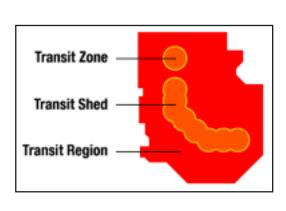
This report uses data from three different geographies:

Transit Zone is the half-mile buffer around each transit station. One half-mile (radius) is widely considered a walkable distance to a fixed guideway (rail) transit station. The TOD Database allows the user to query transit zones for existing stations, potential stations, and both in tandem.

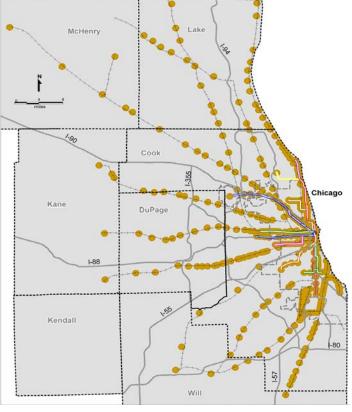
Transit Shed is a group of transit zones. It can be made up of selected stations, an entire line, an entire agency, or all stations in the transit region. An important feature of transit shed statistics is that when two transit zones overlap, the transit shed does not double count the data. Transit shed data are available for both existing and potential stations and a combination of the two. For the purpose of this report, the transit shed has been defined as 367 Metra and Chicago Transit Authority (CTA) stations, the number of stations that were in operation in 2010 that were also in operation in the year 2000. Comparisons of 2000 data with 2010 data in this report are based on these 367 stations.

Transit Regions (hereafter referred to as regions) are comprised of a number of counties, typically those that contain the majority of the region's transit system. Using counties

allows for more consistency when aggregating data with different geographical bases (e.g. TIGER 2000, TIGER 2009, TIGER 2010, etc.). For the purposes of this report, the Chicago Transit Region has been defined as the six Northeastern Illinois counties (Cook, DuPage, Kane, Lake, McHenry, and Will) that encompass the RTA service area. These six counties contain all of the fixed guideway stations in the Metra and CTA system. When data is represented for comparison across regions, the Chicago Region is defined by a larger region that also includes DeKalb, Grundy and Kendall counties. These additional three counties are not included in Chicago's transit shed for this study and are excluded from Region to transit shed comparisons. This yields a slight variation in the Chicago data when looking at it on a regional level (Region versus transit shed) as compared to national peers (Chicago Region and transit shed versus that of other regions).



THE CHICAGO REGION TRANSIT SHED IS COMPOSED OF 367 STATIONS THAT SPAN ACROSS SIX ILLINOIS COUNTIES.



This report also compares the Chicago Region with the four peer US regions with extensive transit systems—New York City, Philadelphia, Boston, and San Francisco. CNT defines transit systems by the number of stations as follows:

Extensive: 325 - 951 stations

Large: 72 - 151 stations

Medium: 25 - 67 stations

Small: fewer than 25 stations

Chicago and its peer regions all have more than 325 stations and are referred to as "extensive systems" throughout this report.

Percentage Change versus Change in Percentage Points

In this report, change is presented in three ways: as absolute change, percentage change, and change in percentage points. Percentage should be thought of as the size of a slice of the pie. It is appropriate to use percentage points when the data compared between 2000 and 2010 is already a percentage. This is the case for Housing and Transportation (H+T*) Affordability Index data and for transit mode share (i.e. percentage of population who use public transportation for trips to work).



National TOD Database and the US Census Data

The Center for Transit-Oriented Development's (CTOD) TOD Database provides data on every existing and proposed fixed guideway transit station area in the United States (as of October 2011). It has nearly 70,000 data characteristics for 4,416 existing stations and 1,583 proposed stations in 54 metros, for the households and housing units within a walkable one half-mile and one quarter-mile radius transit zone of each station. Data in this report from the National TOD Database are derived the following US Census data sources:

US Decennial Census 2000

Summary File 1 Summary File 3

US Decennial Census 2010

Summary File 1

American Community Survey (ACS), 2005-09 Five-Year Estimates (a proxy for 2010 data)

ACS is an ongoing survey that gathers detailed population and housing data every year. It replaced the long form of the Census. The 5-Year Estimates are rolling averages of data collected between 2005 and 2009. ACS data is aggregated from block groups and tracts. This data serves as a proxy for the 2010 decennial Census data until it becomes available.

Local Employment Dynamics, 2002-2009

LED is a voluntary partnership between the Federal Census Bureau and state labor market information agencies. The employment (jobs) data comes from this source.

More information on these data sources and how they inform the National TOD database can be found at http://toddata.cnt.org.

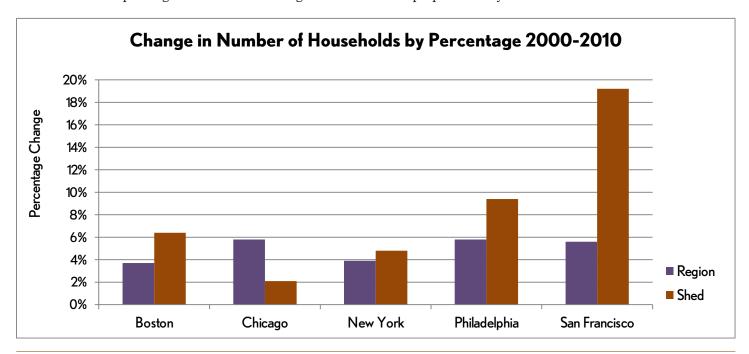
NORTHSIDE CHICAGO
NEIGHBORHOOD
Photo Credit: Clint Bautz

Analysis

Household Growth Not Keeping Up in Transit Zones

Household Changes

The rate of growth in the number of households was greater in the entire Chicago Region than in Chicago's transit shed. This contrasts with our peer regions where household growth occurred disproportionately around transit stations.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.
Source: National TOD Database: http://toddata.cnt.org

Urban sprawl has continued to be the dominant development pattern in the Chicago Region, with households increasingly dispersed around the Region and a growing proportion of the Region's households living more than a half-mile from a transit station. Between 2000 and 2010, the number of households in the Chicago Region increased 5.8 percent, while households in the transit shed increased just 2.1 percent. Though households increased in number, Chicago's Transit shed lost population—an effect explained in part by shrinking average household sizes.

Part of the lower rate of household growth can be attributed to the Chicago Housing Authority's Plan for Transformation that eliminated 18,366 units in the City of Chicago. Fifteen thousand and forty-nine of these eliminated housing units were located within a half-mile of a CTA or Metra station. More than one-third of these housing units (5,703) were occupied. Considering that the transit shed added just over 9,000 households over the study period, this loss of nearly 6,000 households significantly affected the housing stock growth rate.

A greater proportion of people in the Chicago Region are living more than a half-mile from transit stations, making urban sprawl the dominant development pattern in the Region.

	October 1999		December 2010		0
	Total CHA Units*	Occupied CHA Units	Total CHA Units*	Occupied CHA Units	Total CHA Residents (individuals)
CHA units located within one half- mile of a CTA or Metra station	26,611	15,552	11,562	9,849	16,194
CHA units NOT located within one half-mile of a CTA or Metra station	13,566	10,011	10,249	6,135	13,757
GRAND TOTAL	40,177	25,563	21,811	15,984	29,951

*INCLUDES OFFLINE UNITS THAT ARE OFFLINE LONG-TERM OR SLATED FOR DEMOLITION
Source: Chicago Housing Authority 2012

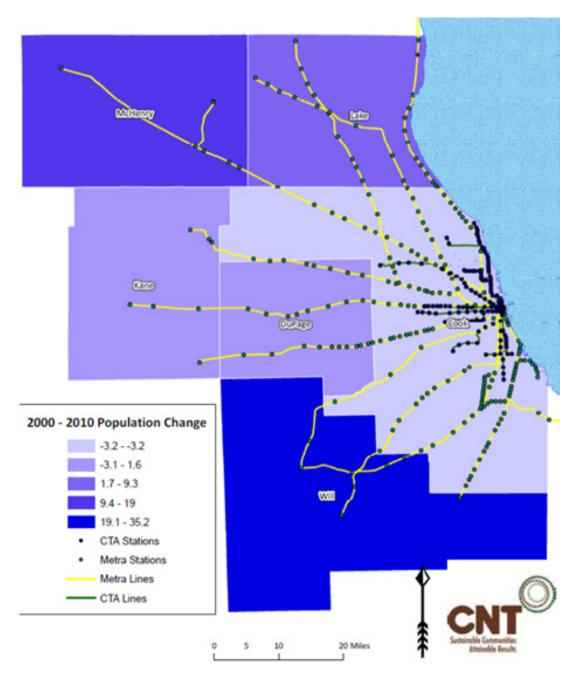
Downtown Chicago gained population, but on a county-wide basis the highest population growth rates in the Region occurred in the collar counties: Will, Lake, Kane, and McHenry. By 2012, the Chicago Region's transit assets, however, are concentrated elsewhere: 306 of 384 (80 percent) of the Region's CTA and Metra train stations are located in Cook County. The Region's strongest population growth

is occurring beyond the reach of the rail transit system. The reality is that today our transit system can no longer directly serve much of its population. This challenge is addressed by RTA initiatives; their report *Setting the Stage for Transit* encourages the development of transit supportive communities that make strategic land use investments and set planning goals that connect people with transit.



CABRINI GREEN, 2008 Photo Credit: Flickr User TheeErin, CC License

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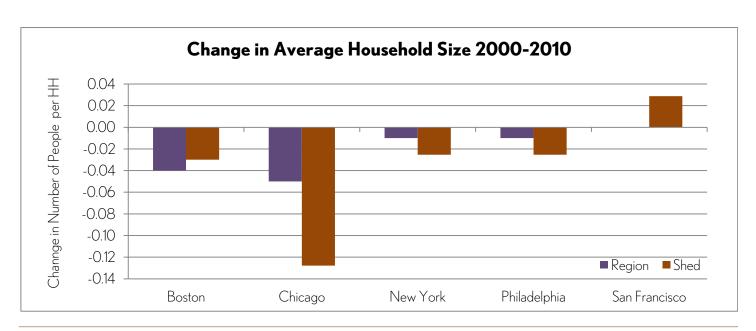


POPULATION GROWTH OUTSIDE OF COOK COUNTY

While Chicago's Loop—a portion of Cook County—saw significant growth in population, Cook County as a whole saw a loss of 3.4%. With much of the population and household growth happening in counties that hold only 20% of the Region's rail stations, expanded TOD in these collar counties offers opportunities to increase transit connectivity to the rest of the Region.

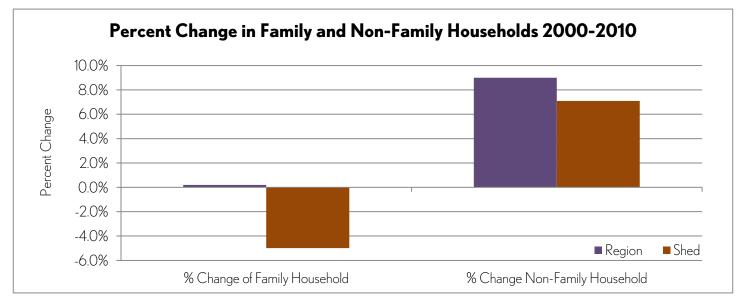
Average household size (average population per household) between 2000 and 2010 decreased throughout the Chicago Region by about two percent while average household size in the transit shed decreased over five percent. This indicates that the households near transit are increasingly single individuals, couples without children living at home, and other small family types. This may be because many TOD

developments have featured small one- and two-bedroom condos marketed to empty nesters and young professionals. Going forward, it is important to ensure the Chicago Region is enabling a wide range of household types to access the benefits of living near transit for reasons of both economic equity and Regional competitiveness.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.

Source: National TOD Database: http://toddata.cnt.org



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.

Source: National TOD Database: http://toddata.cnt.org

Chicago's decrease in average household size far surpassed that of all of its peer regions. Throughout the nation, there has been a significant rise in single-person households, particularly in transit zones, which lowers the average household size. In 1950, nine percent of Americans lived alone; today that figure is 14 percent. Changing social structures and financial prosperity have made it possible for

people to live alone at rates that were not possible in earlier times. Those small households are choosing to live near transit. It is important to the Region's future that families of all sizes be able to access the benefits of living near transit, so future TOD planning and incentives should continue to promote development of larger homes and affordable housing to balance out the trends of the past decade.¹⁰

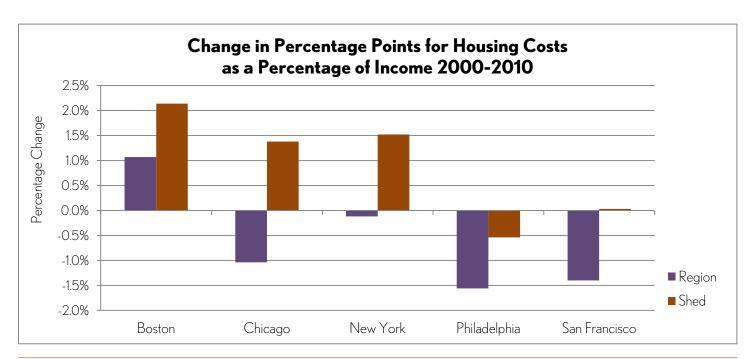
Cost of Living

Over the decade, Chicago's Regional annual housing costs increased by \$3,579 (28 percent) from \$12,741 to \$16,338 per year. In the transit shed, housing costs increased by \$2,751 (19 percent) from \$14,744 to \$17,495. Communities that saw additional TOD growth typically added units at the high end of the market, such as luxury condominiums marketed to affluent empty nesters.

However, even as housing costs rose, incomes also rose. The cost of housing as a percentage of household income housing decreased by 1.1 percentage points in the Region and rose by just 1.4 percentage points (based on national data, which is defined by a larger geography) in the transit shed. In three of the five extensive systems (Boston, Chicago, and New York), housing costs in the transit shed increased as a share of median incomes at rates significantly higher than that of their respective regions. An increase in the cost of housing can benefit communities as it represents the capture of value of

the location efficiency of those places by the housing market, and it can result in increased property tax revenue. However, this needs to be balanced with the inclusion of affordable housing around transit stations to ensure that the Region's low- and moderate-income households can benefit from the Region's investment in public transit, as well.

Transit access is a valuable amenity. It makes the land surrounding transit stations more valuable than land outside of the transit shed. Affordable housing is threatened by replacement by more expensive housing options, displacing those who cannot afford to pay premium rates to live near transit and the amenities that transit zones offer. Preservation of affordable housing contributes to job access for many households. The increase in the cost for housing in the transit shed constitutes an urgent call for the Chicago Region to focus affordable housing development around transit stations.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS. Source: National TOD Database: http://toddata.cnt.org

Benefits of Transit Are Not Equitably Distributed

Optimally, the transit shed population should be representative of the Region, including young people, seniors, families, singles, and households of all backgrounds. The data shows, however, that over the last decade Chicago's transit shed has become less diverse.

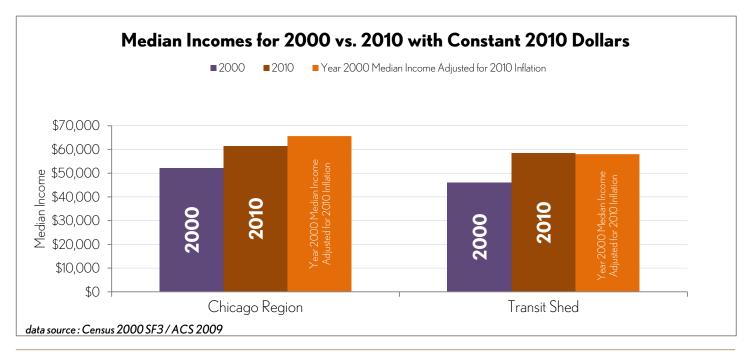
Income

The average household income in transit zones in the Chicago Region increased by 27 percent or \$12,348 over the past decade. The Chicago Region as a whole experienced a smaller 18 percent increase in median income of \$9,312. The divergence in median income between the transit shed and the Region may indicate that the transit shed is gentrifying, potentially displacing low- and moderate-income households.

Transit should be an economic benefit accessible to all of the Region's residents, but low- and moderate-income households, already with the fewest options, need transit access the most. Yet over the past decade, development around transit stations has skewed toward middle and upper-income households. Suburban towns interviewed for this

project added units near transit over the last decade at price points from \$250,000 to \$500,000 and up, often marketed towards young professionals and wealthy empty nesters looking to downsize, but continue to build equity through real estate investment.

The transit shed may be gentrifying, potentially displacing low- and moderate-income households.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.

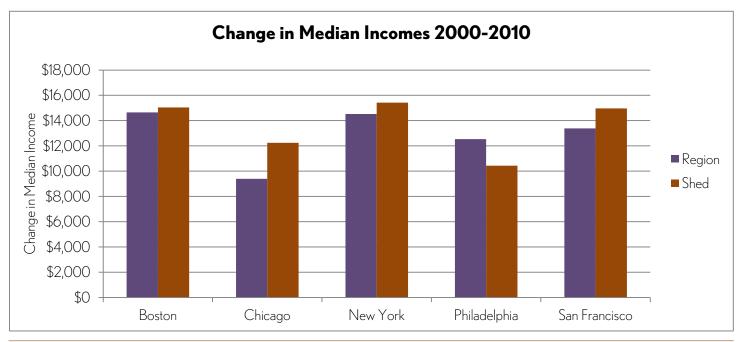
Source: National TOD Database: http://toddata.cnt.org

CTA LOYOLA RED LINE STATION



In three of four of Chicago's peer regions, median household incomes within a half-mile of train stations increased more than the regional median. The trend of increased household income near transit is not just an issue in Chicago, but the

disparity between the increase of Chicago's Regional median income and that of its transit shed was larger than any of its peers. Chicago's transit shed median income grew nearly nine percent more than the Region's.

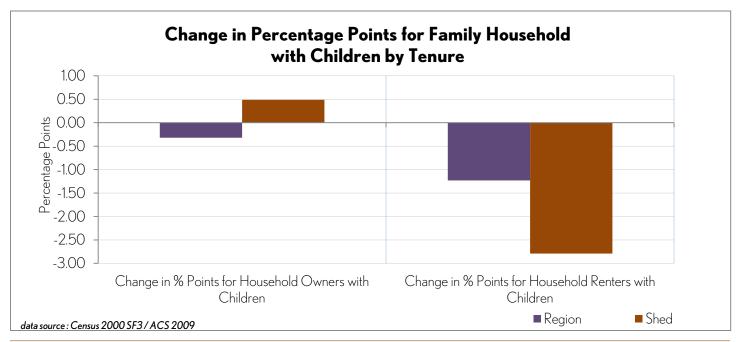


CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS. Source: National TOD Database: http://toddata.cnt.org

Families

The percentage of American households with children under 18 living at home hit a half-century low of 46 percent in 2008. During the study period, the Chicago Region lost 1.5 percent of its households with children; by 2010, only 33 percent of households had children under 18. The transit shed lost 2.3 percent of its households with children during this same period; by 2010, 26 percent of its households were homes to children. The greatest loss came in transit shed rental households with children, which decreased by 2.8 percent. This loss is more than double the 1.3 percent regional loss rate for households with children. For owner occupied households with children, the Region saw a loss of 0.3 percent but the transit shed gained 0.5 percent.

Another troubling trend is that families were represented in fewer TOD households in 2010 than in 2000. Over the last decade within the transit shed, family households decreased by nearly 22,000 (five percent), while the Region saw a small increase of 0.2 percent in the same time period. This means that family households likely saw an increase in transportation costs. Family households with children are not thought by developers to be the optimal TOD residents; singles, millennials, and seniors are often thought to be the more ideal occupants for transit-adjacent living. Based on our interviews, we found that this is because developers have found that it is expensive to build 2-3 bedroom multi-family housing units large enough to house these families. Family households are among the primary beneficiaries of public transit when it is accessible, because they can use it for trips to work, school, and/or other local destinations at a fraction of the cost of automobile transport. Family access to affordable housing needs to become a regional priority.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.

Source: National TOD Database: http://toddata.cnt.org

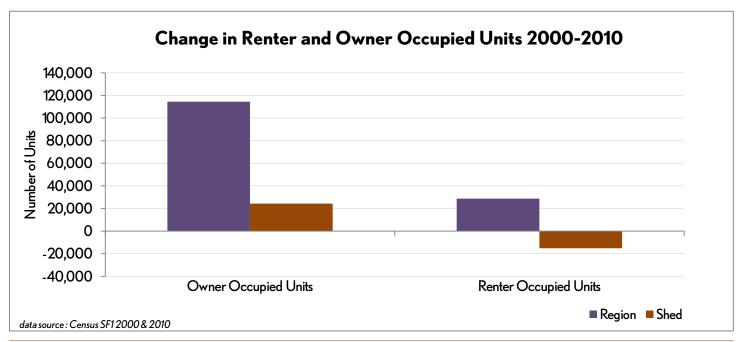
Renters and Owners

Between 2000 and 2010 there was a decrease of 15,095 rental households (–3.4 percent) within the transit shed compared with an increase of 28,768 (2.8 percent) in the Region as a whole. Towns experiencing TOD development have often been more supportive of new condominiums and townhomes than new rental apartments, even when the new units rent at market rate or higher. This, combined with conversion of existing apartments to condominiums, may have led to a decrease in the total number of rental households.

The data shows a trend of fewer rental units near train stations which may mean a restriction of opportunities for less-affluent families to locate in TODs. Despite the condo boom in the 2000s, which tapered off by 2010, we have seen a resurgence of rental units in TOD since then. Rental units have been more successful than condo units in communities including Berwyn, Orland Park, and Tinley Park. Since existing condos are not succeeding in the current housing market, communities in the Region have become more open to approving the development of buildings planned for rental living.



METRA DOWNTOWN
Photo Credit: Flickr User Anarchosyn, CC License



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS. Source: National TOD Database: http://toddata.cnt.org

Changes in Transportation Patterns

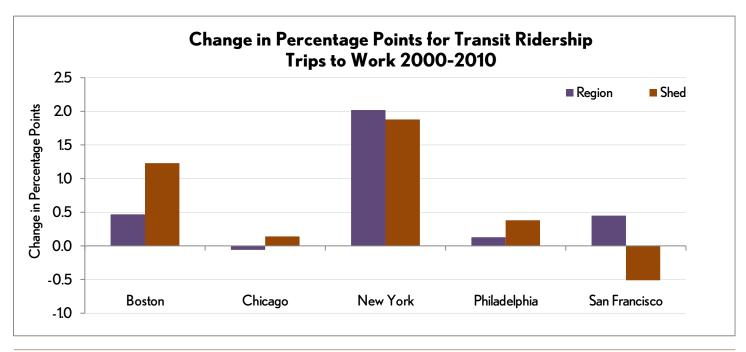
Transit Ridership for Trips to Work Not Keeping Up

Ridership for trips to work in the Region's transit shed rose only slightly between 2000 and 2010, rather than becoming an ever more robust mobility option for the Region's residents. Over the past 10 years, there has been a 0.30 percentage point increase in transit ridership for trips to work among residents within a half-mile of a train station, compared to a Chicago Regional decrease in transit ridership for trips to work of 0.03 percentage points.

In Chicago's peer regions, transit ridership for trips to work increased an average of 0.60 percentage points within the Transit shed and, on average, 0.62 percentage points

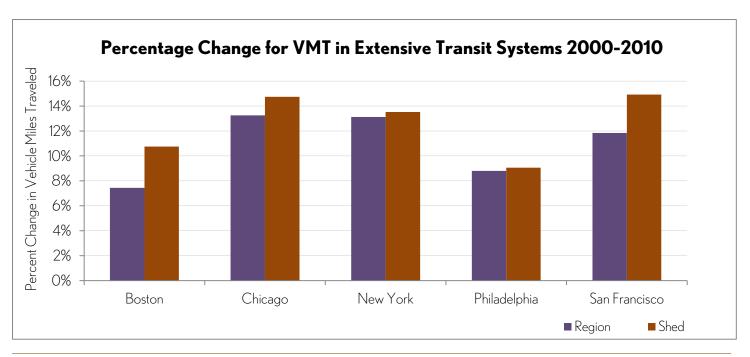
region-wide. This indicates that Chicago's transit ridership for trips to work could be growing much faster than it has, both among TOD households and throughout the Region. Chicago is the only Region among its peers that saw a loss in transit ridership for trips to work on a Regional level. This suggests an opportunity to promote transit to current TOD residents, and implement policies and programs to ensure that residents that move to the Region's TODs in the coming decade make full use of the Chicago Region's substantial transit investments.

Chicago is the only Region that saw a loss in transit ridership for trips to work.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.

Source: National TOD Database: http://toddata.cnt.org



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS. VEHICLE MILES TRAVELLED (VMT) IS MODELED BASED ON A REGIONAL TYPICAL HOUSEHOLD AND IS A PRODUCT OF THE H+T INDEX, A PRODUCT OF THE CENTER FOR NEIGHBORHOOD TECHNOLOGY.

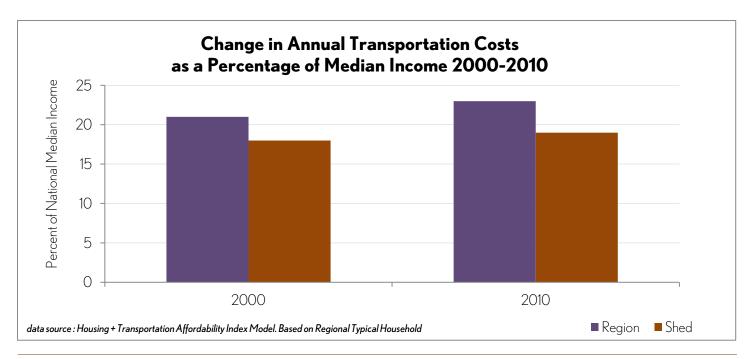
Source: National TOD Database: http://toddata.cnt.org

VMT is Lower, but Increasing Faster in the Transit Shed as Compared to the Region

In the Chicago transit shed, average household annual vehicle miles travelled (VMT) is lower than average, but increased 14.6 percent, compared to 13.3 percent for the Region as a whole. People who live within a half-mile of a rail station increased their annual driving mileage by a larger proportion of the overall Region. We do not know with certainty why this trend is occurring, but we do know that the transit shed of Chicago, as well as that of the other extensive Regions, have higher median household incomes. This could mean higher car ownership and miles travelled, but further research is needed to fully understand the trend. This is troubling, as proximity to transit, as we have seen, is a valuable amenity. People who live nearby should be taking advantage of it more and driving less. These data show

that over the past decade the population with the greatest access to transit still drive less per year than other Regional residents, but driving has increased at a faster rate among this group. This was the case in all four of the other regions with extensive systems as well.

In recent years the nation has seen resurgence in transit ridership for trips to work. After decades of decline, public transportation ridership for trips to work grew 36 percent from 1995 through 2008, almost three times the growth rate of the US population (14 percent) and substantially more than the growth for VMT on our nation's streets and highways (21 percent) over the same period.¹²



CHANGE IN ANNUAL TRANSPORTATION COSTS AS A PERCENTAGE OF MEDIAN INCOME 2000-2010.

Source: Housing + Transportation Affordability Index Model. Based on Regional Typical Household

Transportation Costs Are Not Increasing as Quickly Within the Transit Shed

Transportation costs in the transit shed were significantly lower than transportation costs in the Region as a whole. Within the transit shed, they also increased at a slower rate.

Between 2000 and 2010, average annual household transportation costs for residents of the Chicago Region increased by \$3,282 (38 percent) from \$8,730 per year to \$12,012 per year. In the transit shed, transportation costs increased \$2,324 (31 percent) from \$7,416 per year to \$9,740 per year.¹³

Both the Chicago Region and the Chicago transit shed saw transportation costs rise as a percentage of incomes. Transportation costs in the transit shed continued to represent a smaller percentage of median incomes and rose at a slower rate, showing the transportation cost savings for residents of the transit shed.

In 2010, residents living in a transit zone spent \$2,272 less on household transportation expenses as compared to the Region. Households living within the transit shed typically enjoy lower transportation costs because residents have

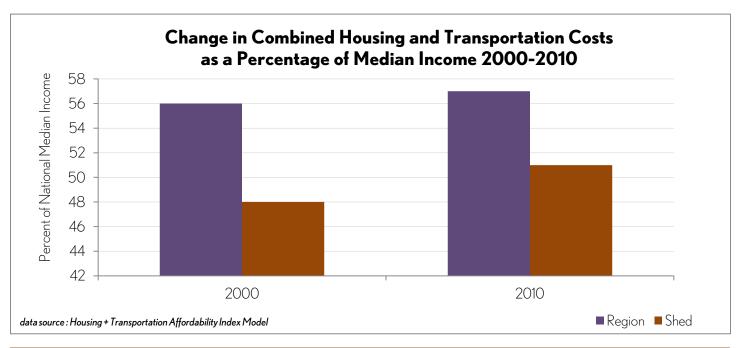
the option to use public transit, walk, and bicycle, and they typically have access to destinations that are closer together. Altogether, this results in the need for fewer cars, fewer miles of driving, and less impact on household budgets from increases in gas prices and other transportation costs. Between 2000 and 2010, the cost of transportation as a proportion of regional household income increased by 2.6 percentage points in the Region as compared to 1.3 percentage points in the transit shed. This speaks to the significant impact on transportation costs of transit ridership for trips to work. While VMT rose faster in the transit shed, the transportation costs rose more slowly in the shed as compared to the Region. This suggests that even though the VMT rose in the shed more rapidly than in the Region, the overall cost of transportation rose more slowly within the transit shed, likely due to transit ridership for trips to work, which is a more affordable transportation option. In other regions, the same was true: transportation costs increased at a slower rate in the transit shed than they did in the transit Region. This is what TOD strives to achieve.

H+T Costs Remain Lower in Transit Shed, but Are Increasing Faster

Combining the costs of housing and transportation and understanding the proportion of incomes required to pay for them reveals the true costs to households of living in a particular place. In the Chicago Region, households living in transit zones saw the combined cost of housing and transportation increase more as a proportion of household income than in the whole Region (three percentage points versus one percentage point, respectively). Despite its higher rate of increase over the decade, these major costs of living remained significantly lower in the transit shed as compared to the Region as a whole. This is yet another demonstration of the cost savings and benefits of living within a transit shed.

For three of Chicago's four peer regions, housing and transportation costs also increased more rapidly in the transit shed than in the Region. In three of the five extensive systems (Boston, Chicago, and New York), the housing costs in the transit shed increased as a share of median incomes at rates significantly greater than that of the Region. Chicago's



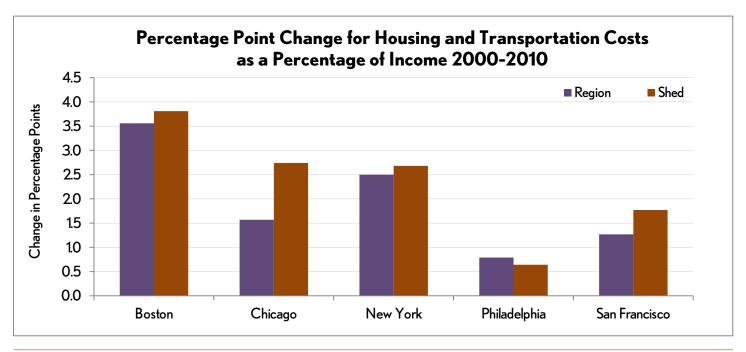


CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS. Source: National TOD Database: http://toddata.cnt.org

BNSF AMTRAK YARDS SOUTHSIDE CHICAGO Photo Credit: Flickr User Mike Miley, CC License

Chicago saw the largest growth in the H+T cost disparity between its transit shed and Region

10-year change in H+T costs as a percentage of income was unique among its peers. Chicago saw the largest growth in the H+T cost disparity between its transit shed and Region: the Chicago transit shed saw an increase of 2.8 percentage points while the Region saw an increase of 1.6 percentage points. Chicagoland's transit shed experienced a trend of a combined housing and transportation costs rising faster than the Region over the past decade. If this trend continues it means moderate- and lower-income households (i.e. young singles, families, renters, affordable housing beneficiaries) will increasingly have difficulty living in the transit shed. Policies should be enacted to ensure that affordability issues do not financially exclude those who want to live near transit and contribute to ridership for trips to work. Overall the data shows that transit creates value for communities by making them desirable and competitive places to own a home, increasing property values and benefitting the larger community through tax revenues near transit.



CHICAGO REGION AND CHICAGO TRANSIT SHEDS ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH OTHER REGIONS.

Source: National TOD Database: http://toddata.cnt.org

WHAT IS THE H+T INDEX?

The Center for Neighborhood Technology's Housing and Transportation ($H+T^{\otimes}$) Affordability Index provides a more comprehensive way of thinking about the cost of housing and transportation true affordability. The Index is the only tool of its kind that examines transportation costs at a neighborhood level. It allows users to view housing and transportation data as maps, charts, and statistics for nearly 900 metropolitan and micropolitan areas—covering 89 percent of the US population.

The H+T Index shows that transportation costs vary between and within regions, depending on neighborhood characteristics. People who live in location-efficient neighborhoods—compact, mixed-use areas with convenient access to jobs, services, transit, and amenities—tend to have lower transportation costs. People who live in location-inefficient places that require automobiles for most trips are more likely to have high transportation costs.

The traditional measure of affordability recommends that housing cost no more than 30 percent of income. Under this view, 76 percent of US neighborhoods are considered "affordable" to the national typical household. That benchmark, however, ignores transportation costs, which are typically a household's second-largest expenditure. The H+T Index offers an expanded view of affordability, one that combines housing and transportation costs and sets the benchmark at no more than 45 percent of household income. Under this view, the number of affordable neighborhoods drops to 28 percent, resulting in a net loss of 86,000 neighborhoods that Americans can truly afford.

The H+T Index data have implications for consumers, planners, and policy makers. The Applications page of the website has more information about how the data can and have been used across the country.

Throughout the evolution of the H+T Index model, the key finding remains the same: household transportation costs are highly correlated with urban environment characteristics when controlling for household characteristics. For more information or to use the H+T Index please visit our website http://htaindex.cnt.org/.

Using a National Typical Household allows results to be directly compared with other metropolitan regions by holding income, average household size, and commuters constant.

Based on the 2005-2009 H+T Model, the characteristics of the National Typical Household in this report are:

- Income = \$51,425
- Average household size = 2.6
- Commuters = 1.15

To put this in a local perspective, the Chicago-Naperville-Joliet metropolitan area Regional Typical Household characteristics are:

- Income = \$60,289
- Average household size = 2.73
- · Commuter = 1.23

Using H+T Affordability Index Data to Compare Datasets Over Time

The recent release of the 2009 H+T Index (using 2005-2009 American Community Survey five-year estimates) represents the first time that the full Index has been expanded and updated to cover a new time period. With this release, there has been great interest in comparing the two Index datasets to assess how housing and transportation costs have changed over the time period.

However, due to differences in the data reported in the 2000 Census and the 2005-2009 American Community Survey (ACS), the 2000 H+T Index and the 2009 H+T Index are not immediately comparable. To enable comparisons to be made between the 2000 H+T Index and the 2009 H+T Index, this dataset compiles Index values from the two time periods in a comparable format.

Because the Index is constructed for a fixed, typical household, it is important that the characteristics defining this household are derived from the same geographic area for the two time periods. Because statistical areas are constantly changing and being redefined, regional statistics do not provide a consistent source on which to fix household characteristics. Therefore, for the H+T Index comparison dataset, national values (national median income, national average household size, and national average commuters per household) are used to define the typical household for each time period.

Changes in Jobs

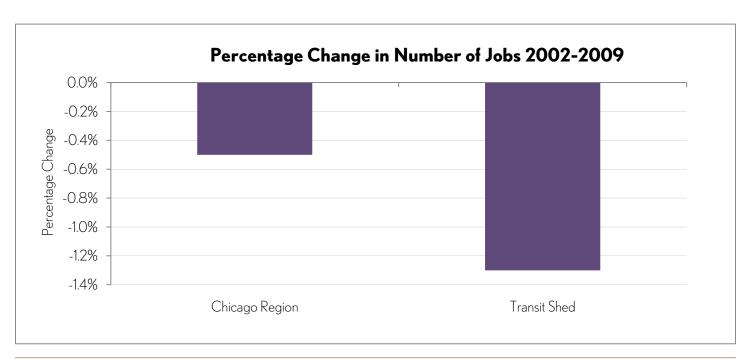
Transit Shed Loses Jobs Faster Than Region

The Chicago Region's job market saw a loss rate (-1.3 percent) nearly three times higher in the transit shed than in the Region as a whole (-0.5 percent), an alarming trend. Ideally, the development pattern in transit zones should result in an increase in the number of mixed-use spaces and employment opportunities.

The Chicago Region kept pace with other extensive systems in terms of transit shed job capture rate. In 2009, the Chicago transit shed was home to 33 percent of the Region's jobs compared with Philadelphia's transit shed that held 32 percent of its jobs and New York's transit shed that held 45 percent of its Region's jobs. Understanding the connection between transit and jobs is essential to maximize the economic potential of the transit shed. While work-related trips make up only 18 percent of all trip types nationwide,

their impact on transit is much greater. Almost 60 percent of all transit trips are for work. ¹⁴ In September 2012, 12 million of the CTA's 20 million boardings were work-related. Rush hour travel behaviors shape peak travel demand. Historically, Chicago had one major job center, Chicago's Loop; travelers would leave from their low-density residential communities and travel to the highly dense downtown for work. This development pattern has diminished with the development of multiple, if smaller, job centers outside of the downtown, however in many cases new satellite job centers have been developed in locations underserved by transit, which is restricting employment to those who own cars and are willing to drive to work.

Job sprawl exacerbates household unaffordability. Low- and moderate-income households¹⁵ often move to areas far



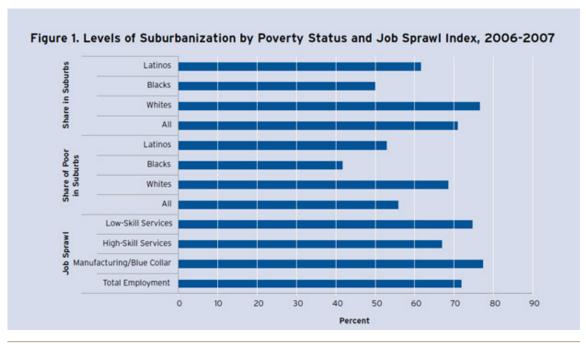
CHICAGO REGION AND CHICAGO TRANSIT SHED S ARE DEFINED BY A LARGER SET OF COUNTIES WHEN DATA IS COMPARED WITH PEER REGIONS. Source: National TOD Database: http://toddata.cnt.org

removed from jobs and public transportation in search of lower-cost housing. What results is an increase in dependency on car ownership, longer driving distances to work, and higher transportation costs. Lower income households are better served by homes in transit zones and by employment centers well connected by public transportation.

One of the key trends in job centers in recent decades is that they are often located in auto-oriented, suburban communities that are on the edge or just outside of metropolitan regions. According to a Brookings Institution report, between 1998 and 2006 jobs shifted away from major metropolitan cores and out to the suburbs. The same has been true of population: the largest growth (outside of the central business district) has been captured in collar counties of large metropolitan regions. Over the last half-century,

jobs have scattered throughout regions, decentralizing from central business districts and succumbing to sprawl. The proportion of jobs located at the core of metropolitan areas has decreased as these jobs have moved out to employment centers along highways in suburban locations. ¹⁷ Nationally, most of the jobs that were added to the transit shed were due to transit zone transit expansion, rather than the creation of new jobs near pre-existing train stations.

The Brookings report also found that when the metropolitan area has high rates of job sprawl, low- and moderate-income populations are more suburbanized; in other words, poor people follow jobs. This report also found that employment decentralization is highest for manufacturing (77.4 percent) and lowest for skill-intensive service industries (66.9 percent).



LEVELS OF SUBURBANIZATION BY POVERTY STATUS AND JOB SPRAWL INDEX, 2006-2007.
Source: Raphael, Steven, and Michael A. Stoll. Job Sprawl and the Suburbanization of Poverty (Washington D.C.: Brookings, 2010).

Employment Sprawl Yields the Sprawl of Lower Income Residents Away from Metropolitan Cores

Within metropolitan regions, 72 percent of all jobs are more than five miles away from the central business district.

Metropolitan regions with high rates of job sprawl see higher rates of suburbanization in general. Only 20 percent of the Chicago Region's transit shed extends beyond Cook County, which is home to Chicago's central business district. These counties beyond Cook are experiencing the greatest population growth and job creation. This disconnect creates a challenge for municipalities that want to provide employment for people who may not be able to afford the transportation costs associated with suburban employment.

Successful TODs are typically characterized by strong local economies, providing retail services and jobs for residents, as well as by the economic diversity of transit zone residents. For city-dwellers whose incomes limit their housing and transportation options, sprawl poses a complex barrier to finding and maintaining employment.

The data above summarizes the general trends of the transit shed and the region for Chicago and its peers. The following section of this report uses a typology to break up the transit zones for a closer look at some key trends at a station level. The typology drives some further analysis and case studies on TOD in the Region.

Growing municipalities outside of the Cook County transit shed struggle to provide employment for residents unable to afford the transportation costs associated with suburban employment.

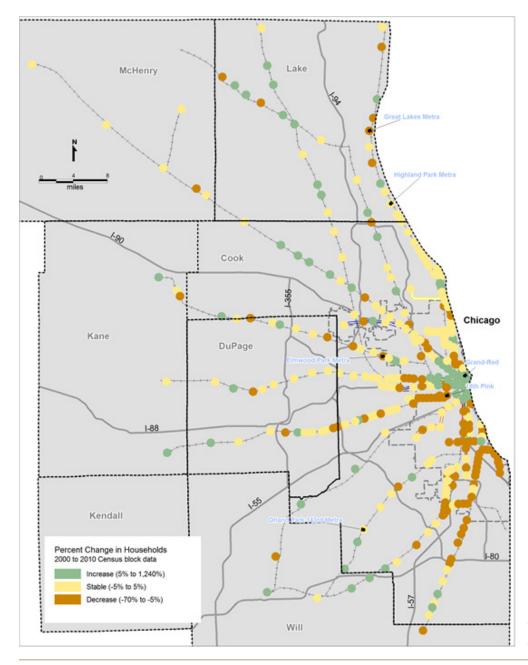


SUBURBAN HOUSING Photo Credit: Flickr User nrtphotos, CC License

Comparing Transit Zones in Chicago

An analysis of population change from the US Census Bureau found that the Chicago Region had the strongest population growth within two miles of its downtown City Hall of any major metro area in the country. Chicago's downtown core saw a population growth of 48,288 (36.2 percent) new residents in the past decade. Comparatively, downtown New York—the area with the next largest growth—added 37,422 (9.3 percent) people in that time.¹⁹

This extraordinary downtown growth pattern shows up when looking at the Chicago Region's transit zones, as well. Transit zones in downtown Chicago were not the only ones that saw significant household growth. Household growth of 10 percent or more occurred in some suburban transit zones along every CTA and Metra line in the Region.



ESRI WEST COOK STATION AREA MARKET SEGMENTS

Chicago Region Transit Zones by Type

The neighborhoods around transit in the Chicago Region vary a great deal by design, history, and use, and their performance as TODs varies as well. To examine this variation, the performance of TODs within the Chicago Region is measured based on the transit zone, or the half-mile radius around each transit station. The 367 transit zones in the Chicago Region that existed in 2000 (and thus can show trends to 2010) are divided into 15 types based on their land-use mix and performance in terms of residential vehicle miles traveled (VMT).²⁰ This typology provides a framework to understand the changes that occurred in each neighborhood around transit in the Chicago Region between 2000 and 2010.

Tables 1 and 2 show how the Chicago Region's transit zones shifted within the typology from 2000 to 2010. Most transit zones are primarily residential places and became slightly more residential from 2000 to 2010. Household VMT is lower in transit zones than other areas, but grew in transit zones throughout the Region, shifting many transit zones from being lower VMT types to higher VMT types, although the lowest VMT places continue to be among the densest.

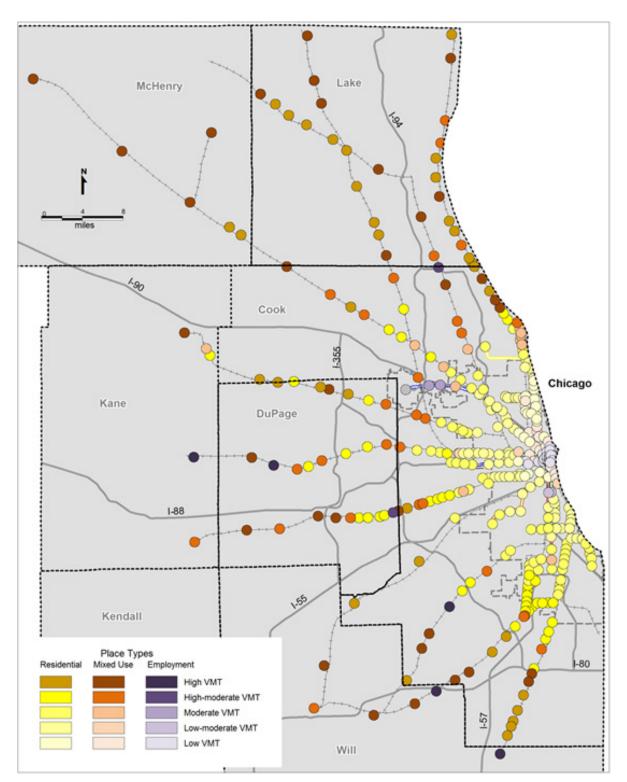
Transit zones in the Chicago Region show some distinct geographical patterns by type, with lower VMT places largely situated near the city center and higher VMT places in the less dense suburban and exurban areas. On average, the Low VMT transit zones are one to four miles from Chicago's City Hall, while the High VMT transit zones are 27–31 miles away. The Employment transit zones are clustered in downtown Chicago and a few outlying places, while the Residential transit zones are more suburban in nature.

Place Type (Employment as share of employees + residents)					
	Employment	Total			
Highest	16	20	8	44	
TM/	19	10	2	31	
Household VMT	60	28	1	89	
Hon	31	10	2	43	
Lowest	97	26	36	159	
Total	223	94	49	366	

Table 1 Chicago Region Transit Zones by Type 2000

	Place Type (Employment as share of employees + residents)						
	Employment	Total					
Highest	35	34	5	74			
ΤM	42	29	2	73			
Household VMT	58	13	2	73			
Hou	67	4	2	73			
Lowest	28	15	30	73			
Total	230	95	41	366			

Table 2 Chicago Region Transit Zones by Type 2010



TRANSIT ZONE
TYPOLOGY FOR THE
CHICAGO REGION
Based on year 2000 to year
2010 changes in VMT and
employees as a share of total
residential population

Performance by Transit Zone Type

As a performance metric, household growth shows positive performance, in that it means new households are choosing to live in transit zones and that new and existing housing units are accommodating growth. The transit zones that saw the highest percentage of household growth in the Chicago Region were the Low VMT, High Employment places. This is supported by the downtown growth trends in the map of household growth patterns. Table 3 shows that these transit zones had 62 percent household growth or an average of 2,700 additional households between 2000 and 2010. High VMT places also saw household gains, but at a much smaller scale, as these neighborhoods tend to be exurban transit stations with low residential density.

In line with the household growth trends, residential density (in terms of housing units per residential acre) increased most in the lowest VMT transit zones in the Chicago Region from 2000 to 2010 (Table 4). The largest increase in density was in the Low VMT, High Employment places that saw a near doubling of density from 46 to 90 units per residential acre. Two transit zone types lost density in the past decade,—the

Low-Moderate Mixed Use and Employment places—a troubling trend for households seeking more location efficient housing opportunities, but the overall trend was that residential density showed stronger increases than household growth in many parts of the Region.

Household VMT is a performance metric, in that lower VMT indicates that a place is location efficient—that residents and workers can access jobs, school, shopping, and other activities through walking, biking, or transit or without driving long distances. Household VMT is lower in transit zones than it is in other parts of the Region, but VMT grew in most transit zones in the Chicago Region between 2000 and 2010, and growth was proportionally greatest in the Low VMT transit zones (Table 3). Even with increased household driving, however, the Low VMT transit zones saw very limited transportation cost increases, as these households own few cars, use less gasoline, and therefore are much less impacted by the fuel price increases that occurred over the past decade (Table 6).



CTA ANDERSONVILLE RED LINE STATION
Photo Credit: Flickr User Andrew Ciscel, CC License

Place Type (Employment as share of employees + residents)						
	Residential	Mixed Use	Employment			
Highest	5% (41)	3% (23)	7% (26)			
Μ	-4% (-76)	1% (18)	-16% (-107)			
Household VMT	-6% (-187)	7% (234)	22% (231)			
Hou	-5% (-259)	-2% (-87)	-19% (-585)			
Lowest	2% (204)	25% (1,640)	62%(2,760)			

Table 3 Household Change, 2000–2010, by Transit Zone Type, Chicago Region

Place Type (Employment as share of employees + residents)					
	Residential	Mixed Use	Employment		
Highest	2%	1%	22%		
/MT	4%	5%	18%		
Household VMT	5%	14%	51%		
Hou	4%	-9%	-22%		
Lowest	10%	28%	107%		

Table 4 Percentage Residential Density Change, 2000-2010, by Transit Zone Type, Chicago Region (Units per Residential Acre)

Place Type (Employment as share of employees + residents)						
	Residential	Mixed Use	Employment			
Highest	7%	7%	0%			
ΤM	13%	17%	13%			
Household VMT	13%	19%	27%			
Hou	17%	24%	24%			
Lowest	17%	27%	32%			

 Table 5 Percent Household VMT Change 2000-2010 by Transit Zone
 Table 6 Transportation Cost Change 2000-2010 by Transit Zone
 Type, Chicago Region

Place Type (Employment as share of employees + residents)						
	Residential	Mixed Use	Employment			
Highest	\$4,038	\$3,984	\$3,933			
Ψ	\$3,706	\$3,752	\$4,027			
Household VMT	\$3,061	\$3,237	\$3,171			
Hou	\$2,486	\$2,296	\$2,318			
Lowest	\$1,436	\$1,132	\$234			

Type, Chicago Region

Place Type (Employment as share of employees + residents)						
	Residential	Mixed Use	Employment			
Highest	-1%	0%	-1%			
ΤM	1%	0%	-8%			
Household VMT	2%	0%	-1%			
Hou	5%	3%	3%			
Lowest	4%	5%	-2%			

Table 7 Change in Housing and Transportation Costs as a Share of Income, 2000-2010, by Transit Zone Type Chicago, Region

Place Type (Employment as share of employees + residents)					
	Residential	Mixed Use	Employment		
Highest	1%	0%	-1%		
TM/	0%	0%	-1%		
Household VMT	1%	1%	1%		
Hou	0%	-1%	9%		
Lowest	1%	-2%	-3%		

Table 8 Transit/Walk/Bike Commute Change, 2000–2010, by Transit Zone Type, Chicago Region

Place Type (Employment as share of employees + residents)						
	Residential	Mixed Use	Employment			
Highest	20%	19%	13%			
TM/	18%	19%	22%			
Household VMT	17%	25%	8%			
Hou	25%	19%	89%			
Lowest	41%	49%	28%			

Table 9 Percentage Household Median Income Change, 2000-2010, by Transit Zone type, Chicago Region

Place Type (Employment as share of employees + residents)					
	Residential	Mixed Use	Employment		
Highest	-16%	-4%	12%		
Μ	-13%	-10%	-29%		
Household VMT	-10%	16%	8%		
Hou	-17%	-5%	-2%		
Lowest	4%	1%	4%		

Table 10 Employment Change, 2000-2010, by Transit Zone type, Chicago Region

Housing and transportation costs as a share of income are an important metric of the affordability of a place to residents. The combined cost of housing and transportation represent the true cost of living in one neighborhood over another, as this metric depends not just on housing prices, but the number of cars an average household will need to own and how much driving will be needed to live in that place. Housing and transportation costs as a share of income changed inconsistently across transit zone types in the Chicago Region between 2000 and 2010. In many places, housing and transportation costs both increased significantly, but incomes increased significantly as well. In other areas, such as the Low VMT, residential neighborhoods, income increases were not large enough to overcome increased housing and transportation costs, resulting in an overall loss of affordability from 2000 to 2010.

The share of commuters that walked, bicycled, or took transit to work did not significantly change in most transit zone types from 2000 to 2010 (Table 8). These alternative commute modes continued to be far more prevalent in Low VMT communities than in higher VMT communities.

Further analysis could build on this report to explore changes in the ways that people arrive to transit stations (walking, biking, driving, other transit modes, etc.).

Median household income grew in every transit zone type from 2000 to 2010. While transit zones of the Low-Moderate VMT, High Employment type saw an 89 percent average increase in income, there are only two transit zones of this type in the Region. More significant was the income increase in the Low VMT transit zones. These three types saw household income increases from 28 percent to 49 percent.

Job growth in the Chicago Region transit zones from 2000 to 2010 was mixed (Table 10). As with household growth, the lowest VMT places performed well with one to four percent growth across all three Low VMT types. Most impactful was the growth in the Low VMT, High Employment transit zone type where employment is densely located. The Moderate VMT, Mixed Use and Employment places also performed well, with 16 percent and eight percent increases in jobs respectively. However, these areas are less dense, so the total number of jobs added in these neighborhoods is limited.



CTA ROSCO AVE. BROWN LINE STATION
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Transit Zone Metrics

One of the advantages of the TOD typology is that it allows the development of average metrics by transit zone type. By averaging values across all transit zones in a type, one can begin to see the demographics and indicators of a "typical" neighborhood of that type. Table 11 provides several key metrics for the Chicago Region transit zones in this study.

	2010 Average Metrics by Transit Zone Type Chicago Region														
	Residential Places					Mixed-Use Places				Employment Places					
	Low VMT	Low- Mod VMT	Mod VMT	High- Mod VMT	High VMT	Low VMT	Low- Mod VMT	Mod VMT	High- Mod VMT	High VMT	Low VMT	Low- Mod VMT	Mod VMT	High- Mod VMT	High VMT
Households	10,522	4,898	2,989	1,674	909	8,113	4,751	3,365	1,559	902	7,240	2,444	1,299	542	380
VMT per Household	10,647	12,301	14,329	16,722	19,501	9,900	12,038	14,519	16,798	19,507	8,464	11,680	14,260	17,744	19,979
Household Transportation Costs	\$7,894	\$9,533	\$11,051	\$12,709	\$13,905	\$7,008	\$9,272	\$11,257	\$12,783	\$13,881	\$5,693	\$9,079	\$10,972	\$13,466	\$14,071
H+T as Percent of Income	49%	45%	49%	58%	69%	55%	47%	56%		69%	53%	34%	47%	86%	64%
Household Income	\$62,867	\$39,822	\$50,045	\$67,252	\$87,433	\$80,894	\$49,714	\$63,263	\$67,777	\$88,787	\$84,602	\$33,173	\$50,266	\$127,914	\$77,236
Jobs	5,735	2,192	1,390	918	595	12,299	5,531	9,442	3,475	2,016	222,611	23,267	10,337	6,279	2,640
Residential Density (Units/ Res. Acre)	30.2	16.0	9.7	5.2	3.5	34.9	19.9	10.6	5.3	3.6	89.8	16.1	12.0	2.6	5.8
Transit/ Walk/Bike Commuters	47%	36%	26%	19%	13%	47%	34%	31%	16%	12%	59%	50%	19%	21%	11%

Table 11 2010 Average Metrics by Transit Zone Type Chicago Region

TOD Typology Methodology

Defining Place Types

Land use is an important neighborhood characteristic, as different policies and planning solutions are applicable to places that are primarily job centers as compared to residential neighborhoods. The Chicago Region's transit zones are divided into three land use categories based on the share that employment makes up of the total of job and residents in the neighborhood. In other words, if you met someone on the sidewalk in that neighborhood, are they more likely to live there or work there?

Place Types:

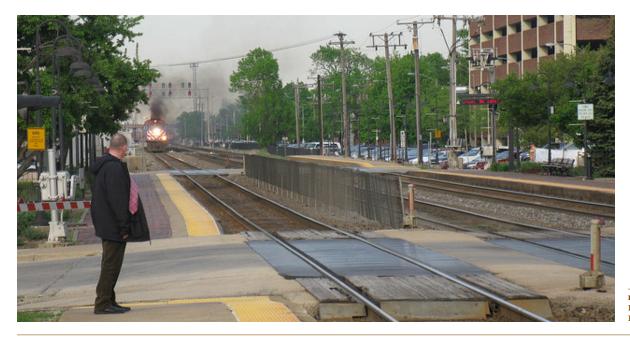
Residential places—0 to 33.3 percent employment Mixed-use places—33.4 to 66.7 percent employment Employment places—66.8 to 100 percent employment

Ranking Performance

Annual residential VMT is used as the key indicator for the types of transit zones, as lower household VMT is strongly correlated with the other benefits of successful TOD, including lower household transportation costs, lower pollution, increased transit ridership for trips to work, and increased walking and biking. VMT values from CNT's Housing and Transportation Affordability Index (H+T® Index) were calculated for each transit zone based on a national typical household. More information about the H+T Index and its methodology can be found at htaindex.cnt.org. The 367 transit zones in study were divided into five sets by their 2010 VMT values.

Performance Characteristics (VMT per household in 2010):

High VMT—17,851 to 22,850 High-Moderate VMT—15,701 to 17,850 Moderate VMT—13,201 to 15,700 Low-Moderate VMT—11,351 to 13,200 Low VMT—9,100 to 11,350



BERWYN METRA Photo Credit: Flickr User David Wilson, CC License

Case Studies

CASE STUDIES

Six station areas were chosen to demonstrate the usefulness of the TOD typology for understanding development in the Chicago Region and explore the variety of development patterns within the transit zone. The following stations were chosen because they all have a demonstrated commitment to TOD and the communities have diverse characteristics representative of the Region:

Berwyn BNSF Metra Station
Elmhurst Metra Union Pacific West Line
Grand Red Line Station
Highland Park Metra Station UPN Metra
Orland Park (143rd Street) SWS Line Metra
18th Street Pink Line CTA Station





Berwyn BNSF Metra Station

Berwyn, Illinois

Moderate VMT, Mixed-Use

A community hard-hit by the recession turns to TOD planning as a revival tool

Berwyn is a well-established community just 10 miles west of

Chicago's downtown. Known for its bungalow-style houses, Berwyn is home to many first-time homebuyers who are attracted to its affordability, variety of amenities, and close proximity to Chicago via car or public transit. Although it was hard-hit by the recession, Berwyn has turned, in part, to TOD planning as a tool to reinvigorate its local economy.

Many of the Metra train boardings at Berwyn's three train stations are by individuals who live outside of the community.

The Berwyn train station is at the edge of a commuter payment zone; commuters who board at stations west of Berwyn and travel east toward downtown Chicago are charged more for their tickets, encouraging commuters from outside of Berwyn to drive to this Metra station. A 2002 study by Metra found that 41 percent of the boardings at the three Berwyn stations are made by passengers from neighboring communities outside of the station's transit zone. This high rate of riders from outside of the zone helps to explain why the Berwyn station zone saw no change in non-auto commutes to work by local residents. Berwyn's transit zone has an inner core of transportation facilities, mixed-use buildings, residential multifamily buildings, and medical institutions. The remainder of the zone is primarily single family residential housing with some multifamily housing clustered along the Metra line.

Berwyn's TOD planning was an exercise in resilience during the height of the recession. Berwyn was hit particularly hard by the housing crisis that started in 2007. The Berwyn Metra station transit zone saw a two percent decrease in households between 2000 and

2010, but a four percent increase in residential density (residential units per acre) causing the household vacancy rate to go from 4.7 percent in 2000 to 7.6 percent in 2010.

Moderate VMT, Mixed-Use transit zones like Berwyn experienced a modest increase in residential density of 14 percent while the Region saw an increase of 34 percent. In the face of the challenge posed by this relatively low increase of density around its transit station, the city turned, in part, to planning and policies to help rebuild its local economy.

In 2008, the City of Berwyn released its TOD Study for the Berwyn Metra station. In 2006, the RTA funded Berwyn's Transit-Oriented Master Plan entitled Berwyn: Transit-Oriented Development Study for the three Berwyn Metra station areas along the Metra BNSF rail corridor between Harlem Avenue and Ridgeland Avenue: LaVergne,

Berwyn, and Harlem Avenue.

The plan proposed that the Berwyn stop, perceived to be the center of the city, would be transformed into the new hub for restaurants, entertainment and shopping outlets. In response to the large numbers of automobiles that are used to reach the station, commuter parking and its availability have been contentious issues. That same year, Berwyn built a 39,000 square foot parking structure with 15,000 square feet of ground floor retail and 1,114 parking spaces—with 300 dedicated to commuters. The rest of the spaces would be shared for other retail uses. The structure has since been built and parking spaces dedicated to commuters are 80 percent occupied on a regular basis. The ground

floor space was initially intended for retail, but it was ultimately developed as an indoor sports and training facility that will serve residents of Berwyn and surrounding communities.

Berwyn's 2008 plan sought to focus development around all three of its train stations with priority given to the Berwyn station. The plan promoted pedestrian development around the stations, including bike paths and streetscaping along new connections to the parks.

Rental units and recreational amenities in Berwyn have been in high demand. In 2009, a 53-unit condo building was developed in the Berwyn station transit zone. It was not successful and went into foreclosure and now has been converted to rental units, all of which are now occupied. The ground floor of this building is still struggling; of the 15,000 square feet available for retail, 11,000 remain unoccupied. Elsewhere in Berwyn, in contrast, local economic development planners report that the retail not only withstood the economic downturn, but

actually grew. Berwyn continues to build on its successful development of multifamily rental units near transit. In 2012 Berwyn put out a request for proposals for a multifamily residential development targeted to seniors across the street from the Berwyn train station.

Berwyn continues its TOD planning efforts. In 2011, Berwyn was the recipient of a Model Communities Grant, allowing the city to pursue new planning efforts to encourage healthy and non-auto transit options such as biking and walking. That same year the West Cook County Housing Collaborative announced its plans to update the TOD development strategy for five communities including Berwyn. Also in 2011, in an effort to renew its housing market, residents of Berwyn started a Berwyn Bungalow Preservation Initiative that offers incentives to people who buy or renovate a bungalow. In October 2012, Berwyn released its Comprehensive Plan, which builds on its plans from the recent past as well as CMAP's GO TO 2040 Plan.

Berwyn Met	Average for Transit Zone Type	Average for All Chicago Transit Zones			
Metric	2000	2010	Change 2000-2010	Change 2000-2010	Change 2000-2010
Households	1,636	1,703	4%	1%	7%
VMT per Household	13,120	16,578	26%	17%	14%
Household Transportation Costs	\$9,008	\$12,969	44%	42%	36%
H+T Cost as a Percent of Income*	67%	62%	-5%	0%	2%
Household Income	\$75,016	\$96,268	28%	19%	23%
Jobs	4,101	4,233	3%	-10%	3%
Residential Density (Units/Residential Acre)	4.2	4.5	8%	5%	34%
Transit/Walk/Bike Commuters*	24%	23%	-1%	0%	0%

^{*} H+T cost shows change as % of Income; Transit/Walk/Bike Commuters show change as the difference between 2010 and 2000 values. All other metrics use percentage change. 2010 Proxy Data: The data in this table used for H+T cost, Transportation costs, vehicle miles travelled (VMT) and transit/walk/bike commuters are from ACS 2005-2009 Data. Jobs data comes from The US Census' 2002 and 2009 Local Employment Dynamics and have been used as proxies to represent year 2000 and 2010 data, respectively.



Elmhurst Metra Union Pacific West Line

Elmhurst, Illinois

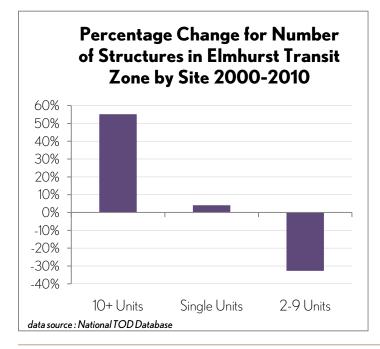
High-Moderate VMT, Mixed-Use

High change in VMT, mix of employees (commercial land uses) and residents (residential land uses) Prioritizing density near Metra station

built in 2010.

Elmhurst is a suburb 18 miles west of Chicago. Located near major expressways and a short drive to both airports, Elmhurst is a desirable location for both businesses and residents. It is home to Elmhurst College, as well as three fine art museums. The Elmhurst Metra station is in the center of the downtown, a mixed-use residential, retail, and entertainment district. This transit zone is distinguished by its wide variety of retail and amenities, while maintaining a small town feeling.

In 1999, the City of Elmhurst completed its Downtown Plan, funded in part by the RTA. This plan found that pedestrian and vehicular access to the Metra station was a deterrent to use of the train



station. The plan was later updated by the city, in 2006, to include TOD-oriented principles in order to encourage and facilitate access to the downtown Metra station by all modes of transportation.

In implementing the plan, Elmhurst put land use regulations in

place that allow greater density and mixed-use development around the station. Developers, for example, can now apply for a conditional-use permit for buildings up to eight stories. Between 2000 and 2010, Elmhurst developed almost 400 new units of housing, largely upscale and owner occupied, and one office building with 30,000 new square feet of space. The majority (55.2 percent) of residential growth in the transit zone came from buildings with ten or more units, a nod to the TOD principles guiding the city's plan. Elmhurst also financed a structured parking lot that allowed underutilized surface parking lots to be redeveloped. The 2006 TOD plan called for a 253-space parking structure to accommodate commuters and downtown visitors, which was

Interviews with developers informed us that despite this flurry of TOD construction, the Elmhurst station area only saw a net growth of 158 housing units, only 67 of which were occupied in 2010. This low increase in housing units was due to the demolition of existing units and an increase in vacant homes. Residential density increased by only eight percent.

Elmhurst's transit zone saw a 26 percent increase in household VMT over the study period. This far surpassed typical High-Moderate VMT, Mixed-Use transit station areas, and the Chicago

Region as a whole. This transit zone saw a one percent decrease in non-auto commuting for trips to work, while typical High VMT, Mixed type transit zones and the Region saw no change in non-auto travel behavior. Transportation costs as a percentage of median income increased 44 percent for the Elmhurst transit zone, as compared to 42 percent for the typical High-Moderate VMT.

Household income increased 28 percent, significantly higher than the 15 percent increase of average High-Moderate VMT, Mixed-Use station type and the Region. This higher household income helped to lower the proportional cost of housing and transportation for residents living within the Elmhurst transit zone by five percentage points from 67 percent to 62 percent.

Elmhurst made efforts to boost its transit value by developing within its transit zone, but it didn't see the benefits. Instead,

Elmhurst saw a significant increase in VMT and transportation costs, low increases in residential density, and a loss in non-auto commuters for trips to work. We can't be certain about why Elmhurst's efforts yielded this effect, but we might assume that Elmhurst's housing market was responding to the increase of incomes by building upscale housing just before the economy went into recession. The increase in household income and VMT may be indicators of the lack of mixed-income developments. Elmhurst may have consolidated smaller, rental units into larger condo units in response to its plans to build for higher-income households. The increase in vacancies could also have been related to the building boom in the 2000s that led to the development of units that were never occupied.

Elmhurst Me	Average for Transit Zone Type	Average for All Chicago Transit Zones			
Metric	2000	2010	Change 2000-2010	Change 2000-2010	Change 2000-2010
Households	3,106	3,032	-2%	7%	7%
VMT per Household	11,955	14,747	23%	19%	14%
Household Transportation Costs	\$8,420	\$11,709	39%	40%	36%
H+T Cost as a Percent of Income*	50%	51%	2%	0%	2%
Household Income	\$46,518	\$56,440	21%	25%	23%
Jobs	4,514	4,724	5%	16%	3%
Residential Density (Units/Residential Acre)	7.3	7.6	4%	14%	34%
Transit/Walk/Bike Commuters*	19%	18%	0%	1%	0%

^{*}H+T cost shows change as % of Income; Transit/Walk/Bike Commuters show change as the difference between 2010 and 2000 values. All other metrics use percentage change. 2010 Proxy Data: The data in this table used for H+T cost, Transportation costs, vehicle miles travelled (VMT) and transit/walk/bike commuters are from ACS 2005-2009 Data. Jobs data comes from The US Census' 2002 and 2009 Local Employment Dynamics and have been used as proxies to represent year 2000 and 2010 data, respectively.



Grand Red Line Station

River North neighborhood, Chicago

Low VMT, High Employment

High employment share with low vehicle miles traveled

Mixed-use, high density central business district station with a diversity of economic strengths

In 2012, after nearly 70 years of operation, the Grand Avenue Red Line subway station received a \$73.6 million renovation that modernized and expanded the station to better serve the high volume of transit riders who pass through to access jobs, shopping, and entertainment. The Red Line provides 24-hour service and takes passengers to the northern limits of the city at Howard and to 95th Street and the Dan Ryan Expressway on the city's South Side. Nearby destinations include Navy Pier, the Merchandise Mart, Michigan Avenue (the Magnificent Mile), 26 institutions of higher learning, and many dining and entertainment options. The train station connects with three CTA bus lines (Routes 29, 36, and 65), as well as a seasonal Navy Pier Trolley.

This transit zone, like much of the rest of Chicago's downtown, has developed characteristics resembling a residential

neighborhood. With increases in population and households, and businesses to support them, the Grand Red Line subway station zone has diversified its economy over the last decade. Additions to Chicago's downtown—including Millennium Park (2004), college campus expansions, revitalization projects, and a wealth of dining and entertainment—have made this part of the city a more desirable place to live. These new elements and the populations they attract help to keep the downtown area lively after the work crowd has gone home.

The area is defined by high density buildings that contain higher-cost offices and residences, as well as high pedestrian and auto traffic. In 2010, the zone's population density was 12 people and four households per acre. The median rent for the transit zone had

risen by 29 percent to \$1,471 since 2000, compared with the median rent for the Region of \$898. Also, the median monthly homeowner costs had dropped by nine percent to \$2,642; the same median figure increased by 40 percent to \$2,188 for the Region. According to the Chicago Loop Alliance's 2010 Annual Report, ²¹ the median rent for a condo in Chicago's Loop rose 25 percent between 2005 and 2010. These significant changes in household costs are the result of a rising demand for rental residences since the housing market crash that started in 2007. While Chicago's transit shed saw a loss in rental households (15,095, or 3.4 percent), the Grand Red Line transit zone bucked the trend and saw a 37-percent increase. The rental market has become increasingly competitive throughout the Chicago Region, especially within the transit zone, where renters are increasingly unable to afford to live.

National trends for metropolitan areas saw larger population growth concentrated near their cores. Chicago led the way as the metropolitan area with the largest population growth increase within two miles of its city hall. (Chicago saw a 36-percent increase in this population.) The Grand Red Line transit zone saw a population increase of 48 percent and a housing stock increase of 46 percent. Based on the transit zone typology in this report, the station is a high employment, low VMT zone. This suggests that the zone's jobs and non-auto patterns are indicators of sustainability.

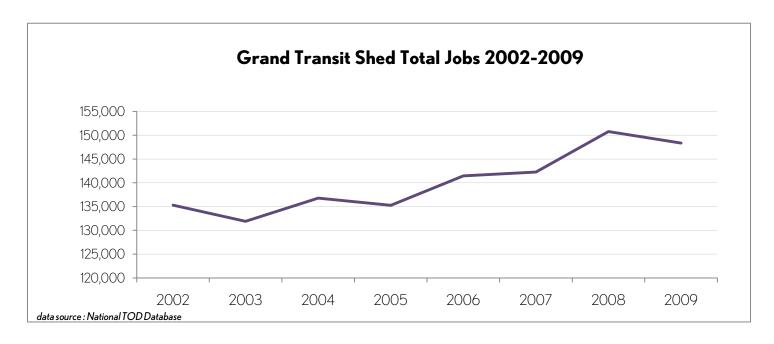
Transit ridership for trips to work for the Grand station saw a generally steady increase with the exception of two separate periods between

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2003 and 2007. Similar dips in the upward trend line for jobs can be seen between 2002 and 2009. This may have been due to the recession or other economic factors that affected the workforce and their travel patterns to work. Gas prices were on a similar upward trend with the exception of one period between 2007 and 2009.

Between 2000 and 2010, the zone saw an increase in households, household density, household income, jobs, and savings in expenditures of housing and transportation costs as a percentage of income. These factors are promising for continued TOD success.



Grand Red L	Average for Transit Zone Type	Average for All Chicago Transit Zones			
Metric	2000	2010	Change 2000-2010	Change 2000-2010	Change 2000-2010
Households	11,573	16,866	46%	62%	7%
VMT per Household	6,260	7,752	24%	32%	14%
Household Transportation Costs	\$5,199	\$4,896	-6%	4%	36%
H+T Cost as a Percent of Income*	54%	52%	-2%	-2%	2%
Household Income	\$61,850	\$81,604	32%	28%	23%
Jobs	136,188	148,355	9%	4%	3%
Residential Density (Units/Residential Acre)	67.6	112.3	66%	107%	34%
Transit/Walk/Bike Commuters*	64%	58%	-6%	-3%	0%

^{*}H+T cost shows change as % of Income; Transit/Walk/Bike Commuters show change as the difference between 2010 and 2000 values. All other metrics use percentage change. 2010 Proxy Data: The data in this table used for H+T cost, Transportation costs, vehicle miles travelled (VMT) and transit/walk/bike commuters are from ACS 2005-2009 Data. Jobs data comes from The US Census' 2002 and 2009 Local Employment Dynamics and have been used as proxies to represent year 2000 and 2010 data, respectively.



HIGHLAND PARK METRA STATION Photo Credit: Flickr User Zol87, CC License

Highland Park Metra Station UPN Metra

Highland Park, Illinois

High-Moderate VMT, Mixed-Use

Moderately high VMT and mixed (employment and residential) population and land uses An affluent North Shore community strengthens quality of life through TOD

The Highland Park transit zone is a High-Moderate VMT, mixedemployment residential station with shopping, including groceries, dining, and entertainment. It is predominantly residential, low- to moderatedensity with an affordable housing policy that promotes housing for a mix of incomes.

The Highland Park Metra stop is in downtown Highland Park, an affluent suburb 23 miles north of downtown Chicago. The station is in the heart of Highland Park's downtown area, a mix of upscale shopping and housing. The area is one of the most vibrant and thriving commercial areas on the North Shore, offering a wide range of retail to meet every day needs. There has been substantial growth in dense, multifamily housing in the downtown area over the last decade.

The station itself is bracketed by parking lots. PACE buses connect the station locally. The Robert McClory Bike Path runs parallel to the train tracks, connecting Highland Park to other suburbs. This is mostly a recreational bike path. There are no car-share locations in Highland Park.

Households in the Highland Park transit zone are upper-income homeowners living in low-density housing. The number of households in this transit zone declined by two percent between 2000 and 2010. Incomes rose 25 percent over the study period. Transit ridership for trips to work and the use of alternative transportation modes declined in the Highland Park transit zone between 2000 and 2010. Household VMT rose over the last decade by 11 percent, less than in other transit zones. Transportation costs rose 42 percent, more than in other transit zones,

but incomes also increased significantly, so that transportation costs as a percent of income increased by only two percent. H+T cost as a percent of income decreased almost four percent, mainly due to stagnant housing costs.

In 2001, The Plan Commission for the City of Highland Park partnered with Camiros to develop a plan for the city's central district. This plan sought to revive the community, which had traditionally served as a hub of activity for surrounding North Shore communities. The 2001 plan has led to the following public and private improvements in the Metra transit zone:

Public:

Redeveloped art center

Purchase of the Highland Park Theater and adjacent parking lot

New parking structures

Improved pocket parks for pedestrians

Private:

80,000 square foot Renaissance Place: an upscale, mixed use retail, office, and residential structure

Banks and retail

430 Park Avenue: mixed use retail, office, and residential

Laurel Terrace: mixed use, 85,000 square foot building

In 2009, Highland Park updated its 2001 downtown planning strategy in order to remain a competitive player in the North Shore commercial real estate market.

One of the striking facts about Highland Park is that H+T costs as a percentage of income declined seven percent, compared to the modest rises that were seen in other transit zones. While transportation costs grew sharply and incomes rose just above the Regional average, housing costs rose just two percent to just over \$23,000 a year, well below the Regional average of 21 percent. Highland Park has the highest household costs of the case study areas presented in this report, but the slight increase is still remarkable, considering the Orland Park 143rd Street Metra zone's housing costs rose nearly 25 percent to just over

\$20,000, and the Grand-Red Line zone's costs rose 26 percent to nearly \$22,000. This is in part attributable to the weak market, but Highland Park's commitment to providing affordable housing cannot go unrecognized. Organizations such as Community Partners for Affordable Housing are working with local, state, and federal agencies to ensure that there are affordable options for working families in the area.

The City of Highland Park has long been committed to creating a compact, diverse neighborhood around the downtown transit zone. The city has a strong vision for creating and maintaining a competitive edge for its downtown development, and has adopted a Sustainability Plan and Non-motorized Transportation Plan. Highland Park has positioned itself on a long-term path toward sustainability.

Highland Park I	Average for Transit Zone Type	Average for All Chicago Transit Zones			
Metric	2000	2010	Change 2000-2010	Change 2000-2010	Change 2000-2010
Households	1,658	1,622	-2%	1%	7%
VMT per Household	16,075	17,824	11%	17%	14%
Household Transportation Costs	\$9,171	\$13,062	42%	42%	36%
H+T Cost as a Percent of Income*	76%	70%	-5%	0%	2%
Household Income	\$76,587	\$95,469	25%	19%	23%
Jobs	3,835	3,877	1%	-10%	3%
Residential Density (Units/Residential Acre)	4.1	4.3	5%	5%	34%
Transit/Walk/Bike Commuters*	20%	18%	-1%	0%	0%

^{*} H+T cost shows change as % of Income; Transit/Walk/Bike Commuters show change as the difference between 2010 and 2000 values. All other metrics use percentage change. 2010 Proxy Data: The data in this table used for H+T cost, Transportation costs, vehicle miles travelled (VMT) and transit/walk/bike commuters are from ACS 2005-2009 Data. Jobs data comes from The US Census' 2002 and 2009 Local Employment Dynamics and have been used as proxies to represent year 2000 and 2010 data, respectively.





Orland Park (143rd Street) SWS Line Metra

Orland Park, Illinois

High VMT, Mixed-Use

High change in annual VMT, mixed (employment and residential) population and land use Major push for public improvements

The Village of Orland Park is a well-connected suburb 25 miles south of Chicago. The Orland Park 143rd Street stop is one of three Metra stops in Orland Park. Situated on the South West Service Line, this stop offers service to downtown Chicago. Due to freight congestion, Metra historically operated only a handful of trains to the Chicago Loop during rush period. That number has expanded, and riders can now even take the South West Service to the Loop on Saturdays.

Owing in part to this modest commuter service, 143rd Street originally developed as a car-oriented commercial and residential center for the community. Much of the land around the station is strip center retail or parking for shoppers. There is some housing from which many errands can be accomplished on foot. There are restaurants, groceries, retail stores, parks, schools, and entertainment less than a mile from the station. Orland Square is a major regional mall for southwest Cook and northern Will Counties; its stores may provide competition for additional retail around the transit stop.

Households, employment, and transit use all declined around the station over the last decade. Households in the transit zone declined four percent over the study period. Both transit ridership for trips to work and alternative transportation modes declined in the Orland Park transit zone between 2000 and 2010. However, household VMT rose only five percent, well below the average for Chicago's transit shed. Transportation costs rose over 40 percent, and increased from 12 percent to 17 percent of median incomes. Employment in the Orland Park 143rd Street transit zone declined 18 percent, from 2,653 to 2,165 jobs.

The Village has moved aggressively to promote TOD, which may reverse these trends in the coming decade. The Orland Park station was conceived as part of an RTA funded study what was completed in 2000. Orland Park constructed and opened a new Metra station at 143rd Street in April, 2007.

The Main Street Triangle, built around the train station, will be a pedestrian-friendly mixed-use development. It will include over 155,000 square feet of commercial space and 240 housing units. The Village of Orland Park implemented a Tax Increment Financing (TIF) zone for the area, using the funds to assemble the land, conduct environmental reviews and remediation, and create infrastructure improvements. To date, Orland Park has invested over \$30 million in public improvements. The Triangle will be connected via pedestrian bridge to Orland Park Crossing, an upscale, walkable shopping complex across La Grange Road.

One of Orland Park's more recent TOD projects is Ninety 7 Fifty on the Park, a six story mixed-use transit-oriented development that represents the first phase of the village's new downtown district. The development will provide a mix of upscale residences and retail as well as a pedestrian friendly space near the 143rd street Metra station. The development will consist of 295 residences, 4,000 square feet of first floor commercial space, 8,666 square feet of residential amenity space and 365 parking spaces. These residences will serve a wide range of residents from young professionals to empty nesters. This kind of development is new to Orland Park and is filling a gap that was identified by the Village of Orland Park. The development anticipates housing 401 residents.

Construction began in early 2011 and is planned to be completed by the end of 2013.

Since the station has opened the SWS line has doubled its service and seen an increase of 20 percent in ridership for trips to work. The Village has also recently updated their zoning ordinance to include transit-supportive regulations.

This commitment to TOD should help boost job growth along the South West Service line and create more destinations for transit riders. Few transit-served employment centers exist near Orland Park's $143^{\rm rd}$ Street transit zone in Southwest Cook and Northern Will Counties, so households may still have to drive to work and amenities, even when they live in a TOD.

Orland Park 143 ^r	Average for Transit Zone Type	Average for All Chicago Transit Zones			
Metric	2000	2010	Change 2000-2010	Change 2000-2010	Change 2000-2010
Households	496	475	-4%	3%	7%
VMT per Household	18,896	19,863	5%	7%	14%
Household Transportation Costs	\$9,936	\$14,101	42%	40%	36%
H+T Cost as a Percent of Income*	62%	67%	4%	0%	2%
Household Income	\$77,665	\$80,696	4%	19%	23%
Jobs	2,653	2,165	-18%	-4%	3%
Residential Density (Units/Residential Acre)	3.8	3.5	-6%	1%	34%
Transit/Walk/Bike Commuters*	11%	7%	-4%	0%	0%

^{*}H+T cost shows change as % of Income; Transit/Walk/Bike Commuters show change as the difference between 2010 and 2000 values. All other metrics use percentage change. 2010 Proxy Data: The data in this table used for H+T cost, Transportation costs, vehicle miles travelled (VMT) and transit/walk/bike commuters are from ACS 2005-2009 Data. Jobs data comes from The US Census' 2002 and 2009 Local Employment Dynamics and have been used as proxies to represent year 2000 and 2010 data, respectively.



18th Street Pink Line CTA Station

Pilsen neighborhood, Chicago

Low VMT, Residential

Primarily residential community with low change in annual vehicle miles travelled Historically dense community with declining population and changing demographics

The Pilsen neighborhood is an enclave of Mexican Culture.

Located on Chicago's southwest side, just four miles southwest of downtown, the 18th Street Pink Line station is in the middle of the Pilsen neighborhood. Since the 1960s, Pilsen has been home primarily to Mexican-American families. In 2010, 84 percent of the zone's population was Latino or Hispanic. Sixty-five percent of the households in the 18th Street transit shed were families.

Just five stops from Chicago's Loop, the 18th Street Pink Line transit zone provides access to a wealth of attractions. The

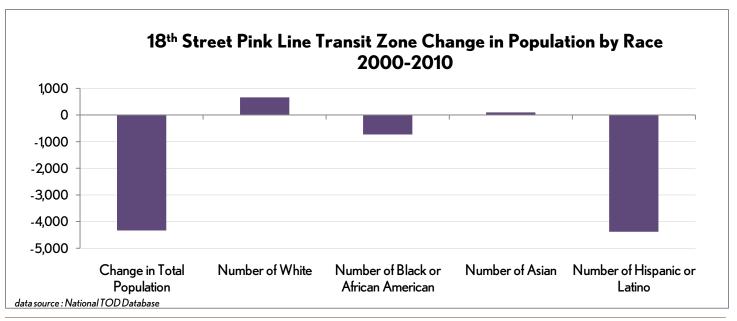
train station is located on 18th, a two-lane street with parking on either side, and older three- to four-story buildings with commercial space on the ground floor and rental apartments on the upper levels. The area is also characterized by iconic Mayan sidewalk medallions and large, bright murals that represent images of Mexican cultural heritage. It is home to many mom and pop Mexican restaurants, the National Museum of Mexican Art and a burgeoning art gallery district. Residents can catch a short train ride to major job centers such as the Loop, University of Illinois at Chicago (UIC), and the UIC Medical District. The Pilsen neighborhood, with its strong Mexican identity, is now a tourist destination. Local stakeholders have worked to preserve the character of the neighborhood while continuing to attract developments for residents and visitors. An example came in 2006 when the Local Initiatives Support Corporation (LISC) released Pilsen: A Center of Mexican Life, a plan that cautioned, "As others discover the beauty of our housing stock and the vitality of our local economy, it is up to us to protect and

nurture the culture that has made Pilsen what it is." This plan is supported by Alderman Danny Solis and 23 local community groups who have pledged to participate in the implementation.

Changing demographics have created the perception of a threat to the community's strong cultural identity. Between 2000 and 2010, the area lost population and households, largely Hispanic, and gained smaller populations of other races including whites and Asians. Other than Mexican-American families, the community is populated by students and young singles, who are perceived to be responsible for the gentrification of the area.

The primary land use patterns of the transit zone are residential, industrial and urban mixed use. The 18th Street transit zone's industrial land uses include part of the Pilsen Industrial Corridor Tax Incremental Financing (TIF) District and the container shipping carrier APL intermodal yard on Western Avenue. This zone has potential for infill development on the large amount of vacant land in the northern end adjacent to industrial and other land uses. A 2004 study by the New Communities Program showed that, in large parts of Pilsen, the value of the land was greater than the structures or physical improvements. Census data shows that 1940 was the average year that a structure was built the 18th Street transit zone; many of these structures, particularly the residential apartments, are quite old.

Development in the Pilsen neighborhood over the last decade has led to some demographic changes in the community. Race, age,



DEMOGRAPHIC SHIFT

The 18th Street transit zone saw large losses in its Hispanic and black population, and gains in its white and Asian population.

18 th Street Pink	Average for Transit Zone Type	Average for All Chicago Transit Zones			
Metric	2000	2010	Change 2000-2010	Change 2000-2010	Change 2000-2010
Households	5,107	4,741	-7%	2%	7%
VMT per Household	9,040	10,993	22%	17%	14%
Household Transportation Costs	\$6,442	\$8,357	30%	22%	36%
H+T Cost as a Percent of Income*	31%	35%	4%	4%	2%
Household Income	\$25,766	\$27,520	7%	41%	23%
Jobs	3,171	5,067	60%	4%	3%
Residential Density (Units/Residential Acre)	19.3	21.2	10%	10%	34%
Transit/Walk/Bike Commuters*	35%	40%	5%	1%	0%

^{*}H+T cost shows change as % of Income; Transit/Walk/Bike Commuters show change as the difference between 2010 and 2000 values. All other metrics use percentage change. 2010 Proxy Data: The data in this table used for H+T cost, Transportation costs, vehicle miles travelled (VMT) and transit/walk/bike commuters are from ACS 2005-2009 Data. Jobs data comes from The US Census' 2002 and 2009 Local Employment Dynamics and have been used as proxies to represent year 2000 and 2010 data, respectively.

and incomes have played a role in the demographic shift of the 18th Street transit zone. The Chicago Region's Hispanic or Latino population increased by 28.5 percent over the last decade, while the 18th Street transit zone, with its strong Mexican identity, saw a decline (4,385 or 27 percent) of its Hispanic or Latino population. This transit zone has seen an increase in whites (663 people) and Asians (99 people) over the past decade—many of them students and young singles who flock to the area for its low rents in and proximity to transit. While the Chicago Region saw a gain of 36 percent in the Latino/Hispanic population, the Chicago transit shed saw a Latino population loss of 0.54 percent. This suggests that new and existing Hispanic populations are living in Pilsen at the rates lower than they did in recent decades. This change in racial makeup has led to accusations of the community being gentrified by the new non-Hispanic population.

Another demographic change has been the return of young professional Mexican-Americans who grew up in the neighborhood's working class families. Many, now with higher incomes, have moved back to the neighborhood to raise their own families in Pilsen's affordable homes or to become landlords in the community's popular rental market. The community is said to be shifting from a blue collar community to one that is a mix of both blue and white collar households.

4,317 people, 23 percent of its population. In comparison, typical Residential, Low VMT transit zones showed a 2000 to 2010 population loss of only 412 people. The 1990s and early 2000s saw an influx of immigration to Chicago's ethnic enclaves, which offset the otherwise declining population of these areas. As this immigration influx tapered off, families aged, and poverty rates rose, immigrant populations represented smaller proportions of the total population in communities like Pilsen.* This population loss can be linked to the loss of 366 households (seven

The 18^{th} Street transit zone saw an increase of four percent in transit ridership for trips to work and a five percent increase in its share of non-auto commuters for trips to work. This increase in non-auto commuters was five times greater than typical for this type of transit zone.

percent). Most of this loss was in rental households.

The 18^{th} Street transit zone gained 1,896 jobs, far more than the average 221 jobs that the typical Residential, Low VMT transit zone type gained for that period of time. The zone has a thriving local economy with outstanding job growth and high transit use, with the potential for growth in both areas. The zone also has significant potential to develop its vacant and underutilized land which can address the challenges of population and household losses, while reinforcing the community's unique Mexican-American identity.

^{*}Hispanics of Mexican Origin in the United States, 2010. Pew Hispanic Center RSS. N.p., n.d. Web. 07 Dec. 2012.

Policy Recommendations

GO TO 2040 took an important step in establishing transit-supportive priorities for the Region. Alone, it will not overcome the barriers to local governments, developers, and citizens making location-efficient transit choices in the Region. To implement GO TO 2040, all levels of government will need to adopt new priorities that target resources to the right locations across the Region. To do this, the Center for Neighborhood Technology advocates for actions which will do the following:

Recommendation 1:

Create TOD Zones

Optimizing the level of TOD around transit stations is a proven means of increasing transit use and achieving many of the economic, environmental, and quality of life goals that align with sustainability. TOD has also proven to be a secure and profitable form of development for investors in many situations. In most cases in this Region, however, TOD involves the reuse of previously developed properties. Such redevelopment poses problems in terms of modifying existing zoning, assembling land, and establishing more intensive land use. The Chicago Region needs to adopt an integrated program of zoning reforms and financial incentives to overcome the impediments to TOD.

Implementers:

Municipalities, along with Council of Governments organizations, with assistance from CMAP and RTA

Priority: **HIGH**

Feasibility: MEDIUM

a. Establish Mixed Use Zoning

Many local land-use regulations do not explicitly allow TOD, so new developments must go through a lengthy and contentious community process that greenfield projects typically avoid. Communities can address both of these obstacles by building upfront community support for a mixed-use zoning code that allows TOD as a matter of right.

Implementers:

Municipalities along with Council of Governments organizations, with assistance from CMAP and RTA

Priority: MEDIUM

Feasibility: MEDIUM

b. Incentivize Higher Density Development

Developers and landowners should be engaged through incentives that encourage them to build structures that support higher density near transit stations. For example under favorable market conditions, zoning that permits higher floor area ratios (FAR) will raise investors' potential return on investment per acre of land and stimulate higher density development. The City of Evanston has led the way with a proposed zoning code that allows for public benefit bonuses on FAR for developments that provide affordable units, shared structured parking, and/or quality public space.

Implementers:

Municipalities along with Council of Governments organizations, with assistance from CMAP and RTA

Priority: HIGH

Feasibility: **HIGH**

c. Offer Expedited Building Permits

For developers, time is money: they need fast action by municipalities to minimize the carrying cost of property awaiting development. The City of Chicago, for example, incentivizes green buildings by guaranteeing a building permit decision within 30 business days to projects that meet certain standards, compared with the usual 90 days. Municipalities throughout the Region should offer a similar building permit incentive to TODs as part of a new zoning package.

Implementers:

Municipalities along with Council of Governments organizations, CMAP, and RTA as providers of technical assistance to municipalities

Priority: **HIGH**

Feasibility: HIGH

d. Decrease Parking Requirements

The City of Chicago has cut parking requirements by half for buildings within 600 feet of transit stops. A rental apartment building close to a Chicago transit stop, for example, needs only one parking space for every two apartments, compared with one space per unit for buildings located farther away from stations. Communities could also follow the example of Fayetteville, Arkansas, which allowed developments to fulfill their requirement by providing parking for bicycles rather than automobiles. Both options reduce construction costs devoted to parking, thereby creating more affordable units and more viable projects.

Implementers:

Transit agencies, CMAP, IDOT, Municipalities

Priority: **HIGH**

Feasibility: LOW

e. Facilitate Structured and Shared Parking

Acres of surface parking lots sit adjacent to Metra and CTA stations. Structured parking facilities, though highly expensive, would consolidate these spaces into smaller parcels and free up additional land for TOD. Structured parking should be a possible use of all of the TOD funding and financing mechanisms proposed in these recommendations. In communities where demand is not sufficient to support structured parking, alternatives such as shared parking with nearby businesses and institutions should be considered as means of reducing the parking footprint in TOD areas.

Implementers:

Municipalities along with Council of Governments organizations, with assistance from CMAP and RTA; Illinois Legislators

Priority: **MEDIUM**

Feasibility: MEDIUM

f. Use Value Capture

The high cost and complex timeline of infill redevelopment has led many municipalities to rely on Tax Increment Financing (TIF) to see projects through from predevelopment to completion. Mechanisms like TIF enable municipalities to capture the extra property and sales taxes generated by the development and adjacent properties and use those revenues to help finance TOD. In some jurisdictions, the revenues are pledged to operating needs of the transit service. Special Service Areas (SSAs) can also help by financing beautification efforts that increase rents or business health within a TOD. Municipalities should make TOD the explicit focus of TIF, SSA, and other special financing mechanisms. TIF financing often imposes an extraordinary burden on smaller and lower-income municipalities that must defer tax revenue for a generation to incentivize present development. In recognition of the Regional benefits generated through TOD, an act of the Illinois Legislature should allow state funds to replace a portion of local tax revenues obligated by TIFs that finance TODs in lower-income municipalities.

Implementers:

Transit agencies, CMAP, FTA

Priority: **MEDIUM**

Feasibility: HIGH

g. Practice Joint Development

The most recent federal transportation bill, MAP-21, has made it easier than ever for transit agencies to use residual transit property or redevelop stations for transit-supportive development. The law also makes it easier to flex any Federal Transportation Agency (FTA) planning or capital grants towards mixed-use projects that boost ridership and increase revenue. Joint development projects must be included in the long range transportation plan developed by local jurisdictions and transit operators through CMAP. Metra and CTA should hire real estate consultants to shape the financing of these projects as well as economic development experts to communicate the expected benefits to the FTA.

The realization of extensive joint development in TOD Zones will require substantial and integrated public investments from a spectrum of agencies, which will stimulate much larger private investments.

Implementers:

CMAP, Municipalities

Priority: **MEDIUM**

Feasibility: **HIGH**

h. Plan TOD Around Future Expansions

GO TO 2040 identifies over twenty future rail projects throughout our region. Planning for a few fiscally constrained projects is already underway. These projects will preserve future right-of-way for express bus or transit service. These alignments will create new TODs, many of which developed during the age of the automobile and may need substantial technical assistance for retrofits.

Recommendation 2:

Preserve and Build Affordable Housing in Transit Zones

Access to good transit service reduces residents' costs of housing and transportation and makes neighborhoods genuinely affordable. However, when the market realizes these benefits in communities, property values rise, and lower income residents may be displaced. A region that optimizes the value of its transit system will replicate model programs and use available funding sources to protect and create affordable housing in its transit zones.

Implementers: Municipalities, Housing agencies, Philanthropic organizations Priority: HIGH Feasibility: HIGH	a. Implement Municipal Programs for Affordable Housing Municipalities should develop inventories of vulnerable affordable housing and potential development sites located near transit and then act to expand these affordable housing assets. The City of Highland Park, for example, has established an independent, non-profit entity to preserve land and units. It then conveys land to developers, who can use it in tandem with the state Affordable Housing Donation Tax Credit to raise more equity than would otherwise be possible.
Implementers: Municipalities, Housing agencies, Philanthropic organizations Priority: HIGH Feasibility: HIGH	b. Establish and Support Affordable Housing Trusts Housing Trust organizations acquire properties on which they build or maintain affordable housing, sometimes by continuing to own the properties and sometimes by selling them with covenants that limit the appreciated value for which they may be sold. Such organizations are especially helpful in successful TOD areas where property values rise rapidly. The work of these organizations in TOD zones should be supported by public and private contributions similar to the community development funds established for affordable housing in San Francisco and Denver. Parking for shared vehicles rather than private autos can be another efficient use of resources.
Implementers: IHDA Priority: MEDIUM Feasibility: HIGH	c. Increase Preferences for Low Income Housing Tax Credit in TOD Areas The Illinois Housing Development Authority (IHDA) has taken great strides in recent years in adding location-efficient criteria to its Qualified Action Plan for Low Income Housing Tax Credits, the single biggest source of equity for affordable projects. IHDA should increase the points available to a project within a TOD and add additional scoring criteria based on that project's average transportation costs.
Implementers: Municipalities and Counties Priority: MEDIUM Feasibility: MEDIUM	d. Channel CDBG and HOME Funding The US Department of Housing and Urban Development (HUD) provides these block grants to Participating Jurisdictions (PJs) to invest in economic development and affordable housing. Those PJs, which include large municipalities and county governments, should pledge to invest them in priority TOD areas.
Implementers: Affordable housing services Priority: LOW Feasibility: HIGH	e. Site Housing and Social Services Near Transit Affordable housing advocacy agencies and supportive social services should locate in vibrant, mixed-use neighborhoods near transit. This allows better access to these services.
Implementers: Municipalities Priority: HIGH Feasibility: MEDIUM	f. Implement Inclusionary Zoning In those TOD areas with affordable housing needs, as measured by Illinois' Affordable Housing Planning and Appeal Act, communities should adopt an inclusionary zoning ordinance. Highland Park's ordinance requires a 20% set aside. These units must be dispersed throughout the development and visually compatible with market rate units.
Implementers: Municipalities Priority: MEDIUM Feasibility: HIGH	g. Exceed Accessibility Standards For people with disabilities and the senior population, public transit may be the only transportation option. Accessibility policies in TOD should adhere to the spirit and letter of ADA requirements to ensure that portions of development are accessible for those with disabilities.

Recommendation 3:

Match Jobs and Transit

Many limitations of the Chicago Region's transit system, as well as high transportation costs, traffic congestion, and air pollution, stem from a pattern of removing job centers from transit and mixed-income neighborhoods. A more efficient and healthy pattern may be achieved through systematic and integrated efforts to expand transit services to job centers, site new employment centers in existing, transit-served communities, and promote incentives to commute through transit, biking, or walking.

Implementers:

CMAP, RTA, Transit Agencies, Council of Governments organizations, Municipalities

Priority: **HIGH**

Feasibility: HIGH

a. Expand Transit Services to Regional Job Centers

The rail and enhanced bus service expansions recommended in this report should focus on connecting communities to employment centers. Specific examples of this policy include enhancing rail access to the Chicago Loop from the far south side and southern suburbs; expanding transit services to the job centers of Oakbrook and the northern suburbs west of O'Hare Airport; and improving rail, bus, or van access to industrial parks throughout the Region.

Implementers:

CMAP – in its capacity as the region's land use as well as transportation planning agency – Illinois agencies including DCEO, IFA, and IEPA; Counties, Council of Governments organizations, and Municipalities

Priority: **MEDIUM**

Feasibility: MEDIUM

b. Focus Job Creation Investments in Transit Served Locations

Investments to stimulate office-based and industrial employment should prioritize areas that now possess extensive transit service such as the city of Chicago's industrial corridors, Chicago's south side and inner ring suburbs of Chicago.

Implementers:

Municipalities, Counties. CDCs, Neighborhood organizations

Priority: **MEDIUM**

Feasibility: HIGH

c. Direct Businesses to TOD Locations

Chicago area local governments should guide prospective companies to transit-served sites. The economic development staffs of local government should quantify and communicate the benefits of transit service to employers, as these benefits relate to employees' well-being, increased morale, and reduced absenteeism. Civic and neighborhood groups that support business development should also communicate the benefits of TOD locations to businesses to help them make informed decisions in the best interest of their companies and the Region's transportation system.

Implementers:

Employers and employees organizations, Advocacy groups, Transit agencies

Priority: **MEDIUM**

Feasibility: **HIGH**

d. Promote Transit Incentives to Employees and Employers

Programs that encourage employees to commute by transit, biking, or walking should be promoted more aggressively. For example, the RTA/CTA Transit Benefit Fare Program provides fiscal incentives to employees and employers for transit ridership, but a low number of employers take advantage of it.

Implementers:

Workforce development organizations

Priority: **MEDIUM**

Feasibility: **MEDIUM**

e. Target Workforce Development

Job training and workforce development groups should focus their efforts on firms and industries that are accessible by transit so that new employees are not forced to commute by car.

Recommendation 4:

Feasibility: HIGH

Provide Alternatives to Car Ownership

Even dedicated users of an excellent transit system need other transportation choices to complete all of their routine trips. Options for active personal transportation and convenient access to cars must be in place to avoid the financial and environmental costs of individual car ownership and frequent single occupant driving.

Implementers: a. Support Car-Sharing CMAP, Municipalities, IDOT; Metropolitan Chicago is served by for-profit and nonprofit car sharing programs through which tens of **Employers and employees** thousands of members schedule the use of a car when it is needed. Car-sharing should grow through: organizations; Advocacy groups • The mandated provision of at least one free car sharing parking space at transit stations and at apartment buildings with off-street parking; Priority: HIGH • Decisions of corporations, institutions, and public agencies to provide car fleets through car sharing Feasibility: **MEDIUM** · Temporary public support for car sharing expansion into new community areas until break-even levels of membership are reached in these markets; and • Decisions of individual citizens to replace personal car ownership with transit, active transportation, and car sharing. Implementers: b. Facilitate Carpooling CMAP, Municipalities, IDOT; Municipalities should work with employers and advocacy groups to create incentive programs for Employers and employees employees to join carpooling arrangements. organizations; Advocacy groups Priority: **HIGH** Feasibility: HIGH c. Build Bicycle Infrastructure and Facilities Implementers: CMAP, IDOT, Municipalities, Transit Local governments should expand the network of dedicated bike trails and separated bike lanes on public agencies streets. In addition, local municipalities and the transit providers should work together to locate secured indoor bicycle parking in transit stations and in shared parking facilities. Priority: **MEDIUM**

Recommendation 5:

Prioritize TOD Across Agencies

While a list of public policies can set favorable conditions for TOD, substantial public investments are needed to remove impediments to redevelopment and attract the much larger private investments that will build significant amounts of mixed-income housing, mixed-use buildings, and functioning businesses in TODs, especially in moderate and weak markets. Collaboration among a range of agencies is required to make these effective public investments.

Implementers:

CMAP, Municipalities, COGs, State and regional agencies

Priority: **HIGH**

Feasibility: MEDIUM

a. Establish and Direct Resources to Priority Development Areas (PDAs)

The Chicago Metropolitan Agency for Planning (CMAP) should establish a mechanism for communities with transit assets and TOD planning to volunteer to become PDAs. State and Regional agencies as well as Councils of Governments (COGs) should pledge to invest in PDAs, using existing resources such as MAP-21, CMAQ, and CDBG. The San Francisco Bay Area pioneered this "bottom up" strategy, and it has inspired transit rich communities to plan for more TOD with the knowledge that Regional resources are available for implementation.

Implementers:

State agencies, County and municipal governments, Private foundations, Financial institutions

Priority: HIGH

Feasibility: HIGH

b. Support Sub-Regional TOD Funds

In Chicago's south and near west suburbs, inter-municipal coalitions have secured federal Sustainable Communities Challenge grants for the purpose of seeding TOD revolving loan funds. Following examples of comparable TOD funds in San Francisco, Denver, and Minneapolis-St. Paul, these are structured funds that integrate public and philanthropic investments with conventional bank capital to finance mixed-income housing and mixed-use development in TODs. These funds are now in the process of attracting additional investments and planning their first transactions. These ventures should be supported with investments and technical assistance; they should also be viewed as pilots for a broader Regional TOD initiative.

Implementers:

State agencies, Illinois legislators, County and municipal governments, Private foundations, Financial institutions

Priority: **HIGH**

Feasibility: **HIGH**

c. Support Sub-Regional Land Banks

Following the successful examples of dozens of Regions across the country, communities in Chicago's southern suburbs have formed a nonprofit land bank to take title to vacant, foreclosed, and tax-delinquent properties; remove impediments to the reuse of these properties (such as title imperfections, back taxes, and environmental contamination); and return the improved properties to the private market. The Cook County Board is also considering the establishment of a county-wide land bank. Land banks can be powerful tools for facilitating the redevelopment of properties in potential TOD areas. While these emerging land banks can act effectively as nonprofit organizations or as agencies of county government, their capacities could be enhanced by state legislation. The efforts of the south suburban and Cook County land banks should be supported through intergovernmental cooperation and public and private investment. These programs should also be viewed as pilots for a potential Regional land bank or a land bank coalition that would advance TOD throughout metropolitan Chicago.

Implementers:

CMAP, COGs

Priority: **HIGH**

Feasibility: LOW

d. Establish a Sustainable Communities Fund

CMAP and COGs should pledge \$1 billion dollars in federal transportation dollars to a competitive fund that can finance joint development projects and infrastructure improvements that set the stage for TOD, including structured parking, bicycle facilities, and streetscapes. Because COGs have traditionally controlled transportation investment decisions among their member municipalities, they should retain the same discretion and control over the TODs that win awards in the same boundaries. The Sustainable Communities Fund should function in collaboration with sub-Regional and Regional TOD Loan Funds and Land Banks to provide the scale of public investment needed to remove impediments to TOD and allow private investment to flow into TOD across the Region.

Sources Cited

- ¹ The TOD database is a product of the Center for Transit-Oriented Development developed and hosted by the Center for Neighborhood Technology with support from the FTA. The database is available at http://toddata.cnt. org/
- ² Center for Neighborhood Technology. Prospering In Place: Linking Jobs, Development and Transit to Spur Chicago's Economy. Rep. Chicago: Center for Neighborhood Technology, 2012. Print.
- ³ Center for Transit-Oriented Development, *Frequently Asked Questions*, 2012 http://www.ctod.org/faqs.php
- ⁴ 367 is the number of Metra and CTA stations that were operating in the year 2000. In order to most accurately capture change over the 10-year study period, none of the stations opened after the year 2000 were used in this study.
- Center for Transit-Oriented Development, Frequently Asked Ouestions, 2012 http://www.ctod.org/faqs.php
- ⁶ AAA. Your Driving Costs: How Much Are You Really Paying to Drive? Heathrow: AAA, 2012. Print.
- American Public Transportation Association. 2012 Public Transportation Fact Book. Rep. 63rd ed. Washington, DC: American Public Transportation Association, 2012. Print.
- ⁸ Center for Neighborhood Technology. Prospering In Place: Linking Jobs, Development and Transit to Spur Chicago's Economy. Rep. Chicago: Center for Neighborhood Technology, 2012. Print.
- Extensive Regions counties are defined by counties. Boston: Bristol County, MA, Essex County, MA, Middlesex County, MA, Norfolk County, MA, Plymouth County, MA, Suffolk County, MA, Bristol County, RI, Kent County, RI, Newport County, RI, Providence County, RI, Washington County, RI. New York: Fairfield County, CT, New Haven County, CT, Bergen County, NJ, Bronx County, NY, Dutchess County, NY, Essex County, NJ, Hudson County, NJ, Hunterdon County, NJ, Kings County, NY, Mercer County, NJ, Middlesex County, NJ, Monmouth County, NJ, Morris County, NJ, Nassau County, NY, New York County, NY, Ocean County, NJ, Orange County, NY, Passaic County, NJ, Putnam County, NY, Queens County, NY, Richmond County, NY, Rockland County, NY, Somerset County, NJ, Suffolk County, NY, Sussex County, NJ, Union County, NJ, Warren County, NJ, Westchester County, NY, Pike County, PA: . Philadelphia: Burlington County, NJ, Camden County, NJ, Gloucester County, NJ Salem County, NJ, Berks County, PA, Bucks County, PA, Chester County, PA, Delaware County, PA, Montgomery County, PA, Philadelphia County, PA. San Francisco: Alameda County, CA, Contra Costa County, CA, Marin County, CA, Napa County, CA, San Francisco County, CA, San Mateo County, CA, Santa Clara County, CA, Solano County, CA.

- Klinenberg, Eric. Going Solo: The Extraordinary Rise and Surprising Appeal of Living Alone. New York: Penguin, 2012. Print.
- Housing cost values are from the H+T Affordability Index and are based on the American Community Survey's values for gross rent and selected owner costs. For more information see htaindex.cnt.org.
- ¹² 2010 Public Transportation Fact Book, American Public
 Transportation Association, 61st Edition, April 2010
- Based on H+T Affordability Index data for typical regional household.
- Reconnecting America, and Center for Transit-Oriented Development. Transit + Employment: Increasing Transit's Share of the Commute Trip. Tech. no. TOD202. N.p.: Federal Transit Administration, 2008. Print.
- The US Department of Housing and Urban Development defines income groups as follows: Households earning: between 120 and 80 percent Area Median Income (AMI) are considered "moderate-income" have incomes below 80 percent AMI, "low-income" is below 50 percent AMI, "very low-income" and below 30 percent AMI, "extremely low-income."

- Raphael, Steven, and Michael A. Stoll. Job Sprawl and the Suburbanization of Poverty. Rep. Washington D.C.: Brookings, 2010. Print.
- ¹⁷ Kneebone, Elizabeth. Job Sprawl Revisited: The Changing Geography of Metropolitan Employment. Rep. Washington D.C.: Brookings, 2009. Print.
- Raphael, Steven, and Michael A. Stoll. Job Sprawl and the Suburbanization of Poverty. Rep. Washington D.C.: Brookings, 2010. Print.
- ¹⁹ US Census Bureau, Patterns of Metropolitan and Micropolitan Population Change: 2000 to 2010, September 2012
- The neighborhood around the O'Hare airport CTA stop was excluded as there are no households there and thus no household VMT values.
- ²¹ Chicago Loop Alliance. Chicago Loop Alliance: 2010 Annual Report. Rep. Chicago: Chicago Loop Alliance, 2010. Print

ABOUT THE CENTER FOR NEIGHBORHOOD TECHNOLOGY

The Center for Neighborhood Technology (CNT) is an award-winning innovations laboratory for urban sustainability. Since 1978, CNT has been working to show urban communities in Chicago and across the country how to develop more sustainably. CNT promotes the better and more efficient use of the undervalued resources and inherent advantages of the built and natural systems that comprise the urban environment.

As a creative think-and-do tank, we research, promote, and implement innovative solutions to improve the economy and the environment; make good use of existing resources and community assets; restore the health of natural systems and increase the wealth and well-being of people—now and in the future. CNT's unique approach combines cutting edge research and analysis, public policy advocacy, the creation of web-based information tools for transparency and accountability, and the advancement of economic development social ventures to address those problems in innovative ways.

CNT works in four areas: transportation and community development, water, energy and climate. CNT has two affiliates, IGO^{TM} CarSharing and CNT Energy.

CNT is a recipient of the 2009 MacArthur Award for Creative and Effective Institutions.

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