

Appendix D Purpose and Need Report





Chicago Red Line Extension Project

Purpose and Need Report

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Abbreviations and Acronyms

CHA	Chicago Housing Authority
CMAP	Chicago Metropolitan Agency for Planning
СТА	Chicago Transit Authority
EIS	Environmental Impact Statement
FTA	Federal Transit Administration
MAP-21	Moving Ahead for Progress in the 21st Century Act
NICTD	Northern Indiana Commuter Transportation District
RA	redevelopment areas
RLE	Red Line Extension
TIF	tax increment financing





Section 1 Introduction

The Federal Transit Administration (FTA), as lead federal agency, and the Chicago Transit Authority (CTA), as the project sponsor, have jointly prepared a Draft Environmental Impact Statement (EIS) to evaluate potential impacts on the human and natural environment that may result from the construction and operation of Red Line Extension (RLE) alternatives including the Locally Preferred Alternative. As part of the Red Ahead Program, the CTA proposes to extend the existing Red Line 5.3 miles south from the existing 95th Street Terminal. CTA proposes to cover a portion of the project funding by applying for federal funds administered by the FTA.

This report identifies the purpose and need for transportation improvements within the project area. Developed from the Purpose and Need statement presented in the RLE Alternatives Analysis document, as well as from input received from the public during the EIS public scoping process, this report describes CTA's basis for advancing the proposed action, identifies objectives that frame the development and evaluation of the alternatives, and sets the stage for subsequent National Environmental Policy Act analysis leading to the final agency decision on the proposed action.





Section 2 The Purpose of the Red Line Extension Project

The purpose of the RLE Project is as follows:

- Reduce commute times for residents both within and south of the project area.
- Improve mobility and accessibility for transit-dependent residents in the project area.
- Improve rapid transit rail service to isolated areas and provide viable linkages between affordable housing (e.g., Altgeld Gardens Housing Complex),¹ jobs, services, and educational opportunities, thereby enhancing livability and neighborhood vitality.
- Provide an opportunity for potential connections and linkages to other public transportation modes including regional commuter rail in the project area.
- Foster economic development in the project area, where new stations may serve as catalysts for neighborhood revitalization and help reverse decades of disinvestment in local business districts.
- Provide a modern, efficient rail car storage yard and shop facility to provide storage and costeffective preventive maintenance for rail cars associated with the RLE Project, rail cars currently stored in the existing 98th Street Yard and Shop, and rail cars supporting additional Red Line expansion of service.

¹ The Altgeld Gardens Housing Complex meets the FTA's definition of *legally binding affordability restricted housing*. This definition includes, but is not limited to, state or federal-supported public housing and housing owned by organizations dedicated to providing affordable housing. The Altgeld Gardens Housing Complex is owned and operated by the City of Chicago Housing Authority.





Section 3 The Need for the Red Line Extension Project

The need for the RLE Project is demonstrated by the following existing conditions:

- Transit trips to jobs are longer for Far South Side residents than they are for commuters in the Chicago region as a whole.
- Transit-dependent populations in the project area have limited direct access to rapid transit rail service.
- The project area is geographically isolated from major activity centers and provides residents limited viable transportation options, which limit access between affordable housing (e.g., Altgeld Gardens Housing Complex), and employment centers outside of the project area.
- Existing transit markets are underserved and transit connectivity is challenging in the project area.
- Disinvestment and limited economic development in the project area have negatively affected Far South Side communities.
- The existing 98th Street Yard does not have capacity to store rail cars for any substantial increase in Red Line capacity accompanying future Red Line expansion.





Section 4 The Red Line Extension Project Area

The project area is 11 miles south of the Chicago central business district (commonly referred to as the Loop) and encompasses approximately 20 square miles. The boundaries extend from 95th Street on the north, Ashland Avenue on the west, Stony Island Avenue on the east, and the Calumet-Sag Channel/Little Calumet River and 134th Street on the south (see **Figure 4-1**).

The project area includes expressways, regional arterials (through roads), commuter and freight railroads, intermodal connectors, local streets, and pedestrian facilities. The expressways that pass through the project area are Interstate 94 (I-94, also known as the Dan Ryan Expressway north of 95th Street and the Bishop Ford Freeway south of 95th Street) and Interstate 57 (I-57). I-94 runs north-south from 95th Street to 99th Street, curves east, then curves south and extends along the west side of Lake Calumet. I-57 splits from I-94 at 95th Street, runs south, on an alignment east of the Metra Rock Island District commuter rail line to 115th Street, then curves south along the western limit of the project area. Halsted Street and Ashland Avenue are the only north-south arterial streets that extend well beyond the northern and southern project limits.

Commuter rail in the project area is operated by Metra and includes the Rock Island District, Electric District Mainline, and Electric District Blue Island Branch. The Northern Indiana Commuter Transportation District operates the South Shore Line, which shares tracks with the Metra Electric District Mainline north of 115th Street. Freight trains in the project area use tracks owned by the Union Pacific Railroad, Canadian National Railroad, Chicago South Shore & South Bend Railroad, Norfolk Southern Railroad, and Indiana Harbor Belt Railroad.

The project area comprises residential (primarily single-family), industrial (both existing and vacant), and commercial development. It encompasses parts of nine community areas in the City of Chicago and the eastern section of the Village of Calumet Park. Chicago community areas include Beverly, Washington Heights, Roseland, Morgan Park, Pullman, South Deering, West Pullman, Riverdale, and Hegewisch.

The ethnicity of the population in the project area is predominantly Black or African American, ranging from 89 percent in the Village of Calumet Park to 97 percent in Roseland and Washington Heights. A majority of the project area population is low income.













Section 5 Justification of the Purpose and Need

5.1 Long Transit Trips to Job Centers for Far South Side Residents

Lengthy travel times affect low-income, minority, and transit-dependent populations in the project area. During 2005–2010, commute times were 24 percent longer for project area residents than for other commuters in the Chicago region (see **Table 5-1**). The Chicago region is a seven-county area including the counties of Cook, DuPage, Kane, Kendall, Lake, McHenry, and Will. The average commute time in the Chicago region was 31.6 minutes one-way, while commute times for residents in the project area averaged 39.3 minutes. **Figure 5-1** details commute times in the project area.

Mean Travel Time to Work (Minutes)
31.7
33.6
39.3

Table 5-1: Mean Travel Time to Work (2005-2010)

Source: U.S. Census Bureau 2010









Source: U.S. Census Bureau 2010 Figure 5-1: Mean Travel Time to Work (Minutes)





On the region's expressways and major arterials, traffic congestion has steadily increased over the past decades. In the project area, roadway capacity constraints and expressway and arterial traffic congestion limit the mobility of residents. **Figure 5-2** shows existing traffic volume per roadway capacity (AM peak period, 2010) on project area roadways based on 2010 data. The 2010 traffic data is based on actual traffic counts provided by the Chicago Department of Transportation and Illinois Department of Transportation. Chicago is ranked seventh in the nation for travel time ratio (peak travel times versus free flow travel time), and third for travel delay, excess fuel consumed, and total congestion costs (Texas Transportation Institute 2011).

Substantial traffic congestion occurs on expressways and arterial streets throughout the project area. Traffic on the roadway network is approaching capacity during the morning peak period and congestion is expected to worsen by 2030 (see **Figure 5-3**). At-grade freight railroad crossings cause further delays on arterial streets, affecting travel times to the CTA 95th Street Terminal. The Union Pacific Railroad operates approximately 27 trains per day through the project area and has at-grade crossings at several east-west arterials. Similarly, delays occur due to the Metra Electric District Blue Island Branch commuter trains, which have at-grade crossings at several major arterials. The *Transportation Technical Memorandum* contains additional information about existing traffic conditions and CMAP traffic projections.











Figure 5-3: Projected Traffic Volume/Capacity (2030, AM Peak Period, No Build Alternative Conditions)





Complex transfers to reach the 95th Street Terminal make commute times greater than two hours one-way for some project area residents (Chicago Metropolitan Agency for Planning [CMAP] 2012). Project area residents accessing the station by bus and other modes of transportation experience measureable delays and difficult transfers resulting from congestion at arterial street intersections. Travel times to jobs north of 95th Street, including the major employment centers in downtown Chicago, are long for both auto and transit commuters.

High unemployment rates in the area indicate the need for improved access to jobs, as shown in Table 5-2. By 2030, the jobs-to-population balance is expected to improve for the project area from one job for every seven adult residents in 2010 to one job for every five adult residents. This ratio would represent improved access to jobs in the project area; however, at that ratio, the area would remain far below the existing and forecasted city and regional averages of one job for every two adult residents in years 2010 and 2030, respectively (CMAP 2012, 2013).

Area	Unemployment Rate
Seven-County Area	19.9%
City of Chicago	12.0%
Red Line Extension Project Area	19.0%
Community Areas within the Project	et Area
Washington Heights	18.8%
Roseland	21.2%
Morgan Park	17.0%
West Pullman	18.5%
Pullman	21.4%
Riverdale	34.8%
Village of Calumet Park	17.4%

Table 5-2: Unemployment Rates in Affected Communities

Source: ACS 2009-2013 5-Year Estimates

5.2 Transit-Dependent Populations Lack Direct Access to Rapid Transit Rail Service

The majority of the project area population is low income. According to the 2010 U.S. Census, the median household income in the project area is \$41,014, which is less than the median household income for the City of Chicago (\$46,877), and also less than the median household income for the seven-county area (\$61,863) (U.S. Census Bureau 2010). The community with the lowest median household income in the project area is Riverdale (\$11,181), which is substantially lower than the rest of the project area and the City of Chicago. The community with the highest median household income in the project area is the Village of Calumet Park (\$53,785). While the seven-county region, the City of Chicago, and the project area all experienced a decline in median household incomes between 2000 and 2010, the project area has experienced a far greater decline (see **Table 5-3**).





Table 5	-3: Household	Income I	Declines ir	n Red Line	Extension	i Project A	rea (2000 to	2010, 2	2010
Dollars)	1					-			

Area	2000 Median Household Income	2010 Median Household Income	Percent Change
Seven-County Area	\$ 66,064	\$ 61,863	-6.8%
City of Chicago	\$ 48,911	\$ 46,877	-4.3%
RLE Project Area	\$ 49,548	\$ 41,014	-20.8%

Source: U.S. Census Bureau 2010

Lengthy travel times to jobs are a particular problem for transit-dependent populations in the project area. Based on the number of vehicles available per household, transit-dependency is higher in the project area than in the seven-county region (see **Table 5-4** and **Table 5-5**). As **Table 5-5** shows, the project area has higher percentages of elderly and disabled populations than the seven-county region and the City of Chicago, along with lower household income levels.

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Area	Average Household Size	Total Households	No Vehicle Available	1 Vehicle Available	2 Vehicles Available	3 or More Vehicles Available
Seven-County Area	2.84	3,824,379	229,889 (6%)	963,008 (25%)	1,576,468 (41%)	1,055,014 (28%)
City of Chicago	2.52	1,161,573	177,352 (15%)	470,228 (40%)	353,218 (30%)	160,775 (14%)
RLE Project Area	2.88	44,610	4,446 (10%)	16,263 (36%)	14,857 (33%)	9,044 (20%)
Altgeld Gardens	3.06	1,374	457 (33%)	618 (45%)	185 (13%)	114 (8%)
Southwest Roseland (Tract 4910)	3.39	1,116	249 (22%)	325 (29%)	428 (38%)	114 (10%)

Source: U.S. Census Bureau 2010

Table 5-5: Socioeconomic Indicators Correlated to Transit Dependence

Characteristic	Seven-County Area		City of Chicago		RLE Project Area	
Characteristic	Total	Percent	Total	Percent	Total	Percent
Total Population	8,431,386	100.0%	2,695,598	100.0%	128,366	100.0%
Persons Age 65+	<i>952,026</i>	11.3%	277,932	10.3%	<i>16,733</i>	15.3%
Persons Age 17 and Younger	2,118,767	25.1%	621,630	23.1%	29,584	27.0%
Total Population (Ages 5+)	7,450,445	100.0%	2,651,049	100.0%	126,657	100.0%
Disabled People (Ages 5+)	765, 147	10.3%	290,748	11%	19,562	15.4%
Total Households	3,824,379	100.0%	1,161,573	100.0%	44,610	100.0%
Households with income <\$40,000	988,729	25.9%	452,957	39%	20,710	46.4%

Source: U.S. Census Bureau 2010; U.S. Census Bureau 2012 (data for disabled people only)





Average household size is greater in the project area than in the seven-county region and the City of Chicago, increasing the demand for multiple vehicles. In particular, residents in locations such as the Altgeld Gardens Housing complex and southwest Roseland have a much greater dependency on transit, with higher household size and lower number of vehicles available per household. Based on vehicle ownership, the City of Chicago shows a slightly higher transit-dependent population than the project area; however, it may be attributed to lifestyle choice versus automobile affordability in addition to greater access to public transportation.

Compared to the seven-county region and the City of Chicago, the project area has a greater concentration of elderly and disabled populations. More information on sensitive populations is available in the *Environmental Justice Technical Memorandum*.

Based on the socioeconomic indicators presented in this section, the RLE project area generally has higher transit dependency than the overall Chicago region. The closest rapid transit rail station is at the northern edge of the project area (CTA's 95th Street Terminal) requiring long trips to access the rapid transit rail system. As further discussed in **Sections 5.1 and 5.3**, average travel time for work trips are higher in the project area than in the seven-county region due to traffic congestion and the time required to ride a bus to the 95th Street Terminal and transfer to the Red Line. The combination of these conditions underscores the need for improved connectivity and access to more efficient modes of travel.

5.3 Isolation from Major Activity Centers and Limited Viable Transportation Options

5.3.1 Existing Transportation Options

Despite the substantial amount of roadway infrastructure in the project area, expressways and arterial streets frequently become congested, limiting mobility. Mobility is further inhibited by the limited options for connecting to the CTA's rail system. Although bus routes operated by CTA and Pace provide service 24 hours a day, buses in the project area are frequently delayed by congestion on arterial streets leading to the 95th Street Terminal. None of the Red Line stations along the Dan Ryan branch currently have park & ride facilities, precluding residents from accessing the stations by car unless they are dropped off. Several bus routes serve the 95th Street Terminal and Metra stations; however, the large residential tracts surrounded by local streets limit the bus network. **Figure 5-5** shows the existing bus routes and rail lines in the project area.







Figure 5-5: Existing Public Transportation in the Red Line Extension Project Area





The Metra Rock Island District commuter rail line has two stations at the west end of the project area at 95th Street and 103rd Street. The Metra Electric District Mainline has four stations from 103rd Street to 115th Street and the Metra Electric Blue Island Branch has five stations from Ashland Avenue to State Street. Although it is unaffected by automobile congestion, Metra service is infrequent, and some stations, including both of the Rock Island District stations, have no mid-day or weekend service. Metra service is useful for peak-hour commuters traveling to and from downtown Chicago, but less convenient for off-peak travel or for non-downtown commutes that may require transferring to the CTA network. The Northern Indiana Commuter Transportation District does not have a station in the project area.

While the project area does have an extensive sidewalk and crosswalk system along the road network, physical divisions between communities include the ME mainline, which is on an embankment; Lake Calumet; the Little Calumet River; and the UPRR right-of-way, which extends north-south from 99th Street to 119th Street; and large tracts of industrial land. These physical divisions are difficult to cross for pedestrians and bicyclists, and effectively separate the communities on either side. This geographic isolation is particularly problematic for residents of the Altgeld Gardens public housing project at the south end of the project area between 130th Street and 134th Street in the Riverdale community area. Residents in this area have limited employment opportunities and transportation choices within walking distance of their homes. The project area currently has limited bicycle infrastructure although improvements are planned. The off-street bicycle trail, the Major Taylor Trail, extends southeast from 105th Street and Throop Street to the Whistler Woods Forest Preserve, south of the Little Calumet River in Riverdale. Bicycle lanes in the project area include the following:

- 103rd Street From Michigan Avenue to Cottage Grove Avenue Standard Bicycle Lanes
- State Street From 95th Street to 99th Street Standard Bicycle Lanes
- State Street From 99th Street to 103rd Street Marked-Shared Bicycle Lanes
- Vincennes Avenue From 89th Street to 103rd Street Barrier-Protected Bicycle Lanes
- Woodlawn Avenue From 103rd Street to 111th Street Standard Bicycle Lanes
- Vincennes Avenue From 103rd Street to 105th Street "Future 2015" Buffer Protected Bicycle Lanes
- 105th Street From Vincennes Avenue to Major Taylor Trail "Future 2015" Marked Shared Lanes
- Cottage Grove Avenue From 93rd Street to 115th Street "Future 2015" Buffer-Protected Bicycle Lanes

There is a need for additional transportation options to address the shortcomings in roadway, transit, pedestrian, and bicycle infrastructure in the project area. More information on existing travel patterns in the project area is available in the *Transportation Technical Memorandum*.





5.3.2 Affordable Housing Options

Residential houses in the project area had an estimated median value of \$95,000 compared to \$161,000 for the City of Chicago (2013 dollars). The median monthly rental price (for 2012) in the project area is estimated at \$1,237 compared to \$1,501 for the City of Chicago (Zillow 2012a, 2012b).

An example of vacant affordable housing in the project area is Altgeld Gardens, one of the country's first public housing complexes, where approximately 3,500 residents currently reside in 1,500 housing units (Altgeld Gardens, 2013). Given the age of the complex, several of the vacant units require rehabilitation before they can be inhabited. As a result, the Chicago Housing Authority (CHA), supported by a \$265 capital improvement program, will rehabilitate 218 units in fiscal year 2015 (CHA 2014). As with other affordable housing opportunities in the project area, residents at Altgeld Gardens are challenged by the affordable housing/transit availability mismatch, in that housing in the project area is affordable but the commute time and effort required to reach viable employment areas are high. Given CHA's investment at Altgeld Gardens, the proposed project has the opportunity to result in a mutual benefit by leveraging the rehabilitation of the housing/transit availability mismatch.

There is a high percentage of vacant homes in the project area—13 percent higher than the City of Chicago (CMAP 2012). Several factors contribute to housing vacancy rates in a particular community. These factors include, but are not limited to, safety and security, proximity to public services, access to jobs, quality of schools, age and type of available housing units, quality of life, and the overall health of the community. Improved public transportation options, combined with affordable housing stock, would serve as a catalyst to bring people to the area that would not otherwise consider communities in the project area as a viable place to live. The mutual benefit for project area residents, and those seeking affordable housing, could be met through rapid transit south of the 95th Street Terminal. See **Figure 5-6** for affordable housing locations in the project area.







Figure 5-6: Affordable Housing Locations in the Red Line Extension Project Area





5.3.3 FTA Regulatory Framework

In August, 2013, FTA published the final rule implementing changes to the New Starts/Small Starts program. This rule is known as the *Moving Ahead for Progress in the 21st Century Act* (known as "MAP-21"). The program is focused on measuring a wider set of project benefits and streamlining the project evaluation process. Under Map-21, "land use" is a quantitative evaluation of several measures, including the share of legally binding affordable housing in the corridor.

In addition to the Map-21 evaluation of affordable housing, the U.S. Department of Housing and Urban Development, the U.S. Department of Transportation, and the U.S. Environmental Protection Agency joined together to form the Partnership for Sustainable Communities. This interagency partnership helps communities nationwide to improve access to affordable housing, increase transportation options, and lower transportation costs while protecting the environment.

The partnership agencies incorporated six principles of livability into federal funding programs, policies, and future legislative proposals:

- Provide more transportation choice.
- Promote equitable, affordable housing.
- Enhance economic competitiveness.
- Support existing communities.
- Coordinate and leverage federal policies and investment.
- Value communities and neighborhoods.

Each of the livability principles identified above are key elements of this project area. More transportation options and improved access to affordable housing would enhance livability in the project area.

5.4 Underserved Transit Markets and Limited Transit Connectivity

CTA and Pace bus services are provided on the east-west and north-south thoroughfares with 16 CTA and 6 Pace routes operating in the project area (not including night bus routes). Of those 22 total bus routes, 18 serve the 95th Street Terminal on the Red Line. **Table 5-6** summarizes existing bus routes, average bus ridership, and routes that serve the 95th Street Terminal. Currently the 95th Street Terminal serves as the only point of connection between CTA and Pace buses.

Metra service in the project area includes the Rock Island District, Electric District Mainline, and Electric District Blue Island Branch. The Northern Indiana Commuter Transportation District (NICTD) operates the South Shore Line, which shares tracks with the Metra Electric District Mainline north of 115th Street. Neither Metra nor NICTD connect to the 95th Street Terminal.

Table 5-6 demonstrates the demand for access to the 95th Street Terminal and the Red Line.





Route Number and Name	2014 Average Weekday Ridership	Maximum Monthly Average Weekday Ridership (May 2012 to April 2013) ³	Serves 95th Street Terminal⁵
#3 King Drive	19,224	21,125	No
#8A South Halsted	3,238	3,784	No
#9 Ashland ¹	26,871	29,066	Yes
#28 Stony Island	7,208	8,014	No
#29 State	13,342	14,012	Yes
#34 South Michigan	5,150	5,690	Yes
#95E 93rd/95th	3,830	4,307	Yes
#95W West 95th	2,369	2,605	Yes
#100 Jeffery Manor Express	674	733	Yes
#103 West 103rd	2,674	3,101	Yes
#106 East 103rd	1,831	2,309	Yes
#108 Halsted/95th	1,322	1,553	Yes
#111 111th/King Drive ²	3,763	4,366	Yes
#112 Vincennes/111th ²	2,289	2,740	Yes
#115 Pullman/115th ²	3,990	4,594	Yes
#119 Michigan/119th	4,725	5,068	Yes
#348 Harvey - Riverdale - Blue Island	332	399	No
#352 Halsted	6,099	6,574	Yes
#353 95th - Riverdale- Homewood	1,769	2,011	Yes
#359 Robbins/South Kedzie Avenue	1,460	1,643	Yes
#381 95th Street	4,038	4,593	Yes
#395 CTA 95th - UPS	529	669	Yes

Table 5-6: Chicago Transit Authority Ridership Summary

Source: CTA 2014

Notes:

- 1. #9 Ashland serves the 95th Street Terminal only with the Night Owl Service.
- 2. Only January through April 2013 is shown for bus routes #111 and #115 due to a route change in December 2012.
- 3. Maximum monthly average weekday ridership is based on the 12-month period from May 2012 through April 2013. In May 2013, Red Line (Dan Ryan) reconstruction changed ridership patterns during construction.
- 4. Night service route #N5 is not included in this table.
- 5. Service to the 95th Street Terminal is based on route maps current as of July 31, 2013.

A potential transit travel market that is not currently well served is drive-access transit trips from within and south of the project area. There are no CTA park & ride facilities on the existing Red Line Dan Ryan branch. All of the other CTA rail rapid transit branches, with the exception of the Green Line Lake Street branch, have park & ride facilities. CTA's newest rail rapid transit line, the Orange Line (opened in 1993), has park & ride facilities at five of eight stations. The Blue Line has





park & ride facilities at Rosemont and Cumberland stations, conveniently located near the I-90 Kennedy Expressway. A previous survey at these Blue Line park & ride stations found that passenger access CTA rail by car from 93 suburbs; 74 percent of all trips originated in the northwest suburbs or northwest Chicago (CTA 1994). Similar conditions, such as crowded expressways and expensive parking in the Loop, face travelers from southern Cook County and beyond. CTA park & ride facilities near major expressways or arterial streets in the southern portions of the project area, would provide new, convenient drive access possibilities on the Red Line.

Other potential transit travel markets include reverse commute trips, school trips, and home-based other trips within southern communities. Several educational facilities are in the project area, including Chicago State University (7,200 students), Olive-Harvey College (4,300 students), and several high schools (including Harlan, Corliss, Fenger, Julian, Brooks, and Carver High Schools) that would benefit from transit improvements in the project area.

Transportation equity is the fair distribution of transportation resources so that no group carries an unfair burden of the negative environmental, social, or economic impacts, or receives an unfair share of benefits. The project area population is almost entirely minority. Many residents do not have access to an automobile and rely on transit for mobility. In addition, daily parking costs in downtown Chicago are among the highest in the United States, further limiting the project area population's access to downtown. Transit improvements in the project area would serve all transportation system users, including low-income and underrepresented populations, and would provide better access to affordable housing in the project area.

5.5 Disinvestment and Limited Economic Development Have Affected Far South Side Communities

The project area has had ongoing disinvestment, including loss of manufacturing jobs, which has led to a decline in population, services, and job opportunities. Once-vibrant retail districts, such as Michigan Avenue and Halsted Street, now contain vacant land and storefronts. This decline may be seen in decreases in project area population and employment compared to the City of Chicago and the seven-county region (see **Table 5-7** and **Table 5-8**).

Area	2000 Population	2010 Population	Percent Change		
Seven-County Area	8,146,264	8,399,893	3.02%		
City of Chicago	2,895,964	2,700,741	-7.23%		
RLE Project Area	147,662	128,366	-15.03%		

Table 5-7: Population Decline in Red Line Extension Project Area (2000 to 2010)

Source: U.S. Census Bureau 2010





Area	2000 Employment ¹	2010 Employment	Percent Change
Seven-County Area	4,083,530	4,429,414	8.49%
City of Chicago	1,358,054	1,410,294	3.84%
RLE Project Area	62,587	56,105	-11.50%

Table 5-8: Employment Decline in Red Line Extension Project Area (2000 to 2010)

Source: U.S. Census Bureau 2010

The City of Chicago is focusing on stabilizing, improving, and redeveloping communities in and adjacent to the project area. As a result, the City has designated several tax increment financing (TIF) districts, Redevelopment Areas (RA), Special Service Areas (SSAs), and Industrial Corridors in the project area. Major incentive zone areas in the project area include the following:

- 119th/Halsted Mixed-Use Area
- Roseland/Michigan Avenue Mixed-Use Area
- West Pullman Industrial Park Mixed Use Area
- North Pullman Mixed-Use Area
- 105th/Vincennes Mixed-Use Area
- 87th/Cottage Mixed-Use Area
- 119th & I-57 Redevelopment Area
- 107th/Halsted Mixed-Use Area
- Calumet Commercial Area
- Lake Calumet Indiana Industrial Corridor
- Stoney Island/Burnside Industrial Area
- SSA#40 Michigan Avenue/Roseland
- SSA #41 103rd Street/Roseland
- SSA \$45 103rd Street/Halsted

In addition to economic revitalization initiatives, viable transportation options continue to be a key element in the success of economic development efforts and revitalization for communities within the project area. Examples of redevelopment in the project area include the Pullman District, the Method factory, and Walmart opening a store in 2014.





Located in the project area and referred to as the Pullman community area of Chicago, the Pullman District includes the Pullman factory, the Hotel Florence, and the Pullman Railroad Porters National Museum. This district was named a National Monument on February 19, 2015, making it a component of the National Park System. (Ward 9 Website 2015)

Building on the Pullman's community history as a manufacturing hub, Method, a manufacturer of environmentally-friendly cleaning and personal care products, has announced the opened a new 150,000 square foot factory in Pullman in April 2015. The Community Development Commission approved \$8.1 million in tax increment financing for infrastructure improvements in Pullman Park in support of the Method plant construction. The plant has created approximately 100 jobs with good salaries, giving employees the opportunity to buy a home, raise a family, and build a financially secure future (Method 2015).

Bringing rail transit to an area that has not experienced recent growth may not only directly improve mobility for community residents, but it may also promote business and real estate investment confidence through the permanency of the improvement. The realization by investors that the rail infrastructure is a permanent enhancement in the area, and would provide better regional connectivity, may promote redevelopment and economic stabilization in the area. A local example is CTA's Brown Line Capacity Expansion Project where median home values near the Brown Line grew more than 40 percent between the years 2000 and 2011; the same time transit improvements where implemented in the corridor. Moreover, a Chicago-based economic development research organization determined that for every dollar spent on transit operating and capital expenses, the Chicago area will realize a return on investment of at least \$1.21 and as much as \$1.64. (Chicago Metropolis 2020 2007)

5.6 The Need for a Rail Car Storage Yard and Maintenance Facility

The existing 98th Street Yard does not have capacity to store rail cars required for any substantial increase in Red Line capacity accompanying future Red Line expansion. Two yard and shop facilities, Howard Yard at the north end of the Red Line and 98th Street Yard at the south end of the Red Line, provide storage for vehicles operating along the Red Line. Any Red Line expansion must consider the capacity of both yards. (The Howard Yard and the 98th Street Yard together supply rail cars for both the northern and southern portion of the Red Line.) All northbound trains currently begin their run at 98th Street Yard, and any expansion of Red Line service would require expanded yard capacity at or near the southern end of the Red Line. The existing 98th Street Yard in landlocked between interstate ramps for I-94 and I-57. There is no room to expand the yard without major realignments for the two highways. In addition, the existing 98th Street Yard is oriented as a terminal yard for service to and north of the 95th Street station. With the RLE Project expanding service to the south, use of the 98th Street Yard would lead to inefficient operations. Moving trains into and out of the existing yard, due to the orientation of the yard, would cause operational inefficiencies and potential capacity constraints to Red Line service.





Section 6 Project Goals

The goals for the RLE Project were developed, reviewed, and defined during CTA's RLE Alternatives Analysis. The goals, which helped define the evaluation criteria used in screening potential alternatives, are included in **Table 6-1**.

Goal	Objectives	Description
Goal 1	Reduce Travel Times	Reduce travel times for residents from within and south of the project area to the 95th Street Terminal and the Loop. Provide direct access to the CTA rail system for transit- dependent populations. Provide new stations convenient to transit-dependent communities. Provide direct service to public housing such as Altgeld Gardens.
Goal 2	Increase Travel Choices	Provide better transit access to regional employment centers and local commercial areas. Allow for potential connections to other public transportation modes including regional commuter rail. Reduce geographic isolation of the project area and improve connections to major activity centers. Provide opportunities for drivers commuting on expressways to park and use transit to complete their trips.
Goal 3	Increase Economic Competitiveness	Foster economic development in the project area by providing stations that can encourage nearby development.
Goal 4	Environmental Criteria	 Displacement and relocation impacts
		 Noise Impacts
		 Park Impacts
		 Community Character Impacts
		 Visual and Aesthetic Impacts
Goal 5	Provide the Best Value	 Projected ridership
		 Capital costs to construct the project
		 Changes in operating and maintenance costs for the system

Table 6-1: Goa	als of the Red	Line Extension	Project Area





Section 7 Conclusions

To meet the project needs identified in CTA's RLE Alternatives Analysis document and in response to the stated project goals above, the RLE Project is being proposed to reduce commute times, improve transit service, increase transportation choices, and promote economic development. The project is needed to respond to the limited transit choices, limited employment options, the need for connectivity to affordable housing, and the need to reverse disinvestment for communities on the Far South Side of Chicago. The purpose and need describes CTA's basis for advancing the proposed project and identifies objectives that frame the development and evaluation of the alternatives in the Draft EIS.





Section 8 References

Altgeld Gardens. 2013. The Garden Spot of America. Available at: www.altgeldgardens.com. Accessed July 23, 2013.

Chicago Housing Authority. 2014. Proposed FY2015 Moving to Work Annual Plan. October 24, 2014. Available at: http://www.thecha.org/file.aspx?DocumentId=1219. Accessed on March 10, 2015.

Chicago Metropolitan Agency for Planning (CMAP). 2010. *GO TO 2040 Comprehensive Regional Plan*. Available at: http://www.cmap.illinois.gov/about/2040. Accessed on September 16, 2014.

CMAP. 2012. 2010 Forecasts. Available at: www.cmap.illinois.gov/data. Accessed on August 7, 2013.

CMAP. 2013. 2030 No Build Forecasts. Available at: www.cmap.illinois.gov/data. Accessed on August 7, 2013.

Chicago Transit Authority (CTA). 1994. O'Hare Park & Ride Surveys: Phase II, CTA Market Research Department. April 1994.

CTA. 2013. Ridership Reports and RTAMS Pace Ridership dataset, May 2012 to April 2013.

Method. 2015. Method breaks Ground and Unveils Designs for its First U.S. Manufacturing Plant Available at: http://methodhome.com/press/method-breaks-ground-unveils-designs-first-u-s-manufacturing-plant/. Accessed in April 2015

Partnership for Sustainable Communities. 2013. About Us. Available at: http://www.sustainablecommunities.gov/mission/about-us. Accessed in June 2013.

Texas Transportation Institute. 2011. Real-Timing the 2010 Urban Mobility Report.

Chicago Metropolis 2020. 2007. Time is Money – The Economic Benefits of Transit Investment. Available at: http://www.edrgroup.com/pdf/timeismoney.pdf. Accessed in April 2105.

U.S. Census Bureau. 2010. 2005–2010 American Community Survey.

Ward 9 Website. 2015. Available at: http://www.ward09.com/site/epage/157407_292.htm. Accessed in April 2015.Zillow. 2012a. Calumet Park Home Prices and Home Values in Illinois. Available at: http://www.zillow.com/calumet-park-il/home-values/. Accessed in October 2012.

Zillow. 2012. Chicago Home Prices and Home Values in Illinois. Available at: http://www.zillow.com/chicago-il/home-values/. Accessed in October 2012.

