

EXECUTIVE SUMMARY

WHAT IS THE PURPOSE OF THIS DOCUMENT?

The Southwest Transitway project seeks federal funds to help pay for its construction, and as a result, the project must be reviewed under the National Environmental Policy Act (NEPA). The regulations of the Council on Environmental Quality (CEQ) implementing NEPA ensure that information on the social and environmental impacts of any federally funded action is available to public officials and citizens before decisions are made and before actions are taken. NEPA regulations direct Federal agencies to integrate into their planning and decision-making the natural and social sciences, environmental amenities and values, and the design arts along with the necessary engineering and economic considerations. The objective is to balance infrastructure development, economic prosperity, health and environmental protection, community and neighborhood preservation, and quality of life.

In addition to NEPA, the provisions of other statutes, regulations and executive orders affect the decision-making on federally assisted transportation projects. These mandates and considerations cover such concerns as air and water quality, historic preservation, parklands protection, habitat preservation, civil rights and social burdens of transportation investments. FTA uses the NEPA process as the overarching umbrella under which the mandates and considerations of all laws affecting transit project development are considered.

This Draft Environmental Impact Statement (Draft EIS) discusses (1) the purpose and need for the project, (2) the alternatives considered, (3) the impacts of these alternatives, and (4) the agencies and persons consulted.

The Southwest Transitway is currently included in the *2030 Transportation Policy Plan* (2030 TPP) (2009), the region's long-range transportation plan; Hennepin County's long-range transportation plan; the *Hennepin County Transportation System Plan (TSP)*; and the comprehensive and transportation plans of the local municipalities in the study area.

WHO IS THE PROJECT SPONSOR?

FTA is the federal lead agency under NEPA, and Hennepin County Regional Railroad Authority (HCRRA) is the state lead agency under the Minnesota Environmental Policy Act (MEPA) for development of the Draft EIS. As of Sept 2, 2011 when the Southwest Transitway project was accepted into the federal New Starts program, Metropolitan Council became the project sponsor and federal grantee. Metropolitan Council will lead the process for development of the Final Environmental Impact Statement (Final EIS), preliminary engineering, and, should the Southwest Transitway project proceed, final design and construction.

WILL THE PUBLIC HAVE AN OPPORTUNITY TO COMMENT ON THE DRAFT EIS?

Yes. The Draft EIS has been made available to the public through a notice of availability published in the Federal Register and in the local newspapers of general circulation. Written comments on the Draft EIS will be accepted for a 60-day time period from

October 12 through December 11, 2012. Comments on the Draft EIS may be submitted through email, mail, or in person at one of the public hearings that will be held specifically for that purpose. Public hearings to receive comments on the Draft EIS are scheduled as follows:

Tuesday, November 13th. Hennepin County Government Center, A-2400
4:00 to 5:00 PM public open house (Public Service Level)
4:30 PM Formal Public Hearing

Wednesday, November 14th, St. Louis Park City Hall, 5005 Minnetonka Boulevard
5:00 to 6:00 PM public open house
6:00 PM Formal Public Hearing

Thursday, November 29th, Eden Prairie City Hall, 8080 Mitchell Road
5:00 to 6:00 PM public open house
6:00 PM Formal Public Hearing

The address to which written comments should be sent is:

Hennepin County
Housing, Community Works & Transit
701 Fourth Avenue South, Suite 400
Minneapolis, MN 55415

or swcorridor@co.hennepin.mn.us

A summary of public involvement activities can be found in Chapter 12 of this Draft EIS.

WHAT HAPPENS AFTER THE CLOSE OF THE COMMENT PERIOD?

Following the close of the comment period, FTA and the project sponsor will consider all comments submitted and will respond to those comments in the Final EIS.

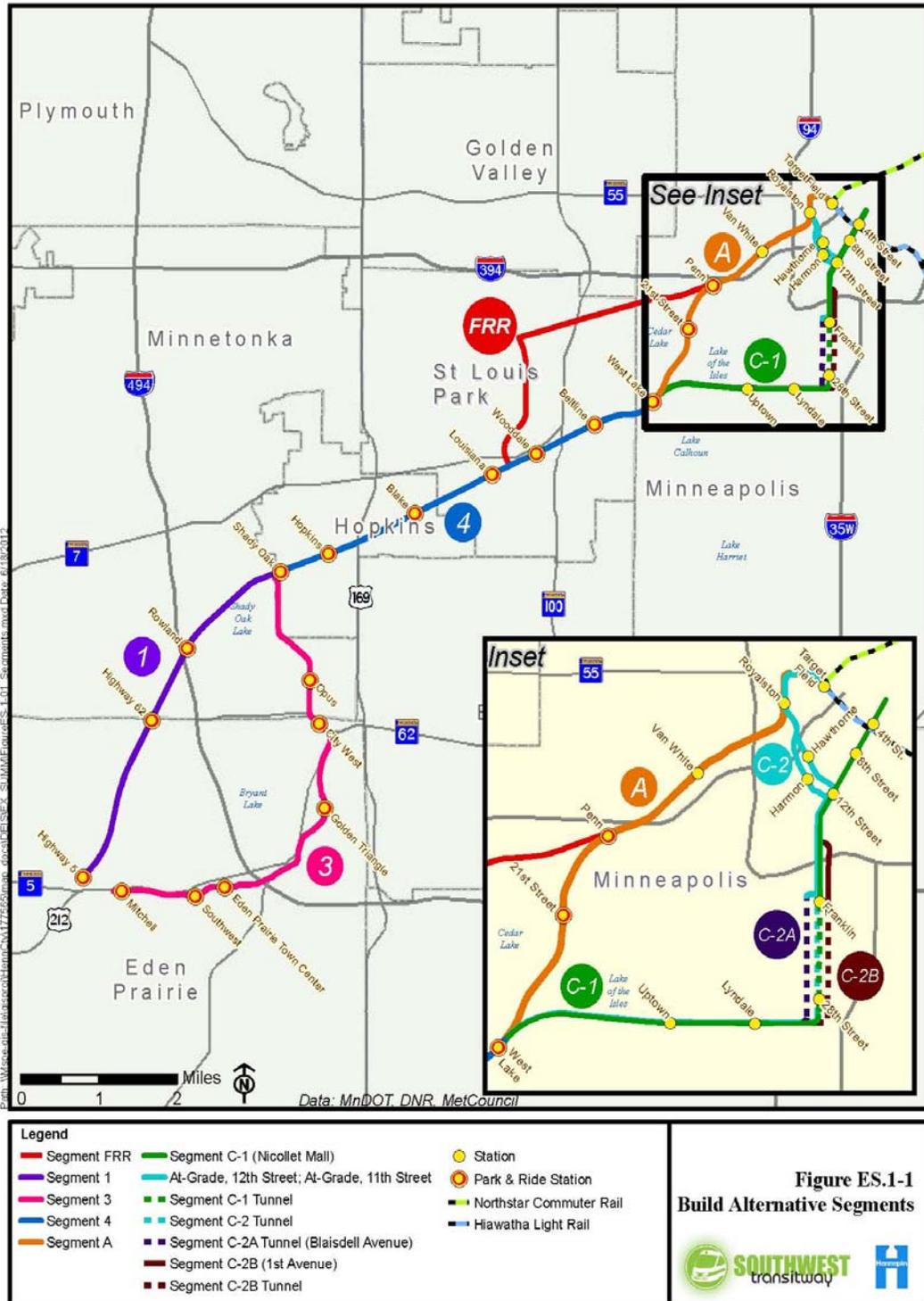
WHERE CAN I FIND A COPY OF THE DRAFT EIS?

The Draft EIS and supporting Technical Memoranda and Reports are available on the project website <http://www.southwesttransitway.org/>. Hard copies of the Draft EIS may be found in HCRRA's and Metropolitan Council's offices and in public libraries and city halls in Minneapolis, St. Louis Park, Hopkins, Edina, Minnetonka, and Eden Prairie.

WHAT IS THE PROPOSED ACTION?

The proposed action, the Southwest Transitway, is the construction and operation of a 15-mile light rail transit (LRT) line in the Minneapolis/St. Paul region, connecting downtown Minneapolis to the cities of St. Louis Park, Hopkins, Edina, Minnetonka, and Eden Prairie. Depending on the alternative being evaluated, this action also includes either:

- The rerouting of existing Twin Cities & Western Railroad Company (TC&W) freight rail service from the Canadian Pacific's (CP) Bass Lake Spur and Hennepin County Regional Railroad Authority's (HCRRA) Cedar Lake (Kenilworth Corridor) to the MN&S Subdivision and BNSF Railway Company's Wayzata Subdivision
- The co-location of LRT and TC&W freight rail service on reconstructed freight rail tracks on the CP's Bass Lake Spur and HCRRA's Cedar Lake (Kenilworth Corridor) (See Figure ES.1).



This Draft EIS evaluates the No Build, Enhanced Bus, and five Build Alternatives. The alternatives are described below and maps are provided to show their routes and station locations.

This Executive Summary presents the major elements and findings of the evaluation of potential impacts of the No Build, Enhanced Bus, and the Build Alternatives. It also includes a preliminary Section 4(f) Evaluation; a comparative evaluation of the alternatives; and a summary of the public involvement, agency coordination, and consultation activities conducted during the preparation of this Draft EIS.

WHAT IS THE PURPOSE AND NEED FOR THE PROJECT?

The purposes for enhancing transit service in the Southwest Transitway study area can be summarized as:

- The Southwest Transitway will improve access and mobility to the jobs and activity centers in the Minneapolis Central Business District (CBD), as well as along the entire length of the corridor for reverse-commute trips to the expanding suburban employment centers.
- The Southwest Transitway will provide a competitive, cost-effective travel option that will attract choice riders to the transit system. The competitive and reliable travel time for the Southwest Transitway is attributed to the diagonal nature of the line compared to the north-south/east-west orientation of the roadway network, and to the increasing levels of congestion of the roadway network.
- The Southwest Transitway would be part of the region's system of transitways integrated to support regional transportation efficiency. The Southwest Transitway has been identified by the Metropolitan Council since the late 1990s as warranting a high-level of transit investment to respond to increasing travel demand in a highly congested area of the region. Due to congestion levels on the roadway network, the speed/use limitations of the shoulder bus operations, and capacity constraints in downtown Minneapolis, a bus option is limited in its ability to adequately serve the travel demand and provide reliable travel times.

The transportation issues facing the Southwest Transitway study area illustrate the need for improved mobility, accessibility, and system linkages to the activity centers in the study area through high capacity transit service. The Southwest Transitway is one of several transit corridors identified in the Metropolitan Council's 2030 Transportation Policy Plan (2030 TPP) as being in need of enhanced transit service. The Southwest Transitway study area continues to increase in population and employment with limited additional traffic capacity on existing streets and highways resulting in increased travel time, delays, and air pollution. Portions of the Southwest Transitway study area are already densely developed. New development and redevelopment occurring in the study area are expected to generate increases in travel demand.

Three primary factors make the Southwest Transitway Corridor important for people who live and work in the southwest metropolitan area: 1) declining mobility, 2) limited competitive, reliable transit options for choice riders and people who rely on public transportation including reverse commute riders, and 3) the need to develop and maintain a balanced and economically competitive multimodal freight system.

WHAT ALTERNATIVES WERE CONSIDERED IN THE DRAFT EIS?

No Build Alternative

The No Build Alternative is required by the NEPA/MEPA processes and includes all existing and committed transportation infrastructure, facilities, and services contained in the region's fiscally constrained and federally approved transportation plan, the Metropolitan Council's 2030 TPP.

Enhanced Bus Alternative

The Enhanced Bus alternative (Figure ES.2) carried forward from the Southwest Transitway Alternatives Analysis (AA) and scoping was refined into Transportation System Management (TSM) Alternative for the purpose of the FTA project development process. This alternative is designed to be the "best that can be done" to improve transit service and mobility without major capital investments. The Enhanced Bus Alternative includes the same highway and roadway network improvements contained in the No Build Alternative, and two new limited-stop bus routes providing bi-directional service between Eden Prairie and downtown Minneapolis, with stops in Minnetonka, Hopkins, and St. Louis Park. The new limited-stop routes are referred to as Limited Stop Route "A" and Limited Stop Route "B," and are represented along with the existing express bus routes provided by Metro Transit and SouthWest Transit using I-394, I-35W, Trunk Highway (TH) 169, and TH 100 from Eden Prairie to downtown Minneapolis in Figure ES.2.

LRT 1A

Alternative LRT 1A (Figure ES.3) is proposed to operate between TH 5 in Eden Prairie and downtown Minneapolis, providing service to Eden Prairie, Minnetonka, Hopkins, St. Louis Park, and Minneapolis.

This alternative includes relocation of the existing freight rail service operating on the Bass Lake Spur and the Cedar Lake Junction between just east of Louisiana Avenue in St. Louis Park and Penn Avenue in Minneapolis to the MN&S line in St. Louis Park, as described in more detail in Section 2.3.4.1 of this Draft EIS. The freight rail relocation will result in the cessation of freight rail service on this section of the Bass Lake Spur and the HCRRRA Cedar Lake Junction (Kenilworth Corridor).

This alternative would operate from TH 5 on the HCRRRA-owned right-of-way through Eden Prairie, Minnetonka, Hopkins and St. Louis Park, and then along the Kenilworth Corridor through Minneapolis to Royalston Avenue then past the downtown Target Field Station using an extension of the Hiawatha LRT tracks on 5th Street. Stations are proposed at TH 5, TH 62, Rowland Road, Shady Oak Road, Downtown Hopkins, Blake Road, Louisiana Avenue, Wooddale Avenue, Beltline Boulevard, West Lake Street, 21st Street, Penn Avenue, Van White Boulevard, and Royalston Avenue.

LRT 3A (Locally Preferred Alternative)

Alternative LRT 3A (LPA) (Figure ES.4) travels between Mitchell Road in Eden Prairie and downtown Minneapolis, providing service to Eden Prairie, Minnetonka, Hopkins, Edina, St. Louis Park, and Minneapolis.

Like LRT 1A, this alternative includes relocation of the existing freight rail service operating on the Bass Lake Spur and the Cedar Lake Junction between just east of Louisiana Avenue in St. Louis Park and Penn Avenue in Minneapolis to the MN&S line in St. Louis Park. The freight rail relocation will result in the cessation of freight rail service on this section of the Bass Lake Spur and the HCRRA Cedar Lake Junction (Kenilworth Corridor).

This alternative would operate from TH 5 and Mitchell Road on new right-of way (ROW) along Technology Drive through the Golden Triangle/Opus areas to the HCRRA property, through St. Louis Park and Hopkins, then along the Kenilworth Corridor through Minneapolis to Royalston Avenue, then past the downtown Target Field Station using an extension of the Hiawatha LRT tracks on 5th Street. Stations are proposed at Mitchell Road, Southwest Station, Eden Prairie Town Center, Golden Triangle, City West, Opus, Shady Oak Road, downtown Hopkins, Blake Road, Louisiana Avenue, Wooddale Avenue, Beltline Boulevard, West Lake Street, 21st Street, Penn Avenue, Van White Boulevard, and Royalston Avenue.

LRT 3C-1

Alternative LRT 3C-1 (Nicollet Mall) (Figure ES.5) travels between Mitchell Road in Eden Prairie and downtown Minneapolis, providing service to Eden Prairie, Minnetonka, Hopkins, Edina, St. Louis Park, and Minneapolis.

Like LRT 1A, this alternative includes relocation of the existing freight rail service operating on the Bass Lake Spur and the Cedar Lake Junction between just east of Louisiana Avenue in St. Louis Park and Penn Avenue in Minneapolis to the MN&S line in St. Louis Park. The freight rail relocation will result in the cessation of freight rail service on this section of the Bass Lake Spur and the HCRRA Cedar Lake Junction (Kenilworth Corridor).

This alternative would operate from TH 5 and Mitchell Road on new ROW along Technology Drive through the Golden Triangle/Opus areas to the HCRRA property through Hopkins and St. Louis Park, then to the Midtown corridor through Minneapolis, to Nicollet Avenue (tunnel from Franklin Avenue to 28th Street) then Nicollet Mall. Stations are proposed at Mitchell Road, Southwest Station, Eden Prairie Town Center, Golden Triangle, City West, Opus, Shady Oak Road, downtown Hopkins, Blake Road, Louisiana Avenue, Wooddale Avenue, Beltline Boulevard, West Lake Street, Hennepin Avenue (Uptown), Lyndale Avenue, 28th Street, Franklin Avenue, 12th Street, 8th Street, and 4th Street.

LRT 3C-2

Alternative LRT 3C-2 (11th/12th Street) (Figure ES.6) travels between Mitchell Road in Eden Prairie and downtown Minneapolis, providing service to Eden Prairie, Minnetonka, Hopkins, Edina, St. Louis Park, and Minneapolis.

Like LRT 1A, this alternative includes relocation of the existing freight rail service operating on the Bass Lake Spur and the Cedar Lake Junction between just east of Louisiana Avenue in St. Louis Park and Penn Avenue in Minneapolis to the MN&S line in St. Louis Park. The freight rail relocation will result in the cessation of freight rail service on

this section of the Bass Lake Spur and the HCRRRA Cedar Lake Junction (Kenilworth Corridor).

Alternative LRT 3C-2 (11th/12th Street) would operate on the same alignment as LRT 3C-1 (Nicollet Mall) between Eden Prairie and the West Lake Station in Minneapolis. At the Midtown Corridor in the vicinity of Nicollet Avenue, the alignment would travel either under Nicollet Avenue, Blaisdell Avenue (C-2B), or 1st Avenue (C-2A) in a tunnel between the Midtown Corridor and Franklin Avenue. North of Franklin Avenue, it would operate on-street to the vicinity of 11th/12th Street where it would turn west onto 11th Street between Nicollet Mall and Royalston Avenue. At Royalston the alternative would use the same routing as the LRT 1A and LRT 3A alternatives, which interline with the Hiawatha/Central Corridor LRT lines on 5th Street. Stations are proposed at Mitchell Road, Southwest Station, Eden Prairie Town Center, Golden Triangle, City West, Opus, Shady Oak Road, downtown Hopkins, Blake Road, Louisiana Avenue, Wooddale Avenue, Beltline Boulevard, West Lake Street, Hennepin Avenue (Uptown), Lyndale Avenue, 28th Street and either Blaisdell Avenue or 1st Avenue, Franklin Avenue and either Blaisdell Avenue or 1st Avenue, 12th Street/Nicollet Mall, 11th Street/Hawthorne Avenue, 12th Street/Harmon Avenue, and Royalston Avenue.

Alternative LRT 3C-2 (11th/12th Street) proposes to use either a tunnel under Nicollet Avenue, with optional routes under Blaisdell or 1st Avenue, between the Midtown Corridor and Franklin Avenue. For the Blaisdell Avenue option, the LRT would exit the tunnel at Blaisdell and Franklin and transition across the Plymouth Congregational Church property to enter center-running operations on Nicollet Avenue. The LRT would operate in the center of Nicollet Avenue to 12th Street. For the 1st Avenue option, the LRT would exit the tunnel north of Franklin and operate center-running on 1st Avenue to 16th Street where it would transition diagonally across the City of Minneapolis meter farm entering Nicollet Avenue at 15th Street for center-running operations to 12th Street. At 12th Street under all options the LRT would operate as a one-way pair on 11th and 12th Street, rejoining as a two-way configuration on 12th Street at Glenwood, then operating on Royalston Avenue with a short tunnel under 7th Street and continuing on the Hiawatha/Central LRT tracks on 5th Street in downtown Minneapolis.

LRT 3A-1 (Co-location Alternative)

Alternative LRT 3A-1 (co-location alternative)¹ (Figure ES.7) travels between Mitchell Road in Eden Prairie and downtown Minneapolis, providing service to Eden Prairie, Minnetonka, Hopkins, Edina, St. Louis Park, and Minneapolis. This alternative would operate from TH 5 and Mitchell Road on new ROW through the Opus/Golden Triangle areas along Technology Drive to the HCRRRA property, through St. Louis Park and Hopkins, then along the Kenilworth Corridor through Minneapolis to Royalston Avenue, then past the downtown Target Field Station using an extension of the Hiawatha LRT tracks on 5th Street.

From just east of the proposed Louisiana Avenue LRT station and the proposed Penn Avenue Station, the Southwest LRT, freight rail, and commuter bike trails (Cedar Lake LRT Trail and the Kenilworth Trail) would be co-located as requested by the City of St. Louis

¹ Please see Section 2.1.2.1 of this Draft EIS for why LRT 3A-1 (co-location alternative) is included in this Draft EIS.

Park in their September 2008 letter. The existing freight tracks along the CP Bass Lake Spur and the HCRRRA Cedar Lake Junction (locally referred to as the Kenilworth tracks) would need to be reconstructed to meet BNSF design standards for clearance requirements.

An LRT structure is proposed between the planned Louisiana Avenue station and the Wooddale Avenue station to accommodate the LRT's transition from placement on HCRRRA owned property to the north of the CP Bass Lake Spur to placement south of the CP Bass Lake Spur prior to crossing Wooddale Avenue at-grade.

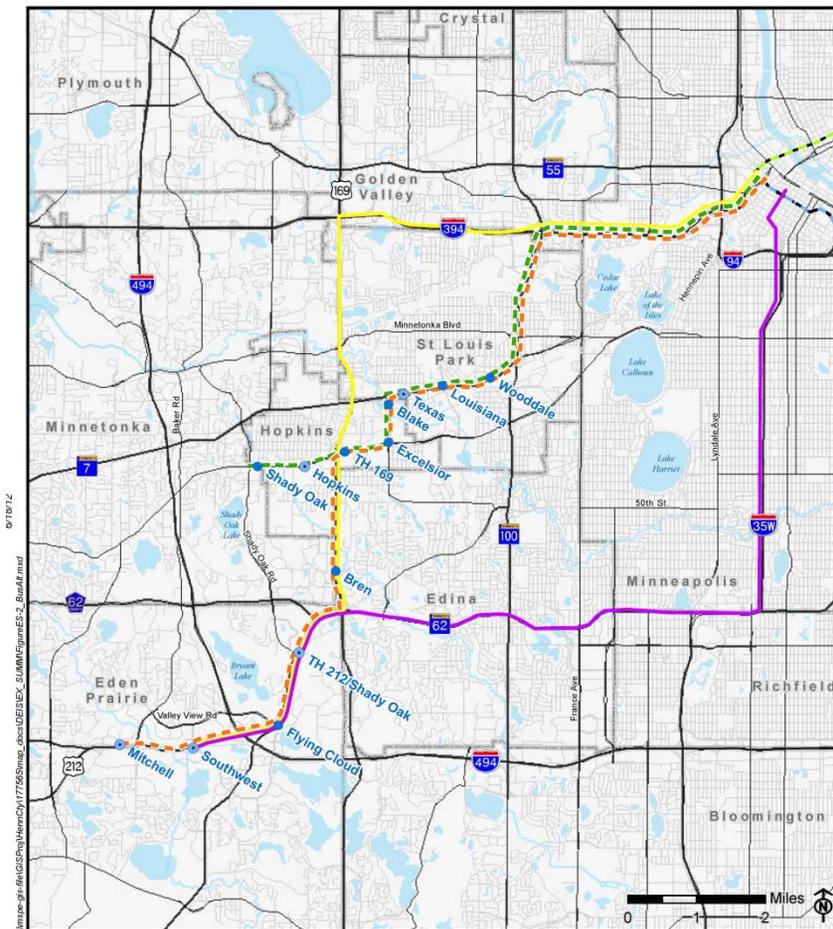
Stations are proposed at Mitchell Road, Southwest Station, Eden Prairie Town Center, Golden Triangle, City West, Opus, Shady Oak Road, downtown Hopkins, Blake Road, Louisiana Avenue, Wooddale Avenue, Beltline Boulevard, West Lake Street, 21st Street, Penn Avenue, Van White Boulevard, and Royalston Avenue. Stations from Louisiana Avenue to Penn Avenue would have slightly different locations than Alternative LRT 3A because a larger footprint would be needed for the co-location of freight rail, LRT, and commuter bike trails.

WHAT POTENTIAL IMPACTS OF THE ALTERNATIVES HAVE BEEN EXPLORED?

All transportation projects have the potential to cause direct, indirect, or cumulative impacts to natural and human environments. The Build Alternatives are anticipated to have beneficial impacts related to increased mobility and improved access to activity centers in the Southwest Transitway corridor, with potential adverse impacts related primarily to acquisitions and displacements, historic and archeological resources, noise and vibration, construction impacts, impacts to low-income and minority populations, and disturbance of hazardous materials. Findings of the impacts analysis are summarized in Table ES.1.

Given the number of historic resources in the study area, the Build Alternatives could result in adverse effects to historic properties and districts. Continued analysis of historic properties and districts through the ongoing consultation process, in accordance with Section 106 of the National Historic Preservation Act, and potential modifications to the design of the project during Preliminary Engineering, may result in refinement of the potential effects conclusions. Any changes or refinements in the extent of impacts to historic properties will be taken into account during selection of a preferred alternative and will be reported in the Final EIS.

Mitigation of impacts to historic resources is feasible, in some cases through refinement of elements of the project, such as LRT station locations and/or design. For adverse effects to historic resources, FTA, in consultation with the Minnesota State Historic Preservation Office (SHPO) and other Section 106 consulting parties, will develop measures and responsibilities to minimize or mitigate adverse effects. These mitigation measures will be documented in a Section 106 Agreement.

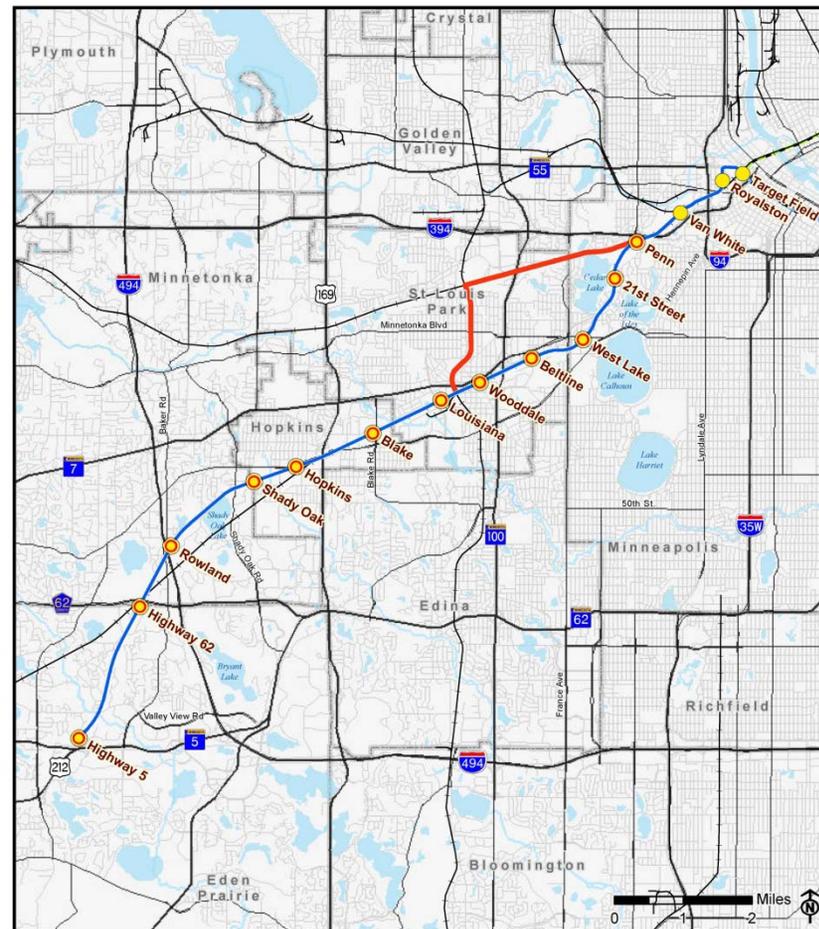


I:\map\gis\MapServer\www\77565map_data\DESEI_SUMM\FigureES2_BusAlt.mxd
 Path: I:\map\gis\MapServer\www\77565map_data\DESEI_SUMM\FigureES-3_A.mxd Date: 10/27/2012

Legend

- Bus Stop Location
- ⊙ Bus Stop with Park & Ride
- Route A Limited Stop (New)
- Route B Limited Stop (New)
- SouthWest Express Bus via I-394 (Existing)
- SouthWest Express Bus via I-35W (Existing)
- Hiawatha Light Rail
- Northstar Commuter Rail
- ▭ Municipal Boundary

**Figure ES.2
Enhanced Bus Alternative
(TSM / Baseline Alternative)**

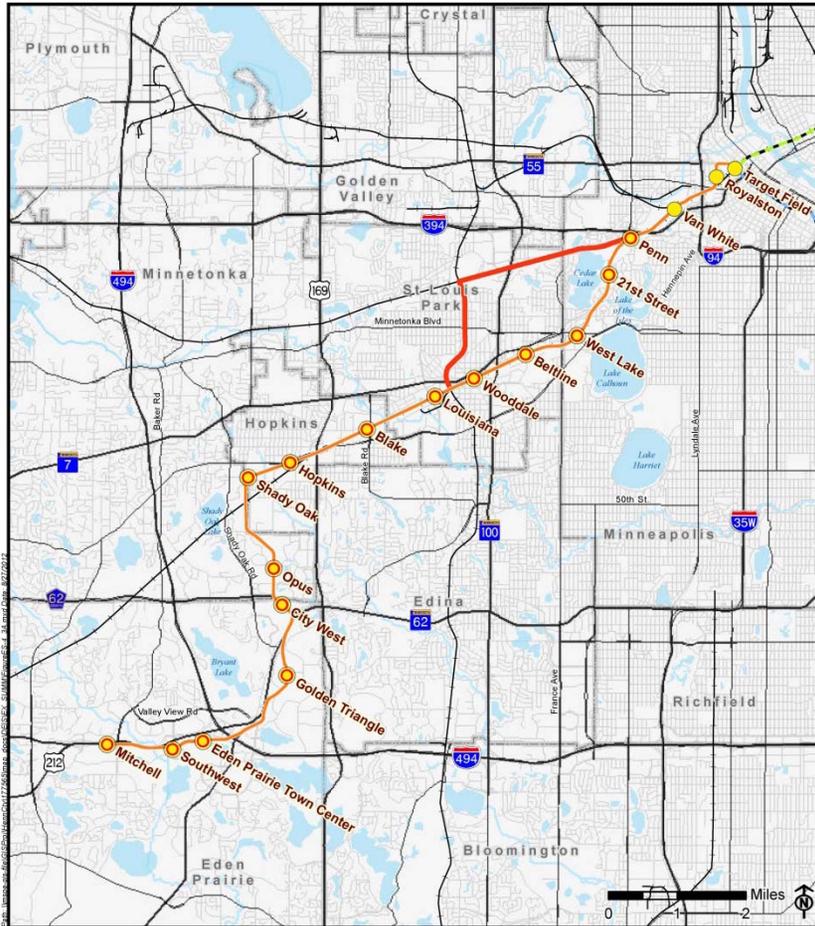


I:\map\gis\MapServer\www\77565map_data\DESEI_SUMM\FigureES-3_A.mxd Date: 10/27/2012

Legend

- Station
- ⊙ Park & Ride Station
- LRT 1A
- Hiawatha Light Rail
- Northstar Commuter Rail
- Freight Rail Relocation
- Railroad
- ▭ Municipal Boundary

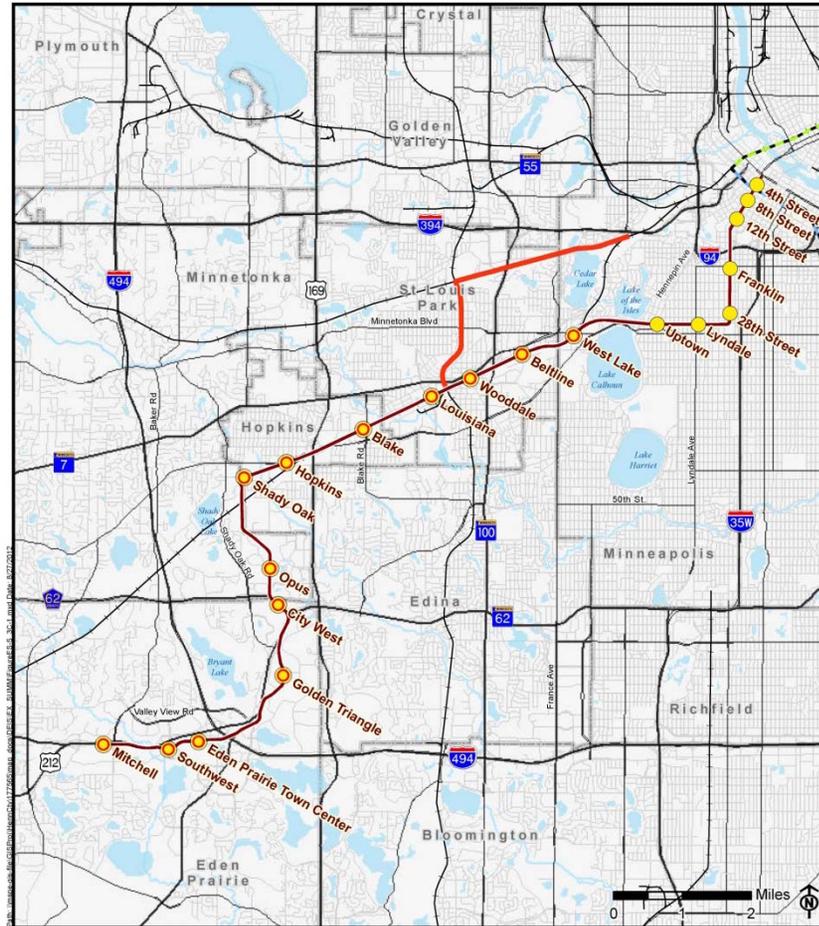
**Figure ES.3
Build Alternative LRT 1A**



Legend

- Station
- Park & Ride Station
- LRT 3A
- Hiawatha Light Rail
- Northstar Commuter Rail
- ▭ Municipal Boundary
- Freight Rail Relocation
- Railroad

Figure ES.4
Build Alternative LRT 3A



Legend

- Station
- Park & Ride Station
- LRT 3C-1
- Hiawatha Light Rail
- Northstar Commuter Rail
- ▭ Municipal Boundary
- Freight Rail Relocation
- Railroad

Figure ES.5
Build Alternative LRT 3C-1

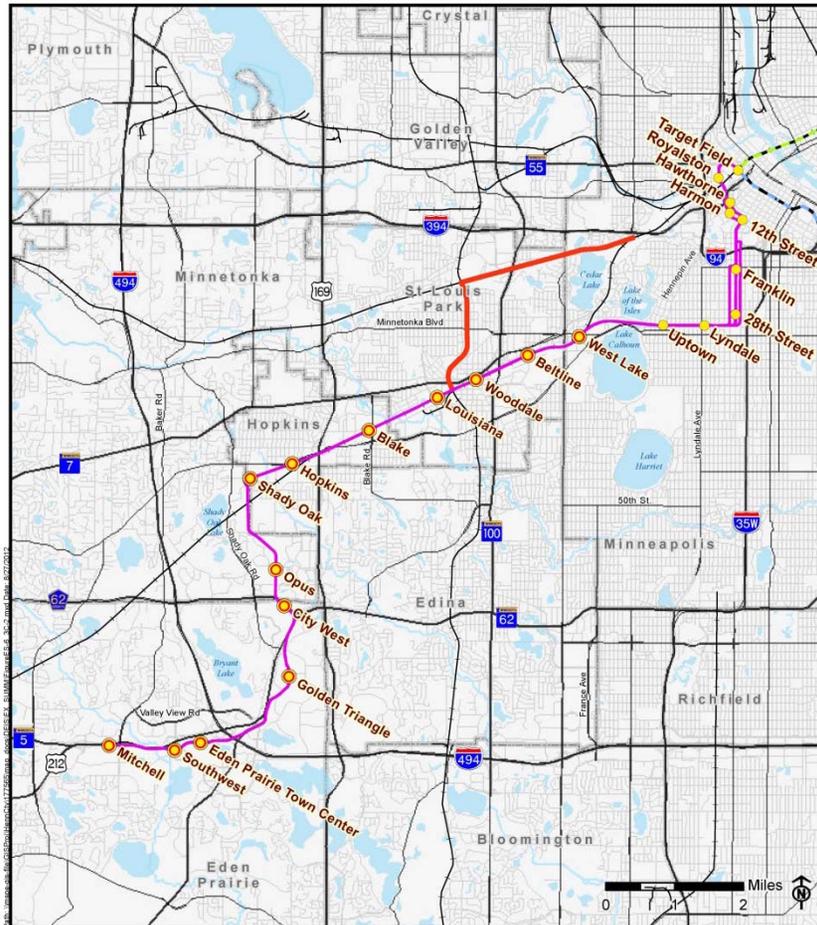


Figure ES.6
Build Alternative LRT 3C-2

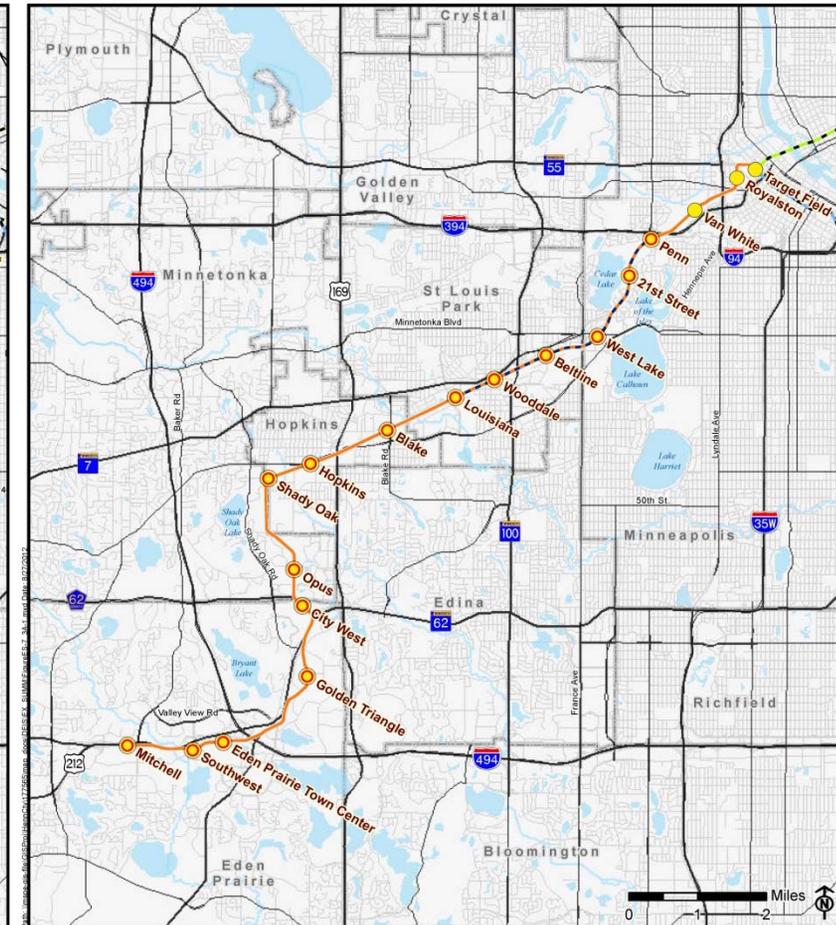


Figure ES.7
Build Alternative LRT 3A-1

LRT noise impacts are expected to be “severe” in a number of residential locations for all of the alternatives. The highest number of severe noise impacts is anticipated for Alternative LRT 1A (up to 358 residential locations with up to 587 units). Many of the impacts are due to low to medium existing ambient noise levels, residential neighborhoods close to the alignment, and high anticipated speeds of or light rail vehicle-mounted audible warning signal (bell) use at some stations and crossings. Use of these warning signals is required for safe operation of the LRT system, but, this does not exclude mitigation options for these impacts. Noise impacts will be addressed through design during Preliminary Engineering and with quiet zones along MN&S freight rail section.

Under build alternatives LRT 1A, LRT 3A (LPA), LRT 3C-1 (Nicollet Mall), and LRT 3C-2 (11th/12th Street) TC&W freight activity which currently follows portions of the Kenilworth Corridor would be relocated. TC&W freight rail operations currently operating in the Kenilworth Corridor in St. Louis Park and Minneapolis would be relocated to the CP MN&S Spur and BNSF Wayzata Subdivision in St. Louis Park. The severe noise impacts in the corridor are due to the freight locomotive horn noise at highway-rail grade-crossings. The implementation of quiet zones at all grade-crossings would eliminate severe noise impacts throughout the corridor by removing the freight locomotive horn noise.

Vibration impacts from LRT are also expected at some locations. The highest number of residential units expected to be affected by vibration are those that would be adjacent to Alternatives LRT 3C-1 (Nicollet Mall) and LRT 3C-2 (11th/12th Street), where densities are high and buildings are close to the proposed alignment. Vibration impacts will be addressed through design and the use of some vibration dampening LRT elements during Preliminary Engineering.

Acquisitions/displacements would be necessary for all of the Build Alternatives—some acquisitions would be very small areas needed to expand the ROW, but others would involve entire parcels of land that would necessitate relocating a resident or business. Based on conceptual engineering, the range would be from 65 property acquisitions (LRT 1A) up to 384 property acquisitions [LRT 3C-2 (11th/12th Street)]. See Table ES.1 for the numbers of acquisitions needed for each alternative. Mitigation for acquisitions and relocations will be addressed through Preliminary Engineering when some property acquisitions may be avoided or minimized, and by compliance with federal and state laws such as the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970, as amended, (42 U.S.C. 4601 et seq.), or the Uniform Act. The Uniform Act requires that property owners be paid fair market value for their land and buildings, and that they be assisted in finding replacement business sites or dwellings. Relocation benefits may be available to displaced businesses and non-profit organizations for certain relocation activities.

Construction for all of the Build Alternatives is likely to include temporary impacts such as noise, fugitive dust, traffic detours and delays, and impaired access. Alternatives LRT 3A-1 (co-location), LRT 3C-1 (Nicollet Mall), and LRT 3C-2 (11th/12th Street) potentially would have “high” construction impacts. These potential impacts would be addressed through best management practices (BMPs) and the development of construction mitigation plans.

Hazardous and regulated materials may be encountered during construction of any of the Build Alternatives because sites where these materials have been released are known to exist along the proposed ROW. These areas include the sites of former and existing gasoline stations and areas with industrial uses. The number of known sites for each alternative are presented in Table ES.1 and range from 98 sites [LRT 3A-1 (co-location alternative)] to 195 sites [LRT 3C-2 (11th/12th Street)]. All clean-up activity would be conducted with prior Minnesota Pollution Control Agency (MPCA) approval and in accordance with the approved Site Safety and Health Plan and would be continuously monitored by qualified inspectors. In addition to contaminated soil and groundwater, the potential exists for structures on acquired lands to contain asbestos, lead paint, or other hazardous materials. It is also likely that unknown sites might be encountered during construction. A Construction Contingency Plan would be prepared prior to the start of construction to account for the discovery of unknown contamination. Contaminated material removal and disposal would be in accordance with this plan. A final report would be prepared and submitted to the MPCA documenting all removal and disposal activity.

As evidenced by the Census data, environmental justice (EJ) populations (low-income and minorities) are present within the project study area. Low-income populations are defined as households with incomes below the U.S. Department of Health and Human Services (HHS) poverty guidelines. In accordance with the USDOT's updated environmental justice order as published in the *Federal Register* (Vol. 77, No. 91, May 10, 2012), "minority" means a person who is Black, Hispanic or Latino, Asian American, American Indian or Alaskan Native, or Native Hawaiian and Other Pacific Islander (full definition is available in Chapter 10 of this Draft EIS). Disproportionate impacts to EJ populations could occur with two of the Build Alternatives: LRT 3C-1 (Nicollet Mall) and LRT 3C-2 (11th/12th Street) where property acquisitions for ROW, community cohesion impacts, construction effects, and traffic could be disproportionately high or adverse for low-income block groups. In the event acquisitions and displacements do occur, all displaced residents (regardless of socioeconomic characteristic) will receive relocation assistance as mandated by the Uniform Relocation and Real Property Assistance Act of 1970. This Act, as amended, requires that replacement housing must be "decent, safe, and sanitary," and be functionally equivalent in the number of rooms and living space, location, and general improvements. With respect to community cohesion, construction effects, and traffic impacts, mitigation measures would be equally applied to both environmental justice and non-environmental justice communities.

Table ES.1. Alternative Performance Summary

Goal and Evaluation Measure	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)#	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11th/12th Street)
Goal 1: Improve Mobility							
Number of transit trips using the project (daily boardings)	N/A	13,000	24,850	28,700	28,700	24,550	28,850
User benefits in hours of travel time savings	N/A	2,492 (compared to No Build)	4,995 (compared to Enhanced Bus)	6,726 (compared to Enhanced Bus)	6,726 (compared to Enhanced Bus)	5,657 (compared to Enhanced Bus)	6,654 (compared to Enhanced Bus)
Traffic Impacts							
Number of Intersections in 2030 at LOS E/F (AM/PM)	0/1	0/1	0/1	2/5	2/5	2/5	2/6
Maximum queue lengths (in vehicles) at freight rail at-grade crossings	20	20	78	78	179	78	78
Goal 2: Provide a cost-effective, efficient travel option							
Total System Cost per Passenger Mile (2012 dollars)	N/A	N/A	\$211.34	\$210.94	\$210.94	\$213.02	\$211.90
End to End Travel Times (minutes)	N/A	50/35*	26.0	31.5	31.5	39.5	40.8

Goal and Evaluation Measure	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)#	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11th/12th Street)
Goal 3: Protect the environment							
Cultural Resources							
Architecture/History individual properties	None	None	16	16	14	26	23-26
Architecture/History historic districts	None	None	7	7	7	6	8-11
Archeological survey areas	0	0	29	44	41	36	37
Parklands (long-term in acres)	0	0	0.002 long-term	0.227 long-term	1.12 long-term	0.32 long-term	0.32 long-term
Section 4(f)							
Properties potentially used permanently (acres)	0	0	1 property, and 1 historic channel (0.002) (<i>de minimus</i>)	1 property and 1 historic channel (0.227) (<i>de minimus</i>)	4 properties (including 0.81 acres of Cedar Lake Park) and 1 historic channel (1.120)	3 properties, 3 historic bridges, 1 district, and 1 historic channel (0.320) (<i>de minimus</i>)	3 properties, 3 historic bridges, 1 district, and 1 historic channel (0.320) (<i>de minimus</i>)
Properties potentially impacted temporarily [†]	0	0	0.076 acre parkland	0.016 acre parkland	0.016 acre parkland	0.45 acre parkland	0.45 acre parkland
Water Resources							
Wetlands impact (acres)	N/A	N/A	Approx. 2.80	Approx. 2.90	Approx. 0.90	Approx. 2.30	Approx. 2.30
Floodplain impact (acres)	N/A	N/A	Approx. 3.83	Approx. 3.19	Approx. 1.19	Approx. 3.19	Approx. 3.19

Goal and Evaluation Measure	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)#	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11th/12th Street)
Biota and Habitat Native habitat impact (acres)	N/A	N/A	1.13	0.95	1.05	0.94	0.94
Air Quality impact	Higher emissions due to increased traffic congestion	Higher emissions due to increased traffic congestion	Modest improvements to air quality				
Noise – Number of parcels with potential severe residential impacts (with use of quiet zones for the FRR Segment)	N/A	N/A	358	201	267	262	302
Potential Vibration impacts (Units)	N/A	N/A	258 (370)	151 (492)	150 (491)	105 (584)	106 (585)
Hazardous/Regulated Materials (number of sites)	N/A	N/A	116	115	98	161	195
Construction Impacts	N/A	N/A	Medium	Medium	High	High	High
Goal 4: Preserve and protect the quality of life in the study area and the region							
Community Cohesion	None	No impact	No impact	No impact	Slight adverse impact	Slight adverse impact	Slight adverse impact
Property Acquisitions Full and partial parcels	0	0	65	125	175	384	364 to 384

Goal and Evaluation Measure	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)#	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11th/12th Street)
Environmental Justice	No change to existing conditions.	Minority, low income, and transit dependent populations would experience marginal service improvements.	Minority, low income, and transit dependent populations would be served, no disproportionately adverse effects anticipated.	Minority, low income, and transit dependent populations would be served, no disproportionately adverse effects anticipated.	Minority, low income, and transit dependent populations would be served, no disproportionately adverse effects anticipated.	Minority, low income, and transit dependent populations would be served. Disproportionately high and adverse effects are anticipated associated with: Acquisitions and displacements Community Cohesion Construction Effects Traffic	Minority, low income, and transit dependent populations would be served. Disproportionately high and adverse effects are anticipated associated with: Acquisitions and displacements Community Cohesion Construction Effects Traffic

Goal and Evaluation Measure	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)#	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11th/12th Street)
Goal 5: Support economic development							
Land Use Consistent with Comprehensive Plans	No	No	No	Yes	No	No	No
Compatible with planned development	No	No	No	Yes	No	Yes	Yes
Economic Effects	None	No substantial change	Beneficial effects	Beneficial effects	Beneficial effects may be diminished at stations where freight operations continue	Beneficial effects	Beneficial effects
Development Effects	Existing development trends would continue	Existing development trends would continue	Localized development surrounding alignment and station areas	Localized development surrounding alignment and station areas	Localized development may be diminished at stations where freight operations continue	Localized development surrounding alignment and station areas	Localized development surrounding alignment and station areas

Goal and Evaluation Measure	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)#	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11th/12th Street)
Goal 6: Support economically competitive freight rail system							
Safe, efficient, and effective movement of freight throughout the region, state and nation	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Continuous flow of freight rail throughout the study area	No	No	Yes	Yes	No	Yes	Yes

Source: HDR Engineering, Inc., 2012

^The freight rail relocation effects are included in this table for LRT 1A, LRT 3A (LPA), LRT 3C-1, and LRT 3C-2 because the freight rail relocation is a part of each of these Build Alternatives.

#Please see Section 2.1.2.1 of this Draft EIS for why LRT 3A-1 (co-location alternative) is included in this Draft EIS.

†Temporary impacts have not been calculated for the Segment FRR or Segment A for the co-location alternative. These impacts will be determined during Preliminary Engineering and reported in the Final EIS.

WHAT WAS THE RESULT OF THE EVALUATION OF ALTERNATIVES?

The evaluation of alternatives considers the extent to which each alternative satisfies the purpose and need for the proposed transportation improvement. Therefore, the evaluation measures used to compare alternatives reflect the project's Purpose and Need Statement.

While the Build Alternatives' transportation benefits would vary somewhat, each would provide transit improvements that would not occur with the No Build and Enhanced Bus Alternatives. Each of the Build Alternatives would have a positive impact on transit ridership by improving access to existing and planned attractions and development in the study area.

Table ES-2 presents a summary of the evaluation of the No Build, Enhanced Bus, and Build Alternatives for the Southwest Transitway project. Each alternative was evaluated against the project's goals that were derived from the project's Purpose and Need Statement.

No Build Alternative

Although the No Build Alternative would avoid potential disruption to neighborhoods, commercial districts, and historic areas in the corridor, the No Build Alternative would not adequately support the goals and objectives of the Southwest Transitway. The No Build Alternative would maintain the existing conditions and future changes as outlined in future transportation system plans with the exception of the Southwest Transitway project, and the development trends as outlined in the land use plans in the Southwest Transitway study area. The No Build Alternative would be inconsistent with local and regional comprehensive plans. It would not improve mobility, provide a cost-effective efficient travel option, or support economic development and an economically competitive freight rail system. Therefore, the No Build Alternative is not recommended as the preferred alternative for the Southwest Transitway project.

Enhanced Bus Alternative

Like the No Build Alternative, the Enhanced Bus Alternative would also avoid potential disruption to neighborhoods, commercial districts, and historic areas in the corridor. By definition, the Enhanced Bus Alternative is a low capital cost alternative that provides the best transit service to the corridor without a major capital investment. The Enhanced Bus Alternative would not adequately support the goals and objectives of the Southwest Transitway. The Enhanced Bus Alternative would only marginally improve the existing conditions. Again, the Enhanced Bus Alternative would be inconsistent with local and regional comprehensive plans. It would only marginally improve mobility, and it would not provide an efficient travel option, or support economic development and an economically competitive freight rail system. Therefore, the Enhanced Bus Alternative is not recommended as the preferred alternative for the Southwest Transitway project.

Table ES-2. Evaluation of Alternatives

	No Build	Enhanced Bus	LRT 1A	LRT 3A (LPA)	LRT 3A-1 (Co-location)	LRT 3C-1 (Nicollet Mall)	LRT 3C-2 (11 th /12 th Street)
Goal 1: Improve Mobility							
	●	●	○	○	○	○	○
Goal 2: Provide a cost-effective, efficient travel option							
	●	○	○	○	○	●	●
Goal 3: Protect the environment							
	○	○	○	○	●	●	●
Goal 4: Preserve and protect the quality of life in the study area and the region							
	○	●	○	○	●	●	●
Goal 5: Support economic development							
	●	●	○	○	○	○	○
Goal 6: Support economically competitive freight rail system							
	●	●	○	○	●	○	○
Overall Performance							
	●	●	○	○	●	●	●

 does not support goal
  somewhat supports goal
  supports goal

LRT 1A

LRT 1A would introduce new elements to the Southwest Transitway study area resulting in environmental impacts as presented in this Draft EIS. These changes, however, would result in benefits that could not be achieved without the associated impacts to the environment in comparison to the No Build and Enhanced Bus Alternatives.

LRT 1A provides TC&W a safe, efficient and economical connection to St. Paul thereby preserving an efficient freight transportation system for the Twin Cities area.

The evaluation of the alternatives shows LRT 1A is a viable alternative that is second only to LRT 3A (LPA). Although LRT 1A satisfies the Purpose and Need Statement of the Southwest Transitway, its anticipated ability to support the improved mobility and economic development goals is inferior to LRT 3A (LPA). LRT 1A has the lowest travel time and the lowest capital cost of the Build Alternatives. However, the projected ridership for LRT1A is one of the lowest of the Build Alternatives, causing LRT 1A to not be a cost effective alternative. Contributing to its low ridership is its lack of compatibility with the study area's comprehensive plans. LRT 1A travels through lower density developments that are not intended to become denser over time as outlined in approved comprehensive plans. Therefore, LRT 1A is not recommended as the environmentally preferred alternative for the Southwest Transitway project.

LRT 3A (LPA)

LRT 3A (LPA) best meets the Southwest Transitway project's Purpose and Need Statement as expressed by the goals of improving mobility, providing a cost-effective and efficient travel option, preserving the environment, protecting quality of life, supporting economic development, and developing and maintaining a balanced and economically competitive multimodal freight system. LRT 3A (LPA) also minimizes construction related impacts.

LRT 3A (LPA) would introduce new elements to the Southwest Transitway study area resulting in environmental impacts as presented in this Draft EIS. These changes, however, would result in benefits that could not be achieved without the associated impacts to the environment in comparison to the No Build and Enhanced Bus Alternatives. The overall benefits derived from LRT 3A (LPA)—including increased transit ridership and enhanced mobility—outweigh the potential adverse environmental impacts. Specifically, the LRT 3A (LPA) will:

- Improve access and mobility to the jobs and activity centers in the Minneapolis CBD, as well as along the length of the corridor for reverse-commute trips to the expanding suburban employment centers.
- Provide a competitive, cost-effective travel option that will attract choice riders to the transit system. The competitive travel time for LRT 3A (LPA) is attributed to the diagonal nature of the line compared to the north-south/east-west orientation of the roadway network and to the increasing levels of congestion of the roadway network.

- Provide a direct connection between the CP Bass Lake Spur and the CP MN&S Spur and between the MN&S Spur and the BNSF Wayzata Subdivision that would allow faster and more efficient train movements thereby allowing TC&W to continue to function as an efficient freight transportation service with a safe, efficient and economical connection to St. Paul.

This alternative is preferred because it provides the ability of the TC&W to continue to function as an efficient freight transportation service and a viable privately held economic enterprise with a safe, efficient and economical connection to St. Paul.

Therefore, LRT 3A (LPA) is recommended as the environmentally preferred alternative for the Southwest Transitway project.

LRT 3A-1 (Co-location Alternative)

Because LRT 3A-1 (co-location alternative) is identical to LRT 3A (LPA) in the transit service it would provide it partially meets the Southwest Transitway project's Purpose and Need Statement as expressed by the goals of improving mobility and providing a cost-effective and efficient travel option. Other goals such as preserving the environment, protecting quality of life, and developing and maintaining a balanced and economically competitive multimodal freight system would not be adequately met by LRT 3A-1 (co-location alternative). In addition, LRT 3A-1 (co-location alternative) has high construction related impacts because of the complex construction staging required to rebuild the freight rail tracks.

Like the other Build Alternatives, LRT 3A-1 (co-location alternative) would introduce new elements to the Southwest Transitway study area resulting in environmental impacts as presented in this Draft EIS. These changes would result in benefits that could not be achieved without the associated impacts to the environment in comparison to the No Build and Enhanced Bus Alternatives. However, two issues associated with LRT 3A-1 (co-location alternative) would diminish the benefits of the project. They include:

- The necessity to acquire Cedar Lake Park property owned by the Minneapolis Parks and Recreation Board
- Failure to provide a direct connection between the CP Bass Lake Spur and the CP MN&S which would satisfy the need for the safe, efficient and economical connection to St. Paul

The use of park property is significant. Section 4(f) of the U.S. Department of Transportation Act of 1966, codified at 49 U.S.C. § 303 and 23 U.S.C. § 138 prohibits the Secretary of Transportation from approving a project that requires the use of publicly owned land of a public park, recreation area, or wildlife and waterfowl refuge of national, state, or local significance, or land of an historic site of national, state, or local significance (as determined by the federal, state, or local officials having jurisdiction over the resource), unless the agency can demonstrate that:

- There is no feasible and prudent alternative to the use of the land; and
- The action includes all possible planning to minimize harm to the property resulting from such use.

The acquisition of 0.81 acres of Cedar Lake Park needed to co-locate the freight rail tracks that is associated with LRT 3A-1 would constitute a Section 4(f) use. Because this

Draft EIS has presented other feasible and prudent alternatives to LRT 3A-1 (co-location), this alternative cannot be recommended as the environmentally preferred alternative.

LRT 3C-1

LRT 3C-1 (Nicollet Mall) would provide service which partially meets the Southwest Transitway project's Purpose and Need Statement as expressed by the goals of improving mobility, supporting economic development, and supporting an economically competitive freight rail system. Other goals such as providing a cost-effective and efficient travel option, preserving the environment, and protecting the quality of life in the study area would not be adequately met by LRT 3C-1 (Nicollet Mall).

Like the other Build Alternatives, LRT 3C-1 (Nicollet Mall) would introduce new elements to the Southwest Transitway study area resulting in environmental impacts as presented in this Draft EIS. These changes would result in benefits that could not be achieved without the associated impacts to the environment in comparison to the No Build and Enhanced Bus Alternatives. However, some impacts associated with LRT 3C-1 (Nicollet Mall) would diminish the overall benefits of the Southwest Transitway project.

LRT 3C-1 (Nicollet Mall) has the second highest capital cost with lowest ridership which makes this alternative less cost effective. This alternative is not compatible with approved comprehensive plans, and it has high construction related impacts because of the extensive in-street and tunnel construction.

LRT 3C-1 (Nicollet Mall) also would cause disproportionately high or adverse effects on low income and minority populations. These impacts could be avoided by choosing another of the Build Alternatives as the environmentally preferred alternative.

LRT 3C-2

LRT 3C-2 (11th/12th Street) would provide service which partially meets the Southwest Transitway project's Purpose and Need Statement as expressed by the goals of improving mobility, supporting economic development, and supporting an economically competitive freight rail system. Other goals such as providing a cost-effective and efficient travel option, preserving the environment, and protecting the quality of life in the study area would not be adequately met by LRT 3C-2 (11th/12th Street).

Like the other Build Alternatives, LRT 3C-2 (11th/12th Street) would introduce new elements to the Southwest Transitway study area resulting in environmental impacts as presented in this Draft EIS. These changes would result in benefits that could not be achieved without the associated impacts to the environment in comparison to the No Build and Enhanced Bus Alternatives. However, some impacts associated with LRT 3C-2 (11th/12th Street) would diminish the overall benefits of the Southwest Transitway project.

Although LRT 3C-2 (11th/12th Street) has the highest projected ridership, it also has the highest capital cost which makes this alternative less cost effective. This alternative is not compatible with approved comprehensive plans, and it has high construction related impacts because of the extensive in-street and tunnel construction.

LRT 3C-2 (11th/12th Street) also would cause disproportionately high and adverse effects on low income and minority populations. These impacts could be avoided by choosing another of the Build Alternatives as the environmentally preferred alternative.

Environmentally Preferred Alternative

At the conclusion of the LPA selection process, the LRT 3A (LPA) alternative was determined to be cost competitive, easier to implement, and in best alignment with overall Metro area transit planning. Therefore, LRT 3A (LPA) was recommended for selection as the LPA because it best met the Southwest Transitway project's Purpose and Need Statement as expressed by the goals of improving mobility, providing a cost-effective and efficient travel option, preserving the environment, protecting quality of life, supporting economic development, and developing and maintaining a balanced and economically competitive multimodal freight system.

LRT 3A (LPA) will introduce a new, premium transit service in the Southwest Transitway study area. The most beneficial effects from building the Southwest Transitway improvements would be improved accessibility and travel times to regional activity centers. Because the LPA will be a permanent investment, this new transit service has the potential to positively influence economic development in the study area consistent with community plans. In addition, LRT 3A (LPA) improves the regional freight rail network consistent with the *Minnesota Comprehensive Statewide Freight and Passenger Rail Plan* (State of Minnesota, 2010).

This Draft EIS describes the transportation and environmental impacts associated with the construction and operation of the Southwest Transitway project. The effects of the No Build, Enhanced Bus, and Build Alternatives were evaluated and compared across a range of subject areas related to both natural and man-made environments. This evaluation did not reveal any substantive issues that would alter the LPA decision. LRT 3A (LPA) meets the purpose and need of the Southwest Transitway project as defined in Chapter 1 and shown in Table 11.2-1, and is recommended as the environmentally preferred alternative for the Southwest Transit project.

The environmentally preferred alternative is the alternative that will cause the least damage to the biological and physical environment and that best protects, preserves, and enhances historic, cultural, and natural resources. The public and other agencies reviewing this Draft EIS can assist the lead agency to develop and determine environmentally preferable alternatives by providing their views in comments on this Draft EIS.

WHAT ARE THE NEXT STEPS?

Copies of the Draft EIS will be distributed to appropriate local, regional, state, and Federal agencies, as well as the public for their review and comment. Public comment will play a role in informing decision makers prior to selecting a preferred alternative and the preparation of the Final EIS. Throughout the planning and environmental process, local elected officials have been and will continue to be kept apprised of

project status through public, advisory committee and stakeholder meetings and individual briefings. These elected officials will have the opportunity to provide input to the decision-making process as unresolved issues are addressed.

The major next steps that will be undertaken and addressed in the Final EIS include:

- Selection of an Operations and Maintenance Facility site
- Completion of appropriate archeological surveying
- Determination of adverse effects to Section 106 properties
- Completion of Section 4(f) Analysis
- Completion of environmental site assessments.