

Application

19841 - 2024 Pedestrian Facilities (Sidewalks, Streetscaping, and ADA)

20255 - CSAH 35 (Portland Ave) Pedestrian Project Regional Solicitation - Bicycle and Pedestrian Facilities

Status: Submitted

Submitted Date: 12/12/2023 5:49 PM

Primary Contact

Feel free to edit your profile any time your information changes. Create your own personal alerts using My Alerts.

Name:*

Name:* He/him/his Jason Richard Pieper
Pronouns First Name Middle Name Last Name

Title: Transportation Engineer

Department: Hennepin County - Transportation Department

Email: jason.pieper@hennepin.us

Address: 1600 Prairie Drive

* Medina Minnesota 53340

City State/Province Postal Code/Zip

Phone:* 612-596-0241

Phone Ext.

Fax:

What Grant Programs are you most interested in? Regional Solicitation - Roadways Including Multimodal Elements

Organization Information

Name: HENNEPIN COUNTY

Jurisdictional Agency (if different):

Organization Type:

County Government

Organization Website:

Address: DPT OF PUBLIC WORKS

1600 PRAIRIE DR

* MEDINA Minnesota 55340

City State/Province Postal Code/Zip

County: Hennepin

Phone:* 763-745-7600

Ext.

Fax:

PeopleSoft Vendor Number 0000028004A9

Project Information

Project Name CSAH 35 (Portland Ave) Pedestrian Project

Primary County where the Project is Located Hennepin
Cities or Townships where the Project is Located: Minneapolis

Jurisdictional Agency (If Different than the Applicant):

type of improvement, etc.)

Brief Project Description (Include location, road name/functional class, The proposed project will upgrade pedestrian ramps and multimodal infrastructure along the CSAH 35 (Portland Ave) corridor from Diamond Lake Rd to 350' north of 52nd St in the City of Minneapolis. A map of the project location is included in Attachment 02.

> The existing sidewalk facilities along CSAH 35 (Portland Ave) present accessibility challenges for those walking and rolling along and across the corridor. Conditions are especially problematic at intersections as many of the existing pedestrian ramps do not satisfy current design standards, and traffic signal poles obstruct the walking route. In addition, the age and condition of traffic signal infrastructure requires costly upgrades to equipment and technology in order to retrofit Accessible Pedestrian Signal (APS) features. Furthermore, the corridor lacks offstreet multimodal facilities along both sides for the two-block segment extending from 53rd St to approximately 350 feet north of 52nd St along CSAH 35 (Portland Ave), presenting a barrier for those trying to access Pearl Park. Photos depicting the corridor's existing conditions are included in Attachment 03.

The project objectives include improving safety, comfort, and accessibility for people walking along and across CSAH 35 (Portland Ave) through the replacement of pedestrian ramps, installation of APS, and implementation of proven traffic calming strategies (such as raised medians, curb extensions, and/or crossing beacons) to improve the crossing experience and manage vehicle speeds. Attachment 04 includes a potential concept for the corridor. The following elements will be evaluated as part of the project development process:

- Construction of an off-road facility along the west side from 53rd St to 350' North of 52nd St
- Replacement of the existing traffic signal system at Diamond Lake Rd
- Determination of the recommended intersection control at 53rd St
- Low-cost strategies to improve on-road bicycle accommodations

(Limit 2,800 characters; approximately 400 words)

TRANSPORTATION IMPROVEMENT PROGRAM (TIP) DESCRIPTION - will be used in TIP CSAH 35 (Portland Ave) from Diamond Lake Rd to 350' N of 52nd St in if the project is selected for funding. See MnDOT's TIP description guidance. Minneapolis

Include both the CSAH/MSAS/TH references and their corresponding street names in the TIP Description (see Resources link on Regional Solicitation webpage for examples).

Project Length (Miles)

0.42

to the nearest one-tenth of a mile

Project Funding

Are you applying for competitive funds from another source(s) to implement this

If yes, please identify the source(s)

Federal Amount \$2,000,000.00 Match Amount \$820,000.00

Minimum of 20% of project total

Project Total \$2,820,000.00

For transit projects, the total cost for the application is total cost minus fare revenues.

Match Percentage 29.08%

Minimum of 20%

Compute the match percentage by dividing the match amount by the project total

Source of Match Funds Hennepin County

A minimum of 20% of the total project cost must come from non-federal sources; additional match funds over the 20% minimum can come from other federal sources

Preferred Program Year

Select one: 2028

Select 2026 or 2027 for TDM and Unique projects only. For all other applications, select 2028 or 2029.

Project Information

If your project has already been assigned a State Aid Project # (SAP or SP)

Please indicate here SAP/SP#.

Location

County, City, or Lead Agency Hennepin County

Name of Trail/Ped Facility: CSAH 35 (Portland Ave) Pedestrian Project

(example; OEDAR LAKE TRAIL)

IF TRAIL/PED FACILITY IS ADJACENT TO ROADWAY:

Road System CSAH

(TH, CSAH, MSAS, CO. RD., TWP. RD., CITY STREET)

Road/Route No. 35

(Example: 53 for CSAH 53)

Name of Road Portland Ave

(Example: 1st ST., Main Ave.)

TERMINI: Termini listed must be within 0.3 miles of any work

From:
Road System
Local Street

(TH, CSAH, MSAS, CO. RD., TWP. RD., CITY STREET)

Road/Route No. (Example: 53 for CSAH 53)

Name of Road Diamond Lake Rd

(Example: 1st ST., Main Ave.)

To:
Road System
Local Street

DO NOT INCLUDE LEGAL DESCRIPTION; INCLUDE NAME OF ROADWAY IF MAJORITY OF FACILITY RUNS ADJACENT TO A SINGLE CORRIDOR

Road/Route No. (Example: 53 for CSAH 53)

Name of Road 350' N of 52nd St

(Example: 1st ST., Main Ave.)

In the City/Cities of:

Minneapolis

(List all cities within project limits)

IF TRAIL/PED FACILITY IS NOT ADJACENT TO ROADWAY:

Termini: Termini listed must be within 0.3 miles of any work

From:

To: Or

At:

In the City/Cities of:

(List all cities within project limits)

Primary Types of Work (Check all that apply)

Multi-Use Trail Reconstruct Trail Resurface Trail

Bituminous Pavement

Concrete Walk Yes

Pedestrian Bridge

Signal Revision Yes

Landscaping

Other (do not include incidental items)

Pedestrian Ramps, APS, Medians, Signal Modifications, Pavement Markings,
Pavement Work, Drainage

BRIDGE/CULVERT PROJECTS (IF APPLICABLE)

Old Bridge/Culvert No.: New Bridge/Culvert No.:

Structure is Over/Under (Bridge or culvert name):

Zip Code where Majority of Work is Being Performed

55419

Approximate Begin Construction Date (MO/YR) 05/01/2028

Approximate End Construction Date (MO/YR) 10/31/2028

Miles of Pedestrian Facility/Trail (nearest 0.1 miles): 0.2

Miles of trail on the Regional Bicycle Transportation Network (nearest 0.1 miles): 0.2

Is this a new trail?

Requirements - All Projects

All Projects

1. The project must be consistent with the goals and policies in these adopted regional plans: Thrive MSP 2040 (2014), the 2040 Transportation Policy Plan (2018), the 2040 Regional Parks Policy Plan (2018), and the 2040 Water Resources Policy Plan (2015).

Check the box to indicate that the project meets this requirement.

Yes

2. The project must be consistent with the 2040 Transportation Policy Plan. Reference the 2040 Transportation Plan goals, objectives, and strategies that relate to the project. Briefly list the goals, objectives, strategies, and associated pages:

A) Transportation System Stewardship (p 2.2-2.4)

Objectives A & B; Strategies A1 & A2

The project will utilize strategic low-cost solutions to enhance multimodal facilities along CSAH 35 (Portland Ave). The project will upgrade non-compliant curb ramps to be ADA accessible, add crossing enhancements and multimodal facilities. These improvements will promote non-motorized travel which will extend the useful life of CSAH 35 (Portland Ave).

B) Safety and security (p 2.5-2.9)

Objectives A & B; Strategies B1, B3, B4 & B6

The project will improve intersection safety for all users with pedestrian crossing improvements, while replacing non-compliant ramps with ADA accessible ramps. Traffic calming such as lane restriping and replacing painted medians with green median strips will enhance safety for all users.

C) Access to destinations (p 2.10-2.25)

Objectives A, B, C, D & E; Strategies C1, C2, C3, C4, C8, C9, C15, C16 & C17

The project will improve access to and the quality of multimodal travel options. The project is adjacent to Pearl Park and Diamond Lake which are recreational destinations in south Minneapolis. The added multimodal facility will enhance CSAH 35 (Portland Ave) as a Tier 1 alignment on the RBTN.

D) Competitive economy (p 2.26-2.29)

Objectives A, B & C; Strategies D1, D3 & D4

The ADA upgrades, pedestrian crossing improvements and multimodal facility are investments in the multimodal transportation system in south Minneapolis. These improvements promote mode choices that will manage and ease congestion which attracts residents and businesses.

E) Healthy and equitable communities (p 2.30-2.34)

Objectives A, B, C & D; Strategies E1, E2, E3, E4, E5, E6 & E7

The project increases the attractiveness of walking and biking in the area. The increase of non-motorized travel to access the recreational destinations will reduce transportation related emissions and promote a healthier community. The ADA upgrades and crossing enhancements will increase accessibility of the park for people of all abilities.

F) Leveraging transportation investments to guide land use (p 2.35-2.41)

Objectives A & C; Strategies F1, F2, F3, F5, F6, F7

The project will safely integrate people walking and biking with people driving on this A-Minor Reliever. Enhancements to walking and biking complements the surrounding land use of residential and parks. Intersection improvements will support safer non-motorized crossing and make the park more accessible and attractive for residents.

List the applicable documents and pages: Unique projects are exempt 1) Hennepin County 2040 Transportation Plan (pages 2-11 - 2-18) from this qualifying requirement because of their innovative nature.

URL: hennepin.us/-/media/hennepinus/your-government/projects-initiatives/2040-comprehensive-plan/2040-comprehensive-plan-full.pdf

2) Hennepin County Climate Action Plan (pages 50-54)

URL: hennepin.us/climate-action/-/media/climate-action/hennepin-county-climate-action-plan-final.pdf

3) Hennepin County Complete and Green Streets Policy (pages 10-11)

URL: hennepin.us/-/media/hennepinus/your-government/projects-initiatives/complete-streets/Complete-and-Green-Streets-Policy_Oct2023.pdf

4) Hennepin County Pedestrian Plan (page 8)

URL: hennepin.us//media/hennepinus/residents/transportation/documents/pedestrian-plan.pdf

5) City of Minneapolis Vision Zero Action Plan (pages 16-35)

URL lims.minneapolismn.gov/Download/RCAV2/31027/18-Vision-Zero-Action-Plan-2023-2025.pdf

6) Hennepin County ADA Transition Plan - Self Evaluation

URL: hennepin.us/-/media/hennepinus/residents/transportation/documents/ada-sidewalk-transition-plan.pdf

URL: hennepin.maps.arcgis.com/apps/StoryMapBasic/index.html? appid=aee6010fe8e64e23b757dd8d69ef81fe

(Limit 2,800 characters; approximately 400 words)

4. The project must exclude costs for studies, preliminary engineering, design, or construction engineering. Right-of-way costs are only eligible as part of transit stations/stops, transit terminals, park-and-ride facilities, or pool-and-ride lots. Noise barriers, drainage projects, fences, landscaping, etc., are not eligible for funding as a standalone project, but can be included as part of the larger submitted project, which is otherwise eligible. Unique project costs are limited to those that are federally eligible.

Check the box to indicate that the project meets this requirement.

5. Applicant is a public agency (e.g., county, city, tribal government, transit provider, etc.) or non-profit organization (TDM and Unique Projects applicants only). Applicants that are not State Aid cities or counties in the seven-county metro area with populations over 5,000 must contact the MnDOT Metro State Aid Office prior to submitting their application to determine if a public agency sponsor is required.

Check the box to indicate that the project meets this requirement. Yes

6. Applicants must not submit an application for the same project in more than one funding sub-category.

Check the box to indicate that the project meets this requirement.

7. The requested funding amount must be more than or equal to the minimum award and less than or equal to the maximum award. The cost of preparing a project for funding authorization can be substantial. For that reason, minimum federal amounts apply. Other federal funds may be combined with the requested funds for projects exceeding the maximum award, but the source(s) must be identified in the application. Funding amounts by application category are listed below in Table 1. For unique projects, the minimum award is \$500,000 and the maximum award is the total amount available each funding cycle (approximately \$4,000,000 for the 2024 funding cycle).

Multiuse Trails and Bicycle Facilities: \$250,000 to \$5,500,000

Pedestrian Facilities (Sidewalks, Streetscaping, and ADA): \$250,000 to \$2,000,000

Safe Routes to School: \$250,000 to \$1,000,000

Check the box to indicate that the project meets this requirement. Yes

8. The project must comply with the Americans with Disabilities Act (ADA).

Check the box to indicate that the project meets this requirement. Yes

9. In order for a selected project to be included in the Transportation Improvement Program (TIP) and approved by USDOT, the public agency sponsor must either have a current Americans with Disabilities Act (ADA) self-evaluation or transition plan that covers the public right of way/transportation, as required under Title II of the ADA. The plan must be completed by the local agency before the Regional Solicitation application deadline. For future Regional Solicitation funding cycles, this requirement may include that the plan has undergone a recent update, e.g., within five years prior to application.

Date plan completed: 08/31/2015

Link to plan:

hennepin.us/-/media/hennepinus/residents/transportation/documents/ada-sidewalk-transition-plan.pdf

The applicant is a public agency that employs fewer than 50 people and has a completed ADA self-evaluation that covers the public right of way/transportation.

Date self-evaluation completed:

Link to plan:

Upload plan or self-evaluation if there is no link

Upload as PDF

10. The project must be accessible and open to the general public.

Check the box to indicate that the project meets this requirement.

Yes

11. The owner/operator of the facility must operate and maintain the project year-round for the useful life of the improvement. This includes assurance of year-round use of bicycle, pedestrian, and transit facilities, per FHWA direction established 8/27/2008 and updated 4/15/2019. Unique projects are exempt from this qualifying requirement.

Check the box to indicate that the project meets this requirement.

12. The project must represent a permanent improvement with independent utility. The term ?independent utility? means the project provides benefits described in the application by itself and does not depend on any construction elements of the project being funded from other sources outside the regional solicitation, excluding the required non-federal match.

Projects that include traffic management or transit operating funds as part of a construction project are exempt from this policy.

Check the box to indicate that the project meets this requirement.

Yes

13. The project must not be a temporary construction project. A temporary construction project is defined as work that must be replaced within five years and is ineligible for funding. The project must also not be staged construction where the project will be replaced as part of future stages. Staged construction is eligible for funding as long as future stages build on, rather than replace, previous work.

Check the box to indicate that the project meets this requirement.

Yes

14. The project applicant must send written notification regarding the proposed project to all affected state and local units of government prior to submitting the application.

Check the box to indicate that the project meets this requirement.

Yes

Requirements - Bicycle and Pedestrian Facilities Projects

1. All projects must relate to surface transportation. As an example, for multiuse trail and bicycle facilities, surface transportation is defined as primarily serving a commuting purpose and/or that connect two destination points. A facility may serve both a transportation purpose and a recreational purpose; a facility that connects people to recreational destinations may be considered to have a transportation purpose.

Check the box to indicate that the project meets this requirement.

Yes

Multiuse Trails on Active Railroad Right-of-Way:

2. All multiuse trail projects that are located within right-of-way occupied by an active railroad must attach an agreement with the railroad that this right-of-way will be used for trail purposes.

Check the box to indicate that the project meets this requirement.

Upload Agreement PDF

Check the box to indicate that the project is not in active railroad right-of-way. Yes

Multiuse Trails and Bicycle Facilities projects only:

3. All applications must include a letter from the operator of the facility confirming that they will remove snow and ice for year-round bicycle and pedestrian use. The Minnesota Pollution Control Agency has a resource for best practices when using salt. Upload PDF of Agreement in Other Attachments.

Check the box to indicate that the project meets this requirement.

Upload PDF of Agreement in Other Attachments.

Safe Routes to School projects only:

4. All projects must be located within a two-mile radius of the associated primary, middle, or high school site.

Check the box to indicate that the project meets this requirement.

5. All schools benefitting from the SRTS program must conduct after-implementation surveys. These include the student travel tally form and the parent survey available on the National Center for SRTS website. The school(s) must submit the after-evaluation data to the National Center for SRTS within a year of the project completion date. Additional guidance regarding evaluation can be found at the MnDOT SRTS website.

Check the box to indicate that the applicant understands this requirement and will submit data to the National Center for SRTS within one year of project completion.

Requirements - Bicycle and Pedestrian Facilities Projects

Specific Roadway Elements

CONSTRUCTION PROJECT ELEMENTS/COST ESTIMATES

Cost

Mobilization (approx 5% of total cost)
Removals (approx 5% of total cost)
Roadway (grading, borrow, etc.)
Roadway (aggregates and paving)
Subgrade Correction (muck)

\$93,000.00 \$33,800.00 \$70,610.00 \$0.00 \$167,000.00

\$111.000.00

Storm Sewer \$167.00

Ponds	\$0.00
Concrete Items (curb & gutter, sidewalks, median barriers)	\$103,150.00
Traffic Control	\$111,000.00
Striping	\$58,200.00
Signing	\$0.00
Lighting	\$0.00
Turf - Erosion & Landscaping	\$83,000.00
Bridge	\$0.00
Retaining Walls	\$0.00
Noise Wall (not calculated in cost effectiveness measure)	\$0.00
Traffic Signals	\$510,000.00
Wetland Mtigation	\$0.00
Other Natural and Cultural Resource Protection	\$0.00
RR Crossing	\$0.00
Roadway Contingencies	\$415,140.00
Other Roadway Elements	\$42,000.00
Totals	\$1,797,900.00
Specific Bicycle and Pedestrian Elements	
	Cont
CONSTRUCTION PROJECT ELEMENTS/COST ESTIMATES	Cost
Path/Trail Construction	\$157,480.00
Sidewalk Construction	\$81,600.00
On-Street Bicycle Facility Construction	\$0.00
Right-of-Way	\$0.00
Pedestrian Curb Ramps (ADA)	\$110,000.00
Crossing Aids (e.g., Audible Pedestrian Signals, HAWK)	\$157,000.00
Pedestrian-scale Lighting	\$168,000.00
Streetscaping	\$83,000.00
Wayfinding	\$0.00
Bicycle and Pedestrian Contingencies	\$235,870.00
Other Bicycle and Pedestrian Elements	\$29,150.00
Totals	\$1,022,100.00
Specific Transit and TDM Elements	
CONSTRUCTION PROJECT ELEMENTS/COST ESTIMATES	Cost
Fixed Guideway Elements	\$0.00
Stations, Stops, and Terminals	\$0.00
Support Facilities	\$0.00
Transit Systems (e.g. communications, signals, controls, fare collection, etc.)	\$0.00
Vehicles	\$0.00
Contingencies	\$0.00
Right-of-Way	\$0.00
Other Transit and TDM Elements	\$0.00
Totals	\$0.00

Transit Operating Costs

 Number of Platform hours
 0

 Cost Per Platform hour (full loaded Cost)
 \$0.00

 Subtotal
 \$0.00

 Other Costs - Administration, Overhead,etc.
 \$0.00

PROTECT Funds Eligibility

One of the newfederal funding sources is Promoting Resilient Operations for Transformative, Efficient, and Cost-Saving Transportation (PROTECT). Please describe which specific elements of your project and associated costs out of the Total TAB-Eligible Costs are eligible to receive PROTECT funds. Examples of potential eligible items may include: storm sewer, ponding, erosion control/landscaping, retaining walls, new bridges over floodplains, and road realignments out of floodplains.

INFORMATION: Promoting Resilient Operations for Transformative, Efficient, and Cost-Saving Transportation (PROTECT) Formula Program Implementation Guidance (dot.gov).

Response:

Based on a planning level review of the proposed scope of work that's primarily focused on constructing pedestrian curb ramps, sidewalks, and medians, county staff did not identify any project elements that were obviously eligible for the PROTECT Program.

Totals

 Total Cost
 \$2,820,000.00

 Construction Cost Total
 \$2,820,000.00

Transit Operating Cost Total \$0.00

Measure A: Project Location Relative to Jobs and Post-Secondary Education

Existing Employment Within One-Half Mile: 1455
Existing Post-Secondary Enrollment Within One-Half Mile: 0

Upload Map 1701889751446 2024 RS Map 01 - CSAH 35 Portland Ave Pedestrian -

Regional Economy.pdf

Please upload attachment in PDF form

Measure A: Population Summary

Existing Population Within One-Half Mile 14546

Upload Map 1701956403450 2024 RS Map 04 - CSAH 35 Portland Ave Pedestrian -

Population Employment.pdf

Please upload attachment in PDF form

Measure A: Engagement

i. Describe any Black, Indigenous, and People of Color populations, low-income populations, disabled populations, youth, or older adults within a ½ mile of the proposed project. Describe how these populations relate to regional context. Location of affordable housing will be addressed in Measure C.

ii. Describe how Black, Indigenous, and People of Color populations, low-income populations, persons with disabilities, youth, older adults, and residents in affordable housing were engaged, whether through community planning efforts, project needs identification, or during the project development process.

iii. Describe the progression of engagement activities in this project. A full response should answer these questions:

- 1. What engagement methods and tools were used?
- 2. How did you engage specific communities and populations likely to be directly impacted by the project?
- 3. What techniques did you use to reach populations traditionally not involved in community engagement related to transportation projects?
- 4. How were the project?s purpose and need identified?
- 5. How was the community engaged as the project was developed and designed?
- 6. How did you provide multiple opportunities for of Black, Indigenous, and People of Color populations, low-income populations, persons with disabilities, youth, older adults, and residents in affordable housing to engage at different points of project development?
- 7. How did engagement influence the project plans or recommendations? How did you share back findings with community and re-engage to assess responsiveness of these changes?
- 8. If applicable, how will NEPA or Title VI regulations will guide engagement activities?

Response:

The area within ½ mile of the proposed project has a lower Black, Indigenous, and People of Color (BIPOC) population than other areas of the county at 12% in part due to redlining and the preponderance of racial covenants used when the area developed in the 1930s and 1940s. However, Pearl Park draws users from the greater region, meaning that project benefits are not strictly limited to the residents of the project area. In addition, 27% of the population within 0.5 miles of the project are under the age of 18, 13% are over the age of 65, and 8% of people have a disability of any kind. These demographic profiles are from the 2017 - 2021 5-year ACS estimates.

The proposed project along CSAH 35 (Portland Ave) is a result of previous requests from residents approaching Hennepin County requesting improvements to the corridor. Residents frequently cite the difficulty in crossing CSAH 35 (Portland Ave), particularly when youth soccer games are played on the adjacent fields and parking is heavily used on Portland.

Previous engagement also occurred through the Minneapolis Park and Recreation Board (MPRB) as part of its 2016 update to the park master plan for Pearl Park. During that process, residents requested a trail and crossing improvements on CSAH 35 (Portland Ave). Hennepin County has been in discussion with MPRB and the city of Minneapolis on creating a pedestrian facility and crossing improvements.

While formal engagement has not yet begun for this project, if the project is funded Hennepin County will create an engagement plan collaboratively with the City of Minneapolis and MPRB to identify appropriate strategies to facilitate community input.

Historically, project outreach strategies have included direct conversations with residents, a regularly updated project website, focus groups, surveys, interactive mapping applications and physical project signage along the corridor. Project outreach will emphasize engagement with BIPOC populations, low-income households, youth, older adults, and other communities more likely to walk, roll, or cycle along the project corridor.

(Limit 2,800 characters; approximately 400 words):

Measure B: Disadvantaged Communities Benefits and Impacts

Describe the project?s benefits to Black, Indigenous, and People of Color populations, low-income populations, children, people with disabilities, youth, and older adults. Benefits could relate to:

- ? pedestrian and bicycle safety improvements;
- ? public health benefits;
- ? direct access improvements for residents or improved access to destinations such as jobs, school, health care, or other;
- ? travel time improvements;
- ? gap closures;
- ? new transportation services or modal options;
- ? Ieveraging of other beneficial projects and investments;
- ? and/or community connection and cohesion improvements.

This is not an exhaustive list. A full response will support the benefits claimed, identify benefits specific to Disadvantaged communities residing or engaged in activities near the project area, identify benefits addressing a transportation issue affecting Disadvantaged communities specifically identified through engagement, and substantiate benefits with data.

Acknowledge and describe any negative project impacts to Black, Indigenous, and People of Color populations, low-income populations, children, people with disabilities, youth, and older adults. Describe measures to mitigate these impacts. Unidentified or unmitigated negative impacts may result in a reduction in points.

Below is a list of potential negative impacts. This is not an exhaustive list.

- ? Decreased pedestrian access through sidewalk removal / narrowing, placement of barriers along the walking path, increase in auto-oriented curb cuts, etc.
- ? Increased speed and/or ?cut-through? traffic.
- ? Removed or diminished safe bicycle access.
- ? Inclusion of some other barrier to access to jobs and other destinations.

Response:

The CSAH 35 (Portland Ave) Pedestrian project will benefit BIPOC populations, low-income households, youth, older adults, people with disabilities, and other communities through the introduction of complete streets elements. The project will promote mobility for all users by upgrading ADA accommodations throughout the corridor and implementing crossing enhancements at intersections as feasible. Attachment 05 provides an overview of key community resources as well as census tracts with high scores of the CDC/ATSDR Social Vulnerability Index (SVI), a resource that uses census data to measure resilience to natural or human-caused disasters. The southern portion of the project corridor is identified as having a high SVI score, indicating a more vulnerable community and potentially a higher number of users who walk, cycle, or use transit.

Pearl Park is a neighborhood park with regional attributes. It has one of four premier fields and one of 10 premier baseball diamonds in MPRB's south service area , which extends from I-35W to the Mississippi River and from the University of Minnesota to the MSP Intl. Airport. In winter it has one of five hockey rinks, one of seven skating rinks and one of three designated sledding hills in the south service area. These facilities attract residents from across Minneapolis and the metro, particularly for organized sports. The proposed project will ensure users will have a full range of modal options available to travel to and from the park, particularly benefitting people with lower income, children, and families unable to drive. It will also directly benefit children with caregivers not able to provide transportation by allowing them to participate in afternoon/evening youth sports via walking, bicycling, or using transit.

The project will also provide benefits to those with limited mobility through constructing a multiuse trail where no facilities exist today. Currently a person walking or using a wheelchair to go southbound on the west side of CSAH 35 (Portland Ave) is required to cross CSAH 35 (Portland Ave) at an unsignalized intersection that lacks any pedestrian ramps to avoid walking through grass or snow. The facility will also create a connection to regional facilities such as the Minnehaha Parkway Regional Trail and the METRO D Line three blocks east on Chicago Ave.

Increased noise and impacts to the roadway and sidewalks are anticipated during construction. The contractor will be required to follow temporary traffic control plans which specify detour routes for all people traveling through the corridor. Access to adjacent buildings will be critical, and staff will seek our opportunities to ensure that nearby businesses and services are not negatively impacted during construction.

(Limit 2,800 characters; approximately 400 words):

Measure C: Affordable Housing Access

Describe any affordable housing developments?existing, under construction, or planned?within ½ mile of the proposed project. The applicant should note the number of existing subsidized units, which will be provided on the Socio-Economic Conditions map. Applicants can also describe other types of affordable housing (e.g., naturally-occurring affordable housing, manufactured housing) and under construction or planned affordable housing that is within a half mile of the project. If applicable, the applicant can provide self-generated PDF maps to support these additions. Applicants are encouraged to provide a self-generated PDF map describing how a project connects affordable housing residents to destinations (e.g., childcare, grocery stores, schools, places of worship).

Describe the project?s benefits to current and future affordable housing residents within ½ mile of the project. Benefits must relate to affordable housing residents. Examples may include:

- ? specific direct access improvements for residents
- ? improved access to destinations such as jobs, school, health care or other;
- ? new transportation services or modal options;
- ? and/or community connection and cohesion improvements.

This is not an exhaustive list. Since residents of affordable housing are more likely not to own a private vehicle, higher points will be provided to roadway projects that include other multimodal access improvements. A full response will support the benefits claimed, identify benefits specific to residents of affordable housing, identify benefits addressing a transportation issue affecting residents of affordable housing specifically identified through engagement, and substantiate benefits with data.

Response:

There are three affordable housing developments within a 0.5 mile buffer of the proposed project along CSAH 35 (Portland Ave), representing 35 total affordable units: MJB House aka Elliot House, 5525 Chicago Avenue and Creekside Commons. Attachment 06 provides a map and full detail summary of these locations, including unit sizes and affordability limits based on area median incomes. As identified in the Met Council generated Socio Economic Conditions map, census tracts proximate to the project contain 363 publicly subsidized rental units.

MJB House is a three-unit shared living space site serving people with disabilities who make 30 percent of area median income or less. It is funded through HUD's Section 811 Project Rental Assistance. The project, which is 0.3 mile from MJB house, will include accessible ramps and accessible pedestrian signals at CSAH 35 (Portland Ave) and 54th St.

Creekside Commons is a multifamily housing site with 30 affordable units in one-, two-, three- and four-bedroom layouts. The site participates in HUD's Low-Income Housing Tax Credit Program. Creekside Commons is 0.5 mile walking distance from the project. Residents will benefit from the creation of a 1.7-mile walking trail / sidewalk loop that includes Diamond Lake Road, Pearl Park and Minnehaha Parkway Regional Trail.

The CSAH 35 (Portland Ave) Pedestrian Project will also benefit residents of affordable housing in the project area who bike, as it creates an off-street bikeway on a Regional Bicycle Transportation Network Tier 1 route. Hennepin County, with Regional Solicitation funding, completed a critical bicycling network gap closure about 1 mile south of this project in 2022, creating a partially protected bikeway on CSAH 35 (Portland Ave) over TH 62. This project will connect people living in affordable housing both north and south of the project locations (toward downtown Minneapolis and toward Richfield) with employment and multimodal transportation options.

(Limit 2,800 characters; approximately 400 words):

Measure D: BONUS POINTS

Project is located in an Area of Concentrated Poverty:

Project?s census tracts are above the regional average for population in poverty or population of color (Regional Environmental Justice Area):

Project located in a census tract that is below the regional average for population in poverty or populations of color (Regional Environmental Justice Area):

Upload the ?Socio-Economic Conditions? map used for this measure.

1701890081670_2024 RS Map 02 - CSAH 35 Portland Ave Pedestrian - Socio Economic.pdf

Measure A: Gaps, Barriers and Continuity/Connections

Response:

The CSAH 35 (Portland Ave) Pedestrian Project will overcome two pedestrian barriers: Crossing and traveling along CSAH 35 (Portland Ave) where today there is no pedestrian facility for 0.2 miles in south Minneapolis.

CSAH 35 (Portland Ave) is an A Minor Reliever parallel to Interstate 35W. It carries traffic that otherwise might be on 35W during congestion and construction closures. The posted speed limit is 30 mph. The general configuration is a two-way with one general lane in each direction, a painted on-street bike lane in each direction and a parking lane in each direction. The roadway meanders a bit around the contours of the former Pearl Lake, which was filled and developed into Pearl Park.

The nearest signalized intersection with accessible ramps is 0.2 mile from the north end of the project to Minnehaha Parkway or 0.65 mile from the southern end at 60th Street. The nearest unsignalized intersection with accessible ramps is 0.06 mile north at 51st Street or 0.18 mile south at 56th St.

The project concept would close a gap between the METRO D Line station at 52nd St and Pearl Park, with crossing improvements at 52nd St and a multiuse trail on the park side.

Hennepin County completed a pedestrian and bicycle traffic study in the project area in 2018 in response to resident requests for crossing improvements. This included 24-hour counts at 52nd St and 53rd St showing 203 people crossing as pedestrians at 52nd St and 172 people crossing as pedestrians at 53rd, with peak hour crossings of 76 and 58, respectively. The counts were conducted to coincide with youth soccer at adjacent Pearl Park, when many people will use on-street parking on the east side of the corridor and cross to get to the park.

The project will improve pedestrian crossings of CSAH 35 (Portland Ave), construct ADA compliant ramps, and provide an off-street pedestrian and bicycle connection to Pearl Park, reducing demand for on-street parking that may reduce corridor user safety while meeting multiple other regional and county goals.

The project will include signal replacement at Diamond Lake Rd, which due to high pedestrian traffic and presence of children today has a rare pedestrian-only signal phase.

The existing sidewalk facilities along CSAH 35 (Portland Ave) are deteriorating and in places completely absent. Current sidewalk facilities are cracked and uneven, and obstructions, such as utility poles, are present at several key intersections, including Diamond Lake Rd. Many of the intersection quadrants through the project corridor have pedestrian ramps that are missing or do not meet current standards. Existing signal infrastructure does not allow for the implementation of accessible pedestrian signals, presenting a challenge for those with limited vision.



Response:

One bicycle-involved crash was reported in the CSAH 35 (Portland Ave) pedestrian improvement corridor from 2013 to 2023. No pedestrian-involved crashes were reported during the same period (see Attachment 07).

The CSAH 35 (Portland Ave) concept would update approximately 15 pedestrian ramps to be directional and ADA accessible. The concept includes a pedestrian refuge island at 53rd St, bumpouts at 52nd St and bumpouts at the service drive portion of CSAH 35 (Portland Ave). County staff will evaluate the potential for a rectangular rapid flashing beacon (RRFB) at the 54th St intersection. These improvements would improve visibility and safety, particularly for children and youth who frequent Pearl Park, as they often are less visible around parked vehicles and have a refuge when drivers fail to yield.

The project concept includes a raised median between Diamond Lake Rd and 54th St, where today there is a painted median, improving safety.

The concept would replace the signals at Diamond Lake Road and 54th Street in part to allow installation of accessible pedestrian signals.

Attachment 08 includes applicable pages from Minnesota's Pedestrian and Bicycle Safety Guidebook.

- Median and crossing islands: Anticipated reduction of up to 46%-56% pedestrian crashes.
- Curb extensions: Anticipated crash reduction of up to 45%.
- Accessible Pedestrian Signals (APS): Crash reduction undetermined.
- Rectangular Rapid Flashing Beacons: Anticipated reduction of 47% in vehicle-pedestrian crashes.
- Off-street facility: Anticipated reduction of 37%.
- Uniform pedestrian lighting: Crash reduction undetermined since corridor currently includes non-uniform lighting.

The concept would improve pedestrian visibility at the signalized intersection with Diamond Lake Rd, where today obstructions hide pedestrians from view and limit their visibility. The obstructions include a utility pole, guy wire, signal pole and signal cabinet. The obstructions limit the ability to clear the pedestrian access route of ice and snow, compounding the current trip and slip hazards created by poor pavement and sidewalk condition.

Response:

The CSAH 35 (Portland Ave) Pedestrian Project would add a raised median on the north leg of the intersection with Diamond Lake Rd. This will improve safety for people using motor vehicles by better channelizing traffic, strongly discouraging aggressive passing maneuvers that occur in today's painted median, and slowing traffic. The project would address drainage issues at the intersection with Diamond Lake Rd, where heavy rainfall or snowmelt combined with debris often cause ponding that can enter the northbound bike lane and general lane.

Regular fixed-route transit service is not present on this segment of CSAH 35 (Portland Ave) today. The D Line bus rapid transit runs parallel to CSAH 35 (Portland Ave) on Chicago Ave, three blocks east, with the nearest stations at 52nd St and 56th St. The project concept would create a safer crossing of CSAH 35 (Portland Ave) at 52nd St with a bumpout and accessible ramps to create a connection from the station to the Pearl Park Recreation Center.

The project will improve biking on CSAH 35 (Portland Ave) by creating an all-ages-and-abilities option in the multiuse trail separated from the general lanes by parking, curb and boulevard. The concept would retain on-street bike lanes and improve safety for people biking on street by removing on-street parking near 53rd St (reducing risk of dooring while improving visibility) and reducing ambiguity in the bike lanes near Diamond Lake Rd, where people tend to park motor vehicles in the southbound bike lane today.

CSAH 35 (Portland Ave) is a Regional Bicycle Transportation Network Tier 1 Route that crosses significant barriers, including TH 62 0.9 miles south, and connects the cities of Bloomington, Richfield and Minneapolis.

A map showing these key multimodal connections is included in Attachment 09.

(Limit 2,800 characters; approximately 400 words)

Transit Projects Not Requiring Construction

If the applicant is completing a transit application that is operations only, check the box and do not complete the remainder of the form. These projects will receive full points for the Risk Assessment.

Park-and-Ride and other transit construction projects require completion of the Risk Assessment below.

Check Here if Your Transit Project Does Not Require Construction

Measure A: Risk Assessment - Construction Projects

1. Public Involvement (20 Percent of Points)

Projects that have been through a public process with residents and other interested public entities are more likely than others to be successful. The project applicant must indicate that events and/or targeted outreach (e.g., surveys and other web-based input) were held to help identify the transportation problem, how the potential solution was selected instead of other options, and the public involvement completed to date on the project. The focus of this section is on the opportunity for public input as opposed to the quality of input. NOTE: A written response is required and failure to respond will result in zero points.

Multiple types of targeted outreach efforts (such as meetings or online/mail outreach) specific to this project with the general public and partner agencies have been used to help identify the project need.

100%

At least one meeting specific to this project with the general public has been used to help identify the project need.

50%

At least online/mail outreach effort specific to this project with the general public has been used to help identify the project need.

50%

No meeting or outreach specific to this project was conducted, but the project was identified through meetings and/or outreach related to a larger planning effort.

No outreach has led to the selection of this project.

00/

Describe the type(s) of outreach selected for this project (i.e., online or in-person meetings, surveys, demonstration projects), the method(s) used to announce outreach opportunities, and how many people participated. Include any public website links to outreach opportunities.

Response

Project-specific outreach has not yet occurred. Hennepin County typically has funding in place before conducting project-specific outreach to avoid the possible perception of empty promises.

Multiple nearby residents have approached the county, city and Minneapolis Park and Recreation Board (MPRB) requesting the improvements included in this application or simply improving pedestrian crossings in some way.

General outreach for the project was conducted as part of MPRB's South Service Area master plan (which includes Pearl Park's master plan) in 2015 and 2016. Outreach efforts included nearly 100 community events, a 19-member community advisory committee that met 11 times, culturally tailored events and engagement in multiple languages. Resident involvement resulted in the Pearl Park's master plan including the trail connection and other improvements. Attachment 10 includes a community engagement summary from MPRB's Neighborhood Park Plans.

If funding is awarded, the county will work with the city and MPRB to develop and execute and engagement plan appropriate for the project.

(Limit 2,800 characters; approximately 400 words)

2. Layout (25 Percent of Points)

Layout includes proposed geometrics and existing and proposed right-of-way boundaries. A basic layout should include a base map (north arrow, scale; legend,* city and/or county limits; existing ROW, labeled; existing signals;* and bridge numbers*) and design data (proposed alignments; bike and/or roadway lane widths; shoulder width;* proposed signals;* and proposed ROW). An aerial photograph with a line showing the project?s termini does not suffice and will be awarded zero points. *If applicable*

Layout approved by the applicant and all impacted jurisdictions (i.e., cities/counties/MnDOT. If a MnDOT trunk highway is impacted, approval by MnDOT must have occurred to receive full points. A PDF of the layout must be attached along with letters from each jurisdiction to receive points.

100%

A layout does not apply (signal replacement/signal timing, stand-alone streetscaping, minor intersection improvements). Applicants that are not certain whether a layout is required should contact Colleen Brown at MnDOT Metro State Aid? colleen.brown@state.mn.us.

100%

For projects where MnDOT trunk highways are impacted and a MnDOT Staff Approved layout is required. Layout approved by the applicant and all impacted local jurisdictions (i.e., cities/counties), and layout review and approval by MnDOT is pending. A PDF of the layout must be attached along with letters from each jurisdiction to receive points.

75%

Layout completed but not approved by all jurisdictions. A PDF of the layout must be attached to receive points.

Yes

50%

Layout has been started but is not complete. A PDF of the layout must be attached to receive points.

25%

Layout has not been started

0%

Attach Layout

1702343506844 Attachment 04 - Potential Concept.pdf

Please upload attachment in PDF form

Additional Attachments

Please upload attachment in PDF form

3. Review of Section 106 Historic Resources (15 Percent of Points)

No known historic properties eligible for or listed in the National Register of Historic Places are located in the project area, and project is not located on an identified historic bridge

Yes

100%

There are historical/archeological properties present but determination of ?no historic properties affected? is anticipated.

100%

Historic/archeological property impacted; determination of ?no adverse effect? anticipated

200/

Historic/archeological property impacted; determination of ?adverse effect? anticipated

40%

Unsure if there are any historic/archaeological properties in the project area.

00/

Project is located on an identified historic bridge

4. Right-of-Way (25 Percent of Points)

Right-of-way, permanent or temporary easements, and MnDOT agreement/limited-use permit either not required or all have been acquired 100%

Right-of-way, permanent or temporary easements, and/or MnDOT agreement/limited-use permit required - plat, legal descriptions, or official map complete

50%

Right-of-way, permanent or temporary easements, and/or MnDOT agreement/limited-use permit required - parcels identified

Yes

Right-of-way, permanent or temporary easements, and/or MnDOT agreement/limited-use permit required - parcels not all identified

0%

5. Railroad Involvement (15 Percent of Points)

No railroad involvement on project or railroad Right-of-Way agreement is executed (include signature page, if applicable)

Yes

Signature Page

Please upload attachment in PDF form

Railroad Right-of-Way Agreement required; negotiations have begun

50%

100%

Railroad Right-of-Way Agreement required; negotiations have not begun.

0%

Measure A: Cost Effectiveness

Total Project Cost (entered in Project Cost Form): \$2,820,000.00

Enter Amount of the Noise Walls: \$0.00

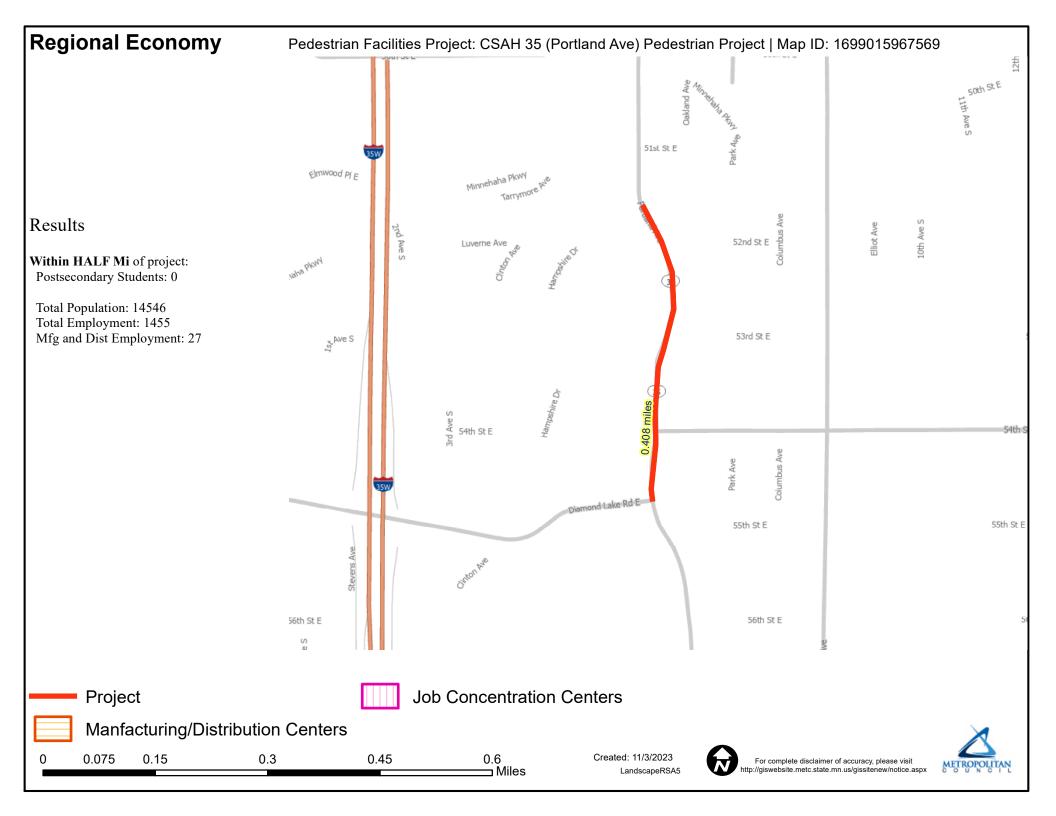
Total Project Cost subtract the amount of the noise walls: \$2,820,000.00

Points Awarded in Previous Criteria

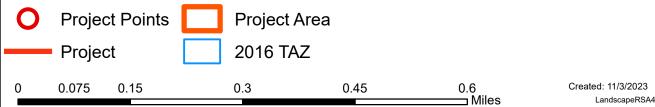
Cost Effectiveness \$0.00

Other Attachments

File Name	Description	File Size
Attachment 00 - List of Attachments.pdf	Attachment 00 - List of Attachments	76 KB
Attachment 01 - Project Narrative.pdf	Attachment 01 - Project Narrative	83 KB
Attachment 02 - Project Location Map.pdf	Attachment 02 - Project Location Map	1.3 MB
Attachment 03 - Existing Condition Photos.pdf	Attachment 03 - Existing Condition Photos	517 KB
Attachment 04 - Potential Concept.pdf	Attachment 04 - Potential Concept	1.0 MB
Attachment 05 - Disadvantaged Communities and Resources Map.pdf	Attachment 05 - Disadvantaged Communities and Resources Map	1.5 MB
Attachment 06 - Affordable Housing Access Map and Detail Summary.pdf	Attachment 06 - Affordable Housing Access Map and Detail Summary	581 KB
Attachment 07 - Crash Data Summary.pdf	Attachment 07 - Crash Data Summary	175 KB
Attachment 08 - Crash Reduction References.pdf	Attachment 08 - Crash Reduction References	1.1 MB
Attachment 09 - Multimodal Connections Map.pdf	Attachment 09 - Multimodal Connections Map	1.3 MB
Attachment 10 - Community Engagement Summary.pdf	Attachment 10 - Community Engagement Summary	2.3 MB
Attachment 11 - City of Minneapolis Letter of Support.pdf	Attachment 11 - City of Minneapolis Letter of Support	347 KB
Attachment 12 - Minneapolis Park and Recreation Board Letter of Support.pdf	Attachment 12 - Minneapolis Park and Recreation Board Letter of Support	172 KB



Population/Employment Pedestrian Facilities Project: CSAH 35 (Portland Ave) Pedestrian Project | Map ID: 1699015967569 Summary 1490 1489 1628 1122 327 1488 238 1326 61 1449 51st St E 230 Elm400d PIF 52nd St E Luverne Ave 1492 Results 3732 197 Within HALF Mile of project: Total Population: 14546 53rd St E 1493 843 1447 689 168 55th St E 55th St E 1498 2698 274 1494 648 11 56th St E 56th St E **Project Points Project Area**







Socio-Economic Conditions Pedestrian Facilities Project: CSAH 35 (Portland Ave) Pedestrian Project | Map ID: 1699015967569 Results Total of publicly subsidized rental housing units in census tracts within 1/2 mile: 363 Project located in census tract(s) that are ABOVE the regional average for population in poverty or population of color. Fort Snelling (unorg.) Richfield Fort Snelling Fort Snell (unorg.) Richfield (unorg. Lines Regional Environmental Justice Area Area of Concentrated Poverty 0.475 0.95 2.85 3.8 Created: 11/3/2023 1.9 For complete disclaimer of accuracy, please visit http://giswebsite.metc.state.mn.us/gissite/notice.aspx LandscapeRSA2

CSAH 35 (Portland Ave) Pedestrian Project HENNEPIN COUNTY MINNESOTA Attachment 04 | Potential Concept LEGEND RAISED MEDIANS & CURBS PROPOSED TRAFFIC SIGNAL)IAMOND SIDEWALK FACILITY **ENTRANCE** OFF-ROAD FACILITY LOW R/W IMPACTS **BOULEVARD** EVALUATE APPROPRIATE INTERSECTION CONTROL DEVICE 굠 PORTLAND NAME AVE **54TH** 55TH ST





HENNEPIN COUNTY
MINNESOTA

Attachment 04 | Potential Concept





HENNEPIN COUNTY MINNESOTA

Attachment 04 | Potential Concept





Attachment 00 | List of Attachments

- 1. Project Narrative
- 2. Project Location Map
- 3. Existing Condition Photos
- 4. Potential Concept
- 5. Disadvantaged Communities and Resources Map
- 6. Affordable Housing Access Map and Detail Summary
- 7. Crash Data Summary
- 8. Crash Reduction References
- 9. Multimodal Connections Map
- 10. Community Engagement Summary
- 11. City of Minneapolis Letter of Support
- 12. Minneapolis Park and Recreation Board Letter of Support

Attachment 01 | Project Narrative

HENNEPIN COUNTY MINNESOTA

Project Name

CSAH 35 (Portland Ave) Pedestrian Project

City(ies)

Minneapolis

Commissioner District(s)

Capital Project Number

Unfunded Candidate ID #2230503

Multimodal Accessibility (Corridor)

Project Category

Scoping Manager

Scoping Form Revision Dates

Dan Patterson

10/18/2023

Project Summary

Pedestrian safety improvements along Portland Avenue (CSAH 35) from Diamond Lake Road to 350' north of 52nd Street in the City of Minneapolis.

Roadway History

The existing sidewalk facilities along Portland Avenue (CSAH 35) present accessibility challenges for those walking and rolling along and across the corridor. Conditions are especially problematic at intersections as many of the existing pedestrian ramps do not satisfy current design standards, and traffic signal poles obstruct the walking route. In addition, the age and condition of traffic signal infrastructure requires costly upgrades to equipment and technology in order to retrofit Accessible Pedestrian Signal (APS) features. Furthermore, the corridor lacks off-street multimodal facilities along both sides for the two-block segment extending from 53rd Street to approximately 350 feet north of 52nd Street along Portland Avenue (CSAH 35), presenting a barrier for those trying to access Pearl Park.

Project Description and Benefits

The project objectives include improving safety, comfort, and accessibility for people walking along and across Portland Avenue (CSAH 35) through the replacement of pedestrian ramps, installation of APS, and implementation of proven traffic calming strategies (such as raised medians, curb extensions, and/or crossing beacons) to improve the crossing experience and manage vehicle speeds. The following elements will be evaluated as part of the project development process:

- Construction of an off-road facility along the west side from 53rd Street to 350' North of 52nd Street
 - Replacement of the existing traffic signal system at Diamond Lake Road
 - Determination of the recommended intersection control at 53rd Street
 - Low-cost strategies to improve on-road bicycle accommodations

Project Risks & Uncertainities

Additional coordination will be needed with the Minneapolis Park and Recreation Board for the proposed design of the off-street facility adjacent to Pearl Park.



Initial Project Timeline

Scoping: Q3 2023 - Q2 2025 Design: Q3 2025 - Q4 2027 R/W Acquisition: Q1 2027 - Q4 2027 Bid Advertisement: Q1 2028 Construction: Q2 2028 - Q3 2028

Project Delivery Responsibilities

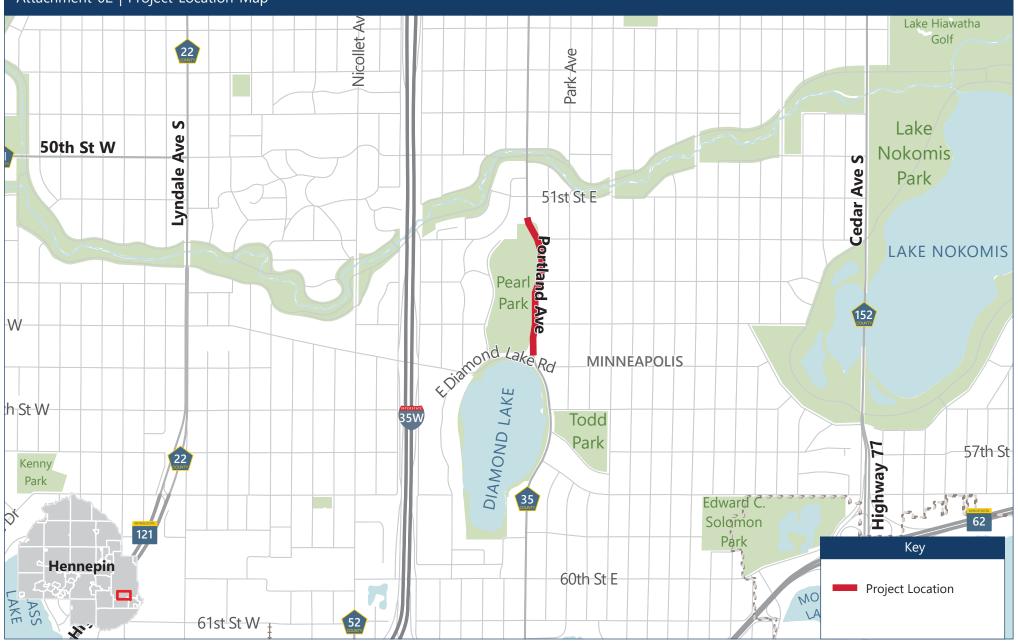
Preliminary Design: Consultant Consultant Final Design: Construction Services: Consultant

Project Budget -		Project Level
Construction	: \$	2,170,000
Cost Estimate Year	:	2023
Construction Year	:	2028
Annual Inflation Rate	:	2.0%
Inflated Construction	: \$	2,400,000
Design Services	: \$	480,000
R/W Acquisition	: \$	90,000
Other (Utility Burial)	: \$	-
Construction Services	: \$	190,000
Contingency	' : \$	720,000
Total Project Budget	: \$	3,880,000

Funding Notes

No funding notes identified at the time of application submittal in the Metropolitan Council's 2024 Regional Solicitation.

Attachment 02 | Project Location Map



Disclaimer: This map (i) is furnished "AS IS" with no representation as to completeness or accuracy, (ii) is furnished with no warranty of any kind; and (iii) is not suitable for legal, engineering or surveying purposes. Hennepin County shall not be liable for any damage, injury or loss resulting from this map.

Publication date: 10/17/2023 Data sources (if applicable):





Attachment 03 | Existing Condition Photos



The intersection of Portland Ave (CSAH 35) and E Diamond Lake Rd is pictured above. The signal system was constructed in 1960 and requires replacement.



Trail through Pearl Park ends at this location and does not provide a continuous facility for people walking and biking to the north.

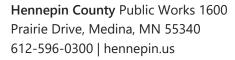




A continuous on-street bike facility will be added to the corridor as the current facilities drop at key locations.



Many ramps along Portland Ave (CSAH 35) lack ADA compliant truncated domes and need repair. The pictures above highlight non-compliant pedestrian infrastructure at the 53rd St intersection.





Attachment 03 | Existing Condition Photos



The intersection of Portland Ave (CSAH 35) and E 52nd St is pictured above. The intersection lacks ADA compliant ramps.



Pavement along the roadway contains cracks and requires repair similar to the image above. A mill and overlay is anticipated to be completed in coordination with this pedestrian project.



Intersection lacks ramp to align with the marked pedestrian crosswalk along Portland Ave (CSAH 35) and E 54th St.



CSAH 35 (Portland Ave) Pedestrian Project HENNEPIN COUNTY MINNESOTA Attachment 04 | Potential Concept LEGEND RAISED MEDIANS & CURBS PROPOSED TRAFFIC SIGNAL)IAMOND SIDEWALK FACILITY **ENTRANCE** OFF-ROAD FACILITY LOW R/W IMPACTS **BOULEVARD** EVALUATE APPROPRIATE INTERSECTION CONTROL DEVICE 굠 PORTLAND NAME AVE **54TH** 55TH ST





HENNEPIN COUNTY
MINNESOTA

Attachment 04 | Potential Concept





HENNEPIN COUNTY MINNESOTA

Attachment 04 | Potential Concept





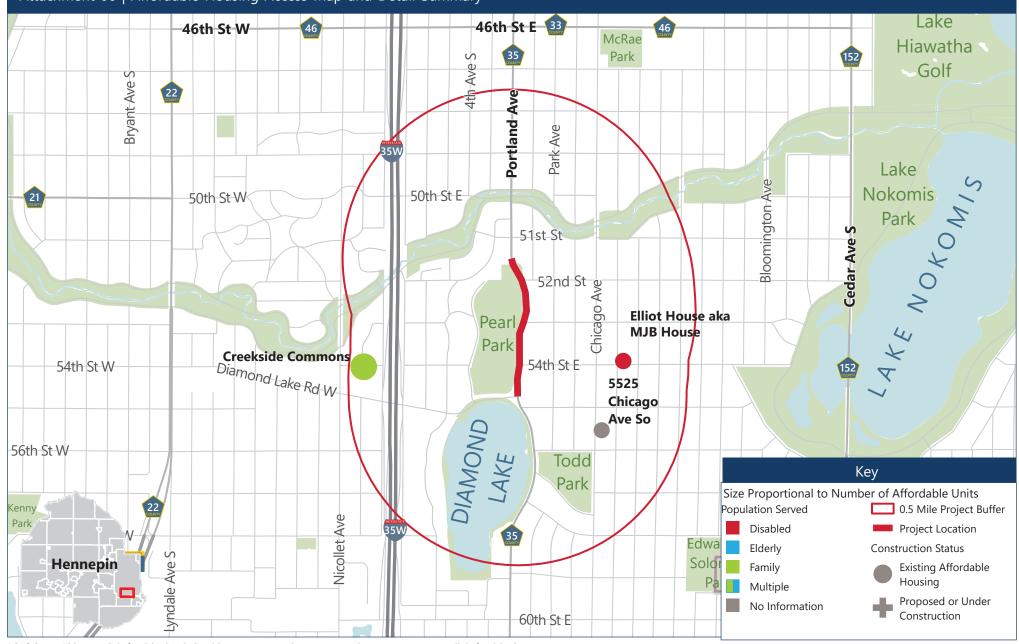
CSAH 35 (Portland Ave) Pedestrian Project Attachment 05 | Disadvantaged Communities and Resources Map Lutheran Church Methodist Church Ucc Lake Nicollet Ave Southside Family Charter Hiawatha Golf Lake Nokomis Stonebridge 33 **Presbyterian** 46th St W 46th St E World Saint Joan Of Saint McRae Church Hiawatha School The Table Arc Catholic Field Elementary Park Luke's College Prep Minneapolis Community New Creation scopal Church Linkage Holy Cross **Bryant** Ave - Northrup Knox Presbyterian Church Baptist Church Childcare Lutheran Ave St. Llc Chicago, Church St. James 4th-John's Lutheran Livina et Lutheran Church Justice Church Lake United Chui Washburn⁻ Pàge Bloomington Ave 50th St W 50th St E **Nokomis** Shir Tikvah John's Lutheran Park edar Ave Church Lake No First Evangelical Keewa Free Church 22 Elemen Nokomis Heights Pearl Church Hale Lutheran Church Washburn 🛂 Of The Park Library Tooncis, Annunciation Kev Our Our Lady Of Mayflower Church Inc. Lady Of Peace Annunciation 54th St W Peace **Project Location** Lake Catholic School Mount Olivet 0.5 Mile Project Buffer The Rock Area Careview Home Our Discovery Center Mayflower Early Schools & Childcare The Urban Refuge Lady Of Peace Bryant Childhood Center Minnehah Catholic Church Church Community Resources Mount Olivet Tierra Avenue **•** Diamond Laked Area Child Day Services Encantada Inc Baptist Church Healthcare (Hospitals & Lutheran Care Llc Restoration Nursing Homes) Church Anglican Windom Spanish Dual Service Centers Kenn **Immersion** Providence Libraries Richfield Reformed Baptist Hennepin Hig United Highway 62 Church High CDC SVI (>0.75) Methodist Church Tracts (2020) 60th St E Creative Church Farly Learning Center 121 Universal &

Disclaimer: This map (i) is furnished "AS IS" with no representation as to completeness or accuracy; (ii) is furnished with no warranty of any kind; and (iii) is not suitable for legal, engineering or surveying purposes. Hennepin County shall not be liable for any damage, injury or loss resulting from this map.

0 0.5 1 Miles



Attachment 06 | Affordable Housing Access Map and Detail Summary



Disclaimer: This map (i) is furnished "AS IS" with no representation as to completeness or accuracy; (ii) is furnished with no warranty of any kind; and (iii) is not suitable for legal, engineering or surveying purposes. Hennepin County shall not be liable for any damage, injury or loss resulting from this map.

Publication date: 11/6/2023

Data sources (if applicable):



Attachment 06 | Affordable Housing Access Map and Detail Summary

Property ID	Property Name	Total Units	Affordable Units	30% AMI	50% AMI	60% AMI	0 BR	1 BR	2 BR	3 BR	4 BR
10122	Becklund Outreach, Inc. Aka Elliot House	3	3	0	3	0	0	3	0	0	0
9334	Creekside Commons	30	30	6	24	0	0	4	14	9	3
16176	5525 Chicago Ave So	2	2	0	0	2	0	0	0	0	0

AMI: Area Median Income

CSAH 35 (Portland Ave) Pedestrian Project Attachment 07 | Crash Data Summary

Table 01 | Pedestrian reported crashes

Year	Total	K	Α	В	С	N
2013	0	0	0	0	0	0
2014	0	0	0	0	0	0
2015	0	0	0	0	0	0
2016	0	0	0	0	0	0
2017	0	0	0	0	0	0
2018	0	0	0	0	0	0
2019	0	0	0	0	0	0
2020	0	0	0	0	0	0
2021	0	0	0	0	0	0
2022	0	0	0	0	0	0
Ten Year						
Totals	0	0	0	0	0	0

Table 02 | Bicycle reported crashes

Year	Total	K	Α	В	С	N
2013	0	0	0	0	0	0
2014	0	0	0	0	0	0
2015	0	0	0	0	0	0
2016	0	0	1	0	0	0
2017	0	0	0	0	0	0
2018	0	0	0	0	0	0
2019	0	0	0	0	0	0
2020	0	0	0	0	0	0
2021	0	0	0	0	0	0
2022	0	0	0	0	0	0
Ten Year						
Totals	0	0	1	0	0	0



Attachment 07 | Crash Data Summary

Crash Severity/Crash Year												
Crash Severity	Total	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
K - Fatal	0	0	0	0	0	0	0	0	0	0	0	0
A - Serious Injury	1	0	0	0	1	0	0	0	0	0	0	0
B - Minor Injury	0	0	0	0	0	0	0	0	0	0	0	0
C - Possible Injury	0	0	0	0	0	0	0	0	0	0	0	0
N - Prop Dmg Only	0	0	0	0	0	0	0	0	0	0	0	0
Total	1	0	0	0	1	0	0	0	0	0	0	0

Crash Severity/Number of Vehicles								
Crash Severity	Total	0	1	2	3+			
K - Fatal	0	0	0	0	0			
A - Serious Injury	1	0	1	0	0			
B - Minor Injury	0	0	0	0	0			
C - Possible Injury	0	0	0	0	0			
N - Prop Dmg Only	0	0	0	0	0			
Total	1	0	1	0	0			

Basic Type Summary	Total	%
Pedestrian	0	0.0
Bike	1	100.0
Single Vehicle Run Off Road	0	0.0
Single Vehicle Other	0	0.0
Sideswipe Same Direction	0	0.0
Sideswipe Opposing	0	0.0
Rear End	0	0.0
Head On	0	0.0
Left Turn	0	0.0
Angle	0	0.0
Other	0	0.0
Total	1	100.0

First Harmful Event Summary	Total	%
Pedestrian	0	0.0
Bicyclist	1	100.0
Motor Vehicle In Transport	0	0.0
Parked Motor Vehicle	0	0.0
Train	0	0.0
Deer/Animal	0	0.0
Other - Non Fixed Object	0	0.0
Collision Fixed Object	0	0.0
Non-Collision Harmful Events	0	0.0
Other/Unknown	0	0.0
Total	1	100.0

Relationship to Intersection Summary	Total	%
Not at Intersection/Interchange	0	0.0
Four-Way Intersection	0	0.0
T or Y Intersection	1	100.0
Five-Way Intersection or More	0	0.0
Roundabout	0	0.0
Intersection Related	0	0.0
Driveway Access Related	0	0.0
At School Crossing	0	0.0
Railway Grade Crossing	0	0.0
Shared Use Path or Trail	0	0.0
Interchange or Ramp	0	0.0
Crossover Related	0	0.0
Acceleration/Deceleration Lane	0	0.0
Other/Unknown	0	0.0
Total	1	100.0

Weather 1 Summary	Total	%
Clear	1	100.0
Cloudy	0	0.0
Rain	0	0.0
Snow	0	0.0
Sleet, Hail (Freezing Rain/Drizzle)	0	0.0
Fog/Smog/Smoke	0	0.0
Blowing Sand/Soil/Dirt/Snow	0	0.0
Severe Crosswinds	0	0.0
Other/Unknown	0	0.0
Total	1	100.0

Light Condition Summary	Total	%
Daylight	1	100.0
Sunrise	0	0.0
Sunset	0	0.0
Dark (Str Lights On)	0	0.0
Dark (Str Lights Off)	0	0.0
Dark (No Str Lights)	0	0.0
Dark (Unknown Light)	0	0.0
Other/Unknown	0	0.0
Total	1	100.0



Attachment 07 | Crash Data Summary

Time of Da	y/Day of	Week												
From To	00:00 01:59	02:00 03:59	04:00 05:59	06:00 07:59	08:00 09:59	10:00 11:59	12:00 13:59	14:00 15:59	16:00 17:59	18:00 19:59	20:00 21:59	22:00 23:59	Total	%
SUN	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
MON	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
TUE	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
WED	0	0	0	0	0	0	0	0	1	0	0	0	1	100.0
THU	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
FRI	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
SAT	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
Total	0	0	0	0	0	0	0	0	1	0	0	0	1	100.0
%	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	100.0	100.0

Driver & N	on-Motori	st Age/G	ender S	ummary		
Age	M	F	NR	No Value	Total	%
<14	1	0	0	0	1	50.0
14	0	0	0	0	0	0.0
15	0	0	0	0	0	0.0
16	0	0	0	0	0	0.0
17	1	0	0	0	1	50.0
18	0	0	0	0	0	0.0
19	0	0	0	0	0	0.0
20	0	0	0	0	0	0.0
21-24	0	0	0	0	0	0.0
25-29	0	0	0	0	0	0.0
30-34	0	0	0	0	0	0.0
35-39	0	0	0	0	0	0.0
40-44	0	0	0	0	0	0.0
45-49	0	0	0	0	0	0.0
50-54	0	0	0	0	0	0.0
55-59	0	0	0	0	0	0.0
60-64	0	0	0	0	0	0.0
65-69	0	0	0	0	0	0.0
70-74	0	0	0	0	0	0.0
75-79	0	0	0	0	0	0.0
80-84	0	0	0	0	0	0.0
85-89	0	0	0	0	0	0.0
90-94	0	0	0	0	0	0.0
95+	0	0	0	0	0	0.0
No Value	0	0	0	0	0	0.0
Total	2	0	0	0	2	100.0
%	100.0	0.0	0.0	0.0	100.0	100.0

Month Summary	Total	%
January	0	0.0
February	0	0.0
March	0	0.0
April	0	0.0
May	0	0.0
June	1	100.0
July	0	0.0
August	0	0.0
September	0	0.0
October	0	0.0
November	0	0.0
December	0	0.0
Total	1	100.0

Physical Condition Summary	Total	%
Apparently Normal (Including No Drugs/Alcohol)	2	100.0
Physical Disability (Short Term or Long Term)	0	0.0
Medical Issue (III, Sick or Fainted)	0	0.0
Emotional (Depression, Angry, Disturbed, etc.)	0	0.0
Asleep or Fatigued	0	0.0
Has Been Drinking Alcohol	0	0.0
Has Been Taking Illicit Drugs	0	0.0
Has Been Taking Medications	0	0.0
Other/Unknown	0	0.0
Not Applicable	0	0.0
Total	2	100.0

Selection Filter:

WORK AREA: County('659472') - FILTER: Date('01/01/2013','12/31/2022'), Basic Type('2') - SPATIAL FILTER APPLIED

Analyst:

Notes:

James Weatherly

CSAH 35 Bike Crashes 2013 - 2022



Attachment 07 | Crash Data Summary

Crash Severity/Crash Year	•											
Crash Severity	Total	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
K - Fatal	0	0	0	0	0	0	0	0	0	0	0	0
A - Serious Injury	0	0	0	0	0	0	0	0	0	0	0	0
B - Minor Injury	0	0	0	0	0	0	0	0	0	0	0	0
C - Possible Injury	0	0	0	0	0	0	0	0	0	0	0	0
N - Prop Dmg Only	0	0	0	0	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0	0	0	0	0

Crash Severity/Number of Vehicles										
Crash Severity	Total	0	1	2	3+					
K - Fatal	0	0	0	0	0					
A - Serious Injury	0	0	0	0	0					
B - Minor Injury	0	0	0	0	0					
C - Possible Injury	0	0	0	0	0					
N - Prop Dmg Only	0	0	0	0	0					
Total	0	0	0	0	0					

Basic Type Summary	Total	%
Pedestrian	0	0.0
Bike	0	0.0
Single Vehicle Run Off Road	0	0.0
Single Vehicle Other	0	0.0
Sideswipe Same Direction	0	0.0
Sideswipe Opposing	0	0.0
Rear End	0	0.0
Head On	0	0.0
Left Turn	0	0.0
Angle	0	0.0
Other	0	0.0
Total	0	100.0

First Harmful Event Summary	Total	%
Pedestrian	0	0.0
Bicyclist	0	0.0
Motor Vehicle In Transport	0	0.0
Parked Motor Vehicle	0	0.0
Train	0	0.0
Deer/Animal	0	0.0
Other - Non Fixed Object	0	0.0
Collision Fixed Object	0	0.0
Non-Collision Harmful Events	0	0.0
Other/Unknown	0	0.0
Total	0	100.0

Relationship to Intersection Summary	Total	%
Not at Intersection/Interchange	0	0.0
Four-Way Intersection	0	0.0
T or Y Intersection	0	0.0
Five-Way Intersection or More	0	0.0
Roundabout	0	0.0
Intersection Related	0	0.0
Driveway Access Related	0	0.0
At School Crossing	0	0.0
Railway Grade Crossing	0	0.0
Shared Use Path or Trail	0	0.0
Interchange or Ramp	0	0.0
Crossover Related	0	0.0
Acceleration/Deceleration Lane	0	0.0
Other/Unknown	0	0.0
Total	0	100.0

Weather 1 Summary	Total	%
Clear	0	0.0
Cloudy	0	0.0
Rain	0	0.0
Snow	0	0.0
Sleet, Hail (Freezing Rain/Drizzle)	0	0.0
Fog/Smog/Smoke	0	0.0
Blowing Sand/Soil/Dirt/Snow	0	0.0
Severe Crosswinds	0	0.0
Other/Unknown	0	0.0
Total	0	100.0

Light Condition Summary	Total	%
Daylight	0	0.0
Sunrise	0	0.0
Sunset	0	0.0
Dark (Str Lights On)	0	0.0
Dark (Str Lights Off)	0	0.0
Dark (No Str Lights)	0	0.0
Dark (Unknown Light)	0	0.0
Other/Unknown	0	0.0
Total	0	100.0



Attachment 07 | Crash Data Summary

ime of Da	ly/Day Oi	WCCK												
From To	00:00 01:59	02:00 03:59	04:00 05:59	06:00 07:59	08:00 09:59	10:00 11:59	12:00 13:59	14:00 15:59	16:00 17:59	18:00 19:59	20:00 21:59	22:00 23:59	Total	%
SUN	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
MON	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
TUE	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
WED	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
THU	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
FRI	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
SAT	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0
Total	0	0	0	0	0	0	0	0	0	0	0	0	0	100.0
%	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	100.0

Driver & Non-Motorist Age/Gender Summary						
Age	M	F	NR	No Value	Total	%
<14	0	0	0	0	0	0.0
14	0	0	0	0	0	0.0
15	0	0	0	0	0	0.0
16	0	0	0	0	0	0.0
17	0	0	0	0	0	0.0
18	0	0	0	0	0	0.0
19	0	0	0	0	0	0.0
20	0	0	0	0	0	0.0
21-24	0	0	0	0	0	0.0
25-29	0	0	0	0	0	0.0
30-34	0	0	0	0	0	0.0
35-39	0	0	0	0	0	0.0
40-44	0	0	0	0	0	0.0
45-49	0	0	0	0	0	0.0
50-54	0	0	0	0	0	0.0
55-59	0	0	0	0	0	0.0
60-64	0	0	0	0	0	0.0
65-69	0	0	0	0	0	0.0
70-74	0	0	0	0	0	0.0
75-79	0	0	0	0	0	0.0
80-84	0	0	0	0	0	0.0
85-89	0	0	0	0	0	0.0
90-94	0	0	0	0	0	0.0
95+	0	0	0	0	0	0.0
No Value	0	0	0	0	0	0.0
Total	0	0	0	0	0	100.0
%	0.0	0.0	0.0	0.0	100.0	100.0

Month Summary	Total	%
January	0	0.0
February	0	0.0
March	0	0.0
April	0	0.0
May	0	0.0
June	0	0.0
July	0	0.0
August	0	0.0
September	0	0.0
October	0	0.0
November	0	0.0
December	0	0.0
Total	0	100.0

Physical Condition Summary	Total	%
Apparently Normal (Including No Drugs/Alcohol)	0	0.0
Physical Disability (Short Term or Long Term)	0	0.0
Medical Issue (III, Sick or Fainted)	0	0.0
Emotional (Depression, Angry, Disturbed, etc.)	0	0.0
Asleep or Fatigued	0	0.0
Has Been Drinking Alcohol	0	0.0
Has Been Taking Illicit Drugs	0	0.0
Has Been Taking Medications	0	0.0
Other/Unknown	0	0.0
Not Applicable	0	0.0
Total	0	100.0

Selection Filter:

WORK AREA: County('659472') - FILTER: Date('01/01/2013','12/31/2022'), Basic Type('1') - SPATIAL FILTER APPLIED

Analyst:

Notes:

James Weatherly

CSAH 35 Ped Crashes 2013 - 2022

Medians and Crossing Islands

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is their purpose?

Medians and crossing islands (also known as refuge islands or center islands) are raised areas that are constructed in the center portion of a roadway, serving as a place of refuge for people who cross the road mid-block or at an intersection. They allow pedestrians and bicyclists to concentrate their attention on one direction of traffic at a time while crossing the roadway. After crossing to the center island, users wait for motorists to stop for an adequate gap in traffic before crossing the second half of the street. Refuge islands can drastically reduce pedestrian delay and vehicle conflicts by increasing the number of safe gaps that are available.



Median at Maryland Avenue and Greenbrier Street, Saint Paul, MN

Are they a proven strategy?

FHWA research shows that median and crossing islands are a **PROVEN** safety countermeasure.

Supporting Document: <u>FHWA Proven Countermeasures – Pedestrian Medians</u>

Where would we use them?

When installing a median or crossing island, an agency should develop a design that allows accessibility for all users and adheres to ADA crossing standards. 6' is the minimum median width where detectable warning surfaces are required. However, to allow storage space for a bicycle and to allow space for a level landing and truncated domes, a best practice is to construct crossing islands or medians of at least 8' in width. 10' or greater width is preferred, especially where bicycle traffic is expected. Crossing islands less than 6' are not considered pedestrian refuges since they cannot include detectable warning surfaces and may not safely serve as a refuge for all users.

Crossing islands are commonly installed at:

- Mid-block crossing locations or candidate locations
- High-priority pedestrian crossing locations such as transit stops, schools, and parks
- On roadways where marked crosswalks alone may not be sufficient, including roadways with speeds greater than 35 mph, and when annual average daily traffic (AADT) is greater than 9000. The raised medians must be accessible by all users, and should adhere to ADA crossing standards.



Medians and Crossing Islands

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

\bigoplus

What are the advantages?

- Separates opposing vehicle travel lanes and allows pedestrians/bicyclists to cross the roadway in two stages rather than all at once.
- Reduces certain types of motor vehicle crashes, such as head-on crashes.
- Can help slow vehicle speeds by providing visual narrowing/traffic calming of the roadway.
- Can be implemented using low-cost, interim materials such as striping, flexible posts, and other bollards until a permanent improvement can be funded through a reconstruction project or other programming.
- Can provide area for landscaping and other visual enhancements as well as stormwater treatment.
- Studies show that a raised median can reduce up to 46% of pedestrian crashes, and a pedestrian crossing island can reduce up to 56% of pedestrian crashes.

What are the maintenance impacts?

Partner with maintenance team members during design development to discuss strategies and issues related to routine maintenance, especially during winter months, to keep the crossing island clear of snow and debris, along with the rest of the sidewalk network. Median crossings can pose an obstacle to snow plows, and to reduce plow strikes on median island curbs, designers should follow

(!)

What are the challenges?

- Permanent medians can be costly and are recommended to be included in larger construction projects.
- May restrict driveway access and on-street parking.
- Can introduce more significant design features and construction costs if stormwater management is impacted and additional inlets are required at locations with curb extensions.
- Require additional winter maintenance considerations.

the pedestrian approach nose details in MnDOT Standard Plan 5-297.250.

Supplemental treatments

Raised medians and crossing islands are often combined with the following treatments:

- High-visibility crosswalk markings
- Advanced warning signs
- Curb extensions
- Street lighting
- Advance stop bars
- RRFBs or PHBs



A median with a refuge island

Best practices

To accommodate all users, medians must be fully accessible by ramp or cut through, and should provide tactile cues for pedestrians with visual impairments to indicate the border between the pedestrian refuge area and the motorized vehicle roadway.



How much do they cost?

The average cost for a raised island or crossing island is approximately \$10/sf, and the total cost can vary widely from approximately \$2,000 to \$45,000. Costs depend on the design, site conditions, and whether the median can be included as part of a larger construction project.



Medians and Crossing Islands

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

Design Features

Continuously raised medians may not be appropriate or physically possible at all locations. They may need to be weighed against other roadway features such as wider sidewalks, bicycle lanes, landscaping buffers, or on-street parking.

At both intersections and mid-block locations, short sections of median at high-priority crossings such as schools and parks provide benefit to pedestrians. Pedestrian islands may be appropriate at unsignalized and signalized crossing locations.

Raised medians must incorporate the following:

- Fully accessible ramps.
- Tactile cues for pedestrians with visual impairments, that meet ADA standards.
- Adequate visibility between pedestrian and approaching vehicles.
- The median crossing can be angled (rather than perpendicular) to allow pedestrians easier visibility of oncoming traffic.
- Crossing islands may also be staggered (also known as a Z-crossing), which is a treatment that forces
 pedestrians to turn in the median and face the direction of traffic. Staggered crossings may be difficult for
 pedestrians with vision impairments to navigate, so it's important to provide a detectable edge along the
 crossing.



Pedestrian approach nose shown at a refuge island



Z-crossing treatment

Resources

- Proven countermeasure: https://safety.fhwa.dot.gov/
 provencountermeasures/ped medians/
- http://pedbikesafe.org/PEDSAFE/countermeasures_ detail.cfm?CM_NUM=6
- CRFs: https://safety.fhwa.dot.gov/tools/crf/
 resources/fhwasa08011/fhwasa08011.pdf
- https://www.dot.state.mn.us/ada/pdf/5-297-250.pdf



Curb Extensions and Curb Radii

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is their purpose?

A curb extension is an extension of the sidewalk into the roadway that reduces the crossing distance of a roadway for pedestrians and pedestrian exposure to vehicular traffic. Curb extensions can provide visual cues to drivers that encourage them to reduce speeds and be aware of pedestrians and bicyclists. Curb extensions also improve intersection sight distance for vehicles and pedestrians since they restrict parking near the intersection. They can also provide additional space to construct ADA-compliant curb ramps, making them an effective strategy on ADA retrofit projects where constructing and ADA-compliant ramp may be otherwise difficult. Curb extensions are used at intersections and at mid-block crosswalks.



A curb extension at an intersection

Are they a proven strategy?

Curb extensions are **PROVEN** safety strategies. Research shows that reducing the crossing distance, restricting the street width, and reducing wide corner radii improve pedestrian safety and enhance the sight distance between motorists and pedestrians.

Supporting Documentation: MnDOT Enhanced Crosswalks

Where would we use them?

Curb extensions are most appropriate in urban settings when there is an on-street parking lane or a shoulder where the extensions will not impede bicycle travel. The curb extension physically precludes vehicles parking near an intersection or pedestrian crossing, improving sight lines and visibility both for and of crossing pedestrians near parked vehicles. Beyond being used at intersections, curb extensions can be applied in a variety of ways depending on the roadway's needs. Examples include the following:

- Mid-block curb extensions or pinch points
- Offset curb extensions or chicanes
- Bus stops

What are the maintenance impacts?

Partner with maintenance team members during design development to discuss strategies and issues related to routine maintenance, especially during winter months. Curb extensions may increase the level of effort required to remove snow from the parking lane. This can be minimized by adding delineators or markers on the curb extension to help guide snow plows, and by flattening the taper rate of the curb extension to 1:5 so plows can maintain a limited forward speed while clearing snow adjacent to the curb extension.



Curb Extensions and Curb Radii

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What are the advantages?

- May be temporarily implemented and evaluated using low-cost, interim materials such as gravel, planters, paint and striping, flexible posts, or bollards until a permanent improvement can be funded through a reconstruction project or other programming.
- Increase visibility of pedestrians and bicyclists crossing the street.
- Encourage slower turning speeds.
- Reduce crossing distance at mid-block crosswalks.
- Serve as a gateway or visual cue for drivers entering a slower, more residential area.
- May dedicate width for bus stops (bus bulbs).
- May dedicate width for on-street parking.
- Increase space for street furniture, landscaping, and stormwater treatment.
- Improve intersection sight distance (by prohibiting parking near the intersection)
- Provide additional space to construct ADAcompliant curb ramps.
- Studies show a reduction in crashes up to 45%.

What are the challenges?

- Design can be restricted by the turning radius of the larger design vehicles (trucks and buses).
- Stormwater management needs associated with the new curb alignment (e.g., catch basin locations) can bring additional design and construction costs.
- Require additional winter maintenance considerations.
- Curb extension retrofits may reduce the amount of available on-street parking

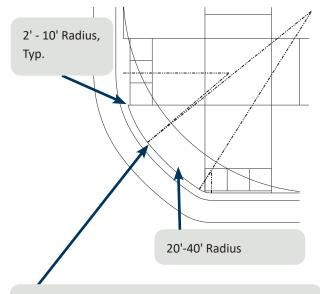
Supplemental treatments

Curb extensions and curb radii can be combined with the following treatments:

- High-visibility crosswalk markings
- Advanced warning signs
- Right turn on red restrictions at signalized intersections
- Landscaping or other aesthetic improvements

Best practices

Curb extensions can often be lengthened to provide additional space for landscaping, stormwater treatment, transit waiting areas, and bus shelters. In addition, curb extensions can create additional space to fit ADA-compliant curb ramps, improving accessibility in constrained locations where it may otherwise be difficult to do so.



A compound radius can increase available curb extension space while still allowing large vehicles to turn, especially on multi-lane roadways.

Compound radius detail, Source: MnDOT Curb Ramp Standard Plan



How much do they cost?

Costs depend on site conditions, drainage impacts, pavement design, and ADA accommodations. Curb extension installation can range between \$2,000-\$3,500 per corner if it does not cause storm sewer impacts and between \$10,000-\$20,000 per corner if it does cause storm sewer impacts.



Curb Extensions and Curb Radii

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

Design Features

Curb extensions should be tailored to the unique characteristics of the site at which they are installed, though MnDOT's Pedestrian Curb Ramp Standard Plans has details that may be helpful. See Curb Extensions and Curb Radii section of this handbook.

Designers should also consider or incorporate the following:

- Curb extensions should extend the full width of an adjacent parking lane.
- Maintain proper sight distance between pedestrians and motorists, including street furniture and landscaping features.
- Stormwater runoff may be impacted and additional catch basins may be required as part of the design. Avoid designs that cause water to pool on the sidewalk.



Resources

- Proven: http://www.dot.state.mn.us/stateaid/trafficsafety/county/CRSP-EnhancedCrosswalks.pdf
- https://safety.fhwa.dot.gov/intersection/conventional/signalized/fhwasa13027/ch9.cfm#s911
- Minnesota DOT Roadway Design Manual, Chapter 5-1.04
- http://www.pedbikeinfo.org/cms/downloads/Countermeasure%20Costs Report Nov2013.pdf
- Bump Outs: http://pedbikesafe.org/PEDSAFE/countermeasures_detail.cfm?CM_NUM=5
- https://nacto.org/publication/urban-street-design-guide/street-design-elements/curb-extensions/
- Curb Radii: http://pedbikesafe.org/PEDSAFE/countermeasures_detail.cfm?CM_NUM=28
- https://safety.fhwa.dot.gov/ped_bike/step/docs/STEP_Guide_for_Improving_Ped_Safety_at_Unsig_Loc_3-2018 07 17-508compliant.pdf

Curb retrofit on Snelling Avenue, Saint Paul, MN; Source: Google

Before/after photo of curb ramp retrofit. The curb extension allowed the construction of ADA-compliant ramps on an otherwise constrained corridor. Note the upstream side of curb extension has a flatter taper than the downstream side.

Traffic Signals

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is their purpose?

Traffic signals assign right-of-way to various traffic movements at intersections and help reduce conflict between different roadway users. Signal design typically focuses on the operating characteristics of motorized vehicles, but can also benefit pedestrians and bicyclists by creating gaps in traffic to cross. For example, in areas with pedestrian activity, traffic signals can include features such as countdown timers, leading pedestrian intervals, and exclusive pedestrian signal timings.

MnMUTCD Chapter 4C includes a list of nine warrants, which are threshold conditions that should be analyzed to help determine if signalization is appropriate for an intersection. These warrants are based on the volume of pedestrians and vehicles crossing the intersection, the presence of a school crossing, coordinated signal system, a grade crossing, and the crash experience at the intersection location. Engineering judgment should always be used when assessing traffic control change and signal warrant analysis.

Are they a proven strategy?

A traffic signal alone is not a proven safety countermeasure for pedestrians and bicyclists. There are a number of reasons for this, including lack of attention and failure of motorists to yield to pedestrians, lack of signal compliance by drivers and pedestrians, and speeding.

Supplemental strategies should be considered to improve pedestrian accommodations at signalized intersections. Strategies include countdown timers, which are **PROVEN** countermeasures to reduce crashes; and leading pedestrian intervals, which are **PROVEN** countermeasures. No Turn on Red restrictions, which are a **TRIED** countermeasure; and exclusive pedestrian signal timings, which are **TRIED** countermeasures.

Where would we use them?

Traffic signals serve many purposes. Before they are used, an engineering study of traffic conditions, pedestrian activity, and location characteristics should be performed. Additionally, the MnMUTCD signal warrants must be analyzed as part of the study. It should be noted that a location meeting one or more traffic signal warrant criteria does not in itself mandate the installation of a traffic signal.

Traffic signals are most effective for pedestrian and bicycle safety when:

- The intersection needs additional enhancements to improve motorist yielding rates or address limited gaps in traffic.
- There is a high volume of pedestrian activity, near transit stops, schools, and parks.



Bicyclists at a traffic signal



Traffic Signals

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

Other Common Treatments:

- Fixed pedestrian phases are common at intersections with steady pedestrian activity throughout the day.
- Pedestrian push buttons are common in areas
 with intermittent pedestrian activity. When push
 buttons are installed, the design should consider
 implementing an Accessible Pedestrian Signal (APS).
 An APS is a device that communicates information
 about WALK and DON'T WALK intervals at signalized
 intersections through audible tones, speech
 messages, and vibrating surfaces to assist pedestrians
 with visual impairments.
- Implementing shorter cycle lengths (approximately 90 seconds).
- Implementing turn restrictions or left-turn phasing for vehicles.
- Ensuring that the signal has proper crossing times for pedestrians per MnMUTCD guidance.
- Exclusive pedestrian signal timings are most common in urban areas. These stop vehicles from all directions to allow pedestrians the right-of-way to cross the street in any direction (including diagonally).

Best practices

Traffic signals are used to assign right-of-way to conflicting traffic modes at intersections. There are several proven safety countermeasures that can be paired with traditional signalized intersections to enhance safety. Examples include countdown pedestrian timers, leading pedestrian intervals, backplates with retroreflective borders, and yellow change intervals.

Resources

- Crash Modification Factors
- Cost
- http://www.dot.state.mn.us/trafficeng/publ/mutcd/mnmutcd2018/mnmutcd-4.pdf
- http://guide.saferoutesinfo.org/engineering/traffic_signals.cfm
- https://www.dot.state.mn.us/trafficeng/publ/ fundamentals/2015-mndot-safety-handbook-



How much do they cost?

Installing a new traffic signal can vary from approximately \$250,000 to \$500,000, depending on the site conditions, existing utilities, and additional enhancements. Annual maintenance costs are approximately \$2,000 to \$4,000 per intersection.

Design Features

Reference the MnDOT Traffic Control Signal Design Manual for a detailed review of traffic signal design elements, including signal phasing and operations, detection design, and signing and pavement markings. The goals of the design should include providing a safe and efficient operation for the intersection's unique conditions.

Key strategies for improving pedestrian accommodation at signalized intersections include the following:

- Adding accessible pedestrian push buttons where signals are pedestrian actuated.
- Implementing short cycle lengths (90 seconds maximum)
- Adding countdown timers, which are usually installed with pedestrian indication lights. These provide the
 number of seconds remaining during the pedestrian phase. <u>MnMUTCD Chapter 4D.7</u> now requires countdown
 timers to be installed at signals with pedestrian signal heads at crosswalks with pedestrian change intervals
 greater than 7 seconds.
- Leading pedestrian intervals, which can be installed to improve the safety of the crossings by providing
 pedestrians 3-7 seconds to enter an intersection prior to giving the green indication to vehicles. More
 information can be found in the section on Leading and Separate Exclusive Signals.
- Using a fixed pedestrian phase if pedestrian traffic is frequent, this timing strategy does not require pushing the pedestrian button to activate the WALK phase.
- Maintaining optimal sight distance and visibility of signals to pedestrians.
- Implementing MnMUTCD guidelines for creating optimal WALK and DON'T WALK times for pedestrians.



Rectangular Rapid Flashing Beacons

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is their purpose?

A Rectangular Rapid Flashing Beacon (RRFB) is a crossing enhancement at uncontrolled intersections that can be activated manually by a pedestrian using a pushbutton or by a pedestrian detection system. The RRFB assembly typically includes one RRFB device on each end of a crosswalk. Each device includes two rapidly and alternatively flashing rectangular yellow indications attached to a pole supplementing the pedestrian warning sign (W11-2) or school crossing sign (S1-1) at a crosswalk. The irregular "wig-wag" flashing sequence is similar to emergency flashers on police vehicles (left light on, then right light on, etc.) with a pulsing light source.

MnDOT has received statewide Interim Approval from FHWA for the use of a pedestrian actuated RRFB (IA-21). Statewide Interim Approval allows any jurisdiction within Minnesota to use the device as long as the jurisdiction agrees to notify the MnDOT Traffic Standards Engineer of the location for each installation and agrees to the specific conditions outlined for Statewide Interim Approvals.



RRFB at Johnson Street NE & 22nd Avenue NE, Minneapolis, MN

Are they a proven strategy?

FHWA has reviewed studies related to the effectiveness of the RRFB device and have confirmed its success at uncontrolled marked crosswalks. Therefore, based on the number of successful experiments, the RRFB is a **PROVEN** safety countermeasure strategy for marked crosswalks.

Supporting Research: <u>Evaluation of Pedestrian Hybrid</u> <u>Beacons and Rapid Flashing Beacons</u>

Where would we use them?

The purpose of the RRFB is to increase driver awareness of the presence of pedestrians at crosswalks that are not across approaches controlled by YIELD signs, STOP signs, or traffic control signals. RRFBs can be used on crosswalks across the approach to and/or egress from a roundabout. Research shows that an RRFB is most effective on roadways with volumes less than 12,000 vehicles per day and with speeds less than 40 mph.

Per the IA-21 the use of an RRFB shall:

- Only be installed to function as a pedestrian-actuated enhancement
- Only be used to supplement a post-mounted or overhead-mounted W11-2 (Pedestrian), S1-1 (School), or W11-15 (Trail) crossing warning sign. A diagonal downward arrow (W16-7P) plaque shall supplement the post-mounted signs.

The IA-21 also provides information regarding sign/beacon assembly locations, beacon dimensions and placement, beacon flashing requirements, beacon operations, and accessible pedestrian features. Reference the Interim Approval-21 for more details regarding the federal guidance.



Rectangular Rapid Flashing Beacons

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References



What are the advantages?

- RRFBs can utilize power from the existing grid network or by solar panels furnished on the devices.
- Increases driver awareness of the crosswalks and driver yielding compliance, especially at night. Compliance rates vary per site, and are generally highest on low-speed, single-lane facilities. Studies have found compliance rates from 17% to as high as 98%, which are comparable to a traffic signal or pedestrian hybrid beacon system.
- Can reduce the number of multiple-threat crashes, especially when used in combination with other strategies noted below.
- 47% reduction in vehicle-pedestrian crashes.

What are the maintenance impacts?

Maintenance for the RRFB is dependent on the power supply type. If solar power is used, the primary concern is removing nearby foliage and the amount of sun exposure throughout the day. Solar powered RRFBs typically function for several years without maintenance issues.

Solar powered RRFB systems do not require underground conduit, and would only require a push button to activate the system. The largest solar panel (55 watt) can accommodate around 1,000 activations per day. These solar panels typically can last up to 10 years or longer depending on usage. The batteries require replacement approximately every 5 years.



What are the challenges?

- RRFB effectiveness varies depending on the type of roadway, traffic volumes, and speeds. On higher-speed (40 mph or higher), multilane, or high-volume (over 12,000 vehicles per day), RRFB's are less effective, and other strategies (or a combination of strategies) should be considered.
- Additional maintenance and operating costs, depending on power source

RRFB systems that are hardwired are powered from a nearby electrical source by running wire underground. Hard wired systems are typically recommended at crossing locations that experience very high pedestrian activity. A hardwired system can ensure consistent operation, especially during the fall and winter months when the sun is low in the sky and reducing the ability to charge the batteries as frequently.

Supplemental treatments

Rectangular Rapid Flashing Beacons are often combined with the following treatments:

- Marked crosswalk (required) and Advance STOP markings and signs (recommended if multi-lane)
- Warning signs (required)
- Parking restrictions (required)
- Curb extensions and ADA curb ramps
- · Pedestrian refuge island
- Speed bumps

Best practices

The RRFB offers significant safety benefits, achieving high rates of compliance for a relatively low cost. The RRFB increases yield rates at uncontrolled crosswalks, and studies show they are most effective on roadways with volumes less than 12,000 vehicles per day and with speeds less than 40 mph. Reference the Interim_Approval-21 for more details regarding the federal guidance.



How much do they cost?

Costs can vary widely for the installation of two RRFB units (one on either side of the street). For an RRFB system using a solar-powered system, the cost is approximately \$15,000 for materials and installation. For an RRFB system that is hardwired, the costs range between \$30,000 and \$50,000 depending on the proximity of a power source. RRFB systems that include overhead flashers cost between \$80,000 to \$100,000, which includes a mast arm and pole for each direction of traffic and hardwired power.



Shared Use Paths

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is their purpose?

Shared use paths are bicycle facilities that are physically separated from motor vehicle traffic by an open space or barrier. Most shared use paths are designed for two-way travel and can serve a variety of nonmotorized users. They may be located within roadway right-of-way or an independent right-of-way. Shared use paths are sometimes referred to as trails, greenways, and sidepaths. In Minnesota, trails are facilities that may use a variety of surface materials, widths, and other standards, so although a shared use path might be called a trail, not all trails are shared use paths.

Are they a proven strategy?

Shared use paths are considered **PROVEN**. Shared use paths provide separation for pedestrians and bicyclists from motor vehicles. This separation increases road safety for all road users, particularly for pedestrians and bicyclists.

Wider shared use paths provide space to separate pedestrians and bicyclists from each other. Because of the lack of specific data for this measure, it is considered **TRIED**.

Where would we use them?

The <u>FHWA Bikeway Selection Guide</u> may be used as a reference. In general, shared use paths can be considered at the following locations:

- Where there is a greater mix of users, high user volumes, and a wide range of speeds between shared use path users
- When space is limited, shared use paths can be placed in lieu of separated bike lanes.
- Wider paths may be necessary where there are

- either large numbers of people bicycling or large percentages of other nonmotorized users that create frequent and inconsistent passing and meeting events. Crowded paths can result in delay, frustration, and collisions. Wider paths also better accommodate social cycling or walking (i.e. the ability to bike or walk side-by-side with another person)
- Geometric characteristics that may merit a wider shared use path include maintenance vehicle size, steep grades, curves, and stationary activities (such as fishing or scenic overlooks)

What are the maintenance impacts?

Partner with maintenance team members during design development to discuss strategies and issues related to routine path maintenance. For example, a wider shared use path may be necessary to better suit available snow removal equipment. Shared use paths should be clear of debris, snow, and major cracks or potholes to accommodate users year round.



Shared use path with pavement markings separating bicycles and pedestrians



Shared Use Paths

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References



What are the advantages?

- Separating bicyclists from motor vehicles is safer and more comfortable than shared lane facilities. Separating pedestrians from motor vehicles is also safer. Shared use paths are also more comfortable as motorist volumes and speeds increase.
- Shared use paths that separate users
 with a range of speeds (i.e., bicyclists and
 pedestrians) reduce crashes between shared
 use path users.
- When designed along corridors with minimal road interactions, such as routes following waterways, linear parks, and railroad or transit facility rights-of-way, shared use paths can increase safety and reduce travel times.



What are the challenges?

- Widening existing shared use paths may require modifications to existing drainage infrastructure.
- May require additional lighting for safety including for personal safety.
- Activities that create distractions or obstructions may require wider shared use paths to accommodate
 people standing. Standing areas for scenic overlooks or fishing, or benches and wayfinding kiosks, should be
 located beyond the functional area of the shared use path.
- The speed differential of users on wheels and walking can present safety challenges, thus the demand and user mix must be carefully considered when selecting a width and the ability to provide separate lanes, or spaces along the path (see FHWA's Shared Use Path Level of Service Calculator).
- Shared use path intersections should be carefully designed, particularly at intersections with other shared use paths and roadways. Grade separation may be appropriate to eliminate conflicts with railroads or motor vehicle traffic entirely. See Grade-separated Crossings section.
- A limiting factor to consider when widening a shared use path (or constructing a wider shared use path) is the available right-of-way. If necessary, the shared use path may still be widened but with narrower portions provided where right-of-way is constricted.





How much do they cost?

Typical costs for a shared use path range from \$300,000 to \$600,000 per mile.





Sidewalks

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is their purpose?

A sidewalk is a type of walkway that defines a path for pedestrian travel placed along the side of a roadway. They are usually separated from roadway traffic lanes by curb and gutter and sometimes by a planting strip or buffer zone. Other types of walkways include shared use paths and roadway shoulders.

Are they a proven strategy?

Sidewalks are a **PROVEN** safety strategy. Sidewalks on both sides of a street have been found to significantly reduce occurrences of walking along the roadway (which is a pedestrian crash risk) compared to locations where no sidewalks or walkways exist. Sidewalks provide a 65-89% reduction in crashes involving pedestrians walking along roadways.

Supporting Documentation: <u>FHWA Countermeasure – Walkways</u>



Before and after images of sidewalk construction on 54th Street in Edina, MN

Where would we use them?

Planning for a network of sidewalks should include an audit of the current sidewalk system. The audit should document pedestrian access to transit stops/service, schools, public buildings, parks, etc. The audit should also include consideration of sidewalk design issues, including obstructions (e.g., fire hydrants, signposts, etc.) and compliance with Americans with Disabilities Act (ADA) Standards for Accessible Design (see PROWAG guidelines). Sidewalks can be considered at the following locations, on both sides of the roadway:



- Along all urban streets and suburban arterials and collectors
- Adjacent to streets that connect pedestrian origins and destinations. For example, segments connecting neighborhoods with schools, parks, transit locations, or retail areas
- Along high-speed and high-volume roadways without shoulder width
- Shoulder space should be considered on any rural or suburban roadway that cannot feasibly implement a sidewalk or walkway. See the section on Paved Shoulders

What are the maintenance impacts?

- Partner with maintenance team members during design development to discuss strategies and issues related to routine maintenance, especially during winter months. Snow clearance from sidewalks may be improved by a buffer zone in between the sidewalk and roadway. This buffer zone can be landscaped and allows for snow storage during winter.
- In addition, sidewalks can become damaged over time from tree roots or other reasons. Vertical lips at these locations must be ground down to avoid tripping hazards and maintain ADA compliance.



Crosswalk Lighting

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

What is its purpose?

Crosswalk lighting is a strategy that installs street lights at and in advance of intersections and crosswalks to improve visibility, safety, and comfort, especially at night. Crosswalk lighting can contribute significantly to safety by providing an advance warning to drivers that they are approaching a point of potential conflict with pedestrians and bicyclists. Street lights can be located at individual intersections or crosswalks, or be continuous along roadway corridors.



Lighting at a midblock crosswalk

Is it a proven strategy?

Research shows that the installation of street lights at rural intersections is a **PROVEN** strategy to reduce crashes,—especially nighttime crashes, fatal and serious crashes, and vehicle-pedestrian and vehicle-bicycle crashes.

However, there is no research into the effectiveness of street lights relative to reducing pedestrian crashes at urban intersections or along urban roadways; this strategy has been **TRIED**.

Where would we use it?

Crosswalk lighting is commonly installed at:

- Isolated intersections with crosswalks that are not along continuously lit roadways
- Mid-block crosswalks

What are the maintenance impacts?

Crosswalk lighting requires routine maintenance to ensure the lighting is uniform at the intersection and all other material and fixtures are functioning appropriately. Maintenance depends on power source; for example, back-up battery packs require periodic replacement.

Supplemental treatments

Most strategies discussed in this guide would benefit from additional lighting, including mid-block crossings, marked crosswalks, curb extensions, and signalized intersections.



Crosswalk Lighting

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 08 | Crash Reduction References

Best practices

Properly designed street lights improve drivers' ability to see pedestrians during low light conditions. Crosswalk lighting should be provided on urban and suburban corridors that do not have continuous street lighting. Crosswalk lighting provides valuable visual cues for drivers, including a visual cue to pay attention for the possibility of a pedestrian in the roadway.



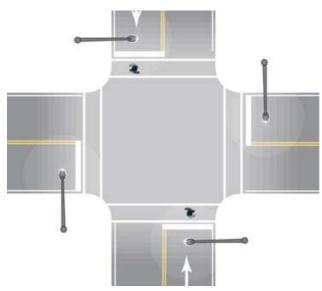
What are the advantages?

- Some construction costs may be eligible to be covered by federal and state funds.
- Solar-powered lighting can be used as an alternative to traditionally powered fixtures.
- Intersection illumination can reduce nighttime vehicle/pedestrian crashes by up to 42%.



What are the challenges?

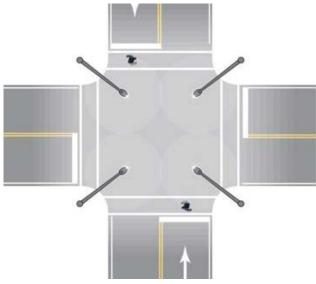
- Increased maintenance and power cost or battery costs (solar fixtures).
- · Requires power source.
- Some communities are concerned about light pollution (consider full cutoff fixtures).



Intersection lighting over the stop bars



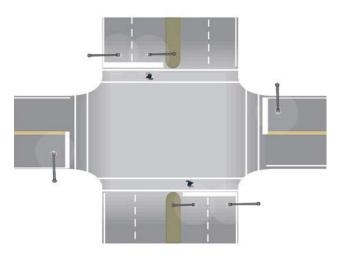
Midblock crossing with two lights



Intersection lighting over the center of the intersection



Midblock crossing with a single light



Intersection lighting with a four-lane divided roadway



How much does it cost?

Costs for implementation vary widely, depending on available utilities, power source, and fixture type. Typically, street light installation can range from around \$10,000 per intersection to over \$40,000.



CSAH 35 (Portland Ave) Pedestrian Project Attachment 09 | Multimodal Connections Map LAKE HARRIET 22 152 Minespolis Chain Ave LAKE **HIAWATHA** oxlakes Trail 35W Lyndale Ave 46th St W 46th St E 46th St.E 50th St W Parkway Regional Trail-21 50th St W 50th St E 50th St E Cedar Ave 51st St E Portland Ave 52nd St E Key 54th St W 54th St E **Project Location** Diamond Lake Rd & 0.5 Mile Project Buffer DIAMOND **Transit Routes** 56th St-W BRT Off-Street Bicycle 57th S **Facility** 22 Highway On-Street Bicycle 58th St W **Facility** Lyndale Ave S **Existing BRT Service** 121 Hennepin 52 61st.St W 62

Disclaimer: This map (i) is furnished "AS IS" with no representation as to completeness or accuracy; (ii) is furnished with no warranty of any kind; and (iii) is not suitable for legal, engineering or surveying purposes. Hennepin County shall not be liable for any damage, injury or loss resulting from this map.

Publication date: 12/12/2023

Data sources (if applicable):





Attachment 10 | Community Engagement Summary

PEARL

LOCATION AND HISTORY

Pearl Park is one of the larger parks in the south service area. It is located just north of Diamond Lake and stretches for three long blocks on the west side of Portland Avenue. Unlike most south service area parks it is not a square, but rather a somewhat irregular rectangle bounded by streets that wiggle as they traverse the city north to south. This shape has much to do with the park's history.

The first mention in park board proceedings of what became Pearl Park was an offer presented to the park board in 1923 from Clarke's Diamond Lake Realty to donate a tract of land "surrounding Pearl Lake and a portion of the shores of Diamond Lake" for park



purposes—a donation that was accepted in 1925. In the 1927 annual report, park superintendent Theodore Wirth planned to dredge Diamond Lake and fill Pearl Lake. While the plans to dredge Diamond Lake never were executed, the plans to fill Pearl Lake proceeded fairly quickly and the first skating rink was provided there in the winter of 1929-1930.

The Pearl Lake and Diamond Lake Park holdings increased dramatically in 1936 with the acquisition of 72.32 acres (of mostly water). The park board conducted studies with the community on development of Pearl Lake as a community park and regional athletic field. In the following years federal work-relief crews dumped and graded well more than 75,000 cubic yards of fill into the "swamp." The fill was acquired from the airport, where federal crews were grading for new runways. (The park board owned the airport at the time and was responsible for its development and operation until the 1940s.) The crews then built a skating rink; baseball, softball and football fields; two tennis courts; a volleyball court; and horseshoe pits. A children's playground was also installed.

In 1962, the board included Pearl in its capitol improvement program for 1965, but added that the project "depends on receiving fill material." Pearl Lake, like most other parks in the system built on filled land, continued to settle and need more fill. The board authorized the superintendent to seek excess fill in 1963 from the construction of I-35W a few blocks to the west. The 1965 plan for the park positioned a proposed recreation center at the south end of the park instead of in the center of the park as earlier plans had done. Work to execute those plans began in 1966, primarily grading and landscaping, and were continued the next year with work on the new recreation center, wading pool, ball fields and playgrounds, with lighting throughout the park.

The new recreation center was dedicated in December, 1968—the costs split in half between assessments on neighborhood property and city bonds. As a park retrieved from a lake, Pearl continued to have flooding problems, which caused the need to refill and regrade the fields in 1979. Not only had flooding problems persisted, but the original fill material from the airport included chunks of concrete that migrated to the surface over time.

The old recreation center was renovated and a gym added in 1996. In 2008 the wading pool at the park was upgraded to meet new safety standards. In 2011 the baseball field was improved with new fencing and remediation of poor soil. In 2015 the basketball and volleyball courts were resurfaced, and a new youth-sized basketball hoop was installed.

EXISTING CONDITIONS AND CHARACTER

The organization of Pearl Park is best thought of in four sections, arranged from south to north. The southernmost section is home to the recreation center, two play areas, a wading pool, and various courts: basketball, tennis, and volleyball. A parking lot along Diamond Lake Road includes permeable paving as a means of managing and treating stormwater runoff before it enters Diamond Lake.

Just to the north of the recreation center is quad of multi-use diamonds arranged facing inward toward a large multi-use field space. This area is home to a skating area and hockey rink in the winter. Immediately to the north of this multi-use complex is a premier baseball diamond and associated batting cages and concession building. The northernmost section of the park is a large open grass field most often used for organized and pick-up soccer. A small low area planted with water tolerant vegetation lies north of the fields.

Paths encircle the southern three sections of the park but end at East 53rd Street just north of the premier baseball diamond.

Pearl Park feels quite large, as south Minneapolis parks go, especially with the feeling of open space continuing southward as Diamond Lake Park. This is an active park, with many sports leagues—operated both by MPRB and others—occupying all sections of the park throughout the playing season. It also feels more pastoral than other parks, because it is not a square in the city grid, but rather retains shades of its watery past.

CSAH 35 (Portland Ave) Pedestrian ProjectAttachment 10 | Community Engagement Summary



Existing Conditions: Pearl

Attachment 10 | Community Engagement Summary



Proposed Plan: Pearl

NEW/ ADDED



Premier Field



Tennis Court



Walking Loop Trail



Adult Fitness



Storage Building

Attachment 10 | Community Engagement Summary

CONNECTIONS BETWEEN PARKS

Wayfinding and connections from Pearl Park should focus on:

- The existing City of Minneapolis bicycle and pedestrian route on 54th Street, which connects to Nokomis-Hiawatha Regional Park
- Improved crossings of Portland Avenue and 52nd, 53rd, and 54th Streets
- Implementation of the proposed Southside Greenway, a community and City of Minneapolis project running on Portland Avenue and connecting all the way through the south service area.

THE PROPOSED DESIGN

Many facilities in Pearl Park are relatively new, so the plan does not change the fundamental arrangement of the park. The four general sections remain, with the middle two (the multi-use diamond/field area and the premier baseball diamond) essentially unchanged. The only addition in these areas is an adult fitness zone just beyond the outfield of the baseball diamond. All the facilities near the recreation center are likewise retained in their current locations—playgrounds, wading pool, parking lot, lawn games area, and basketball and volleyball court. The main change in this area is the addition of two additional tennis courts (arranged north-south), to consolidate tennis in this park in light of the removal of tennis at Todd and other SSA parks. The tennis area can be expanded while still preserving space for sledding on the east facing hillside.

The most significant change is proposed in the northernmost section. A new adult-size premier soccer field occupies the southern half of this area, with the northern half improved but retained as a multi-use field. The adult-size field can also accommodate three youth-size soccer fields. Parking for this facility would be along Portland Avenue and in the surrounding neighborhoods, as it is today, but crosswalks and trail connections would be improved to increase safety and accessibility.

At the northernmost edge of the park, hidden from views along Portland by existing trees and new screening, is a small maintenance building and yard. This maintenance area provides necessary equipment and materials staging for Pearl and other nearby parks, which will allow more efficient maintenance of south side parks. This building will not be open to the public. Restroom facilities will be handled as they are today, with portable toilets between the soccer and baseball areas.

The edges of the park are naturalized with pollinator-friendly plantings, and additional trails reach into and around the northern section of the park, providing more neighborhood connections and walking loops. Pearl Park will keep its sports focus by providing the same facilities it always has while also bringing the first premier field to the southern half of the service area—something that is a significant desire in the community and something Pearl has the size and current use to support. But Pearl will at the same time become more natural and idyllic, encouraging strolls around the edges along with sports in the center.

KNOWN LAND USE AND COORDINATION ITEMS

There are no known land use issues at Pearl Park.

UPDATE EXISTING



Traditional Play Structure



Wading Pool



Basketball Court



Volleyball Court



Multi-use Field



Multi-use Diamond



Premier Diamond



Tennis Court



Skating Rink



Hockey Rink



Lawn/Court Games



Designated Sledding Hill

Attachment 10 | Community Engagement Summary

PR0	CESSES	2: Initial Concepts + Public		
1: General Input		Comment	3: The Preferred Concept	
Spring-Fall 2015		Fall-Winter-Summer 2015/2016 Input themes on initial and preferred	Now	
	Input themes prior to initial concepts	concepts	Key elements of the concept	
aquatics	Pool mostly seen as negative, probably because of quality; bigger, deeper pool desired	no comments	Wading pool in same general location	
play	Play area needs improvement, but is well liked	no comments	Play area in same general location	
	Provide more challenging options for older kids			
athletics	Diamonds and fields liked about the same, but need improvement	Maximize soccer fields; like premier fields in northern end, but keep six youth fields overall	Premier diamond in center of park, as existing	
		Keep four diamonds here	Multi-use field and diamond area in south end of park, as existing	
		Some concern about premier field, mainly about who can use it	Addition of premier soccer field in northern end of park, at a size to accommodate three youth fields or one adult field, with an adjacent multi-use field that can accommodate three youth fields	
courts	Tennis courts well liked	Need to upgrade basketball court	Addition of two tennis courts, for a total of four (retains sledding area)	
	Basketball courts need improvement,		Basketball court in same general location	
	but basketball is a desired activity		Sand volleyball court instead of hard court, in same general	
			location	
			Enhanced lawn/court games area (bocce, lawn bowling, bag toss, etc.) in location of existing horseshoes	
winter	Move hockey off of multi-use fields into open area behind building	no comments	Hockey rink and open skating area on multi-use fields, as existing	

CSAH 35 (Portland Ave) Pedestrian ProjectAttachment 10 | Community Engagement Summary

PROCESSES CONT.

		2: Initial Concepts + Public		
	1: General Input	Comment	3: The Preferred Concept	
Spring-Fall 2015		Fall-Winter-Summer 2015/2016 Input themes on initial and preferred	Now	
	Input themes prior to initial concepts	concepts	Key elements of the concept	
adenahara	More trees and vegetation	Mixed responded to parking: some feel it is necessary though could be smaller than shown, some oppose any parking on northern end	Addition of naturalized areas around perimeter of park	
	Community gardens	During public comment period: significant opposition to parking at northern end		
rotto	Multiple suggestions for coffee shop/restaurant Suggestions for dog park in northern end of park	Like adult fitness and walking loop Mixed opinions on operations center/restroom: concern about location in/near wetland, some positive about restrooms, many opposed to restrooms, suggestion to	Addition of small maintenance building and storage yard at northern edge of park (within park to preserve views) Addition of pathways to create walking loops around the park Enhancement of crossings of Portland Avenue and to Diamond Lake Park (NOTE: will require coordination with City of Minneapolis) Addition of adult fitness area near premier diamond	

CSAH 35 (Portland Ave) Pedestrian Project Attachment 11 | City of Minneapolis Letter of Support



Public Works 350 S. Fifth St. - Room 239 Minneapolis, MN 55415 TEL 612.673.3000

www.minneapolismn.gov

Support for Hennepin County Regional Solicitation Applications

Dear Ms. Stueve:

Hennepin County has requested letters of support for a series of grant applications as part of the Regional Solicitation process, by which the Metropolitan Council competitively allocates federal transportation funds. As a part of this request, Minneapolis conducted a review of completed plans, studies, and community engagement, as well as documented priorities and adopted policies to identify which projects to support. Improvements along Hennepin County streets offer significant opportunities to address some of the greatest safety and mobility needs within Minneapolis and are a critical part of the city's goal to address climate change, support mode shifts, and eliminate deaths and severe injuries resulting from traffic crashes.

Minneapolis hereby supports the following applications:

Roadway Reconstruction / Modernization

 Cedar Avenue South (CSAH 152) Reconstruction Phase 2: 42nd Street East (CSAH 42) to East Lake Street (CSAH 3)

Multimodal/Trail

 Park Avenue (CSAH 33) and Portland Avenue (CSAH 35) Bikeway Project: 38th Street East to the Midtown Greenway

Pedestrian Facilities

Portland Avenue (CSAH 35) Pedestrian Upgrades: Diamond Lake Road to 350 ft north of 52nd Street

Bridges

Glenwood Avenue (CSAH 40) Bridge: Replacement/rehabilitation of Bridge #94282

At this time, Minneapolis has no funding programmed in its adopted 2023-2028 Transportation Capital Improvement Program (CIP) for these projects. Therefore, Minneapolis is currently unable to commit cost participation in these projects. However, we request that Hennepin County includes city staff as part of the design process to ensure project success. Furthermore, Minneapolis agrees to provide maintenance, such as sweeping and plowing, for protected bikeways included with these projects and in alignment with Minneapolis' proposed All Ages and Abilities Network. This maintenance commitment will require close coordination with city staff so that designs meet acceptable city standards, until such time Hennepin County has the resources to do so.

Thank you for making us aware of this application effort and the opportunity to provide support. Minneapolis Public Works looks forward to working with you on these projects.

Sincerely,

Jenifer Hager

Transportation Planning and Programming Director

Minneapolis Public Works



Administrative Offices

2117 West River Road North Minneapolis, MN 55411-2227

Northside Operations Center

4022 1/2 North Washington Avenue Minneapolis, MN 55412-1742

Southside Operations Center

3800 Bryant Avenue South Minneapolis, MN 55409-1000

> Phone 612-230-6400

> Fax 612-230-6500

www.minneapolisparks.org

President Meg Forney

Vice President Cathy Abene, P.E.

Commissioners

Becky Alper Billy Menz Steffanie Musich Tom Olsen Charles Rucker Elizabeth Shaffer Becka Thompson

Superintendent Al Bangoura

Secretary to the Board Jennfier B. Ringold

CSAH 35 (Portland Ave) Pedestrian Project

Attachment 12 | Minneapolis Park and Recreation Board Letter of Support

December 5, 2023

Carla Stueve, P.E.
Director and County Highway Engineer
Hennepin County Transportation Project Delivery
1600 Prairie Drive
Medina, MN 55340

RE: Letter of Support

Regional Solicitation for Reconstruction Project at CSAH 35

Dear Ms. Stueve:

The Minneapolis Park and Recreation Board (MPRB) hereby expresses its support for Hennepin County's Regional Solicitation federal funding application for the proposed pedestrian project along CSAH 35 (Portland Ave) from Diamond Lake Rd to 350' north of 52nd St in the City of Minneapolis.

This project for this funding application is anticipated to involve ADA upgrades along the corridor, pedestrian crossing improvements (where feasible), traffic signal upgrades, and a new off-road facility to promote connections along MPRB's Pearl Park. The proposed project will complement key first and last mile connections, as well as accessibility, safety, and mobility improvements for people walking, rolling, and biking; thereby enhancing the livability and quality of life for Minneapolis and Hennepin County residents.

Specific details regarding cost participation and maintenance responsibilities are anticipated to be determined during the design process as project development is advanced. MPRB requests that community engagement for the project aligns with MPRB Community Engagement Policy if the facility may be operated as a trail by MPRB. Additionally, if an off-road facility is selected as the preferred option, MPRB agrees to collaborate on an operations and maintenance agreement of the bikeway facility year-round in accordance with the county's Cost Participation and Maintenance policies.

Thank-you for making us aware of this application and project, and the opportunity to provide support. MPRB looks forward to working with you on this project.

Sincerely,

Michael Schroeder, Assistant Superintendent for Planning Services