

CITY COUNCIL AGENDA ITEM
CITY OF SHORELINE, WASHINGTON

AGENDA TITLE:	Adoption of Resolution No. 410 - Adopting the 2018-2023 Transportation Improvement Plan
DEPARTMENT:	Public Works
PRESENTED BY:	Nytasha Sowers, Transportation Services Manager
ACTION:	<input type="checkbox"/> Ordinance <input checked="" type="checkbox"/> Resolution <input type="checkbox"/> Motion <input type="checkbox"/> Public Hearing <input type="checkbox"/> Discussion

PROBLEM/ISSUE STATEMENT:

In accordance with state law, the City is required to prepare a six-year Transportation Improvement Plan (TIP). The six-year TIP should include transportation projects, such as road and bridge work, as well as new or enhanced bicycle or pedestrian facilities. In addition to local projects, the TIP should also identify projects and programs of regional significance for inclusion in the regional TIP. The City's TIP is used to secure federal funding for transportation projects as part of the Statewide Transportation Improvement Plan.

The draft 2018-2023 TIP was presented to Council on April 24, 2017, and a public hearing on the TIP was held on May 8, 2017 as required by RCW 35.77.010. Tonight, Council is scheduled to adopt proposed Resolution No. 410 (Attachment A), which would adopt the 2018-2023 TIP.

RESOURCE/FINANCIAL IMPACT:

There is no financial impact associated with adoption of the TIP. The projects identified in the City's TIP are a combination of funded projects in the CIP, including projects that are partially funded or underfunded, as well as currently unfunded projects the City would like to undertake should funding become available. Listing projects in the TIP makes them grant eligible, as most grant programs will not fund projects not included in a jurisdiction's TIP. The vast majority of projects included in the TIP are unfunded or partially funded. All of the funded programs are identified as underfunded, as additional work could be completed through these programs with supplemental funding.

RECOMMENDATION

Staff recommends that Council adopt Resolution No. 410, adopting the 2018-2023 Transportation Improvement Plan.

Approved By: City Manager **DT** City Attorney **MK**

BACKGROUND

In accordance with RCW 35.77.010, cities in Washington State are required to prepare and adopt a comprehensive six-year transportation improvement plan (TIP). A city's TIP must be consistent with its comprehensive plan transportation element. RCW 35.77.010 requires that the City hold at least one public hearing on the TIP and to submit the adopted TIP to the Washington State Secretary of Transportation. The Department of Transportation has historically accepted submittal of TIPs through the month of July.

Projects in the TIP can be funded and unfunded and the draft TIP includes the transportation projects identified in the preliminary 2018-2023 Capital Improvement Plan (CIP). Including projects in the TIP improves the City's eligibility to secure grant funding. The TIP is prepared and presented to Council in advance of the CIP. The policy direction provided through adoption of the TIP is used to identify transportation projects for inclusion in the CIP. The City Council will review the City's proposed six-year CIP as part of the 2018 budget process later this fall.

The draft 2018-2023 TIP was initially presented to the City Council on April 24, 2017. A public hearing on the TIP was subsequently held on May 8, 2017 as required by RCW 35.77.010. The staff report for the public hearing and discussion of the TIP on May 8th can be found at the following link:

<http://cosweb.ci.shoreline.wa.us/uploads/attachments/cck/council/staffreports/2017/staffreport050817-8a.pdf>.

DISCUSSION

The proposed 2018-2023 TIP utilizes last year's TIP as its foundation. Projects and programs included in the TIP include high priority projects identified in the 2011 Transportation Master Plan (TMP) for safety and operations, as well as bicycle and pedestrian projects.

25th Avenue NE Sidewalk Project

Prior to public comment at the May 8th meeting, Council discussed one modification to the previously presented 2018-2023 TIP - to remove the 25th Avenue NE Sidewalk project. Staff explained that typically only projects that are identified as a high priority in the TMP's prioritized list of sidewalk improvements are included in the TIP. The 25th Avenue NE Sidewalk project is currently identified a medium priority project in the 2011 TMP/Sidewalk Prioritization, but because of the impacts to the neighborhood and the benefit of constructing frontage improvements for the North Maintenance Facility (NMF), the sidewalk project was added. Since the decision to add this project to the TIP was made, development of the NMF has been delayed and it is now not expected to be constructed in the next six years.

The City is also in the process of re-evaluating how sidewalk projects are prioritized in the TMP with staff planning to have an updated list of priority projects by the end of 2017. Staff will be engaging the City Council on the development of sidewalk project prioritization criteria and the prioritized ranking of evaluated projects in the future.

At the May 8th public hearing, one public comment was received in favor of sidewalks in the Ballinger neighborhood as planned. Council discussed the removal of the 25th Avenue NE Sidewalk project, and there was direction from several Councilmembers to remove the project and utilize this limited funding for other projects at this time. Other Councilmembers felt it is important to retain the 25th Avenue NE Sidewalk project as a priority in the 2018-2023 TIP and/or earmark or dedicate the funds for this project in the future. All Councilmembers were interested in addressing both stormwater and sidewalk improvements at the same time.

Given the majority of Council direction, staff has removed the 25th Avenue NE Sidewalk project from the 2018-2023 TIP presented to Council tonight. The draft 2018-2023 TIP shows this project as “removed” under Project #5 in the TIP. This had the effect of moving \$595,000, which is the estimated cost of the 25th Avenue NE Sidewalk project, from that removed project to “New Sidewalks Projects”, which is listed as Project #27 in the TIP. If adopted with this project removed, staff will finalize the 2018-2023 TIP by renumbering the identified projects in the TIP.

As well, the 25th Avenue NE Sidewalk project would be re-evaluated for next year’s 2019-2024 TIP. As noted previously, Council will have the ability to move this project to a higher priority in future years if it should rate lower than desired under the new sidewalk prioritization plan.

If any Councilmember is interested in adding the 25th Avenue NE Sidewalk project (Attachment B) back into the 2018-2023 TIP prior to adoption of proposed Resolution No. 410, staff recommends that Council use the following amendment language:

I move to amend Exhibit A to Resolution No. 410 by adding the 25th Avenue NE Sidewalk project to the 2018-2023 Transportation Improvement Plan and moving \$595,000 in funding from the New Sidewalk Projects TIP Project to the 25th Avenue NE Sidewalk Project.

COUNCIL GOAL ADDRESSED

Adoption of the 2018-2023 TIP addresses Council Goal 2 to improve Shoreline’s infrastructure. By identifying and developing a plan for multi-modal transportation improvements, the City is working to preserve and enhance the infrastructure. This plan also addresses Council Goal 5 to promote and enhance the City’s safe community and neighborhood programs and initiatives by funding the Traffic Safety Improvements program.

RESOURCE/FINANCIAL IMPACT

There is no financial impact associated with adoption of the TIP. The projects identified in the City’s TIP are a combination of funded projects in the CIP, including projects that are partially funded or underfunded, as well as currently unfunded projects the City would like to undertake should funding become available. Listing projects in the TIP makes them grant eligible, as most grant programs will not fund projects not included in a jurisdiction’s TIP. The vast majority of projects included in the TIP are unfunded or

partially funded. All of the funded programs are identified as underfunded, as additional work could be completed through these programs with supplemental funding.

RECOMMENDATION

Staff recommends that Council adopt Resolution No. 410, adopting the 2018-2023 Transportation Improvement Plan.

ATTACHMENTS

Attachment A: Proposed Resolution No. 410

Attachment A, Exhibit A: 2018-2023 Transportation Improvement Plan

Attachment B: 25th Avenue NE Sidewalk Project Description

RESOLUTION NO. 410

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF SHORELINE, WASHINGTON, ADOPTING A SIX-YEAR (2018-2023) TRANSPORTATION IMPROVEMENT PLAN AND DIRECTING THE SAME TO BE FILED WITH THE STATE SECRETARY OF TRANSPORTATION AND TRANSPORTATION IMPROVEMENT BOARD.

WHEREAS, the City Council of the City of Shoreline has previously adopted a Comprehensive Plan including a six-year Transportation Improvement Plan required by RCW 35.77.010 as part of the Transportation Element of the Plan; and

WHEREAS, the City Council of the City of Shoreline has reviewed the work accomplished under the said Plan, determined current and future City Street needs, and based upon these findings a Six-Year Transportation Improvement Plan for the ensuing six (6) calendar years has been prepared; and

WHEREAS, a public hearing was held on the Six-Year Transportation Improvement Plan on May 8, 2017;

NOW, THEREFORE, THE CITY COUNCIL OF THE CITY OF SHORELINE, WASHINGTON, HEREBY RESOLVES AS FOLLOWS:

Section 1. Plan Adopted. The Six-Year Transportation Improvement Plan for the City of Shoreline for the ensuing six (6) calendar years (2018-2023 inclusive) attached hereto as Exhibit A and incorporated herein by this reference, which Plan sets forth the project location, type of improvement and estimated cost thereof, is hereby adopted.

Section 2. Filing of Plan. Pursuant to Chapter 35.77.010 RCW, the City Clerk is hereby authorized and directed to file a copy of this resolution forthwith, together with the Exhibit attached hereto, with the Secretary of Transportation and a copy with the Transportation Improvement Board for the State of Washington.

ADOPTED BY THE CITY COUNCIL ON May 22, 2017.

Mayor Christopher Roberts

ATTEST:

Jessica Simulcik Smith
City Clerk

Exhibit A

City of Shoreline

2018-2023 Transportation Improvement Plan

1. What is the Six-Year Transportation Improvement Plan (TIP)?

The City of Shoreline Six-Year Transportation Improvement Plan (TIP) is a short-range planning document that is updated annually based upon needs and policies identified in the City's Comprehensive Plan and Transportation Master Plan. It identifies Shoreline's current needed transportation projects and programs for the next six years. Some projects identified in the TIP are significant enough in nature that they will take longer than six years to complete.

2. What is Included in the TIP?

A project sheet for each project or program in the TIP has been developed and includes the following:

- **Scope/Narrative:** A description of the project or program including the specific work to be performed, project elements, project/program purpose and/or interagency coordination efforts.
- **Funding:** Identifies whether a project is funded, partially funded or unfunded and what the known funding sources are.
- **Funding Outlook:** A description of the current funding projection for the project, including possible funding sources (when applicable).
- **Project Status:** Identifies Council goals achieved by each project, the stage of a project (such as design, environmental review or construction), previous years' work and expenditures and/or potential revenue sources for projects.
- **Purpose/Goals Achieved:** Identifies which of several purposes the project satisfies and/or general goals the project achieves including Non-motorized Transportation; System Preservation; Growth Management; Improves Efficiency and Operations; Safety; Major Structures; Corridor Study; and/or Interjurisdictional Coordination.

Projects in the TIP are sorted into three categories: Funded Programs, Funded Projects, and Unfunded Projects. Projects and programs that are underfunded or partially funded are included in the funded categories. Generally, funded projects are those included in the City's 2017-2022 Capital Improvement Plan. All projects and programs identified for 2021 are unfunded. All of the funded programs are identified as underfunded, as additional work could be completed through these programs with supplemental funding. The TIP also identifies the potential for new projects or programs that may arise from current City planning efforts in the Emerging Projects section. The final section provides a summary of projects included in the 2017-2022 TIP that are scheduled for completion in 2017.

3. Project Costs and Funding

Each project listed in the TIP includes an estimated cost, the amount of funding secured or unsecured and the funding source(s) for the six year period covered by the TIP. Existing and new project and program costs need to cover all phases of a project (described below), including the staff time necessary to administer them. If grant funding has been secured from a specific source, it is identified. The Funding Outlook section of each project sheet identifies the total project cost

and any previous expenditures. Potential grant funding sources are also identified in this section. Projects listed that are necessary to accommodate growth and allow the City to maintain its adopted Levels of Service may be funded in part by transportation impact fees. The costs for projects programmed for the first three years of the TIP have been developed with a higher level of detail whereas those in the latter three years have been developed with less specificity, as the projects are generally less defined. Unless otherwise noted, project costs do not include the costs for placing overhead utilities underground.

4. Developing the TIP

The annual TIP update starts with the previously adopted TIP. Projects in the previously adopted TIP are reviewed and projects that have been completed, or because of changing conditions, are no longer needed are removed from the TIP. Existing projects may also be updated based upon completed studies, refined project scopes or revised cost estimates. The remaining projects carried over from the previous TIP are reviewed for changes to cost estimates, project funding, schedule, or scope during the update process to ensure that the best information is represented in the TIP.

New projects are generated from many sources, including the City's adopted Transportation Master Plan (TMP), Comprehensive Plan, Council priorities, identification of new issues or deficiencies, response to growth, accident locations or the potential to secure grant funding. The City may use tools such as pavement management rating, analysis of accident data and transportation modeling to help identify potential new projects. Potential new projects undergo a review of scope, priority, schedule and cost analysis.

Updated projects from the previous TIP and new projects are then used to create a draft TIP project list. The phasing and funding of these projects in the draft TIP is based on an evaluation of project priority compared with priorities laid out in the TMP and Comprehensive Plan, commitments to projects and programs that are already underway, secured grants, partnerships the City has entered into with other jurisdictions and agencies and new opportunities that arise to leverage local transportation funding in combination with other funding sources.

Once the draft TIP has been developed, a public hearing is held to provide an opportunity for the community comment. Based on the results of the public hearing and comments from the Shoreline City Council a final version of the TIP is developed. This final version is then adopted by the City Council.

5. Emerging Projects

The City of Shoreline is currently engaged in several long range planning efforts that will identify additional transportation improvements needed in the City. Because the type and costs of the potential projects will not be known until the completion of the planning stage, it is difficult to include them in the TIP at this time. Once the planning process is complete and projects more clearly defined, they can be included in future TIPs.

Light Rail Station Access Improvements

In anticipation of the commencement of light rail service in 2023, the City has planned for land use change around the future stations located in Shoreline near NE 145th Street and NE 185th Street. Higher residential densities and a mix of land use types near the stations, as well as transit users traveling to the stations, will create an increased demand for multi-modal transportation facilities.

Transportation impacts and needs associated with these land use changes as well as the necessary solutions to resolve them are outlined in the adopted light rail station subarea plans. The redevelopment of the station areas is expected to occur over many decades.

The City of Shoreline is currently working with Sound Transit to identify light rail station access improvements that will support existing and future transportation needs near these stations. In general, the access improvements under discussion will improve access for pedestrians and bicyclists, transit and para transit riders, motorists and “kiss and ride” users. Agreed to improvements will be incorporated into future TIPs.

Park and Ride Demand Analysis

With the beginning of light rail service in Shoreline in 2023, the City is anticipating significant changes to its transit network. In preparation for this change, the City is evaluating the demand for park and ride facilities citywide and identifying future park and ride needs. The park and ride study is scheduled for completion in 2017. Identified park and ride and transit related improvements will be incorporated into future TIPs.

6. Relationship of the TIP to other Transportation Documents

A. Six-Year Capital Improvement Plan (CIP)

Once adopted, the TIP helps to guide funding and implementation priorities during the development of the transportation portion of the CIP. The CIP is a six-year financial plan addressing capital needs and is updated along with the development of the City's operating budget. The CIP shows the City-funded portion of projects and is constrained by current budget forecasts, whereas the TIP shows the complete project list, including unfunded projects and programs. The first year of the CIP is adopted as part of the annual budget.

B. Transportation Master Plan

The City of Shoreline's Transportation Master Plan (TMP) is the long-range blueprint for travel and mobility, describing a vision for transportation that supports the City's adopted Comprehensive Plan. The TMP provides guidance for public and private sector decisions on local and regional transportation investments, including short-, mid-, and long-range transportation and related land-use activities. In this way, the City can assess the relative importance of projects and schedule their planning, engineering and construction as growth takes place and the need for the facilities and improvements is warranted. It also establishes a prioritization of the projects to be included in future capital improvement plans. The TMP covers all forms of personal travel – walking, bicycling, transit and automobile.

C. State and Federal Requirements

State law (RCW 35.77.010) requires that each city develop a local TIP and that it be updated annually. It also requires that projects be included in the TIP in order for cities to compete for transportation funding grants from most federal and state sources. Federal grant funded and regionally significant projects from the first three years of the City's TIP are included in the Regional TIP, which is assembled by the Puget Sound Regional Council for King, Kitsap, Pierce, and Snohomish Counties. The Regional TIPs from around the State are then combined to form the State TIP, which is approved by the Governor and then submitted to the Federal Highway Administration and Federal Transit Authority for their review and approval.

7. Funding Challenges

As is the case for most jurisdictions, the need for transportation improvements in Shoreline greatly outweighs the City's ability to fund them in both the short and long term. In addition to major capital projects such as intersection or corridor improvements, there is an on-going need to maintain the existing system. This includes repair, maintenance and preservation work, such as Bituminous Surface Treatment (BST) or overlays, upgrades and repairs to traffic signals, installation of new street lights and curb ramp upgrades. It is difficult to estimate the annual backlog or degree to which the City's transportation program is underfunded, as new projects are identified annually and maintenance is a continuous necessity. The unfunded projects and programs included in this six year TIP (not including the unfunded portions of partially funded projects) total \$211,106,153.

The City of Shoreline funds transportation capital projects from the General Fund, Real Estate Excise Tax (REET), Transportation Benefit District (TBD) and grant revenue from local, state and federal governments. Because some of these revenue sources are so closely tied to the health of the economy they can be somewhat unpredictable, making it challenging for the City to plan for transportation improvements with assurance that funding will be available.

Historically the largest sources of funding for Shoreline's transportation programs and projects have been grants. Funding for transportation projects is available from federal, state and local resources. Each funding source has specific rules and guidelines about what types of projects they will fund, how much of a project will be funded and timelines for expenditure of funds. Most grant programs require a funding match, which means that the City must also contribute funding to the cost of a project. The granting agency may also have restrictions about the source of the funding match. For example, a state funded grant might be restricted from having another state funded grant serve as the match. Funding programs for bicycle and pedestrian transportation projects are very limited, especially in comparison to funding for highway and roadway projects. Quite often, granting agencies prefer to fund construction of projects rather than planning, design or environmental work. Having projects fully designed and "shovel ready" improves their ability to compete for funding. The competitive nature of grant funding and the specific requirements associated with available grants narrow the opportunities for many of the City's high priority projects to obtain outside funding.

8. Lifecycle of a Project

Depending upon the size and/or degree of complexity associated with a project, it can take several years to complete. For example, the three mile Aurora Corridor Improvement Project completed in early 2016, began the initial planning work in 1997. Large projects may be divided into several smaller projects in order to manage the project more effectively, comply with grant funding requirements or minimize inconvenience to the community during construction. Throughout all phases of a project, the City is committed to maintaining open communications with the community. The process to develop projects generally includes the following steps.

Planning and Alternatives Development – During this phase, conceptual ideas for a project are identified, evaluated and narrowed, sometimes to a single option. Citizens, community organizations, neighboring jurisdictions and other stakeholders help shape the project. Public meetings provide updates to the community and help the City gather feedback.

Preliminary Design and Environmental Review – This phase identifies potential environmental impacts of the project alternative(s). The level of review and documentation depends on the scope of the project and its potential for environmental impacts. An Environmental Impact Statement (EIS) is prepared for large projects with potentially significant impacts. Development of a State Environmental Policy Act (SEPA) checklist may be prepared for projects not requiring an EIS. A similar review under the National Environmental Policy Act (NEPA) is required for projects that receive federal funding. The project's design moves from conceptual to preliminary as initial engineering begins.

During this phase:

- If required, a SEPA checklist or Draft EIS is published followed by a public comment period. Responses to those comments are found in the Final EIS.
- Preliminary design is completed.
- The City selects the project that will eventually be built.

Final Design and Property Acquisition – In this phase, architects and engineers define what the project will look like as well as the technical specifications for the project. Field work is performed including testing soil conditions and ground water levels, surveying, and locating utilities. Additionally, the City acquires any necessary private property and easements. This phase is often referred to as “Projects, Specifications and Estimate (PS and E)”.

Construction – Construction time varies widely from project to project. The City balances the need to complete the project on time and on budget while minimizing construction impacts to the community.

Unforeseen site conditions, weather, design corrections and the complexity of a project are some of the factors that can influence the schedule. Construction schedules can also be affected by environmental restrictions, such as permissible timeframes to work in fish bearing waters.

Contact Information

For additional information, contact Nytasha Sowers, Transportation Services Manager, 206.801.2481, nsowers@shorelinewa.gov.

The following is a list of projects included in the TIP. A description of each project can be found below.

FUNDED PROGRAMS (FULLY OR UNDERFUNDED)

1. Curb Ramp, Gutter and Sidewalk Program (*underfunded*)
2. Traffic Safety Improvements (*underfunded*)
3. Annual Road Surface Maintenance Program (*underfunded*)
4. Traffic Signal and Intelligent Transportation System (ITS) Improvements (*underfunded*)

FUNDED PROJECTS (FULLY OR PARTIALLY)

5. (*Project removed*)
6. 145th Street (SR 523) Corridor Improvements (*partially*)
7. 145th/I-5 Interchange Improvements (*partially*)
8. 148th Non-motorized Bridge (*partially*)
9. Trail Along the Rail (*partially*)
10. Westminster and N 155th Improvements
11. N/NE 175th Street Corridor Improvements (*partially*)
12. N/NE 185th Street Corridor Improvements (*partially*)
13. Richmond Beach Road Rechannelization

UNFUNDED PROJECTS

14. N 160th Street, Aurora to Dayton/Greenwood
15. Greenwood/Innis Arden/160th Intersection improvements
16. 15th Avenue NE – NE 175th Street to NE 195th Street
17. Fremont Avenue N – N 175th Street to N 185th Street
18. Point Wells Potential Mitigation Projects
19. Major Pavement Rehabilitation Projects
20. Meridian Avenue N - N 145th Street to N 205th Street
21. NE Perkins Way Improvements – 10th Avenue NE to 15th Avenue NE
22. N 165th Street and Carlyle Hall Road N Sidewalk and Intersection Safety
23. Ballinger Way - NE 205th Street to 19th Avenue NE Access Control Preliminary Design
24. N 185th Street and Linden Avenue N Intersection Improvements
25. 3rd Avenue NW and NW Richmond Beach Road Intersection Improvements
26. Westminster Way (South), N 155th Street to Fremont Avenue N
27. New Sidewalks
28. 145th Street, Aurora Avenue to 3rd Avenue NW

EMERGING PROJECTS

1. Light Rail Station Area Multi-modal Access Improvements
2. Park and Ride Demand Analysis

PROJECT SCHEDULED FOR SUBSTANTIAL COMPLETION IN 2017

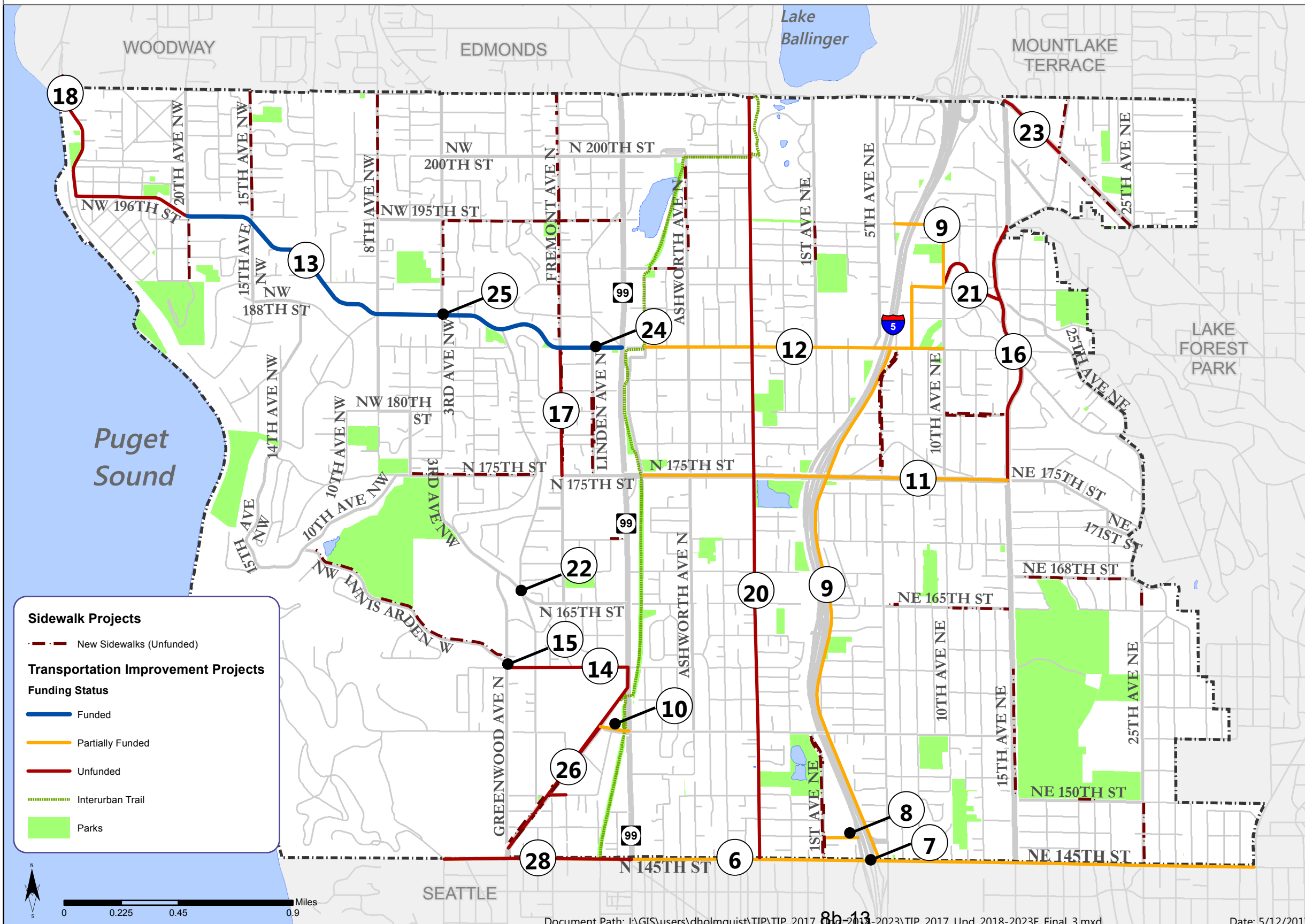
1. Echo Lake Safe Routes to School
2. Bicycle System Plan Implementation – Minor Improvements
3. Citywide Radar Speed Signs
4. Meridian Avenue N and N 155th Street Intersection Phase Changes

PROJECTS SCHEDULED FOR SUBSTANTIAL COMPLETION IN 2017

PROJECT NAME	PROJECT DESCRIPTION	COST	FUNDING SOURCES
Echo Lake Safe Routes to School	This project will construct sidewalks (including curb and gutter), curb ramps, and crosswalks on N 195th Street between Meridian Avenue N and Wallingford Avenue N, directly adjacent to Echo Lake Elementary. The new sidewalk will connect to sidewalk already in place in front of the school east to the N 195th Street Trail, which connects student walkers and bicyclists to the surrounding neighborhoods.	\$ 419,000	Safe Routes to School, Roads Cap
Bicycle System Plan Implementation – Minor Improvements	Implement the majority of the City of Shoreline's adopted Bicycle System Plan through the installation of bicycle lanes, sharrows and route signage. Wayfinding signage that helps guide non-motorized travelers to destinations throughout Shoreline and in neighboring jurisdictions will accompany the installation of facilities. Implementation will include the design of facilities, procurement of materials, construction and project management. Improvements that would be installed as part of this project do not include those that would require significant capital projects, construction or right-of-way acquisition, as these are identified as components of other projects within this TIP.	\$ 585, 725	Federal STP and Roads Cap
Citywide Radar Speed Signs	This project includes the installation of speed feedback signs (radar speed signs) at the following five locations: 1. Greenwood Ave N between Westminster Way N and N 160th Street (northbound and southbound) 2. 5th Ave NE between NE 192nd Street and NE 205th Street (northbound and southbound) 3. 1st Ave NE between N 145th Street and N 155th Street (northbound and southbound) 4. 15th Ave NW between NW Richmond Beach Rd and NW 205th St (northbound and southbound) 5. NW Innis Arden Way between Greenwood Ave N and 10th Ave NW (westbound only) "	\$ 121,000	HSIP, Roads Cap
Meridian Avenue N and N 155th Street Intersection Phase Changes	This project will revise northbound/southbound signal phasing from permissive to flashing yellow arrow operation to address at-angle collisions at the intersection of Meridian Ave N and N 155th St. It will decrease intersection radii to lower vehicle turning speeds and reduce pedestrian crossing distance for increased pedestrian safety and repair and provide vehicle and bicycle detection where needed and rebuild intersection sidewalks, curb ramps and pedestrian signal system for ADA compliance.	\$359,000	HSIP, Roads Cap



Transportation Improvement Program 2018 to 2023



Individual Project Locations

Fully or Partially Funded Projects

- 5. Project removed
- 6. 145th St (SR 523) Corridor Improvements
- 7. 145th/I-5 Interchange Improvements
- 8. 148th Non-motorized Bridge
- 9. Trail along the Rail
- 10. Westminster Way N and N 155th St Improvements
- 11. N/NE 175th St - Corridor Improvements
- 12. N/NE 185th St - Corridor Improvements
- 13. Richmond Beach Road - Rechannelization

Unfunded Projects

- 14. N 160th St - Aurora Ave N to Dayton/Greenwood Aves
- 15. Greenwood Ave N/Innis Arden Way/N 160th St - Intersection Improvements
- 16. 15th Ave NE - NE 172th St to NE 205th St
- 17. Fremont Ave N - N 175th St to N 185th St
- 18. Point Wells Potential Mitigation Projects
- 20. Meridian Ave N - N 145th St to N 205th St
- 21. NE Perkins Way Improvements - 10th Ave NE to 15th Ave NE
- 22. N 165th St and Carlyle Hall Rd N - Sidewalk and Intersection Safety
- 23. Ballinger Way - NE 205th St to 19th Ave NE - Access Control Preliminary Design
- 24. N 185th St and Linden Ave N - Intersection Improvements
- 25. 3rd Ave NW and NW Richmond Beach - Intersection Improvements
- 26. Westminster Way - N 155th St to Fremont Ave N
- 28. 145th St - Aurora Ave N to 3rd Ave W

Citywide Improvements

Underfunded

- 1. Curb Ramp, Gutter and Sidewalk Program
- 2. Traffic Safety Improvements
- 3. Annual Road Surface Maintenance Program
- 4. Traffic Signal/ITS) Improvements

Unfunded

- 19. Major Pavement Rehabilitation Projects
- 27. New Sidewalk Projects

Project	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	2018-2023 Total
FUNDED PROGRAMS (FULLY OR PARTIALLY)							
1. Curb Ramp, Gutter and Sidewalk Program	\$ 190,000	\$ 190,000	\$ 200,000	\$ 200,000	\$ 200,000	\$ 200,000	\$ 1,180,000
2. Traffic Safety Improvements	\$ 160,775	\$ 163,814	\$ 167,005	\$ 175,355	\$ 184,123	\$ 184,123	\$ 1,035,195
3. Annual Road Surface Maintenance Program	\$ 1,100,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 7,100,000
4. Traffic Signal and Intelligent Transportation System (ITS) Improvements	\$ 121,551	\$ 127,628	\$ 134,010	\$ 140,711	\$ 147,746	\$ 147,746	\$ 819,392
FUNDED PROJECTS (FULLY OR PARTIALLY)							
5. <i>(Project removed)</i>	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
6. 145th Street (SR 523) Corridor Improvements, Aurora Ave N to I-5	\$ 2,448,000	\$ 6,000,000	\$ 7,500,000	\$ 10,000,000	\$ 10,000,000	\$ 6,570,000	\$ 42,518,000
7. SR 523 (N/NE 145th Street) & I-5 Interchange Improvements	\$ 3,000,000	\$ 160,000	\$ -	\$ 10,000,000	\$ 6,840,000	\$ -	\$ 20,000,000
8. 148th Street N Non-motorized Bridge Project	\$ 500,000	\$ 1,600,000	\$ 5,000,000	\$ 5,000,000	\$ 4,000,000	\$ -	\$ 16,100,000
9. Trail Along the Rail	\$ 275,000	\$ 500,000	\$ 500,000	\$ 4,000,000	\$ 3,000,000	\$ 725,000	\$ 9,000,000
10. Westminster and N 155th Improvements	\$ -	\$ 5,500,000	\$ -	\$ -	\$ -	\$ -	\$ 5,500,000
11. N/NE 175th Street Corridor Improvements	\$ 1,640,000	\$ 2,460,000	\$ 2,200,000	\$ 2,200,000	\$ 7,150,000	\$ 7,150,000	\$ 22,800,000
12. N/NE 185th Street Corridor Improvements	\$ 700,000	\$ -	\$ -	\$ 8,539,000	\$ 8,539,000	\$ 8,539,000	\$ 26,317,000
13. Richmond Beach Rd Rechannelization	\$ 300,000	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 300,000
UNFUNDED PROJECTS							
14. N 160th from Aurora to Dayton/Greenwood	\$ 100,000	\$ 700,000	\$ 700,000	\$ -	\$ -	\$ -	\$ 1,500,000
15. Greenwood/Innis Arden/160th Intersection Improvements	\$ 100,000	\$ 700,000	\$ 700,000	\$ 1,500,000	\$ 1,500,000	\$ 1,500,000	\$ 6,000,000
16. 15th Avenue NE – NE 175th Street to NE 205th Street	\$ -	\$ -	\$ 6,176,793	\$ -	\$ -	\$ -	\$ 6,176,793
17. Fremont Avenue N – N 175th Street to N 185th Street	\$ -	\$ -	\$ 6,292,720	\$ -	\$ -	\$ -	\$ 6,292,720
18. Point Wells Potential Mitigation Projects	\$ -	\$ -	\$ -	\$ -	\$ 45,490,000	\$ 45,490,000	\$ 90,980,000
19. Major Pavement Rehabilitation Projects	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 12,000,000
20. Meridian Avenue N – N 145th Street to N 205th Street	\$ -	\$ -	\$ -	\$ -	\$ 9,117,000	\$ 9,117,000	\$ 18,234,000
21. NE Perkins Way Improvements – 10th Avenue NE to 15th Avenue NE	\$ -	\$ -	\$ 3,681,540	\$ -	\$ -	\$ -	\$ 3,681,540
22. N 165th Street and Carlyle Hall Road N Sidewalk and Intersection Safety	\$ -	\$ -	\$ -	\$ -	\$ 2,482,000	\$ 2,482,000	\$ 4,964,000
23. Ballinger Way - NE 205th St to 19th Ave NE Access Control Preliminary Design	\$ -	\$ 200,000	\$ -	\$ -	\$ -	\$ 10,800,000	\$ 11,000,000
24. N 185th Street and Linden Avenue N Intersection Improvements	\$ -	\$ 530,100	\$ -	\$ -	\$ -	\$ -	\$ 530,100
25. 3rd Ave NW and NW Richmond Beach Rd Intersection Improvements	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2,320,000	\$ 2,320,000
26. Westminster Way N (South). N 155th St to Fremont Ave NB	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 5,000,000	\$ 5,000,000
27. New Sidewalk Projects	\$ 1,822,000	\$ 6,300,000	\$ 6,300,000	\$ 6,300,000	\$ 6,300,000	\$ 6,300,000	\$ 33,322,000
28. 145th Street, Aurora Ave N to 3rd Ave NW	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 9,700,000	\$ 9,700,000
Total Expenditures by Year	\$ 14,457,326	\$ 28,331,542	\$ 42,752,068	\$ 51,255,066	\$ 108,149,869	\$ 119,424,869	\$ 364,370,740

FUNDED PROGRAMS
(FULLY OR PARTIALLY)

Project # and Name

1. Curb Ramp, Gutter and Sidewalk Program

Scope / Narrative

The ongoing Curb Ramp, Gutter and Sidewalk Program includes replacement of curb ramps that do not comply with the Americans with Disabilities Act (ADA) standards; design and construction of new, ADA compliant curb ramps in locations where none exist; and repairing and replacing existing concrete gutters and sidewalks damaged by tree roots, cracking or settlement. In a related project, the City is undertaking a City-wide inventory of all pedestrian facilities in the public right of way as a step toward an ADA compliance plan. The City-wide inventory will help to determine priorities for this capital program as well.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Roads Capital	\$ 190,000	\$ 190,000	\$ 200,000	\$ 200,000	\$ 200,000	\$ 200,000	\$ 1,180,000

Funding Outlook

This program is currently funded through an annual transfer from the General Fund. It is underfunded, as it is known that additional work is needed to fully maintain the existing sidewalks. It is unknown how much additional funding is needed at this time. A full inventory is required in order to accurately assess the need and an inventory and condition assessment is funded in the 2017 budget. Additionally, new requirements for curb ramp upgrades associated with projects such as traffic signal improvements and pavement overlays continue to increase the costs associated with this program. It is estimated this program is less than 50% funded. Future TIPs may include this information.

Project Status

Annual program, 2018-2023. This program helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

2. Traffic Safety Improvements

Scope / Narrative

This program addresses priority traffic and pedestrian safety concerns on both arterial and local streets. The primary purpose of this program is to design and implement small spot improvement projects to improve safety and enhance the livability of neighborhoods. Projects include traffic calming devices (speed humps, radar speed display signs, etc), capital infrastructure (curb ramps, sidewalks, etc) and operational changes (bike lanes, turn lanes, school signing, etc).

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Roads Capital	\$ 160,775	\$ 163,814	\$ 167,005	\$ 175,355	\$ 184,123	\$ 184,123	\$ 1,035,195

Funding Outlook

This program is currently underfunded. Additional improvements that could be implemented with supplemental funding include street lighting, ADA compliance upgrades, small sidewalk projects, and projects identified in the Neighborhood Traffic Action Plans. Addressing all the projects identified as high priority by residents in the traffic plans is estimated at \$37.6 million.

Project Status

Annual program, 2018-2022. This program helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure and Goal 5: Promote and enhance the City's safe community and neighborhood initiatives and programs.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

3. Annual Road Surface Maintenance Program

Scope / Narrative

The City's long-term road surface maintenance program is designed to maintain the City's roadway system at the highest Pavement Condition Index (PCI) rating within the limits of available funding. PCI is recalibrated annually and re-assessed City-wide at 5 year intervals. Roadway maintenance is accomplished by using a combination of asphalt concrete overlays and bituminous surface treatment (BST), both of which are preventative maintenance techniques. Asphalt overlays are used to maintain the structure of arterial streets, which have higher traffic volumes and higher wear, and BST is employed on residential streets, which have lower traffic volumes, lower wear and, if well maintained, a generally longer life span. These techniques typically extend pavement life between 10 and 15 years. Each year, the City identifies streets that require maintenance through this program. To maximize the impact of available funding and staff and coordinate with grant funding cycles, the City alternates each year between overlays and BST. As part of this program, the City renews pavement markings, traffic channelization and signs.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Roads Capital	\$ 1,100,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 7,100,000
Federal - STP							\$ -
PROJECT TOTAL	\$ 1,100,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 1,200,000	\$ 7,100,000

Funding Outlook

This program is currently funded at approximately 50 percent.

Project Status

Annual program 2018-2023. This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

4. Traffic Signal and Intelligent Transportation System (ITS) Improvements

Scope / Narrative

The maintenance of safe and efficient traffic signals is an important part of the City's responsibility to all users of the transportation network including drivers, pedestrians and bicyclists. New traffic signal technology provides superior functionality compared to older, obsolete equipment.

Intersection improvements are one of the most cost effective ways to improve traffic flow while effective maintenance and operation of traffic signals can increase safety and extend the life of the signal, decreasing overall program costs. Examples of signalized intersection improvements include, but are not limited to:

- New controllers which can accommodate transit signal priority, dynamic emergency vehicle preemption and coordination of traffic signals along a corridor for increased efficiency.
- Functional detection to ensure signals operate dynamically, based on actual user demand.
- Back up battery systems to keep signals operational during power outages.
- Communication to a central system for efficient signal timing changes, troubleshooting, and reporting.
- Accessible Pedestrian Signals and countdown signal heads for improved safety and ADA compliance.

The ability to keep traffic signals operating and vehicles moving is a key part of Shoreline's Emergency Management Plan.

Intelligent Transportation Systems (ITS) is the application of advanced information and communications technology to transportation. ITS helps roadway users make more informed decisions about travel routes thereby improving efficiency, safety, productivity, travel time and reliability. Elements of an ITS system can include variable message signs, license plate or bluetooth/wi-fi readers, real-time traffic flow maps, traffic monitoring cameras, and communication between traffic signals and a Traffic Management Center (TMC). Existing City ITS components include fiber optic lines, traffic monitoring cameras, and a central signal system for signals along Aurora. The City began operation of a TMC in 2013 to help manage these systems which may be expanded or modified as the City's ITS system grows. This project will fully integrate all City signals, with ITS improvements where appropriate, including traffic monitoring cameras. Future expansions of the system may include coordination with traffic signals in Seattle, cities to the north, and those operated by WSDOT.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Roads Capital	\$ 121,551	\$ 127,628	\$ 134,010	\$ 140,711	\$ 147,746	\$ 147,746	\$ 819,392

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Funding Outlook

The annual funding for this project is not enough to completely rebuild two traffic signals each year, as a traffic signal rebuild typically costs \$60,000. While some signal upgrades were deferred due to the recession, the city still remains on schedule to rebuild an average of two signals each year, in part due to grant-funded CIP projects, such as the Aurora Corridor Improvement Project. The program is currently underfunded by approximately \$20,000 annually to stay on schedule for rebuilding two traffic signals each year. An additional \$750,000 is needed to complete the ITS components of this project. The ITS portion of the project is currently unfunded as well.

Project Status

Annual program 2018-2023. This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

FUNDED PROJECTS
(FULLY OR PARTIALLY)

Project # and Name

5. Project removed

Scope / Narrative

Funding

FUNDING SOURCE	FUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	

Project Status

Purpose / Goals Achieved

- | | |
|---|---|
| <input type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

6. 145th Street (SR 523) Corridor Improvements, Aurora Ave N to I-5

Scope / Narrative

This project is identified in the 145th Street Multi-modal Corridor Study. The project will make improvements to signalized intersections in order to improve transit service, general purpose traffic, and pedestrian crossings. The project will improve pedestrian facilities along its full length. The Design phase for this project is fully funded. The City is striving to completed the ROW and Construction phases of the project by 2023 by the time the light rail station opens near NE 145th Street and the I-5 Interchange. A specific funding source to complete this project in the desired timeframe has not been identified.

Funding

FUNDING SOURCE	FUNDED		UNFUNDED				
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	2018-2023 Total
Deign phase. Roads Capital	\$ 330,000						\$ 330,000
Desgn Phase. Federal - STP	\$ 2,118,000						\$ 2,118,000
ROW and Construction - Unknown		\$ 6,000,000	\$ 7,500,000	\$ 10,000,000	\$ 10,000,000	\$ 6,570,000	\$ 40,070,000
PROJECT TOTAL	\$ 2,448,000	\$ 6,000,000	\$ 7,500,000	\$ 10,000,000	\$ 10,000,000	\$ 6,570,000	\$ 42,518,000

Funding Outlook

The estimates for 2019-2023 are included as placeholders. Right of way acquisition costs are estimated to be \$13,500,000 and are unfunded, though Shoreline has set aside \$1,000,000 for this task. Construction costs are estimated to be \$44,966,000 and are unfunded. Shoreline may use a portion of its Connecting Washington funds for this project.

Project Status

The project design work will begin in Spring 2017 and is expected to take two years to complete.

Purpose / Goals Achieved

- | | |
|--|--|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

7. SR 523 (N/NE 145th Street) & I-5 Interchange Improvements

Scope / Narrative

This project will improve traffic operations through the 145th Street and I-5 Interchange while also accommodating additional non-motorized users. The project will add a new northbound I-5 onramp, extend left turn lane capacity, and add a new non-motorized bridge spanning I-5. The Design phase for this project is fully funded. The City is striving to complete the ROW and Construction phases of the project by 2023 by the time the light rail station opens near NE 145th Street and the I-5 Interchange. A specific funding source to complete this project in the desired timeframe has not been identified. Connecting Washington Funds are available to apply to corridor improvements in 2026. The City is working on a strategy to utilize these funds early to enable construction of the project to be complete by 2023.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
STP	\$ 2,595,000						
Roads Capital	\$ 405,000						
Unknown		\$ 160,000		\$ 10,000,000	\$ 6,840,000		
PROJECT TOTAL	\$ 3,000,000	\$ 160,000	\$ -	\$ 10,000,000	\$ 6,840,000	\$ -	\$ 20,000,000

Project Status

The project design will begin in Spring 2017.

Purpose / Goals Achieved

- | | |
|--|--|
| <input checked="" type="checkbox"/> Non-motorized | <input checked="" type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

8. 148th Street N Non-motorized Bridge Project

Scope / Narrative

This project will provide a new non-motorized bridge crossing over I-5 from the neighborhood in the vicinity of the N 148th Street to the 145th Street Light Rail Station.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
30% Design and Enviro Review - CIP	\$ 500,000						\$ 500,000
Final Design and Permitting - unknown		\$ 1,600,000					\$ 1,600,000
Construction - unknown			\$ 5,000,000	\$ 5,000,000	\$ 4,000,000		\$ 14,000,000
PROJECT TOTAL	\$ 500,000	\$ 1,600,000	\$ 5,000,000	\$ 5,000,000	\$ 4,000,000	\$ -	\$ 16,100,000

Funding Outlook

The total cost for this project is estimated to be approximately \$16 million. Design phase will be complete in 2018 and construction will be completed in 2023.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|--|
| <input checked="" type="checkbox"/> Non-motorized | <input checked="" type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

9. Trail Along the Rail

Scope / Narrative

This project will provide an approximately 2.5 mile multi-use trail that roughly parallels the Lynnwood Link Light Rail guideway from 145th Street Station through the 185th Street Station and to the 195th Street Pedestrian Overcrossing.

Funding

FUNDING SOURCE	FUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
30% Design and Enviro Review - CIP	\$ 275,000						\$ 275,000
Final Design and Permitting - unknown		\$ 500,000	\$ 500,000				
Construction - unknown				\$ 4,000,000	\$ 3,000,000	\$ 725,000	
							\$ -
PROJECT TOTAL	\$ 275,000	\$ 500,000	\$ 500,000	\$ 4,000,000	\$ 3,000,000	\$ 725,000	\$ 9,000,000

Funding Outlook

The total cost for this project is estimated to be approximately \$9 million. Design phase will be complete in 2018 and construction will be completed in 2023.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|--|
| <input type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

10. Westminster and N 155th Improvements

Scope / Narrative

This project incorporates a series of improvements in the Community Renewal Area. Individual projects include the following:

- a. Realign the intersection at N 155th St and Westminster Way N. This project improves the main vehicle intersection and increases safety for pedestrians and bicyclists. Includes improvements to the section of N 155th St between Westminster Way N and Aurora Ave N. Most effectively done at one time and in conjunction with the redevelopment of the Sears property.
- b. Create a more pedestrian and bicycle friendly Westminster Way N from 200' SW of N 155th St to N 157th St. Envisioned as a project in the Aurora Square CRA Renewal Plan, reworking Westminster Way N in this section provides a more pedestrian and bicycle friendly section with street parking that can help unite the small triangle property to the rest of Aurora Square. Most effectively completed with the redevelopment of the triangle property.
- c. Construct a one-way N 157th St from Westminster Way N to Aurora Ave N. New street connection makes Westminster between 155th and 157th pedestrian and cycle-friendly, creates a better entrance to Aurora Square, connects the triangle property to the rest of Aurora Square, and alleviates congestion at the N 155th St Intersection. Most effectively completed with the redevelopment of the triangle property.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
N 155th St (West) including intersection at Westminster - Unknown		\$ 2,500,000					\$ 2,500,000
Westminster Way N (North) N 157th to Aurora - Unknown		\$ 1,500,000					\$ 1,500,000
Construct N 157th St - Unknown		\$ 1,500,000					\$ 1,500,000
PROJECT TOTAL	\$ -	\$ 5,500,000	\$ -	\$ -	\$ -	\$ -	\$ 5,500,000

Funding Outlook

Many of these projects will be constructed by private development as properties within the Aurora Square Community Renewal Area are redeveloped. The cost estimate does not include the funding needed for utility undergrounding.

Project Status

This project helps to implement City Council Goal 1: Strengthen Shoreline's economic base and Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|--|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input checked="" type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input checked="" type="checkbox"/> Corridor Study |

Project # and Name

11. N/NE 175th Street Corridor Improvements

Scope / Narrative

This project incorporates a series of improvements along this corridor to improve safety and capacity. Individual projects include the following:

- a. N 175th St – Stone Ave N to Meridian Ave N* and Interstate 5 to 15th Ave NE: This project will design and construct improvements which will tie in with those recently constructed by the Aurora project. The improvements include: reconstruction of the existing street to provide two traffic lanes in each direction, a center lane with two-way left turn areas, medians and turn pockets, bicycle lanes (integrated into the sidewalk), curb, gutter, and sidewalk with planter strip where feasible, illumination, landscaping and retaining walls. Intersections with high accident rates will be improved as part of this project. The profile of the roadway between Ashworth Ave N and Stone Ave N will be lowered to meet standard sight distance requirements. This project includes improvements to the I-5 intersections, in coordination with WSDOT.
- b. N 175th St and Meridian Ave N*: Construct a northbound add lane on Meridian Ave N, which involves widening the northbound approach to include a second through lane. Rechannelize the southbound approach with a single left turn lane and increase the westbound left turn pocket length.
- c. N/NE 175th St – Meridian Ave N to the Interstate 5 on-/off-ramps*: Extend the left-turn pockets between Meridian Ave N and I-5 to provide additional storage capacity for left turning vehicles at the intersections.
- d. NE 175th St – 15th Ave NE – 25th Ave NE: Re-stripe the westbound approach to provide a dedicated left-turn pocket and shared through/right lane. With dedicated left-turn pockets, remove split-phase signal operation and optimize for eight-phase signal operation.

Some of these projects can be constructed individually, allowing the complete set of improvement to be phased over time.

* Projects have been identified in the City's Transportation Master Plan as necessary to accommodate growth and allow the City to maintain its adopted Levels of Service. These projects may be funded in part by transportation impact fees.

Continued on next page

Funding							
FUNDING SOURCE	FUNDED		UNFUNDED				2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Design and Enviro Review - Federal STP	\$ 1,418,600	\$ 2,127,900					
Design and Enviro Review - Impact Fees	\$ 221,400	\$ 332,100					
ROW - Unfunded			\$1,903,000.00	\$ 1,903,000			
ROW - Impact Fees			\$297,000.00	\$ 297,000			
Construction - Unfunded					\$ 6,184,750	\$ 6,184,750	
Construction - Impact Fees					\$ 965,250	\$ 965,250	
PROJECT TOTAL	\$ 1,640,000	\$ 2,460,000	\$ 2,200,000	\$ 2,200,000	\$ 7,150,000	\$ 7,150,000	\$ 22,800,000

Funding Outlook

Projects identified in the City's Transportation Master Plan as necessary to accommodate growth and allow the City to maintain its adopted Levels of Service may be funded in part by transportation impact fees. The City pursued federal grant funding for design and environmental work through the Surface Transportation Program administered by PSRC in 2014 and was included as the first project eligible for funding on the contingency list. In February 2016 this project was selected off the contingency list and fully funded for design and environmental review. It is anticipated that the City will use transportation impact fees collected from private development to serve as the match for this project.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

- Purpose / Goals Achieved**
- Non-motorized
 - System Preservation
 - Improves Efficiency & Operations
 - Safety
 - Major Structures
 - Interjurisdictional Coordination
 - Growth Management
 - Corridor Study

Project # and Name

12. N/NE 185th Street Corridor Improvements

Scope / Narrative

185th Street Corridor Strategy will develop a corridor plan for 185th Street/10th Avenue NE/NE 180th Street that includes multi-modal transportation facilities necessary to support projected growth in the subarea, a phasing plan for implementation and a funding plan for improvements. This project is identified in the 185th Street Station Subarea Plan. Individual improvements projects* that come out of the plan could be the following:

- a. NE 185th St – 1st Ave NE to 7th Ave NE** and 7th Ave NE to 10th Ave NE: Rechannelize the roadway to add a center two-way left-turn lane, retain bicycle lanes and remove on-street parking.
- b. N 185th St and Meridian Ave N**: Construction of northbound and southbound add/drop lanes, which involves widening the northbound and southbound approaches to include a second through lane and receiving lane. This project also includes construction of an east to southbound right-turn pocket, which involves widening the eastbound approach. This signal will be coordinated with the signal at Meridian Ave N and 1st Ave NE.
- c. N 185th St – Midvale Ave N to Stone Ave N: Extend the second eastbound through lane from Midvale Ave N to Stone Ave N. The lane will terminate as a right-turn only lane at Stone Ave N.
- d. N/NE 185th St – Midvale Ave N – 10th Ave NE: Perform overlay/preservation work. Work may include milling the roadway and sealing the joints between the concrete panels to improve the smoothness and improve the pavement life span.

*Some of these projects can be constructed individually, allowing the complete set of improvements to be phased over time. Preservation work may occur in advance of other projects in order to maintain them until funding is available for the larger capital projects.

**Projects have been identified in the City's Transportation Master Plan as necessary to accommodate growth and allow the City to maintain its adopted Levels of Service. These projects may be funded in part by transportation impact fees.

Funding

FUNDING SOURCE	FUNDED		UNFUNDED				2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
185 th St Corridor Strategy (CIP)	\$700,000						\$ 700,000
NE 185 th St – 1 st Ave NE to 7 th Ave NE and 7 th Ave NE to 10 th Ave NE(a) - unknown				\$231,000	\$231,000	\$231,000	\$ 693,000
NE 185 th St – 1 st Ave NE to 7 th Ave NE (a) – impact fee				\$78,000	\$78,000	\$78,000	\$ 234,000
N 185 th St and Meridian Ave N(b) - unknown				\$4,110,000	\$4,110,000	\$4,110,000	\$ 12,330,000
N 185 th St and Meridian Ave N (b) – impact fee				\$1,370,000	\$1,370,000	\$1,370,000	\$ 4,110,000
N 185 th St – Midvale Ave N to Stone Ave N (c) - unknown				\$550,000	\$550,000	\$550,000	\$ 1,650,000
NE 185 th St – Midvale Ave N – 10 th Ave NE (d) - unknown				\$2,200,000	\$2,200,000	\$2,200,000	\$ 6,600,000
N/NE 185th Street Corridor Study (e) - unknown							\$ -
PROJECT TOTAL	\$ 700,000	\$ -	\$ -	\$ 8,539,000	\$ 8,539,000	\$ 8,539,000	\$ 26,317,000

Continued on next page

Funding Outlook

Projects identified in the City's Transportation Master Plan as necessary to accommodate growth and allow the City to maintain its adopted Levels of Service may be funded in part by transportation impact fees.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure. Bicycle lanes were installed in 2013. The roadway will need to be rechannelized again in order to provide the center turn lane.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input checked="" type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input checked="" type="checkbox"/> Corridor Study |

Project # and Name

13. Richmond Beach Rd Rechannelization

Scope / Narrative

This project will re-channelize Richmond Beach Rd/NW 195th St/NW 196th St from 24th Ave NW to Dayton Ave N from four lanes to one lane in each direction plus a center turn lane. The primary goal of this project is to improve driver, pedestrian, and bicyclist safety and mobility. Re-channelization also provides the ability to implement on-street bicycle lanes which will provide a space for people biking as well as provide a buffer between pedestrians and vehicle traffic.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Roads Capital Fund	\$ 300,000						\$ 300,000

Funding Outlook

This project did not receive funding from the Citywide Safety Grant administered through WSDOT. The City's Roads Capital Fund currently has \$200k allocated toward the project. During the Summer 2017 budget process, staff will try to secure the additional funding needed.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

UNFUNDED PROJECTS

Project # and Name

14. N 160th from Aurora to Dayton/Greenwood

Scope / Narrative

N 160th from Aurora to Dayton/Greenwood. This is a multi-phase project. N 160th will be restriped to 3-lanes and bikelanes as part of the Federally funded bicycle project in 2018. Following phases include new sidewalks, a gateway entrance on N 160th St for Aurora Square and a midblock pedestrian crossing. Most effectively done when the Sears property redevelops and only if traffic volumes warrant.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Greenwood/ N 160th St/ Innis Arden intersection	\$ 100,000	\$ 700,000	\$ 700,000				\$ 1,500,000
PROJECT TOTAL	\$ 100,000	\$ 700,000	\$ 700,000	\$ -	\$ -	\$ -	\$ 1,500,000

Funding Outlook

This project assumes funding by King County for restriping to three lanes with a bike lane. It assumes pedestrian improvements will be made by private development as properties within the Aurora Square Community Renewal Area are redeveloped. The cost estimate does not include the funding needed for utility undergrounding.

Project Status

This project helps to implement City Council Goal 1: Strengthen Shoreline's economic base and Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|--|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input checked="" type="checkbox"/> Corridor Study |

Project # and Name

15. Greenwood/Innis Arden/160th Intersection Improvements

Scope / Narrative

Reconstruct Greenwood/Innis Arden/160th intersection for improved operations. Project also includes sidewalks between Dayton and Greenwood.

Funding

FUNDING SOURCE	FUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Shoreline Community College/Unknown	\$ 100,000	\$ 700,000	\$ 700,000	\$ 1,500,000	\$ 1,500,000	\$ 1,500,000	\$ 6,000,000
				\$ -	\$ -	\$ -	
PROJECT TOTAL	\$ 100,000	\$ 700,000	\$ 700,000	\$ 1,500,000	\$ 1,500,000	\$ 1,500,000	\$ 6,000,000

Funding Outlook

This project assumes partial funding from Shoreline Community College. The cost estimate does not include the funding needed for utility undergrounding.

Project Status

This project helps to implement City Council Goal 1: Strengthen Shoreline's economic base and Goal 2: Improve Shoreline's utility, transportation and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

16. 15th Avenue NE – NE 175th Street to NE 205th Street

Scope / Narrative

This project would construct sidewalks and accessible bus stops on the west side of the road from NE 180th St to NE 205th St. There are significant topographic challenges related to constructing a sidewalk on the west side of this arterial. A corridor study will be performed to identify a preferred transportation solution for this roadway segment. Alternatives to accommodate bicycles will be analyzed, including rechannelization of the roadway from four lanes to three. The cross-section of the road from NE 175th St to NE 180th St would be reduced from four lanes to three and bicycle lanes would be installed. Right-of-way may need to be purchased to complete this project.

Funding

	UNFUNDED						
FUNDING SOURCE	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	2018-2023 Total
Unknown			\$ 6,176,793				\$ 6,176,793

Funding Outlook

The funding identified for this project is to identify and design the appropriate improvements for the roadway and develop cost estimates. Because construction costs are unknown at this time, a placeholder for them is identified in 2019-2021. More refined construction costs and a timeline for completion will be updated in future TIPs.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input checked="" type="checkbox"/> Corridor Study |

Project # and Name

17. Fremont Avenue N – N 175th Street to N 185th Street

Scope / Narrative

This project incorporates a series of improvements along this corridor to improve safety and capacity including:

- Rechannelization of the roadway to a three lane cross-section (one travel lane in each direction with a center turn lane) with bicycle lanes.
- Construction of sidewalks on both sides of the street. All sidewalks would be five to eight feet wide, include curb and gutter and five foot amenity zones separating the pedestrians from the roadway.
- Perform overlay/preservation work.

These projects can be constructed individually, allowing the complete set of improvement to be phased over time.

Fremont Ave N serves as a primary route to Shorewood High School and Shoreline's Town Center.
Tricia - Need updated cost estimate

Funding

UNFUNDED							
FUNDING SOURCE	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	2018-2023 Total
Unknown			\$ 6,292,720				\$ 6,292,720

Project Status

This project helps to implement City Council Goal 1: Strengthen Shoreline's economic base and Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Funding Outlook

The funding identified for this project is to identify and design the appropriate improvements for the roadway and develop cost estimates. Because construction costs are unknown at this time, a placeholder for them is identified in 2019-2021. More refined construction costs and a timeline for completion will be updated in future TIPs.

Purpose / Goals Achieved

- | | |
|---|--|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

18. Point Wells Potential Mitigation Projects

Scope / Narrative

The proposed Point Wells development in Snohomish County will result in significant traffic impacts in the City of Shoreline. Mitigation projects for the Point Wells development will be funded and potentially constructed by private developers. The following is a preliminary list of projects based on original project submissions. This list will need to be updated as part of the development's DEIS process once Snohomish County has determined that accurate and adequate project information has been provided to move forward with the DEIS process.

- a. NW 195th/196th St – Richmond Beach Dr NW to 24th Ave NW: NW 196th St and NW 195th Street are unimproved roadways with a speed limit of 25 miles per hour and two 12 foot wide lanes with limited sidewalks. Preliminary recommended improvements to the roadway should include sidewalks on one side of the street (including Richmond Beach Drive between NW 195th St/NW 196th Street) and narrowing lanes to slow traffic flow and improve pedestrian comfort. This project will also include a roundabout or other traffic calming technique at the 24th Ave NW intersection.
- b. NW 196th St – 24th Ave NW to 20th Ave NW: NW 196th St is a collector arterial with a speed limit of 25 miles per hour. It consists of two 12 foot wide lanes with a sidewalk on the north side and part of the south side of the street. Improvements to the roadway should include construction of a complete sidewalk on the south side of the street.
- c. NW 195th St at 20th Ave NW: Construct a traffic signal at this intersection which is currently controlled by stop signs on all approaches.
- d. NW Richmond Beach Road at 15th Ave NW: Improve operations and safety at the existing off-set intersection. This could include signalization or construction of roundabouts.
- e. Richmond Beach Dr NW – NW 196th St to NW 205th St: Richmond Beach Dr NW is the only road to serve the Point Wells site. It is designated as a collector arterial and local secondary street. It consists of two 12 foot wide lanes with no sidewalks. Some areas on the east side are wide enough to accommodate on-street parking. Improvements to this roadway include, at a minimum, widening to help maintain traffic flow and construction of a sidewalk on one side of the street.
- f. NW Richmond Beach Rd at 8th Ave NW: Improve safety and operation at this existing five legged intersection through a reconfiguration that eliminates the southwest approach or construction of a roundabout.
- g. NW/N Richmond Beach Rd - Richmond Beach Dr NW to Fremont Ave N: Perform overlay/preservation work. Preservation work may occur in advance of other projects in order to maintain them until funding is available for the larger capital projects.
- h. Off-Corridor Sidewalk/Pedestrian Safety Improvements: Staff and the developer are currently reviewing potential off-corridor sidewalks to improve pedestrian safety on arterial streets that connect to the corridor.
- i. Traffic Calming and Bicycle Improvements: Implement traffic calming techniques to minimize cut-through traffic in the area between Richmond Beach Drive and 20th Ave NW, on NW 190th Street west of 8th Ave NW and bicycle improvements on east-west streets paralleling the Richmond Beach Road corridor.

Continued on next page

Funding							
FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
NW 195th/196 th St – Richmond Beach Dr NW to 24 th Ave NW (a) – developer mitigation					\$1,500,000	\$1,500,000	\$ 3,000,000
NW 196 th St – 24 th Ave NW to 20 th Ave NW (b) – developer mitigation					\$300,000	\$300,000	\$ 600,000
NW 195 th St at 20 th Ave NW (c) – developer mitigation					\$1,340,000	\$1,340,000	\$ 2,680,000
NW Richmond Beach Road at 15 th Ave NW (d) – developer mitigation					\$2,210,000	\$2,210,000	\$ 4,420,000
Richmond Beach Dr NW – NW 196 th St to NW 205 th St: (e) – developer mitigation					\$18,250,000	\$18,250,000	\$ 36,500,000
NW Richmond Beach Rd at 8 th Ave NW: (f) – developer mitigation					\$2,140,000	\$2,140,000	\$ 4,280,000
NW/N Richmond Beach Rd - Richmond Beach Dr NW to Fremont Ave N (g) – developer mitigation					\$4,000,000	\$4,000,000	\$ 8,000,000
Off-Corridor Sidewalk/Pedestrian Safety Improvements (h) – developer mitigation					\$15,050,000	\$15,050,000	\$ 30,100,000
Traffic Calming and Bicycle Improvements (i) - developer mitigation					\$700,000	\$700,000	\$ 1,400,000
PROJECT TOTAL	\$ -	\$ -	\$ -	\$ -	\$ 45,490,000	\$ 45,490,000	\$ 90,980,000

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Funding Outlook

Many of these projects will be funded and constructed by private developers as mitigation for the Point Wells development. It is unknown at this time when projects will be constructed.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|--|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input checked="" type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input checked="" type="checkbox"/> Corridor Study |

Project # and Name

19. Major Pavement Rehabilitation Projects

Scope / Narrative

Replacement of the roadway pavement is called for when regular maintenance has been deferred for an extended period and the pavement structure becomes sufficiently worn or damaged that the overlay or bituminous surface treatment preservation techniques employed in the City's Annual Road Surface Maintenance program (Project # 3) are ineffective. Timing is important: The cost of reconstructing a roadway is dramatically higher than the cost of preventive maintenance over the same time period. Several road segments in Shoreline require replacement of all or most the roadway pavement:

- N/NE 155th St: Aurora Ave N to 15th Ave NE
- N/NE 185th St: Midvale Ave N to 10th Ave NE (costs included with Project #18)
- NW/N Richmond Beach Rd: Richmond Beach Dr. NW to Fremont Ave N
(Costs included with Project #17)
- Fremont Ave N: N 175th St to N 185th St (costs included with Project #15)
- Westminster Way N: N 145th St to N 155th St
- N/NW 200th St: 3rd Ave NW to Aurora Ave N
- N/NW 195th St: 3rd Ave NW to Aurora Ave N
- Linden Ave N: N 175th St to N 185th St
- 8th Ave NW: NW Richmond Beach Rd to NW 180th St
- NW 201st St: 23rd Pl. NW to 24th Ave. NW
- 23rd Pl NW: 23rd Ave NW to 20th Ave NW
- 21st Pl NW: 21st Ave NW to 23rd Pl NW
- 24th Ave NW: NW 196th St to NW 201st St
- Ashworth Ave. N: N 183rd St. to N 185th St
- 20th Ave NW: NW 197th St to 23rd Pl NW
- N 183rd St: Ashworth Ave N to Meridian Ave N

On roadways where both capital projects and preservation work are identified in this TIP, the preservation work may occur in advance of those projects in order to maintain them until funding is available for the larger capital projects. The costs for these projects are identified on the individual project pages.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 2,000,000	\$ 12,000,000

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Funding Outlook

The City will pursue federal grant funding for overlay work. Grant funding would be pursued for the projects that are most highly qualified. The annual funding identified for 2017-2022 will not be adequate to perform overlay work for all of the roadways identified.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

20. Meridian Avenue N – N 145th Street to N 205th Street

Scope / Narrative

This project incorporates a series of improvements along this corridor to improve safety and capacity including:

- Rechannelization of the roadway to add a center two-way left-turn lane and bicycle lanes (requires removal of on-street parking)
- Installation of traffic calming measures
- Repair of damaged sidewalks, curbs and gutters and installation of new sidewalks where missing
- Installation of curb ramps to improve ADA accessibility
- Roadway overlay work
- Possible undergrounding of utilities.

Right-of-way may need to be acquired in order to meet ADA requirements around trees. This project has been identified in the City's Transportation Master Plan as necessary to accommodate growth and allow the City to maintain its adopted Levels of Service. These projects may be funded in part by transportation impact fees. Overlay from N 190th Street - N 205th Street scheduled to occur in conjunction with Project #3.

As part of improvements to this corridor, the City may choose to incorporate additional projects identified in this TIP.

Funding

	UNFUNDED						
FUNDING SOURCE	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	2018-2023 Total
Unknown					\$6,590,000	\$6,590,000	\$ 13,180,000
Roads Capital							\$ -
Federal - STP							\$ -
Impact Fee					\$2,527,000	\$2,527,000	\$ 5,054,000
PROJECT TOTAL	\$ -	\$ -	\$ -	\$ -	\$ 9,117,000	\$ 9,117,000	\$ 18,234,000

Continued on next page

Funding Outlook

Projects identified in the City's Transportation Master Plan as necessary to accommodate growth and allow the City to maintain its adopted Levels of Service may be funded in part by transportation impact fees. 2016 estimates include awarded grant funds for overlay work from N 190th Street - N 205th Street.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|--|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input checked="" type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input checked="" type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

21. NE Perkins Way Improvements – 10th Avenue NE to 15th Avenue NE

Scope / Narrative

Construct bicycle and pedestrian improvements on NE Perkins Way from 10th Ave NE to 15th Ave NE. This roadway segment currently includes two travel lanes and a pedestrian walking on the north side separated from the travel lanes by jersey barriers. No bicycle facilities are present. This segment is part of the Northern Connector route from the Interurban Trail in Shoreline to the Burke-Gilman Trail in Lake Forest Park. Upon completion of the separated trail at NE 195th Street from 1st Ave NE to 5th Ave NE and installation of signage along the remainder of the route, this segment will be the remaining gap within the connector route. A study is needed to determine the appropriate scope of improvements and costs for this project.

Funding

	UNFUNDED						
FUNDING SOURCE	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	2018-2023 Total
Unknown			\$ 3,681,540				\$ 3,681,540

Funding Outlook

The funding identified for this project is to identify and design the appropriate improvements for the roadway and develop cost estimates. Because construction costs are unknown at this time, a placeholder for them is identified in 2019-2020. More refined construction costs and a timeline for completion will be updated in future TIPs. This project is likely to be competitive for grant funding.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input checked="" type="checkbox"/> Corridor Study |

Project # and Name

22. N 165th Street and Carlyle Hall Road N Sidewalk and Intersection Safety

Scope / Narrative

This project will improve an odd-shaped intersection to improve visibility and safety, as well as providing pedestrian safety features. The design has not been completed and one of the first steps will be to scope out alternatives.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown					\$ 2,482,000	\$ 2,482,000	\$ 4,964,000

Funding Outlook

The funding identified for this project is to identify and design the appropriate improvements for the roadway and develop cost estimates. Because construction costs are unknown at this time, a placeholder for them is identified in 2022. More refined construction costs and a timeline for completion will be updated in future TIPs.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

**23. Ballinger Way - NE 205th St to 19th Ave NE Access Control
Preliminary Design**

Scope / Narrative

Access control improvements along this corridor are needed to address vehicular and pedestrian collisions as identified in the City's Annual Traffic Report. Preliminary design to determine the scope of access control and intersection improvements is needed as a first step. Scoping will also identify pedestrian safety improvement opportunities, specifically related to midblock crossings. Right-of-way may need to be acquired in order to provide U-turns at signals and/or at access points.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown		\$ 200,000				\$ 10,800,000	\$ 11,000,000

Funding Outlook

This project is competitive for funding from the Citywide Safety Grant administered through WSDOT.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

24. N 185th Street and Linden Avenue N Intersection Improvements

Scope / Narrative

This project would rebuild the intersection of Linden Ave N and N 185th Street in order to revise signal phasing to address at-angle collisions as noted in the City's Annual Traffic Report. This project would also decrease intersection radii to lower vehicle turning speeds and reduce pedestrian crossing distances for increased pedestrian safety. Sidewalks, curb ramps and pedestrian signal systems for ADA compliance would also be addressed. The current signal infrastructure does not have capacity to provide these phase changes and pedestrian improvements unless the intersection is rebuilt.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown		\$ 530,100					\$ 530,100

Funding Outlook

This project is competitive for funding from the Citywide Safety Grant administered through WSDOT.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

25. 3rd Ave NW and NW Richmond Beach Rd Intersection Improvements

Scope / Narrative

This intersection has regularly been the highest ranked site for number of collisions in the City. This project would rebuild the intersection of 3rd Avenue NW and NW Richmond Beach Road in order to provide left turn pockets in the eastbound and westbound directions. This would allow for safer and more efficient signal phasing to address at-angle collisions as noted in the City's Annual Traffic Report. Sidewalks, curb ramps and pedestrian signal systems for ADA compliance would also be addressed. Additionally, the current signal infrastructure is located on a span wire which would be changed to signal pole structures.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown						\$ 2,320,000	\$ 2,320,000

Funding Outlook

This project is competitive for funding from the Citywide Safety Grant administered through WSDOT. There may also be a nexus for new development, such as Point Wells, to fund safety improvements at this intersection.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input checked="" type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

26. Westminster Way N (South). N 155th St to Fremont Ave NB Frontage Improvements

Scope / Narrative

Frontage and channelization improvements including widening sidewalks and/or a multi-use trail, installation of a planted median and ADA improvements at intersections.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unkown						\$ 5,000,000	\$ 5,000,000

Funding Outlook

This projects will be constructed by private development as properties within the Aurora Square Community Renewal Area are redeveloped. The cost estimate does not include the funding needed for utility undergrounding.

Project Status

This project helps to implement City Council Goal 1: Strengthen Shoreline's economic base and Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

27. New Sidewalk Projects

Scope / Narrative

The 2011 Transportation Master Plan (TMP) includes a Pedestrian System Plan, which identifies key pedestrian corridors in Shoreline that result in a comprehensive pedestrian network throughout the City. Over 100 projects are identified in order to complete the system. These projects are prioritized in the TMP.

The City's standard design for sidewalks includes construction of an amenity zone between the curb and the sidewalk. The amenity zone provides a buffer between pedestrians and traffic and is often vegetated. The amenity zone can be utilized as a stormwater management and treatment facility through the use of low impact development techniques such as rain gardens. It is the City's policy to maintain open stormwater channels whenever possible and these are often in the right-of-way where sidewalks would be constructed. In these circumstances, the City will need to implement flexibility in its design standards to maintain these channels as much as possible.

The primary focus of the sidewalk projects listed in this TIP is to complete sidewalks on one side of a street in order to create continuous walkways along a street or corridor. The sidewalk projects listed in this TIP include a combination of projects that fill in gaps between existing segments, projects that are well qualified for grant programs and those projects that will be required as mitigation for public projects.

Funding

FUNDING SOURCE	UNFUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown	\$ 1,822,000	\$ 6,300,000	\$ 6,300,000	\$ 6,300,000	\$ 6,300,000	\$ 6,300,000	\$ 33,322,000

Funding Outlook

In the past, the City has applied for grant funding for sidewalks from several state sources including the WSDOT Pedestrian and Bicycle Program, WSDOT Safe Routes to School and the Transportation Improvement Board as well as the federal Transportation Alternatives Program. Sidewalks have also been funded through federal Surface Transportation Program as part of larger roadway projects, such as the Aurora Corridor Improvement Project.

The City is starting a Sidewalk Prioritization process that will look at how to package and fund high and medium ranked projects from the City's current list. The rough order of magnitude estimate for improvements is approximately \$127 million (with a combination of standard sidewalks and alternative treatments) which if implemented evenly over 20 years would be ~\$6.3 million per year.

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

28. 145th Street, Aurora Ave N to 3rd Ave NW

Scope / Narrative

The 145th Street Corridor Study identified future improvements to 145th Street between Aurora Avenue and 3rd Avenue. These improvements modify the roadway to a 3-lane section with on-street bike lanes where space allows.

Funding

FUNDING SOURCE	PARTIALLY FUNDED					UNFUNDED	2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Unknown	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 9,700,000	\$ 9,700,000

Funding Outlook

No funding has been identified for this project at this time. Design and construction of this segment of roadway is anticipated to begin in 2023 after completion of Project No. 6 (145th Street (SR 523) Corridor Improvements, Aurora Ave N to I-5) and Project No. 7 (SR 523 (N/NE 145th Street) & I-5 Interchange Improvements).

Project Status

This project is scheduled to be completed after the 145th interchange and segment from I-5 to Aurora.

Purpose / Goals Achieved

- | | |
|--|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input checked="" type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |

Project # and Name

5. 25th Avenue NE Sidewalk

Scope / Narrative

This project will extend sidewalks along the west side of 25th Ave NE from NE 195th PI to NE 200th St. Sidewalk will be installed in front of the proposed Public Works Maintenance Facility and Bruggers Bog Park. Intermittent on-street parking will also be installed.

Funding

FUNDING SOURCE	FUNDED						2018-2023 Total
	2018 Estimate	2019 Estimate	2020 Estimate	2021 Estimate	2022 Estimate	2023 Estimate	
Roads Capital	\$ 60,000	\$ 510,000	\$ 25,000				\$ 595,000

Project Status

This project helps to implement City Council Goal 2: Improve Shoreline's utility, transportation, and environmental infrastructure.

Purpose / Goals Achieved

- | | |
|---|---|
| <input checked="" type="checkbox"/> Non-motorized | <input type="checkbox"/> Major Structures |
| <input type="checkbox"/> System Preservation | <input type="checkbox"/> Interjurisdictional Coordination |
| <input type="checkbox"/> Improves Efficiency & Operations | <input type="checkbox"/> Growth Management |
| <input checked="" type="checkbox"/> Safety | <input type="checkbox"/> Corridor Study |