



City of Bandon Safe Routes to School Plan



PHASE 1 FINAL

JUNE 2020



BANDON SCHOOL DISTRICT
455 9th St. SW, BANDON, OREGON 97411
[HTTP://WWW.BANDON.K12.OR.US/](http://www.bandon.k12.or.us/)

This page intentionally left blank.

Table of Contents

Table of Contents.....	i
Chapter 1. Introduction	3
Oregon Department of Transportation’s Project Identification Program	3
What is Safe Routes to School (SRTS)?	3
City of Bandon Schools Overview	5
PIP Outreach Process.....	6
Chapter 2. Vision and Goals for Safe Routes to Schools	7
Chapter 3. Existing Conditions	8
Background Data	8
Bandon Schools Virtual School Safety Assessment	12
Bike and Pedestrian Facility Inventory	13
Chapter 4. Needs & Recommendations	14
Construction Recommendations.....	14
High Priority Improvements for the ODOT Infrastructure Grant Application	23
Chapter 5. Potential Funding & Implementation	28
Statewide Funding Opportunities	28
Federal Funds	30
Local Funding Opportunities	30
Non-Infrastructure Programs Funding Opportunities	31

This page intentionally left blank.

Chapter 1. Introduction

The City of Bandon Safe Routes to School (SRTS) Plan lays the foundation for schools, the Bandon School District, City of Bandon, Coos County, Oregon Department of Transportation (ODOT), and wider community to work together on reducing barriers for students walking and biking to school. The City of Bandon SRTS Plan includes Bandon High School, Ocean Crest Elementary School, and Harbor Lights Middle School.

This Plan is the first deliverable in a phased approach to the planning process, in response to the COVID-19 global pandemic and the need for social distancing and school closures. It documents the process that took place remotely to identify and prioritize construction projects for the ODOT SRTS Competitive Infrastructure Grant Program.

Oregon Department of Transportation's Project Identification Program

This SRTS Plan supports Oregon's state-wide SRTS construction (infrastructure) and education/engagement (non-infrastructure) efforts. The Project Identification Program (PIP) Process is an ODOT technical grant program that connects communities in Oregon with planning assistance to identify needs and opportunities near one or more schools, **focusing on streets within a quarter-mile of the school, as well as critical issues within a mile of the school.**

The goals of the PIP process are:

- To engage school stakeholders around identifying and prioritizing projects that will improve walking and bicycling routes to schools.
- To identify and refine specific projects that are eligible for the ODOT SRTS Infrastructure Grants and prepare jurisdictions to apply for the funding.

The City of Bandon and Bandon School District worked with a consultant team from Alta Planning + Design to complete this SRTS Plan.

For more information on the program, visit: <https://www.oregon.gov/ODOT/Programs/Pages/SRTS-Project-Identification-Program.aspx>.

What is Safe Routes to School (SRTS)?

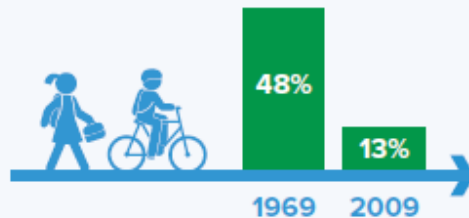
SRTS is a comprehensive program to **make school communities safer** by combining engineering tools and enforcement with education about safety and activities to enable and encourage students to **walk and bicycle to school**. SRTS programs typically involve partnerships among municipalities, school districts, community members, parent volunteers, and law enforcement.

The benefits of implementing a SRTS plan are far-reaching and include improving safety, encouraging physical activity, increasing access to school, and reducing traffic congestion and motor vehicle emissions near schools. Implementing SRTS programs and projects benefit adjacent neighborhoods as well as students and their families, by reducing traffic conflicts and enabling walking and biking trips for all purposes.

Why Safe Routes to School?

THE PROBLEM

Within the span of one generation, the percentage of children walking or bicycling to school has decreased **73%**.



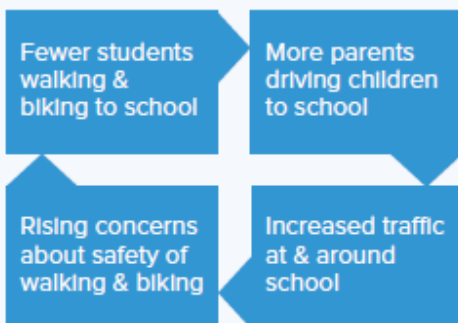
Children and adolescents should have **60 minutes (1 hour)** or more of physical activity daily.



Roads near schools are congested, decreasing safety and air quality for children.



This movement away from active transportation is a **self-perpetuating cycle**.



THE SOLUTION

Safe Routes to School programs and activities help overcome obstacles to walking, biking, and skating by **improving safety** and making it **fun and convenient for everyone**.



SRTS education and encouragement programs can result in a **25% increase** in walking and biking over five years.



When education and encouragement programs are combined with infrastructure improvements, such as sidewalks and safe crossings, SRTS can result in a **45% increase** in walking and biking.



1 mile of walking each way to school equals **2/3 of the daily recommended 60 minutes** of physical activity.



* McDonald, Noreen, Austin Brown, Lauren Marchetti, and Margo Pedrosa. 2011. "U.S. School Travel 2009: An Assessment of Trends." American Journal of Preventive Medicine. + Centers for Disease Control. www.cdc.gov/physicalactivity/basics/children/index.htm

** McDonald, N., Steiner, R., Lee, C., Rhoulac Smith, T., Zhu, X., and Y. Yang. (2014). Impact of the Safe Routes to School Program on Walking and Bicycling. Journal of the American Planning Association.

City of Bandon Schools Overview

Bandon High School

Principal:	Sabrina Belletti	Address:	550 9 th Street SW Bandon, OR 97411
Enrollment:	197	% students eligible for free or reduced lunch:	55%
Grades Served:	9-12		
Type of School:	Public		

Harbor Lights Middle School

Principal:	Dustin Clark	Address:	390 9 th St SW Bandon, OR 97411
Enrollment:	233	% students eligible for free or reduced lunch:	60%
Grades Served:	5-8		
Type of School:	Public		

Ocean Crest Elementary

Principal:	Becky Armistead	Address:	1040 Allegheny Ave SW Bandon, OR 97411
Enrollment:	246	% students eligible for free or reduced lunch:	57%
Grades Served:	K-4		
Type of School:	Public		

Table 1: School Demographics

SCHOOL	AMERICAN INDIAN/ ALASKA NATIVE	ASIAN	NATIVE HAWAIIAN/ PACIFIC ISLANDER	BLACK/ AFRICAN AMERICAN	HISPANIC	WHITE, NON- HISPANIC	MULTIRACIAL
Bandon High School	2.0%	1.5%	0.5%	0.5%	15.2%	72.6%	7.6%
Harbor Lights Middle School	0.4%	0%	0%	0%	10.7%	80.7%	8.2%
Ocean Crest Elementary	0%	1.6%	0%	0%	15%	76.4%	6.9%

Source: Oregon Department of Education 2019-2020 school year.

Table 2: Bandon School District Languages

TOP 5 LANGUAGES SPOKEN	# STUDENTS
English	758
Spanish	4
Chinese	1
Total Languages Spoken: 3	

Source: Oregon Department of Education 2019-2020 school year.

PIP Outreach Process

In response to the COVID-19 global pandemic and the need for social distancing and school closures, the outreach process for this Plan took place virtually and focused on planning efforts in the short term to prepare for the ODOT Competitive Infrastructure Grant Program. The outreach process consisted of a Virtual School Safety Assessment and several conversations with representatives from the City of Bandon, the Bandon School District, and ODOT.

Chapter 2. Vision and Goals for Safe Routes to Schools

Chapter pending in Phase 2, when public health circumstances allow for a site visit and community meeting to establish shared community goals for SRTS.

Chapter 3. Existing Conditions

Background Data

In advance of the School Safety Assessment, the consultant team collected and compiled existing conditions data and local context information, as well as information about documented community concerns, demographics, travel routes, existing facilities, traffic patterns, school environment, and other relevant details. After the Virtual School Safety Assessment, the consultant team added contextual details learned from the participants.

Plan Review

COOS COUNTY TRANSPORTATION SYSTEM PLAN/TRANSPORTATION IMPROVEMENT PROGRAM (2011)

The Coos County Transportation System Plan (TSP) presents the investments and priorities for the County's pedestrian, bicycle, transit, motor vehicle, and other transportation systems. Several of the TSP's goals and objectives, are highlighted below as being especially relevant to the SRTS planning and implementation effort:

- Goal 1: Mobility
 - Objective: Maintain roadways that serve as school bus routes to minimize service and safety impacts due to poor road surface conditions.
- Goal 2: Multimodal System
 - Objective: Plan safe and convenient bicycle and pedestrian networks that connect between residential area, schools, and other activity centers.
 - Objective: Incorporate bicycle and pedestrian elements, such as sidewalks and bike lanes or shoulders, in roadway upgrades.
- Goal 4: Safety
 - Identify and improve intermodal conflict points, including rail crossings and pedestrian/bicycle crossings of major roadways near transit stops, schools, and other activity centers.

The County TSP does not include any specific bicycle or pedestrian improvements in the vicinity of the school area in Bandon. Additionally, it does not include any specific roadway safety projects on US 101 in the project area, which runs along the east side of the school campus area.

CITY OF BANDON TRANSPORTATION SYSTEM PLAN (2000)

The City of Bandon Transportation System Plan (TSP) presents the investments and priorities for the City's pedestrian, bicycle, transit, motor vehicle, and other transportation systems. The goals, objectives and policy language in the 2000 TSP was updated in the **City of Bandon Transportation Refinement Plan (2010)**, which was adopted into the TSP. The TSP contains several objectives and policies which are highlighted below as being especially relevant to the SRTS planning and implementation effort:

Transportation Goal: A transportation system meeting the complete needs of individuals, businesses, and institutions for the transport of people and goods, by multiple means, in a safe, efficient and economical manner.

Objectives:

- Objective 1. To develop a system of sidewalks, walking paths, and bicycle facilities linking major areas of the community.
- Objective 2. To minimize vehicular trips to the greatest extent possible, given the practical opportunities for demand reduction and alternate modes of travel.
- Objective 3. To complete the “backbone” bicycle system, as described in the TSP as soon as possible.
- Objective 4. To complete a collector street bicycle system which provides connections among all activity centers within ten years (from 2000 adoption date).
- Objective 5. To complete the “backbone” pedestrian system, as described in the TSP as soon as possible.
- Objective 6. To complete a collector street pedestrian system which provides connections among all activity centers within ten years (from 2000 adoption date).

Policies:

- Policy 4. The City shall ensure adequate pedestrian safety by continued development of sidewalks and alternate routes for pedestrian traffic.
- Policy 5. The City shall encourage pedestrian and bicyclist safety by continued development of sidewalks, bike lanes, and in-road bike facilities, multi-use paths and alternate routes for foot and bicycle traffic.
- Policy 10. The City shall plan for, ensure development of, and maintain a local access street system at a service level and scale which:
 - A. Recognizes the multi-use functions of neighborhood streets for walking, bicycling, and social interaction, and which preserves the privacy, quiet, and safety of neighborhood living.
- Policy 10. Special consideration in the design of the transportation system shall be given to the needs of those people who have limited choice in obtaining private transportation.
- Policy 11: Bicycle and pedestrian facilities shall be provided on, or nearby, new arterials and collectors.

BICYCLE PLAN (2000 TSP)

Few roadways within the city include bicycle facilities, and the TSP states that bicycling activity in Bandon is observed as low. The Bicycle element of the TSP proposes a “backbone system” to connect identified activity centers throughout the city, including schools, and provide a safe, dedicated space to encourage more cycling in the city.

Among many projects identified to establish the system, the Bicycle Plan specifically calls for bicycle improvements along Highway 101, Franklin Ave, and 11th St, which bound the school campus area. Highway 101 and 11th St are identified as the highest priorities for bicycle system development.

PEDESTRIAN PLAN (2000 TSP)

The Pedestrian Plan element of the TSP states that, while many gaps in the sidewalk network exist throughout the City, pedestrian travel is high in Bandon and plan recommends strategically prioritizing pedestrian infrastructure improvements over bicycle improvements. The Pedestrian Plan focuses on filling sidewalks gaps on arterial and collector streets. As in the Bicycle Plan, Highway 101 and 11th St are identified as the pedestrian “backbone system”.

Sidewalk gaps along 11th Ave between Jackson Ave and Klamath Ave, which passes along the south side of the school project area, are identified as very high priority. Additionally, sidewalk gaps along Franklin Ave along the west side of the school project area are identified as high priority.

CITY OF BANDON PARKS MASTER PLAN (2017)

The purpose of the City of Bandon Parks Master Plan is to serve as a guiding philosophy as well as a practical guide for creating a parks and recreation system capable of meeting the current needs of Bandon residents. The Plan may be used in conjunction with the SRTS Plan to align objectives and coordinate future planning. The Plan includes the following goals which are relevant to the SRTS planning and implementation effort:

C.1 Park System Design

- Goals:
 - Develop a system of different types of parks, some with interconnecting trails, providing connectivity throughout the community.

C.4 Accessibility

- Goals:
 - Ensure parks are easily accessible.
 - Make park and recreation services available to all residents.
 - Comply with American Disabilities Act standards in the development of parks, recreation facilities, trails and natural areas.

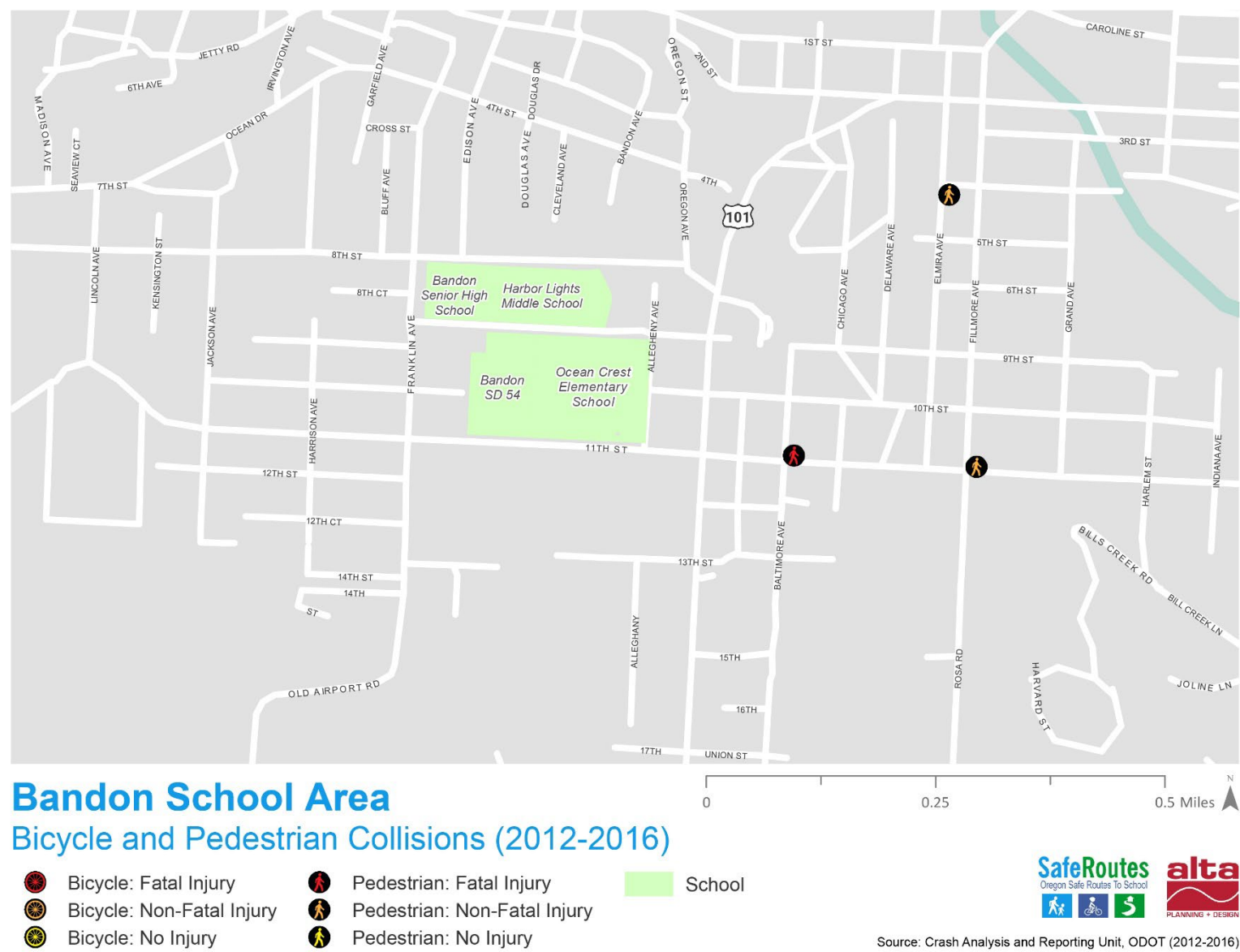
D.2 Community Involvement

- Goal:
 - Involve the community in parks and recreation facilities planning.

Crash History

Figure 1 documents the crashes involving a pedestrian or cyclist near Ocean Crest Elementary School, Harbor Lights Middle School and Bandon Senior High School from 2012 to 2016. It is important to note that this map does not include vehicle-only incidents. Furthermore, crash data do not record near misses and unreported incidents.

Figure 1. Pedestrian and Bike Crashes Near Project Area



School Attendance Area and Transportation Policies

Ocean Crest Elementary School, Harbor Lights Middle School and Bandon Senior High School are in the Bandon School District. The Bandon School District serves all students in the City of Bandon and a swath of Coos County. Currently, the City of Bandon and Bandon School District does not have any specific transportation policies in place to support walking and biking to school.

Previous SRTS Efforts or Walking/Biking Engagement Activities

At present, the City of Bandon and the Bandon School District lack the staff capacity and financial resources to create a Safe Routes to School Action Plan that will identify, prioritize and plan Safe Routes to School projects and programs. However, during the course of the school year there is instruction in traffic/pedestrian safety and responsibility of student conduct between school and home. There is currently a “flag system” in place to help raise awareness of students crossing Highway 101 east of the campus area.

Bandon Schools Virtual School Safety Assessment

The School Safety Assessment consisted of a Zoom Conference call among project partners, due to social distancing guidelines and school closures in response to the COVID-19 global pandemic. During the Virtual School Safety Assessment, the team discussed potential solutions to identified challenges with a particular focus on construction projects eligible for the ODOT SRTS Competitive Infrastructure Grant.

Date: May 11, 2020

Meeting Time: 11 am – 12 pm

Attendees:

Facilitators

- | | |
|--|--|
| <ul style="list-style-type: none">• Megan Lawrence, City of Bandon• Tim Lakey, City of Bandon• Doug Ardiana, Bandon School District• Jenna Marmon, ODOT | <ul style="list-style-type: none">• Grace Stainback, Alta Planning + Design• Kirk Paulsen, P.E., Alta Planning + Design |
|--|--|

KEY THEMES FROM OUTREACH PROCESS

- 9th Street between Franklin Ave and Highway 101 is a stretch of road that sees a lot of foot traffic from students, both along the sidewalks on either side of the street, and at many crossing points to access facilities on either side of the street. Existing crosswalks are not always used, and many travelers mistake existing speed bumps for crosswalks.
- Crossing Highway 101 at 9th St is a major point of concern for the school community. Many students use this crossing before and after school, as well as midday to access businesses on the east side of Highway 101. ODOT is in the design phase of a funded project that will install an RRFB with a pedestrian refuge island across the north leg of the intersection.
- 11th St is a major multimodal travel route for students and the City of Bandon community, connecting neighborhoods, services and the coastline. Vehicle speeding is a major point of concern for participants. The sidewalk gap on the north side of 11th St just west of Ocean Crest Elementary School is a very high priority for the City and School District. There are environmental constraints at this gap that have prevented traditional sidewalk infill.

Bike and Pedestrian Facility Inventory

The bike and pedestrian facility inventory confirmed existing infrastructure conditions and filled gaps in ODOT, City of Bandon, and Yamhill County data, focusing on all streets within a quarter mile of the school. In response to the COVID-19 global pandemic and the need for social distancing and school closures, the bike and pedestrian facility inventory was completed virtually to the best of the consultant's ability. An on-site inventory will be complete when circumstances allow for a site visit. As part of the online bike and pedestrian facility inventory, the consultant team collected the following information about general infrastructure deficiencies and needs:

- **Sidewalk deficiencies** – lack of continuity, insufficient width, poor surface condition, non-compliant cross-slopes and driveways, lack of separation from the travel lane, and obstacles (utility/light poles, signs, and vegetation)
- **School area signs and pavement markings** – presence, placement, and condition
- **Paths** – formal or informal, surface material
- **Bike lanes** – lack of continuity, insufficient width or markings, presence of on-street parking, speed and volume of traffic, poor pavement condition
- **Bicycle, scooter, and/or skateboard parking** – presence, location, visibility, degree of security, and utilization
- **Drop-off/pick-up areas** – designated areas, curb paint, and signs
- **Visibility** – insufficient pedestrian lighting, line of sight obstacles (parked cars, vegetation, signs, and poles)

The following information about street crossings was collected by the consultant during the bike and pedestrian facility inventory:

- **Traffic signals** – pedestrian signals, push-button location and reach distance, signing, countdown feature, accessible pedestrian signal feature, and sufficient crossing time.
- **Marked crosswalks** – condition, type, signs, visibility, and whether ramp is contained within crosswalk markings.
- **Curb ramps** – presence at corners, ADA-compliant design (tactile domes, ramp and flare slope, level landing).
- **Connections with neighborhood trails or paths and transit** - signage, bike parking, ease of connection to transit hubs, parks, or schools.

Deficiencies and needs identified in the bike and pedestrian facility inventory inform the construction recommendations described in Table 3 starting on page 15.

Chapter 4. Needs & Recommendations

Construction Recommendations

PHASING

The consultant team prioritized recommendations listed in in Table 3 into three time-frames: short term, medium term, and long term:

- Short Term: action to be completed in the following semester
- Medium Term: the following school year from when the Plan is being developed
- Long Term: two or more years from Plan development

Phasing is based on the community's readiness to accomplish the action, resources available, and other factors.

In response to the COVID-19 global pandemic and the need for social distancing and school closures, the recommendations included below are based on a virtual assessment of the site and are focused on short-term and medium-term construction recommendations that are eligible for ODOT SRTS Competitive Infrastructure Grant Funding. When circumstances allow for an in-person site assessment and community meeting additional recommendations will be provided, including longer-term construction recommendations, construction recommendations on school grounds, and education and encouragement recommendations that complement infrastructure improvements improve and promote safe walking and bicycling to and from school and in the community.

The construction recommendations identified below are based on:

- Existing conditions data
- Community feedback from the Online Public Input Tool
- Jurisdiction input

Table 3 lists the needs identified at each location and ensuing infrastructure recommendations, as well as the relative priority of the recommendation, a high-level cost, the agency responsible for implementing the recommendation, and the potential funding source for construction.

.

Table 3. Bandon Schools Construction Needs and Recommendations

ISSUE/ CHALLENGE	RECOMMENDATION	PRIORITY LEVEL	PLANNING LEVEL COST	RESPONSIBLE AGENCY	POTENTIAL FUNDING SOURCE
9th Street					
<i>9th St bisects the area between the three schools and several shared school buildings and amenities, resulting in student travel across the street at various points throughout the day. The existing marked crosswalks are not clearly marked; furthermore, existing speed humps are marked in such a manner that students will use these locations to cross. This results in uncertainty and safety concerns for both students crossing and vehicles traveling along the street.</i>	<i>9th St at Franklin Ave (north intersection): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the east leg of the intersection, and across the north leg of the intersection; install curb extensions with perpendicular curb ramps on the northeast and southeast corners; install curb ramp on the northwest corner.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>9th St at Franklin Ave (south intersection): Install 2' wide white thermoplastic continental crosswalk markings across the north leg of the intersection; install curb ramps on both sides. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk.</i>				
	<i>9th St at Bandon High School frontage: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across 9th St. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>Install white markings per MUTCD standards in place of the existing speed hump markings.</i>				
	<i>9th St at Harbor Light Middle School and gymnasium frontage: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings at both crosswalks.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>

ISSUE/ CHALLENGE	RECOMMENDATION	PRIORITY LEVEL	PLANNING LEVEL COST	RESPONSIBLE AGENCY	POTENTIAL FUNDING SOURCE
	<p><i>Install curb extensions and curb ramps on the north and south sides of both crosswalks. Shift the western of the two crosswalks further west (~5 ft) to avoid impact of curb extension on turning movement impacts from the parking lot on the north side of the street. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of both crosswalks.</i></p> <p><i>Install white thermoplastic pavement markings per MUTCD standards in place of the existing speed hump markings.</i></p>				
	<p><i>9th St at Allegheny Ave: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the west leg of the intersection. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk. Install curb extensions with perpendicular curb ramps at the northwest, northeast and southwest corners.</i></p> <p><i>Install white markings per MUTCD standards in place of the existing speed hump markings.</i></p>	Short-term	\$\$	City of Bandon	ODOT SRTS Competitive Grant
	<p><i>9th St at Highway 101: Coordinate with current ODOT planning processes for this intersection to align efforts.</i></p>	Medium-term	N/A	City of Bandon	N/A
Franklin Ave					
<p><i>Franklin Ave bounds the west side of the overall school area, and is a major north-south route for students</i></p>	<p><i>Franklin Ave at 8th St: Install 2' wide white thermoplastic continental crosswalk markings across the east leg of the intersection. Install</i></p>	Short-term	\$\$	City of Bandon	ODOT SRTS Competitive Grant

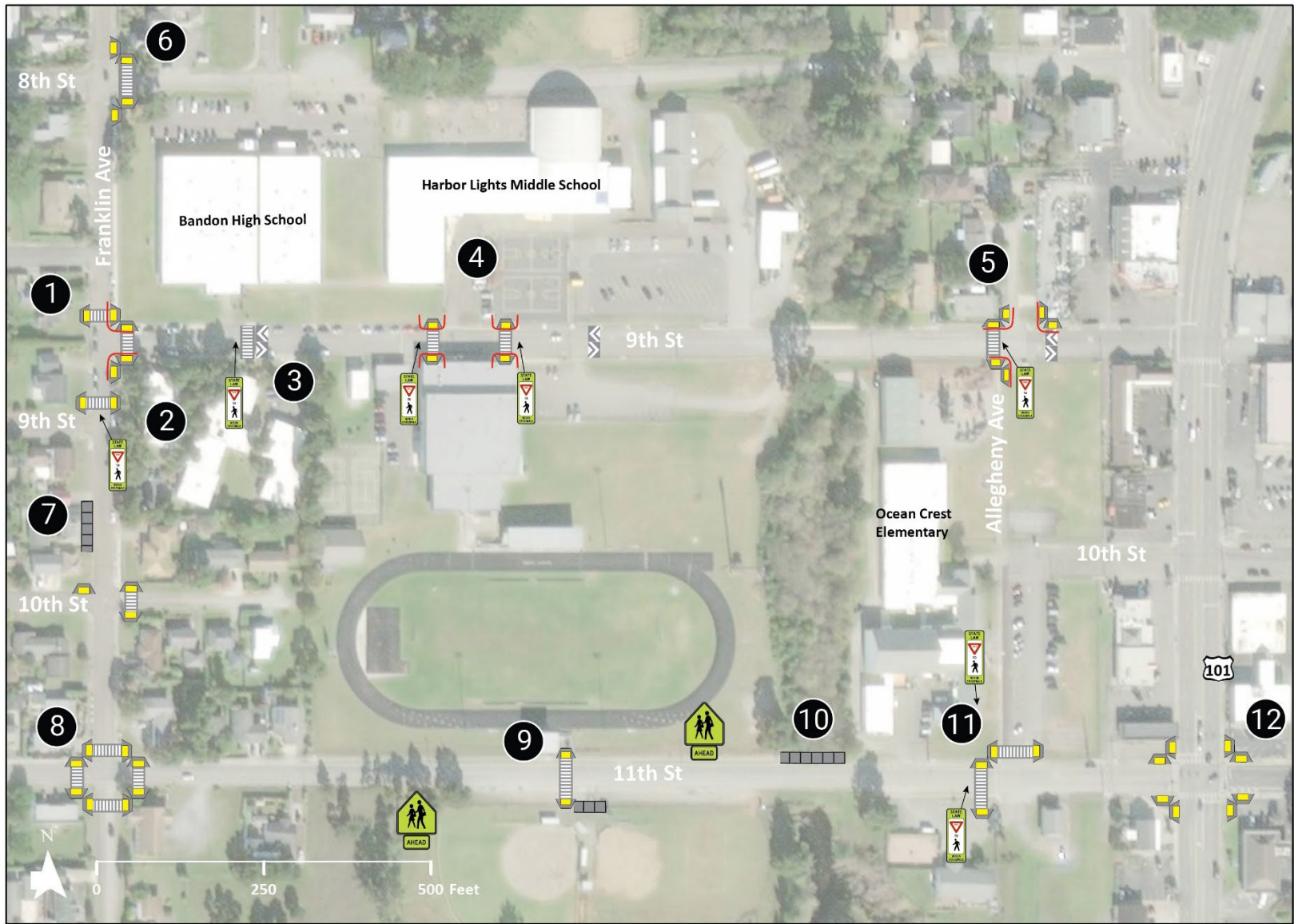
ISSUE/ CHALLENGE	RECOMMENDATION	PRIORITY LEVEL	PLANNING LEVEL COST	RESPONSIBLE AGENCY	POTENTIAL FUNDING SOURCE
<i>traveling to and from school. However, unmarked and insufficient crossings create access and safety concerns.</i>	<i>perpendicular curb ramps at the northeast and southeast corners.</i>				
	<i>Franklin Ave at 9th St: Recommendation included above.</i>	<i>N/A</i>	<i>N/A</i>	<i>N/A</i>	
	<i>Franklin Ave between 9th St and 10th St: Fill in sidewalk gap on the west side of Franklin Ave (approximately 60 ft) and install a curb ramp on the northwest side of the intersection of Franklin Ave and 10th St.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>Franklin Ave at 10th St: Install 2' wide white thermoplastic continental crosswalk markings across the east leg of the intersection. Install perpendicular curb ramps at the northeast and southeast corners.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>Franklin Ave at 11th St: Install 2' wide white thermoplastic continental crosswalk markings across all four legs of the intersection. Install perpendicular curb ramps at all four corners.</i> <i>As an alternative to curb extensions, consider a pedestrian refuge island or raised crosswalks on the west and east sides of the intersection.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
11th Street					
<i>11th St bounds the south side of the overall school area, includes access to sports fields to the south, and is a major east-west route for students traveling to and from school. It is also a major vehicle travel route for the City of Bandon, connecting neighborhoods, services and</i>	<i>11th St at Jackson Ave: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the north leg of the intersection. Install curb ramps at the northwest and northeast corners.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>

ISSUE/ CHALLENGE	RECOMMENDATION	PRIORITY LEVEL	PLANNING LEVEL COST	RESPONSIBLE AGENCY	POTENTIAL FUNDING SOURCE
<i>the coastline. However, observed speeding and unmarked crossings create safety concerns</i>	<i>11th St at Harrison Ave: Install 2' wide white thermoplastic continental crosswalk markings across the north leg of the intersection. Install perpendicular curb ramps with tactile domes at the northwest and northeast corners.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>11th St at Franklin Ave: Recommendation included above.</i>	<i>N/A</i>	<i>N/A</i>	<i>N/A</i>	
	<i>11th St at track field (midblock): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across 11th St. Install curb ramps on the north and south side of the crosswalk. Construct approximately 30 feet of sidewalk/path along the south side of 11th St to connect the crossing with the existing paved pathway onto the athletic fields. Install complete Advance School Crossing Assemblies (S1-1 & W16-9P) in advance of the crossing.</i>	<i>Medium-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>11th St at Ocean Crest Elementary School Frontage: Option 1: Fill in the sidewalk gap on the north side of the street (approximately 85 feet). Due to environmental constraints, consider a raised platform or pedestrian bridge.</i>	<i>Medium-term</i>	<i>\$\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>11th St at Ocean Crest Elementary School Frontage: Option 2: Alternatively, address environmentally constrained sidewalk gap with more protection for pedestrians that currently walk in the street. Use</i>	<i>Short-term</i>	<i>\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>

ISSUE/ CHALLENGE	RECOMMENDATION	PRIORITY LEVEL	PLANNING LEVEL COST	RESPONSIBLE AGENCY	POTENTIAL FUNDING SOURCE
	<i>white paint and flexible bollards to mark the area (approximately 85 feet) where students presently travel into the street to pass. Consider incorporating a student art project to create a mural design for the walking space to encourage visibility and use.</i>				
	<i>11th St at Ocean Crest Elementary School Frontage: Remove existing midblock crosswalk and retain the crosswalk 150 feet to the east (at the vehicle circulation egress), which serves as a more direct route to the school for students.</i>	<i>Short-term</i>	<i>\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>11th St at Allegheny Ave (Ocean Crest Elementary School vehicle egress): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings on the west and north legs of the intersection. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk on the west leg of the intersection. Install perpendicular curb ramps at the northwest, southwest and northeast corners.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>11th St at Highway 101: Install perpendicular curb ramps at all four corners of the intersection.</i>	<i>Medium-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>
	<i>11th St at Alabama Ave: Install 2' wide white thermoplastic continental crosswalk markings across all four legs of the intersection. Install perpendicular curb ramps at all four corners.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>

ISSUE/ CHALLENGE	RECOMMENDATION	PRIORITY LEVEL	PLANNING LEVEL COST	RESPONSIBLE AGENCY	POTENTIAL FUNDING SOURCE
	<i>11th St at Baltimore Ave: Install 2' wide white thermoplastic continental crosswalk markings across all fours legs of the intersection. Install perpendicular curb ramps at all four corners.</i>	<i>Short-term</i>	<i>\$\$</i>	<i>City of Bandon</i>	<i>ODOT SRTS Competitive Grant</i>

Figure 2. City of Bandon SRTS Construction Improvements Map



Map produced May 2020

- 1

9th St at Franklin Ave (north intersection): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the east leg of the intersection, and across the north leg of the intersection; install curb extensions with perpendicular curb ramps on the northeast and southeast corners; install curb ramp on the northwest corner.
- 2

9th St at Franklin Ave (south intersection): Install 2' wide white thermoplastic continental crosswalk markings across the north leg of the intersection; install curb ramps on both sides. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk.
- 3

9th St at Bandon High School frontage: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across 9th St. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk. Install white markings per MUTCD standards in place of the existing speed hump markings.
- 4

9th St at Harbor Light Middle School and gymnasium frontage: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings at both crosswalks. Install curb extensions and curb ramps on the north and south sides of both crosswalks. Shift the western of the two crosswalks further west (~5 ft) to avoid impact of curb extension on turning movement impacts from the parking lot on the north side of the street. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of both crosswalks. Install white thermoplastic pavement markings per MUTCD standards in place of the existing speed hump markings.
- 5

9th St at Allegheny Ave: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the west leg of the intersection. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk. Install curb extensions with perpendicular curb ramps at the northwest, northeast and southwest corners. Install white markings per MUTCD standards in place of the existing speed hump markings.
- 6

Franklin Ave at 8th St: Install 2' wide white thermoplastic continental crosswalk markings across the east leg of the intersection. Install perpendicular curb ramps at the northeast and southeast corners.
- 7

Franklin Ave between 9th St and 10th St: Fill in sidewalk gap on the west side of Franklin Ave (approximately 60 ft) and install a curb ramp on the northwest side of the intersection of Franklin Ave and 10th St.
Franklin Ave at 10th St: Install 2' wide white thermoplastic continental crosswalk markings across the east leg of the intersection. Install perpendicular curb ramps at the northeast and southeast corners.
- 8

Franklin Ave at 11th St: Install 2' wide white thermoplastic continental crosswalk markings across all four legs of the intersection. Install perpendicular curb ramps at all four corners.
As an alternative to curb extensions, consider a pedestrian refuge island or raised crosswalks on the west and east sides of the intersection.
- 9

11th St at track field (midblock): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across 11th St. Install curb ramps on the north and south side of the crosswalk. Construct approximately 30 feet of sidewalk/path along the south side of 11th St to connect the crossing with the existing paved pathway onto the athletic fields. Install complete Advance School Crossing Assemblies (S1-1 & W16-9P) in advance of the crossing.
- 10

11th St at Ocean Crest Elementary School Frontage:
Fill in the sidewalk gap on the north side of the street (approximately 85 feet). Due to environmental constraints, consider a raised platform or pedestrian bridge.
Remove existing midblock crosswalk and retain the crosswalk 150 feet to the east (at the vehicle circulation egress), which serves as a more direct route to the school for students.
- 11

11th St at Allegheny Ave (Ocean Crest Elementary School vehicle egress): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings on the west and north legs of the intersection. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk on the west leg of the intersection. Install perpendicular curb ramps at the northwest, southwest and northeast corners.
- 12

11th St at Highway 101: Install perpendicular curb ramps at all four corners of the intersection.

This page intentionally left blank.

High Priority Improvements for the ODOT Infrastructure Grant Application

The following are top priority improvements recommended for the Competitive ODOT SRTS IN Grant Application:

ISSUE/ CHALLENGE	RECOMMENDATION
<i>9th St bisects the area between the three schools and several shared school buildings and amenities, resulting in student travel across the street at various points throughout the day. The existing marked crosswalks are not clearly marked; furthermore, existing speed humps are marked in such a manner that students will use these locations to cross. This results in uncertainty and safety concerns for both students crossing and vehicles traveling along the street.</i>	<p><i>9th St at Franklin Ave (north intersection): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the east leg of the intersection, and across the north leg of the intersection; install curb extensions with perpendicular curb ramps on the northeast and southeast corners; install curb ramp on the northwest corner.</i></p> <p><i>9th St at Franklin Ave (south intersection): Install 2' wide white thermoplastic continental crosswalk markings across the north leg of the intersection; install curb ramps on both sides. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk.</i></p> <p><i>9th St at Bandon High School frontage: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across 9th St. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk. Install white markings per MUTCD standards in place of the existing speed hump markings.</i></p> <p><i>9th St at Harbor Light Middle School and gymnasium frontage: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings at both crosswalks. Install curb extensions and curb ramps on the north and south sides of both crosswalks. Shift the western of the two crosswalks further west (~5 ft) to avoid impact of curb extension on turning movement impacts from the parking lot on the north side of the street. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of both crosswalks. Install white thermoplastic</i></p>

ISSUE/ CHALLENGE	RECOMMENDATION
	<p><i>pavement markings per MUTCD standards in place of the existing speed hump markings.</i></p> <p><i>9th St at Allegheny Ave: Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings across the west leg of the intersection. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk. Install curb extensions with perpendicular curb ramps at the northwest, northeast and southwest corners. Install white markings per MUTCD standards in place of the existing speed hump markings.</i></p>
<p><i>11th St bounds the south side of the overall school area, includes access to sports fields to the south, and is a major east-west route for students traveling to and from school. It is also a major vehicle travel route for the City of Bandon, connecting neighborhoods, services and the coastline. However, observed speeding and unmarked crossings create safety concerns. The sidewalk gap near the Ocean Crest Elementary School egress is a high-priority concern.</i></p>	<p><i>11th St at Ocean Crest Elementary School Frontage:</i></p> <p><i>Option 1: Fill in the sidewalk gap on the north side of the street (approximately 85 feet). Due to environmental constraints, consider a raised platform or pedestrian bridge.</i></p> <p><i>Option 2: Provide more protection for pedestrians that currently walk in the street. Use white paint and flexible bollards to mark the area (approximately 85 feet) where students presently travel into the street to pass.</i></p> <p><i>11th St at Ocean Crest Elementary School Frontage: Remove existing midblock crosswalk and retain the crosswalk 150 feet to the east (at the vehicle circulation egress), which serves as a more direct route to the school for students.</i></p> <p><i>11th St at Allegheny Ave (Ocean Crest Elementary School vehicle egress): Install 2' wide white thermoplastic continental crosswalk markings in place of the existing markings on the west and north legs of the intersection. Install bi-directional in-street Pedestrian Crossing signs (R1-6c) in advance of the crosswalk on the west leg of the intersection. Install perpendicular curb ramps at the northwest, southwest and northeast corners.</i></p>

Additional details that will be needed to complete the application are provided in Table 4.

Table 4. Project Details for ODOT Competitive Infrastructure Grant

GRANT CRITERIA/QUESTION	RESPONSE FOR CITY OF BANDON
<i>Relevant Right of Way ownership</i>	<i>Potential need to coordinate with Bandon School District regarding sidewalk gap on 11th St regarding project location and feasibility for grant eligibility.</i>
<i>Utility implications and opportunities to mitigate</i>	<i>N/A</i>
<i>Environmental resource implications</i>	<i>Potential need to address constraints regarding sidewalk gap on 11th St.</i>
<i>Stormwater management implications</i>	<i>Potential need to address constraints regarding sidewalk gap on 11th St.</i>
<i>Near a rail road? Or bridge, tunnel, retaining wall affected?</i>	<i>N/A</i>
<i>AADT</i>	<i>AADTs needed for: 9th St 11th St</i>
<i>Priority Safety Corridor</i>	<i>No</i>

Table 5. Competitive Grant Cost Estimates

ITEM DESCRIPTION	MEASUREMENT	COST/UNIT	UNITS	ESTIMATE
Removal of pavement symbol markings.	SF	\$3	1002	\$3,006
Install 9 marked crosswalks with thermoplastic continental markings.	SF	\$8	1170	\$9,360
Install warning sign assembly associated with school crossing.	EA	\$1,000	10	\$10,000
Install curb extension with ramps.	EA	\$15,000	11	\$165,000
Remove existing catch basin.	EA	\$500	2	\$1,000
Install catch basin.	EA	\$3,000	6	\$18,000
Install perpendicular curb ramp.	EA	\$10,000	5	\$50,000
Install in-street school sign.	EA	\$500	6	\$3,000
Install 8 thermoplastic speed hump pavement markings.	SF	\$8	120	\$960
Option 1: Install pedestrian bridge.	SF	\$150	680	\$102,000
Option 2: Protected in-street walking path.	LF	\$25	85	\$2,125
Traffic Mobilization (10%)	EA	\$36,445	1	\$36,445
Traffic Control (15%)	EA	\$54,668	1	\$54,668
Erosion Control (2%)	EA	\$7,289	1	\$7,289
			Subtotal	\$462,853
Total Costs				
Preliminary Engineering/Design Costs (12%)				\$55,542
Construction Costs (Subtotal + 40% Contingency + 15% CE)				\$717,422
Right of Way Costs				\$0
Utility Costs				\$0
Other Costs				\$0
Total Project Cost:				\$772,964

This page intentionally left blank.

Chapter 5. Potential Funding & Implementation

This chapter lists a variety of funding sources that the City of Bandon, Yamhill County, Bandon School District, or other partners could use to implement the recommendations outlined in Chapter 4. These funding sources are accurate as of May 2020, but may change over time. Please refer to ODOT or other funding jurisdictions' websites for the most up to date information.

Statewide Funding Opportunities

ODOT SRTS Infrastructure Grants:

ODOT currently offers specific Safe Routes to School funding pools for local jurisdictions interested in improving walking and biking conditions near schools, including a competitive infrastructure grant program and a rapid response infrastructure grant.

COMPETITIVE INFRASTRUCTURE GRANT

ODOT's SRTS Competitive Infrastructure Grant program funds roadway safety projects located within a one-mile radius of an educational facility that improves walking and biking conditions for children on their way to school. Funding requests may range between \$60,000 and \$2 million, with a 40% local match (special circumstances may allow a 20% reduction in match requirements). These funds are awarded on a competitive application basis to cities, counties, transit districts, ODOT, any other roadway authority, and tribes are in compliance with existing jurisdictional plans and receive school or school district support.

Learn more about the 2021-2022 grant cycle at

<https://www.oregon.gov/ODOT/Programs/Pages/SRTS.aspx>.

RAPID RESPONSE INFRASTRUCTURE GRANT

Up to 10% of state SRTS funding will be reserved for projects that can demonstrate serious and immediate need for safety improvements within a one-mile radius of schools. This funding would be awarded outside of the Competitive Infrastructure Grant cycle as a Rapid Response Infrastructure Grant. Eligibility requirements for Rapid Response Infrastructure grants can be found at

<https://www.oregon.gov/ODOT/Programs/Pages/SRTS.aspx>.

ODOT STIP Program

Outside of Safe Routes to School programs, ODOT offers general funding opportunities for bicycle and pedestrian improvement projects through the development of ODOT's State Transportation Improvement Program (STIP), which programs funding for three years. Proposed projects in Newberg should be nominated in coordination with ODOT's Region 2 office. To be eligible for STIP funding, projects must be included an adopted Transportation System Plan. The draft 2021-2024 STIP includes roughly \$115 million for walking and biking projects. Programs include

Active Transportation Leverage, which adds walking or biking features to Fix-It projects, and ADA Curb Ramps, to boost accessibility of pedestrian infrastructure.

Learn more: <http://www.oregon.gov/ODOT/STIP/> and find contact info for your ODOT region at www.oregon.gov/ODOT/STIP/Pages/Contacts.aspx

ODOT All Roads Transportation Safety Program (ARTS)

ODOT's STIP process also funds safety improvement projects that reduce traffic related deaths and injuries through the All Roads Transportation Safety Program, which utilizes data collection and analysis to select projects that will maximize traffic safety benefits per investment dollar. For more information on ARTS, visit:

<https://www.oregon.gov/ODOT/Engineering/Pages/ARTS.aspx>.

Oregon Parks and Recreation Grants

Oregon Parks and Recreation manage a number of grants that may help in completing a Safe Routes to School off-road project like the Local Government Grant Program, the Land and Water Conservation Fund, and the Recreational Trails Program. For more information visit:

<https://www.oregon.gov/OPRD/GRANTS/pages/index.aspx>

Oregon Community Paths Program (OCP)

In 2020, ODOT will open solicitation for an off-system path grant program called the Oregon Community Paths Program (OCP) and will fund awarded projects (in 2021) with either the state Multimodal Active Transportation fund or the federal Transportation Alternatives Program funds. Through the OCP, ODOT strives to fund projects for pedestrian and bicycle transportation projects including the development, construction, reconstruction, resurfacing, or other capital improvement of multiuse paths, bicycle paths, and footpaths that improve access and safety for people walking and bicycling.

Oregon Transportation Infrastructure Bank (OTIB)

Oregon Transportation Infrastructure Bank (OTIB) provides low cost loans for transportation related projects by: reducing total up-front costs; reducing overall interest costs; no prepayment penalties; draw funds only as needed. OTIB loans are processed quickly and a decision is typically received within 60 days, with loan closing between 90-120 days. www.oregon.gov/odot/cs/fs/pages/otib.aspx

State Highway Trust Fund/Bicycle Bill

When roads are constructed or reconstructed, Oregon law requires walkways and bikeways be provided. Additionally, all agencies receiving State Highway Funds are required to spend at least 1% of those funds on bicycle and/or pedestrian infrastructure improvements (ORS 366.514). Currently, cities and counties receive 20% and 30% of the state's highway trust funds, respectively, which can be used for walking and biking projects along roads. For more information contact Jessica Horning, (503) 986-3555.

Sidewalk Improvement Program (SWIP)

ODOT's SWIP builds pedestrian and bicycle facilities on state roads and local roads that help people moving across or around the state system. For more information contact Jessica Horning, (503) 986-3555.

Transportation and Growth Management (TGM) Funds

TGM offers grants for improving transportation system plans and planning efforts that integrate land use and transportation. TGM also offers Quick Response grants when pending development will impact the city's goals, Code Assistance to help with specific code questions, Transportation System Plan (TSP) Assessments to look at city TSPs, and Education and Outreach projects to move community conversations forward. www.oregon.gov/lcd/tgm/

State Transportation Improvement Fund (STIF)

Walking and biking connections to transit are eligible under ODOT's STIF Discretionary and Statewide Network Program, a new fund for transit started in 2018.

<https://www.oregon.gov/odot/RPTD/Pages/Funding-Opportunities.aspx>

Congestion Mitigation and Air Quality (CMAQ) program

The CMAQ program is jointly administered by the FHWA and FTA, with projects selected by local jurisdictions in high pollution areas. Bike/pedestrian projects make up a significant portion of the funded projects, which must focus on air quality improvement. www.fhwa.dot.gov/environment/air_quality/cmaq/

Federal Funds

Some federal funding sources may be available to certain communities and can be used for Safe Routes to School projects. Such as:

- Community Development Block Grant Program, <https://www.orinfrastructure.org/Infrastructure-Programs/CDBG/>
- Rural Development Grant Assistance Program, <https://www.usda.gov/topics/farming/grants-and-loans>

Local Funding Opportunities

Potential School Bond Opportunities

Localities can leverage school bonds to collect funding for transportation educational programming and school-zone pedestrian/bicycle infrastructure improvements. School bonds may be sufficient to cover the cost of low to mid cost projects or could be utilized to collect local match dollars for state awarded grants.

SRTS Projects & the TSP

Cities and counties undergoing transportation system plan updates should consider including a section on their plans and priorities for Safe Routes to School infrastructure upgrades and programming to identify project expenses well in advance and allow ample time to gather project funding.

Demonstration Projects

Demonstration projects are temporary roadway improvement installments that utilize temporary barriers (such as traffic cones, planters, hay barrels, etc.) to test and demonstrate how a street would operate with bicycle and/or pedestrian infrastructure improvements. These low-cost projects can serve as an immediate term temporary solution to traffic issues while local jurisdictions build support and funding for permanent infrastructure

improvements. Depending on specific site conditions and the nature of materials used, demonstration projects can last for several hours to several months.

Non-Infrastructure Programs Funding Opportunities

ODOT SRTS Non-Infrastructure Grant

In addition to funding infrastructure improvements for Safe Routes to School programs, ODOT reserves \$300,000 annually for funding of non-infrastructure SRTS projects that encourage children in grades K-8 to walk and bike to school. This competitive grant program distributes funding to a project over the course of three years (to allow for advanced planning) with a maximum award of \$50,000 per year with a 12% match requirement. For more information, visit <https://www.oregon.gov/ODOT/Programs/Pages/SRTS.aspx>