

Patterson Elementary

Safe Routes to School Action Plan



Patterson Elementary

Safe Routes to School Action Plan

CONTENTS

Introduction

What is Safe Routes to School	3
School Information	4

Existing Conditions

District Transportation Policy	5
District Supplemental Transportation Plan	5
Patterson Attendance Area	5
Patterson Walk Boundary and Suggested Walk Path	6

Evaluation and Data Collection

Student Travel Surveys	7
Parent Surveys	8
Walk Audit	14
Speed and Traffic Counts	14
Parent and Staff Meetings	14

Recommendations 15

Next Steps 19

Appendix 20

Introduction

WHAT IS SAFE ROUTES TO SCHOOL? The City of Hillsboro Safe Routes to School (SRTS) Program works to promote and support the use of safe, healthy and active transportation (like walking and biking) to and from school. The benefits of walking and biking include increased daily physical activity, enhanced student alertness and readiness to learn, improved air quality around the school, and reduced vehicle congestion at and around the school. According to a [2009 school travel study](#), a generation and a half ago, almost 50% of students nationally walked or biked to school. In 2009, approximately 13% of students nationally were using active transportation to get to school. This decrease in walking or biking to school occurred in just a generation and a half.¹ The City of Hillsboro SRTS Coordinator is working with each school to develop a comprehensive SRTS Program specific to each school’s unique context and environment to help increase the number of students walking and biking to/from school.

The principles of the SRTS Program are outlined nationally by the “Six E’s,” which include:

Equity – Reduce health and wealth disparities by providing equitable services in all school communities.

Education – Students learn lifelong safety behaviors and skills, while parents can learn about the benefits of active transportation and safe travel for students to school.

Encouragement – Parents and students are invited to engage in biking and walking events and activities that promote healthy and active transportation options.

Enforcement – Promote safe walking and biking through consistent enforcement of traffic laws around schools.

Engineering – Implement engineering improvements such as new sidewalks, improved crossings, and other traffic calming devices to enhance students’ safety as they walk or bike to school.

Evaluation --Survey parents and students regarding modes of travel to and from school, assess the neighborhood travel routes, and drop-off and pick-up processes at the school; as well as evaluate the success of the SRTS Program as a whole.

This Action Plan identifies barriers or challenges to walking or biking to Patterson Elementary School and identifies the potential engineering and programmatic strategies to address those barriers. The Action Plan is available for use by the city, the Patterson SRTS Project Team, the Hillsboro School District, parents, students and community members as a framework to guide Patterson’s work on SRTS.

Safe Routes to School Goals

1. Increase the number of students walking or biking to school
2. Reduce the number of driving trips to schools
3. Improve traffic and environmental factors around schools
4. Identify barriers and possible solutions to safe, active commuting

¹ [http://www.ajpmonline.org/article/S0749-3797\(11\)00263-7/pdf](http://www.ajpmonline.org/article/S0749-3797(11)00263-7/pdf)

SCHOOL INFORMATION

School Name: Patterson Elementary
School Address: 261 NE Lenox Street, Hillsboro, Oregon 97124
County: Washington County
School District: Hillsboro School District
School Website: <https://www.hsd.k12.or.us/patterson>
Enrollment (2019): 480
Enrollment by Grade (2017): K-48; 1-55; 2-60; 3-49; 4-41; 6-55
Free/Reduced Lunch (2016/2017): 20.1% of students are eligible for free or reduced lunch
Action Plan Contact: Bernadette Le, SRTS@hillsboro-oregon.gov
503-681-6146

THE PROJECT TEAM

School Principal: Jamie Lentz
Parent Representatives: Melissa Ashby
Mindy Mellom
Michelle Mitchell
Martha Gilbert
Shelby Bird
School Resource Officer: Adela Rios
Safe Routes to School Coordinator: Bernadette Le

Existing Conditions

District Transportation Policy

Students in grades kindergarten through 6th grade who live less than a mile from the school are encouraged to walk, bike, or carpool to school each day. In cases where the student lives more than 1 mile from the school, the Hillsboro School District’s preferred method of travel is by school bus.

District Supplemental Transportation Policy

The Supplemental Transportation Plan provides buses to transport students inside Oregon’s unfunded walking distances, which is 1 mile for elementary school students and 1.5 miles for middle school students, because of hazardous conditions. Hazardous conditions are defined as difficult crossings, limited infrastructure, crossing railroad tracks, freeway crossings, and high volume and high speed roadways.

School Attendance Area

The Patterson Elementary is located in northern Hillsboro. Its attendance area boundary is displayed in Figure 1.

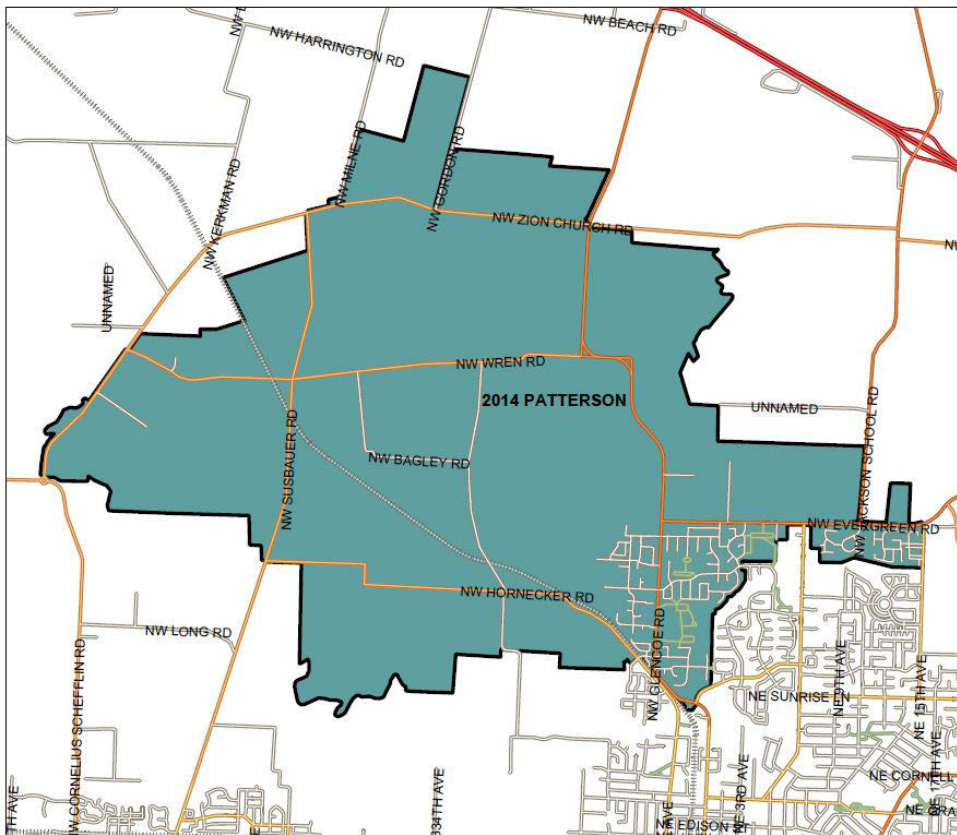


Figure 1: Patterson Attendance Area

Patterson Walk Boundary and Suggested Walk Paths

The walking boundary of Patterson Elementary, set by the school district, is well under the 1 mile distance identified in the school district standard transportation policy. The school district uses the supplemental transportation policy to reduce the walk boundary due to factors including high volume and speed roadways as well as difficult crossings.

The walking paths, located within the walk boundary, were identified in coordination with the school district, county, and city prior to the beginning of this project.

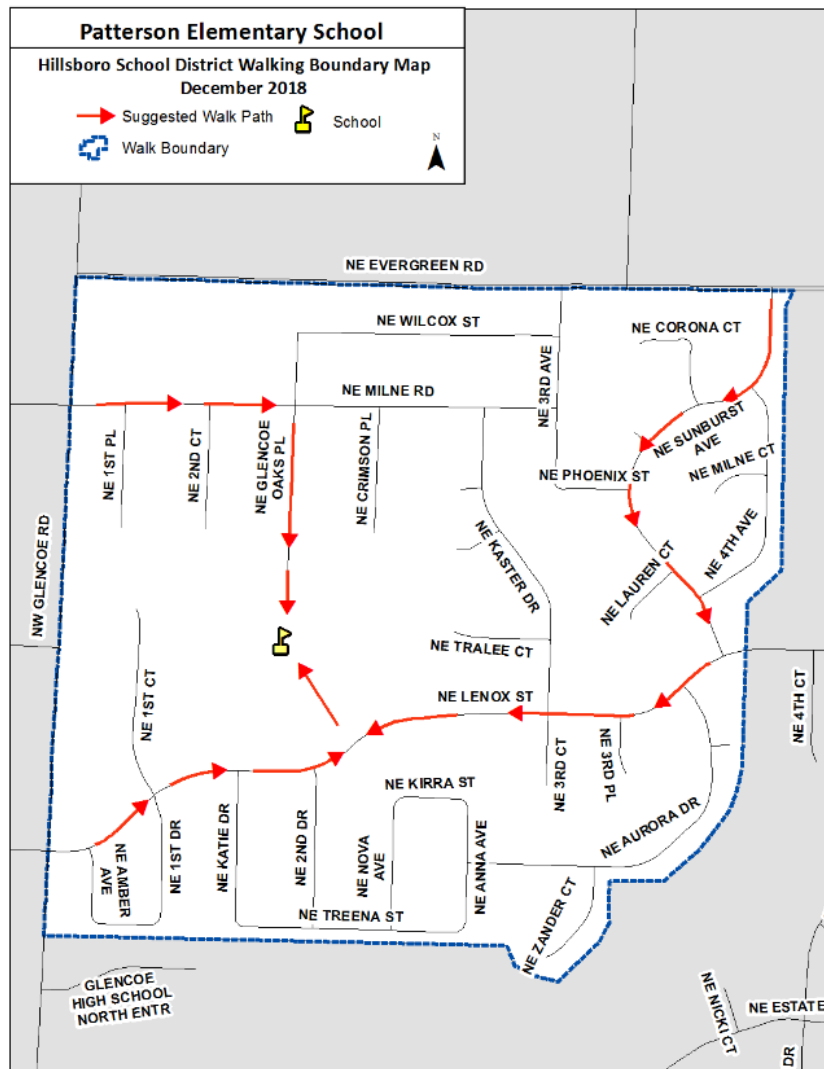
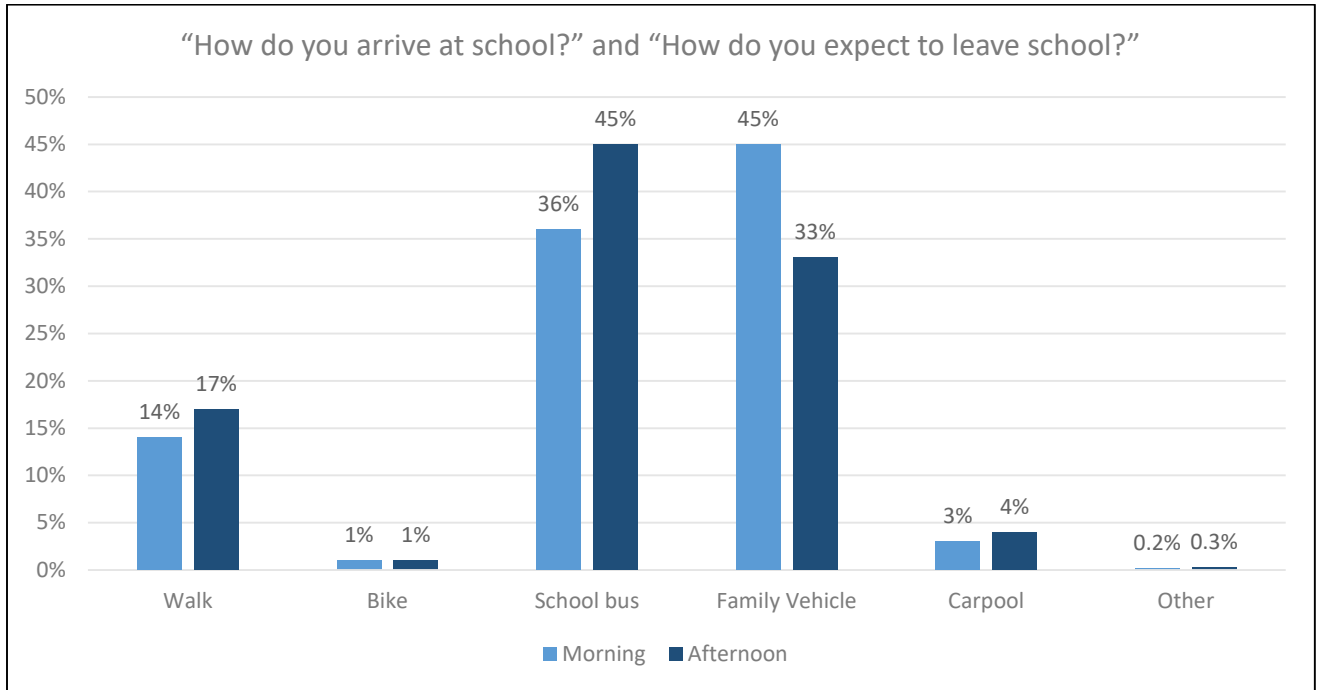


Figure 2: Patterson Walk Boundary

EVALUATIONS AND DATA COLLECTION

Student Travel Data

In 2019, student surveys were conducted to collect information about how students get to and from school using the in-class “hand raise” Student Travel Tally questionnaire from the National Center for Safe Routes to School. Teachers asked students for 2 or 3 mornings how they arrived at school and how they planned to leave school that afternoon. The results of this tally are below. This data will be used as a baseline with a recommendation to repeat the survey on an annual basis.



Data Observations

Staff noted the following characteristics about reported travel choice:

- The percentage of students walking to school in the morning and afternoon slightly exceeds the national average (14 and 17% compared to 13%)².
- Over a third of students are riding the bus in the morning and almost half in the afternoon.
- More students are being driven in the morning than in the afternoon.
- All students receive bus service or live in the walk boundary. Directing outreach to families that drive their student(s) to school will create opportunity to decrease the number of personal vehicle trips.

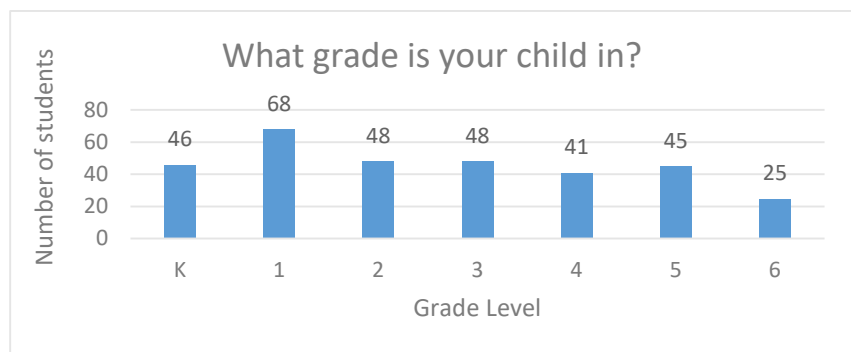
² “The Decline of Walking and Bicycling”. Pedestrian and Bicycling Information Center.
http://guide.saferoutesinfo.org/introduction/the_decline_of_walking_and_bicycling.cfm

Parent Surveys

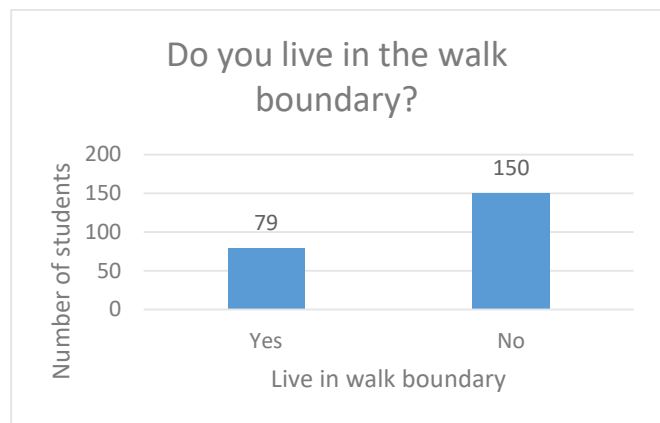
In addition to the Student Travel Data tallies, the City conducted a Parent Survey to gather information about how students get to and from school and to learn about concerns and issues related to walking and biking to school. The City worked with the school to send home surveys with all 470 students. Parents were asked to return one survey per household. Upon receiving a completed survey, the school gave an incentive to each school aged student in the family. The incentives were provided by the City. Two hundred twenty-nine (229) surveys were returned.

The survey asked parents a series of nine questions related to if they live in the walk boundary, the mode of travel the students use traveling to and from school, the comfort level the parents have with their students walking and biking to school, and concerns they have with their students walking and rolling to school.

Parents were asked to submit one survey per family and indicate the grade(s) their students attended. The responses were evenly distributed across most grades with the exception a higher number of first grade students and lower number of 6th grade students.



The majority of families that responded to this survey lived outside of the walk boundary. The high number of bus eligible families responding to the survey is not unexpected as a large portion of Patterson's attendance area receives either standard or supplemental bus service. This data was used to sort the responses of families by area and identify travel patterns and common concerns.

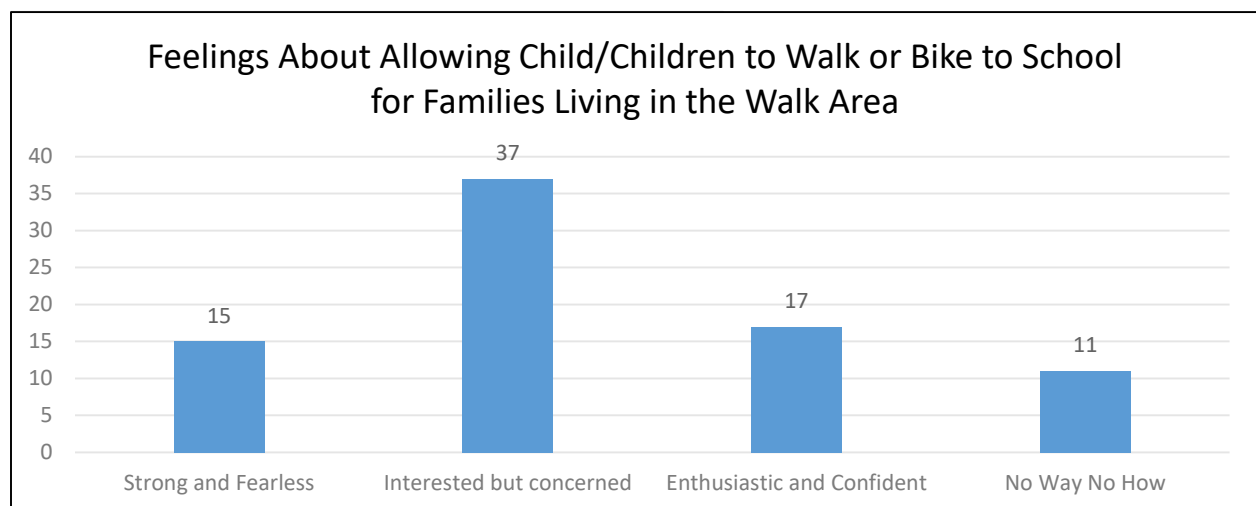
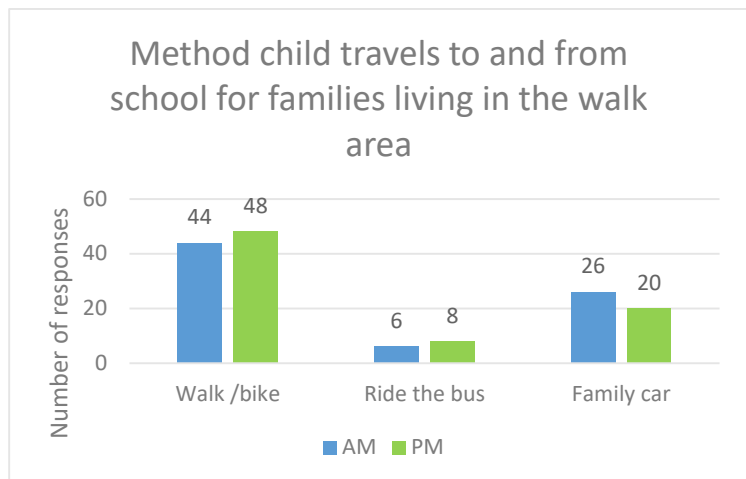
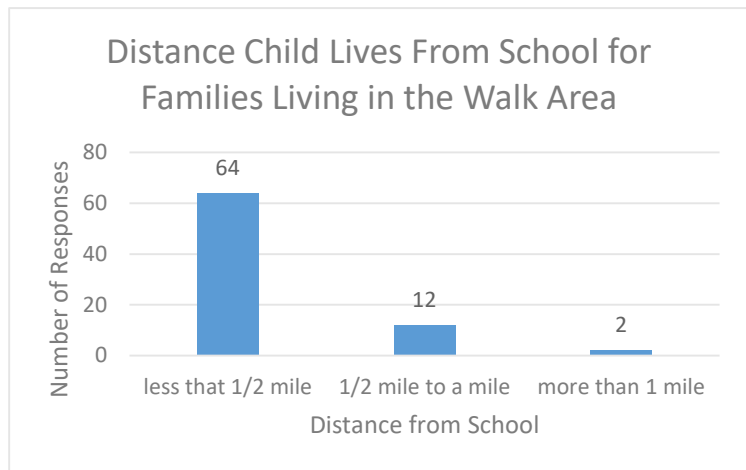


Families Living in the Walk Area

The parent survey data was filtered to determine the traveling characteristics, comfort level, and concerns of families living inside the walk boundary. The majority of responding families that lived inside the walk boundary lived less than a half mile of the school while a few lived over a half mile to a mile away from the school.

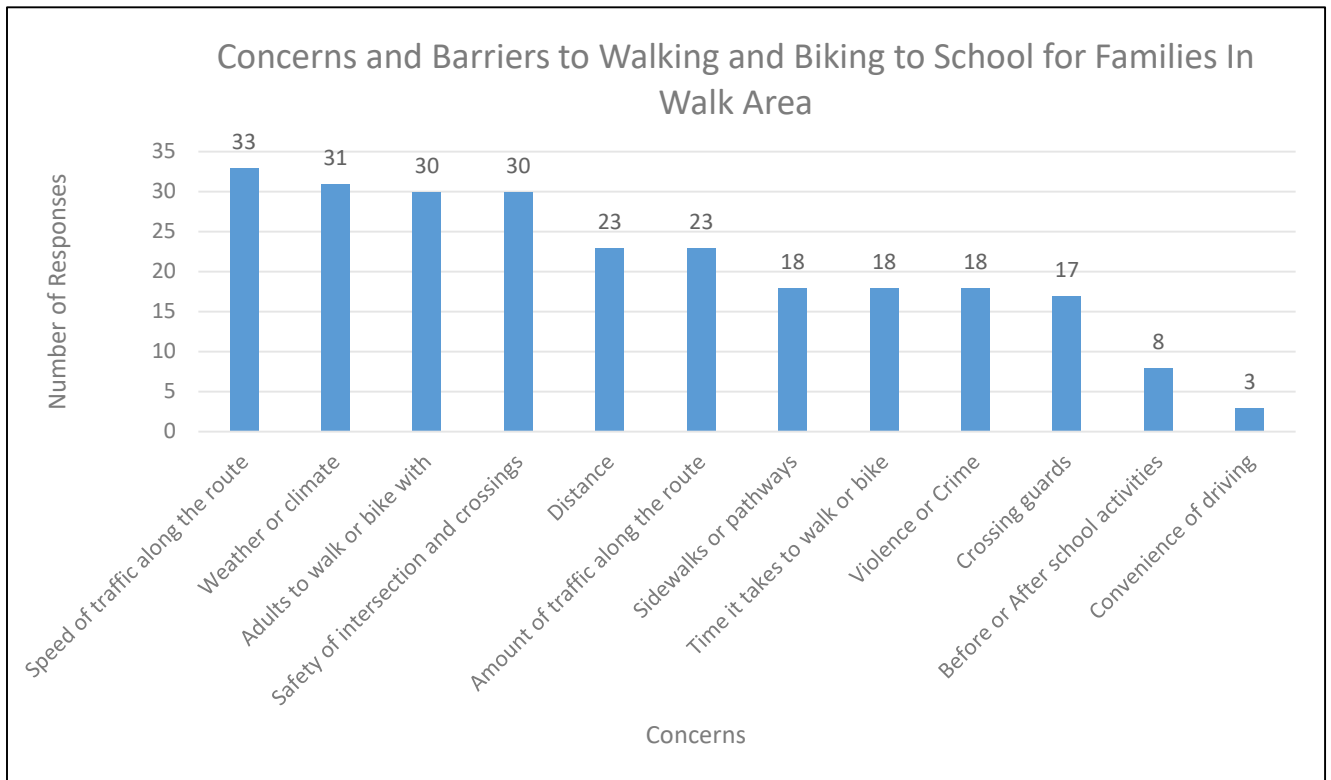
Parents were asked “On most days, how does your child get to school and how does your child leave school?”. While most families indicated that they walk or bike to and from school, slightly more families drive their students in the morning and slightly more students walk or bike in the afternoon.

Using a scale called “Level of Stress” parents were asked to identify how they felt about allowing their child to walk or bike to school. The highest number of respondents answered that they were “Interested but Concerned” and “Enthusiastic and Confident”. A high number of responses in these two categories is encouraging as it represents those who might be convinced to walk or bike in the future.



Parents were also asked to identify all the issues that affect their decision to let their child walk or bike to school. Because multiple responses were allowed, the totals are greater than the number of respondents. The top four responses were:

- Speed of traffic along the route
- Weather or climate
- Adults to walk or bike with
- Safety of intersections and crossings



Finally, the parents were asked about specific intersections, crosswalks or other aspects of the walk route that concern them. The following concerns were listed:

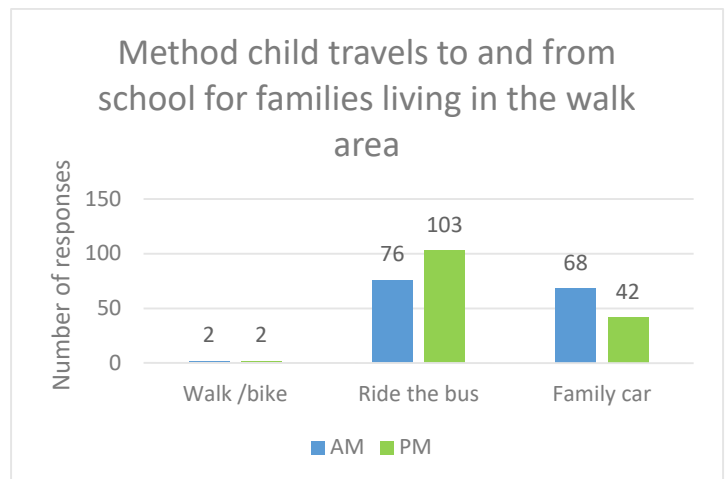
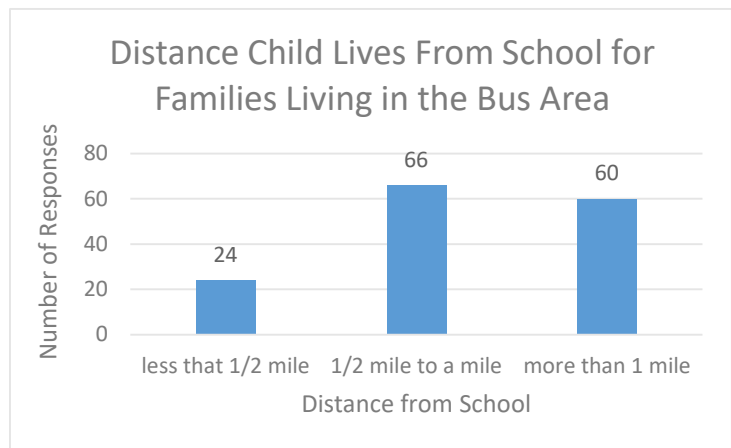
- Lenox Street (12)
 - Speed, driver behavior, or traffic volume on Lenox Street (7)
 - NE Lenox Street and NE 2nd Drive (1) – specific concern not stated
 - Sidewalk on NE Lenox Street between NE 1st Court and School has some large uneven sections. (1)
 - Crossing NE Lenox Street
 - No specific intersection (1)
 - In front of school (2)

- Crossing guard was requested at NE Lenox Street and NE Kaster Drive. (1)
- NE Milne Road (5)
 - NE Glencoe Oaks Place and NE Milne Road was mentioned specifically by 4 individuals and one person requested a crossing guard at this location.
- NE Sunburst Ave (4)
 - Speed on Sunburst Ave (3).
 - One person also mentioned concern about crossing the street due to speed and curves.
- Crossing NE Kaster Drive. (2)

Families Living in the Bus Service Area

The parent survey data was also filtered to determine the traveling characteristics of families living outside of the walk boundary. The majority of responding families that lived outside of the walk boundary lived within a mile of the school. These families likely receive bus service through the supplemental bus service program.

Parents were asked “On most days, how does your child get to school and how does your child leave school?”. Similar number of parents indicated that their students took the bus and were driven in a family vehicle in the morning while a larger number indicated that their student rode the bus in the afternoon.



Data Observations

City staff noted the following observations from the student tally and parent surveys

- A large number of families who live in the walk boundary are already choosing active transportation
- A number of families living within a half mile of the school are driving to school
- Although many students ride the bus, more families choose to ride the bus in the afternoon
- Filtering the parent survey responses based on the zone they live it produces valuable data regarding travel mode.

Walk Audit

The SRTS program staff led a walking tour along the suggested walk paths on April 11, 2019 following school dismissal. Each attendee was given a self-guided walking tour packet which included a questionnaire to fill out during the walk. Copies of the packet were also left at the front office from April 11 to April 17th.

The majority of streets within the Patterson walk boundary have sidewalks. In many locations these sidewalks are separated from the street with a vegetated buffer. The low traffic volumes, shade from mature trees, and separation from traffic result in a comfortable walking environment along the streets in the walk boundary.

Staff and attendees noted a few locations along NE Sunburst Avenue where sidewalks were lifting due to tree roots and a few locations throughout the neighborhood where vegetation had grown into the sidewalk clear zone. Basketball hoops were also observed on the sidewalk which reduced the space available to passing pedestrians.

The school staff representative and a parent expressed concern about speed and driver behavior along NE Lenox Street near the school. Prior to the walk audit, a crossing guard was observed assisting students at the school crossing on Lenox Street directly east of the school driveway as well as helping at the school driveway. An attendee stated that the crossing guard helps students cross the school driveway as well as assists drivers attempting to leave the school parking lot.



Figure 3: Walk Audit Attendees



Figure 4: Street in Walk Area

Speed and Traffic Counts

In 2018, the City conducted traffic volume counts and speed monitoring at four locations within the Patterson walk boundary. The findings from these counts were used to objectively analyze speed and traffic volumes at key locations. Details on the findings can be found in Appendix A.

Parent and Staff Meetings

The SRTS Coordinator attended a meeting with the Patterson Elementary Safety Team (December 4, 2018) and a Booster Club meeting (April 9, 2019) to provide information about the Safe Routes to School Program and receive parent input for the plan. Details regarding parent and staff input at these meetings is included in Appendix B at the end of this document.

Recommendations

The following specific recommendations are made for Patterson Elementary should the school administration choose to implement a Safe Routes to School Program. Note that some of the recommendations will be short-term activities while others may require participation by multiple partners such as parent organizations, the City of Hillsboro Public Works Department, the Hillsboro School District, Washington County and the Hillsboro Police Department. Using the six Es that guide the SRTS program, City of Hillsboro staff make the following recommendations based on existing conditions, walk audits, survey results, and communication with Patterson parents and staff as well as Hillsboro School district representatives.

Program Component	Existing Condition	Recommendation	Lead/Partners
Overall program	Safe Routes to School events had not been organized at Patterson prior to the Action Plan. One event was held during the action planning process (see Encouragement section).	Work together to expand SRTS program at Patterson Elementary.	<ul style="list-style-type: none"> • Patterson Elementary staff • SRTS Coordinator
Encouragement	Patterson Elementary hosted a Walk and Roll Rodeo during the action planning process.	Participate in the spring and fall Walk + Roll to School day each year.	<ul style="list-style-type: none"> • Patterson Elementary staff
		Organize additional Walk and Roll Rodeos in September or May to encourage bike and pedestrian safety.	<ul style="list-style-type: none"> • SRTS Coordinator • Patterson Elementary Staff • Patterson Elementary Booster Club
	Patterson parents expressed concern about walking along higher traffic and volume streets.	Organize a walking school bus weekly or monthly.	<ul style="list-style-type: none"> • Patterson Elementary staff • Patterson Elementary parents • SRTS Coordinator

	Weather and climate was identified in the Parent Survey as a barrier to walking or rolling to school.	Create a space for wet clothing to be stored during the school day.	<ul style="list-style-type: none"> • Patterson Elementary staff
	Many students that receive bus service are dropped off or picked up in a family vehicle.	Organize "Riding the Bus" encouragement activities.	<ul style="list-style-type: none"> • Patterson Elementary staff • HSD • SRTS Coordinator
Education	No previous education activities existed.	Train PE teacher on pedestrian safety curriculum.	<ul style="list-style-type: none"> • SRTS coordinator
		Teach pedestrian safety curriculum annually. This includes the steps to cross the street and information about legal crossing locations.	<ul style="list-style-type: none"> • Patterson Elementary Staff
		Create Back to School safety handout to educate parents about suggested walk map and driveline safety.	<ul style="list-style-type: none"> • SRTS Coordinator
		Print safety handout and provide to school for distribution.	<ul style="list-style-type: none"> • HSD • Patterson Elementary Staff
		Distribute Back to School safety handout with Back to School materials.	<ul style="list-style-type: none"> • Patterson Elementary Staff
		Include SRTS safety reminders in parent outreach materials throughout the school year such as how long it takes to walk a mile, wet weather walking tips, and guidance for safe crossings.	<ul style="list-style-type: none"> • HSD • SRTS coordinator • Patterson Elementary Staff

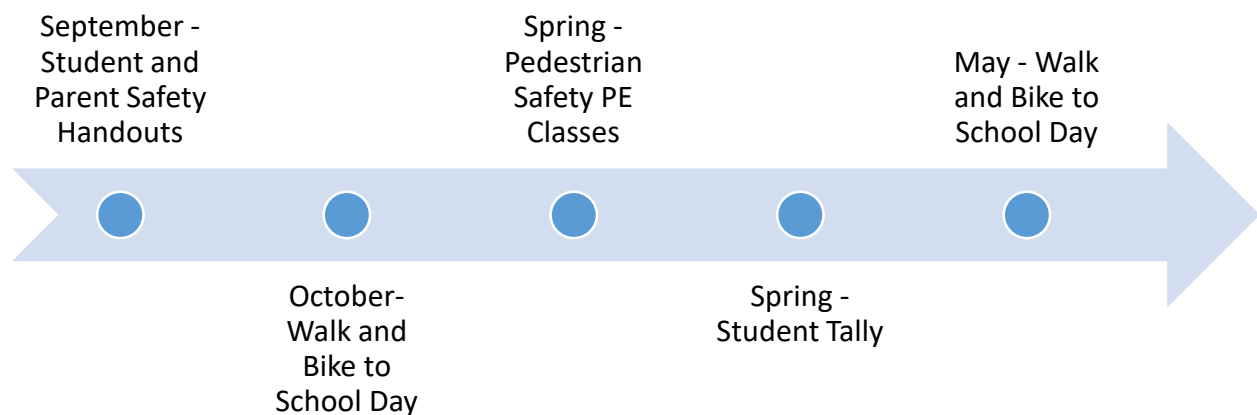
Enforcement	<p>Parents expressed concern about speeding and driver behavior along NE Lenox Street. They also expressed concern about speeding along NE Sunburst Avenue.</p> <p>The collected traffic speed on NE Sunburst Avenue (between 4th and Lenox) and on NE Lenox (between Sunburst and 4th) are reasonable (Appendix A). The 85th percentile speed during the hours when the school zone is active on NE Lenox Street in front of Patterson Elementary is 27 MPH. This is 7 MPH above the posted speed limit.</p>	<p>Parents are encourage to contact PD when they observe speeding or concerning driver behavior.</p> <p>Consider placing a mobile speed response sign on NE Sunburst Avenue and NE Lenox Street.</p> <p>Consider varied traffic enforcement during elementary school arrival and dismissal as well as during high school dismissal times.</p>	<ul style="list-style-type: none"> Hillsboro Police Department (HPD)
	<p>Crossing guard in front of school currently helps students crossing driveway and NE Lenox Street.</p>	<p>If funding is available, HSD will evaluate placing an additional crossing guard at the driveway based on established criteria and current Hillsboro School District practices.</p>	<ul style="list-style-type: none"> HSD
	<p>Parents requested crossing guards during the parent surveys at the following locations</p> <ul style="list-style-type: none"> NE Glencoe Oaks Place and NE Milne Road NE Lenox Street and NE Kaster Road 	<p>If funding is available, HSD will evaluate request based on established criteria and current Hillsboro School District practices.</p>	<ul style="list-style-type: none"> HSD

	School related vehicles were observed idling on NE Lenox Street for a short period of time during school dismissal. School staff were observed assisting with dismissal and encouraging drivers to pull ahead to front of pick-up area.	Continue to have staff encourage parents to move forward to the end of the pick-up area.	<ul style="list-style-type: none"> • Patterson Elementary Staff
		Have all staff helping with traffic flow wear safety vests. This will improve their visibility and will help drivers know that they are helping with the pick-up process.	<ul style="list-style-type: none"> • Patterson Elementary Staff
	Basketball hoops were observed blocking a portion of the sidewalk in multiple locations along NE Milne Road.	PD notified property owners of the requirement to keep the sidewalk zone clear of obstructions during the action plan process.	<ul style="list-style-type: none"> • HPD
Engineering	Potential sidewalk trip hazards were identified on NE Sunburst Avenue between NE Lauren Court and NE Evergreen Road as well as on NE Lenox Street between NE 1 st Court and the school.	Staff will assess if the sidewalk concerns are trip hazards and will notify homeowners if sidewalk maintenance is needed.	<ul style="list-style-type: none"> • City of Hillsboro
	Vegetation was observed blocking the sidewalk clear zones along multiple roads within the walk boundary.	Staff will notify homeowners of needed vegetation maintenance.	<ul style="list-style-type: none"> • City of Hillsboro
	Trees on the south side of NE Lenox Street impact site distance of the school crossing sign at the crosswalk in front of the school.	Notify homeowners of the need to trim the trees to improve the site distance.	<ul style="list-style-type: none"> • City of Hillsboro
		Install a school crossing sign visible from the eastbound lanes on the north side of the road.	<ul style="list-style-type: none"> • City of Hillsboro
Evaluation	Students travel mode was assessed spring 2019. A survey was also conducted in 2019 to collect information on parents' opinions and concerns about allowing their children to walk and bike to school.	Repeat evaluations annually.	<ul style="list-style-type: none"> • Patterson Elementary Staff

Equity	The Hillsboro Safe Routes to School Program encourages students to safely walk or roll (bike, skate, scoot or ride the bus) to school.	Continue to include all modes of active and shared transportation in encouragement events.	<ul style="list-style-type: none"> • SRTS Coordinator • Patterson Elementary Staff • HSD Transportation Department
	Patterson Elementary knows the number of families needing printed materials.	Provide printed materials for families that need them.	•Patterson Staff
	Some families within the school community speak Spanish and one family speaks Arabic.	The Safe Routes to School Program provides all materials in English and Spanish.	<ul style="list-style-type: none"> •Patterson Elementary Staff •SRTS Coordinator
		Consider translating SRTS materials into additional languages if a District-wide need is identified.	•SRTS Coordinator

Next Steps

Patterson Elementary should work to identify a parent or staff champion to help coordinate ongoing efforts with the City of Hillsboro SRST Program Coordinator. Additionally, City staff will provide city wide encouragement and education events open to all families in the community.



Appendix

Appendix A

Speed and Traffic Counts

The City conducts traffic volume counts and speed monitoring at key locations throughout the city each year. Special traffic studies are also completed by City staff on an as needed basis. Two of the annual counts and two 2018 special counts fall in the walk zone for Patterson Elementary. The locations are:

- NE Lenox Street
 - Between 2nd and Kaster
 - Between 4th and Sunburst
- NE Milne Road
 - Between 2nd and Glencoe Oaks
- NE Sunburst Avenue
 - Between 4th and Lenox

Road Classification and Average Daily Totals

NE Lenox Street and NE Sunburst Avenue are classified as neighborhood routes which means that higher levels of traffic are expected on than local streets as neighbors use these routes to access the neighborhood. The observed traffic volume on NE Lenox Street and NE Sunburst Avenue are below the expected range for this type of street.

NE Milne Road is classified as a local street which means that low traffic volumes are expected. The observed traffic volume this street is within the range of expected traffic volumes for a local street.

Table 1 lists the Average Daily Totals for each location and the date the data was collected.

**Table 1: Average Daily Totals (ADT)
Patterson Attendance Area**

Street	ADT	Date Collected
NE Lenox Street <ul style="list-style-type: none">• Between 2nd and Kaster• Between 4th and Sunburst	1401 410	10/9/2018 7/25/2018
NE Milne Road <ul style="list-style-type: none">• Between 2nd and Glencoe Oaks	434	10/9/2018
NE Sunburst Ave <ul style="list-style-type: none">• Between 4th and Lenox	410	7/25/2018

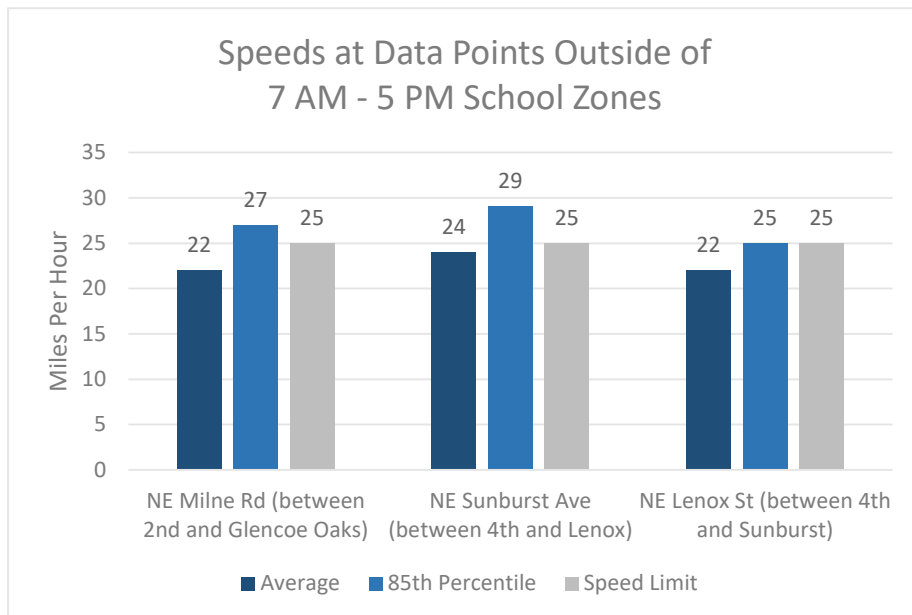
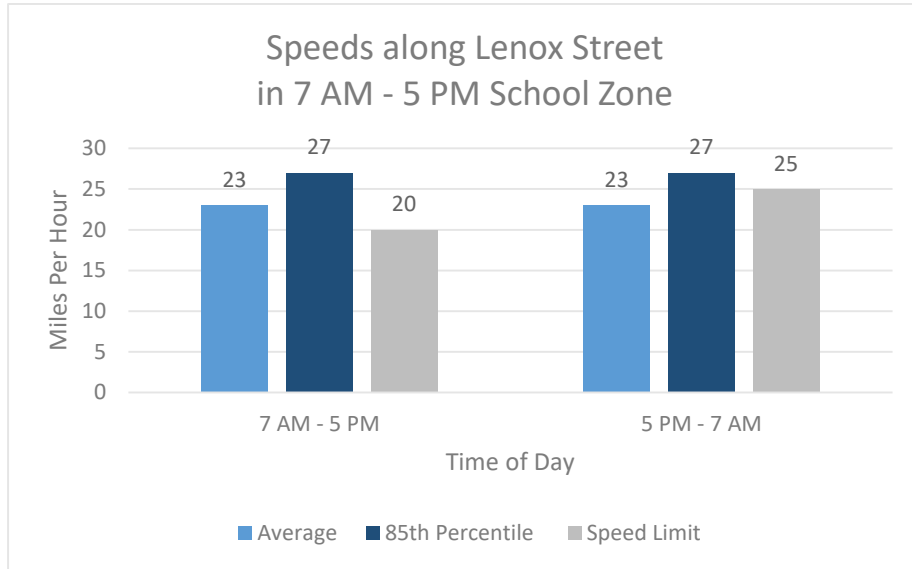
Speed Limits and School Zones

The speed limit along NE Lenox Street, NE Milne Road and NE Sunburst Avenue is 25 MPH. A school zone is located on NE Lenox Street between NE Kaster Drive and NE Katie Drive as well as on NE Milne Road between NE 2nd Court and NE Crimson Place. The school zone on NE Lenox Street directs drivers to

reduce their speeds to 20 MPH between 7 AM and 5 PM. In the school zone on NE Milne Road, drivers are told to reduce their speed to 20 MPH “When Children are Present”.

Observed Speeds

The tables below compares the average and 85th percentile speeds³ observed at the four data collection points to the speed limits.



³ The 85th percentile speed means that 85% of vehicles are driving at or below the listed speed.

Appendix B

Patterson Elementary Parent/Staff input

The SRTS Coordinator attended a meeting with the Patterson Elementary Safety Team (December 4, 2018) and a Booster Club meeting (April 9, 2019) to provide information about the Safe Routes to School Program and receive parent input for the plan. Walk audit attendees also provided input on programmatic recommendations while walking through the walk area on April 11, 2019.

Equity

- A need for Arabic translation was identified. This would serve a limited number of families at this time.
- The school prints hardcopy materials for a limited number of families that do not have internet access. Working with the school to determine the number of needed printed copies would be beneficial.
- Most students have bikes so bike ownership is not a barrier to most students at Patterson.

Encouragement

- Very interested in the Walking School Bus concept. They are interested in forming school buses either for special events or on a weekly schedule. Members of the Booster Club expressed strong interest in guiding a walking school bus across Glencoe Road but also supported having the walking school busses through the walk area.
- Supported organizing a wet clothes/rain boots storage area.
- Supported future bike rodeos but would prefer they are organized in September, May or June.
- One staff member stated that special events and newsletter text would be a good first step for Safe Routes to School at Patterson.

Engineering, Enforcement and Education

- Supported bringing pedestrian safety PE curriculum to Patterson and were happy to hear that their teacher would be trained in May 2019.
- A good first step to encourage wet weather walking is to provide helpful tips and suggestions in the school newsletters.
- Interested in having a marked crossing on Glencoe Road closer to Patterson Elementary so that they could walk to school with their students.
- Concerned about speeding on Lenox during the Patterson arrival and departure times as well as during high school afternoon departure.
- Concerned about high school students using neighborhood to turn around on Glencoe Road and to park during the school day. Booster Club parents expressed interest in having a signalized exit at the Glencoe north parking lot as they thought if students could turn left that it would reduce speeding and traffic in their neighborhood.
- Concerned about traffic within school parking lot.

City of Hillsboro Feedback on Engineering Requests

City of Hillsboro staff reviewed the parent input collected at the Booster Club meeting and through the parent survey for potential engineering improvements in the Patterson walk boundary. The following table provides an update on the proposed improvements that were recommended by parents but were not included in the recommendations table.

Concern/Proposed Improvement	Staff Feedback
NE Milne Street/Glencoe Oaks Place	Staff observed the intersection and did not see any concerning behavior. No changes are recommended at this time.
Enhanced crossing across Glencoe Road	Students living west of Glencoe Road receive supplemental bus service due to the road width as well as high traffic volume and speed along this route. HSD continues to support providing bus service to this area. Since students receive bus service and this is the preferred transportation method by HSD, an enhanced crossing will not be considered as a recommendation of the Safe Routes to School Program.

Appendix C

Crosswalk and Sidewalk Prioritization Review

The Public Works Department Transportation Division’s Bicycle and Pedestrian Capital Improvement Program (BPCIP) is a ten-year plan guiding transportation investments. Each BPCIP prioritizes a list of sidewalk, bike lane, and enhanced crossing projects throughout the City of Hillsboro.

The City of Hillsboro is in the process of updating the [Transportation System Plan](#) (TSP).

The updated TSP will include BPCIP project selection guidance based on input from the community. When the TSP is completed, it will be used to develop the 2020-2029 BPCIP project list which will then be presented to Transportation Committee for adoption (see diagram below).



More information about opportunities for the community to provide input on the TSP will be available on the [TSP webpage](#).

Appendix D

Projects Scheduled in Neighborhood

No projects are being designed or constructed within the walk boundary.

Appendix E

Current Sidewalk Inventory in Patterson Walk Route

