AGENDA Bend Metropolitan Planning Organization Policy Board

Date: September 15, 2023

Time: 12:00 – 1:30 pm

Location: Hybrid meeting

In-Person Location: ODOT Region 4, Building M, 63055 N. Highway 97, Bend, Baney Conference Room (use the DMV entrance on Mervin Sampels Road and Bldg. M is straight ahead)

Virtual Option: https://bendoregon-gov.zoom.us/j/88278652207?pwd=ZIJIZjFBSUMyUTVIRTICR2Vwb0dHZz09

Phone Option: 1-888-788-0099, Enter webinar ID: 882 7865 2207 and Event Passcode: bmpo (*The ID and password are not typically required*)

YouTube Option: https://youtube.com/live/45KDtu9y1w8?feature=share

Contact: Tyler Deke at (541) 693-2113 or tdeke@bendoregon.gov

1. Call to Order & Introductions	Chair Campbell
2. Hybrid Meeting Guidelines	Tyler Deke
3. Public Comment	Chair Campbell

Action Items

Recommended Language for Motion: I move approval of the August 18, 2023, Policy Board draft meeting minutes as presented.

Information Items

5. Metropolitan Transportation Plan Update ...Chris Maciejewski, DKS & MPO Staff

Background: Work is beginning on the federally required 5-year update of the Metropolitan Transportation Plan (MTP), the MPO's long-range

transportation plan. Staff will provide an overview of the update process, the project schedule and Policy Board engagement and leadership.

Attachments: Public summary document (**Attachment B**). Plan update information will be posted on the following site: <u>https://www.bendoregon.gov/mtp</u>

Action Requested: None. Information item.

6. US 97 at Reed Market Road Safety & Operations Study Tyler Deke, Sinclair Burr, City of Bend and David Amiton, ODOT Region 4

- Background: The Bend TSP and the US 97 Parkway Plan identified Reed Market Road as a critical bottleneck with several safety issues and include concept level improvements. This study refined those project concepts, updated cost estimates, and prioritizes the projects to align with existing funding. Staff will review the study outcomes and discuss next steps.
- Attachments: Executive Summary (Attachment C) and public summary (Attachment D). Study information and materials are posted on the following site: <u>https://www.oregon.gov/odot/projects/pages/project-details.aspx?project=00005</u>

Action Requested: None. Information item.

7. City of Bend STBG Funding Update David Abbas, City of Bend

Background: The MPO provides a percentage of its federal Surface Transportation Block Grant (STBG) funds to the City of Bend for transportation system preservation and operations projects. City staff will provide an update on the City's overall preservation and operations program and how the STBG funds are used within that program.

Attachments: None. Information may be distributed at the meeting.

Action Requested: None. Information item.

8. Other Business Chair Campbell & Staff

- Safety outreach update
- Policy Board member meeting topic requests
- The next scheduled meeting of the Policy Board is October 20th at 12 noon
- 9. Public Comment Chair Campbell

10. Adjournment



Accessible Meeting/Alternate Format Notification

This meeting event/location is accessible. Sign or other language interpreter service, assistive listening devices, materials in alternate format, such as Braille, large print, electronic formats, or any other accommodations are available upon advance request at no cost. Please contact Kelli Kennedy no later than 24 hours in advance of the meeting at (541) 693-2122 or kkennedy@bendoregon.gov. Providing at least 2 days-notice prior to the event will help ensure availability.



Policy Board

Draft Minutes

August 18, 2023 ODOT Region 4, 63055 North Highway 97, Building M – Baney Conference Room, Bend, Oregon

Link to meeting:

https://youtube.com/live/j5hmzGKN2pQ?feature=share

Present during the meeting (in person and virtually) were:

<u>Policy Board Members</u>: **BMPO Chair** Barb Campbell, Ariel "Ari" Mendez, *Mike Riley absent, Bend City Councilors;* **BMPO Vice-Chair** Phil Chang, *Deschutes County Commissioner;* Bob Townsend, *Oregon Department of Transportation (ODOT) Region 4 Area Manager,* Tarik Rawlings, *Deschutes County (via video)*

Policy Board Alternates: David Amiton, ODOT Planning and Program Manager (via video)

MPO Staff: Tyler Deke, Manager; Andrea Napoli, Senior Planner

Visitors: Greg Bryant, Deschutes River Woods

Media: None

(The 3 digits after a motion title show the number of member jurisdictions voting in favor/opposed/abstaining.)

1. Call to Order and Introductions

Chair Campbell called the regular meeting of the Bend Metropolitan Planning Organization (Bend MPO) Policy Board to order at 12:04 p.m., Friday, August 18, 2023, with a quorum of member jurisdictions present (3 of 3).

2. Hybrid Meeting Guidelines

Mr. Deke reviewed the meeting guidelines.

3. Public Comment

None.

ACTION ITEMS

4. Meeting Minutes

Materials: July 21, 2023, Policy Board draft meeting minutes

Motion 1 (3/0/0): Mr. Mendez moved approval of the July 21, 2023, Policy Board draft meeting minutes as presented. Mr. Townsend seconded the motion which passed unanimously.

5. Bend MPO Boundary Adjustments– Tyler Deke & Andrea Napoli

<u>Materials</u>: Memo (Attachment A) and Frequently Asked Questions (Attachment B) <u>Request</u>: Review and consider approval of proposed FAUB and MPO Boundary changes

Mr. Deke provided an overview of the process involved in identifying modifications to the Bend MPO and Federal Aid Urban Boundaries via PowerPoint with Ms. Napoli presenting the virtual map of the boundaries and highlighting the potential changes as reviewed in the previous meeting. Mr. Deke also presented the Staff's recommendations, including those regarding the Baker Road Interchange related to concerns about emergency egress

and funding considerations. He noted ODOT is finishing a planning process for the Baker Road Interchange which the Board had recommended be included to make it eligible for funds, knowing that the Interchange Area Management Plan will have significant upgrades over the next 10 to 15 years depending on funding availability.

Discussion included aligning the 2010 Federal Aid Urban Boundary (FAUB) and MPO boundary where possible, verification that the entire Baker Road Interchange was already included in the FAUB, and including other areas included in the 2010 FAUB in the 2020 MPO boundary considerations. [17:46] Staff addressed clarifying questions about funding eligibility and design standards as a result of being inside or outside the MPO boundary. Mr. Townsend [19:07] stated he would send a high-level concept plan for the Baker Road Interchange Project for clarity on that project's boundaries.

Following discussion, the Policy Board agreed to extend the MPO boundary to the east within the ODOT right-of-way, which included the path, to the south along Highway 97 and encompassing the Baker Road Interchange, and otherwise maintaining the existing MPO boundary, adding the Widgi Creeks and Fountain area, [16:15] as well as the Solar Farm, which were required. No changes were made to the boundary as it related to Tumalo at this time. The Board would have further discussion about Tumalo in six months to a year, and Staff would create a work plan that includes outreach to the Tumalo community. However, the next FAUB update would be in 10 years.

Motion 2 (3/0/0): Mr. Mendez moved approval of the proposed FAUB changes as discussed. Mr. Chang seconded the motion which passed unanimously.

Motion 3 (3/0/0): Mr. Mendez moved approval of the proposed changes as previously discussed to the Bend MPO boundary to include the revised FAUB. Mr. Chang seconded the motion which passed unanimously.

Information Items

6. E-bike Discussion – Chair Campbell and Staff

Materials: None.

<u>Request</u>: Discuss options and steps related to e-bike safety.

Chair Campbell reviewed the need for a statewide e-bike policy, noting technological advancements were causing disorder regarding where e-bikes would be allowed. The e-bike legislation has not been updated since 1997 and there were changes to Park District rules and regulations two years ago making the state law more permissive. Legislation would be proposed containing the details as well as the public announcement timing in a short session this January thus the Board would not need to formulate a different proposal. Staff will raise this as part of the agenda in the next OMPOC (Oregon Metropolitan Planning Organization Consortium) meeting in September.

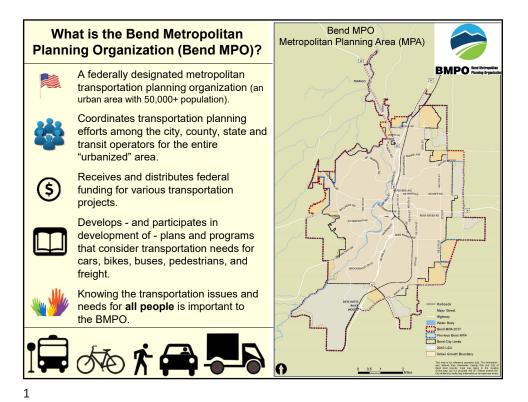
7. Other Business Chair Campbell & Staff

 <u>Safety outreach update</u>: Mr. Deke stated that the funding from ODOT Safety Division is still in hand due to staffing limitations. Staff is currently onboarding Kelli Kennedy who will handle most of the administrative tasks. There is ongoing work to get an intergovernmental agreement (IGA) with the Central Oregon Intergovernmental Council (COIC) to help expend the funds on road safety messaging until the end of September and also work with partners to develop the funding application for the next grant cycle. Another update on these items will be provided next week.

- <u>Dutch Cycling Embassy debrief:</u> Staff shared significant takeaways to achieve a great level of comfort and safety in terms of bike lane standards and road safety including design standards that could help execute this goal. A more formal synopsis will be circulated as widely as possible.
- <u>Policy Board member meeting topic requests</u>: Please contact Chair Campbell or Mr. Deke before the next meeting.
- <u>The next scheduled meeting of the Policy Board is September 15 at 12 noon</u>
- 8. Public Comment Chair Campbell None.

9. Adjournment

With no further business, Chair Campbell adjourned the meeting at 1:42 p.m.









US 97 AT REED MARKET ROAD OPERATIONS AND SAFETY STUDY - EXECTUTIVE SUMMARY

SEPTEMBER 8, 2023

PREPARED FOR:

OREGON DEPARTMENT OF TRANSPORTATION

CITY OF BEND



1050 SW 6TH AVENUE, SUITE 600 • PORTLAND, OR 97204 • 503.243.3500 • DKSASSOCIATES.COM

EXECUTIVE SUMMARY

PROJECT PURPOSE

Reed Market Road is a critical east-west travel corridor and a priority for addressing mobility during the most recent Bend Transportation System Plan/Metropolitan Transportation Plan (TSP/MTP) update. As one of the few crossings of the Deschutes River and US 97, Reed Market Road is heavily relied upon for access to much of southern Bend, as well as popular destinations such as the Old Mill District, riverfront, Mount Bachelor, and Cascade Lakes Scenic Byway. The corridor has multiple operations and safety deficiencies that compound to create a significant east-west bottleneck. Furthermore, one of the key findings from the US 97 Parkway Plan is that Reed Market Road congestion limits the ability of any interchange improvements to function adequately, leading to queue spillback and one of the most critical bottlenecks on the Parkway.

As a result of these earlier planning efforts, the Oregon Department of Transportation and the City of Bend partnered to identify and fund concept-level improvement projects in the Reed Market Road corridor between Bond Street/Brookswood Boulevard and 4th Street through the City's Capital Improvement Program (CIP) and general obligation (GO) bonds. However, further project refinement and development of a coordinated plan were needed to support implementation. Therefore, the purpose of this study was to:

- Refine a set of complementary projects in the Reed Market Road study corridor between Brookswood Boulevard/Bond Street and 4th Street.
- Reduce congestion.
- Improve safety for all users.
- Align project cost with available and reasonably anticipated funding.

SYSTEMWIDE BENEFITS OF PROPOSED PROJECTS

The construction of the recommended projects will result in significant safety improvements, reductions in overall congestion, and lower levels of traffic stress for people walking and biking along the Reed Market Road corridor and surrounding Key Routes. The projects will also relieve one of the most critical long-range bottlenecks on the US 97 Parkway, which will have significant regional mobility benefits. While congestion will be reduced, it will still be pronounced in this corridor. Therefore, other systemwide improvements will be needed to reduce the demand on Reed Market Road, such as a new south river crossing or encouraging less travel by automobile.

Some of the systemwide benefits of the proposed projects include the following:

- The number of vehicle hours of delay experienced during the peak afternoon two-hour period on an average weekday will decrease by about 60 percent.
- Three street crossings on Key Routes will be improved to provide more protection for people walking and biking, improving safety for these vulnerable travelers and resulting in a lower level of traffic stress.
- Shorter vehicle queues and a new traffic signal will significantly improve safety for all users.



• Access to transportation options for low-income residents in the area will be improved with more comfortable walking and biking facilities along and across Reed Market Road and improved access to existing and future transit stops.

PREFERRED ALTERNATIVES

Figure 1 shows the study area and improvement locations. Figures and more details about the preferred alternatives are included in Attachment A – *Prospectus Sheets*. The text on the following pages summarizes the recommended intersection improvements, benefits, challenges, and cost.

This study also identified limited opportunities for people walking and biking to cross US 97 in the vicinity of the Reed Market Road overcrossing. While Reed Market Road is not a designated low-stress route, the City of Bend's standard requires low-stress walking and biking facilities when a street is reconstructed. Providing low-stress walking and biking facilities along Reed Market Road would require reconstruction to widen the overall cross section. However, there are currently no planned or funded projects to do this. Therefore, this study includes several long-term cross section designs that may be considered in the future as opportunities arise (see Chapter 4). These designs generally consist of replacing on-street bike lanes with multiuse paths along Reed Market Road. The recommended intersection improvements listed below could be designed to support either the existing on-street bike lanes or a future multiuse path.

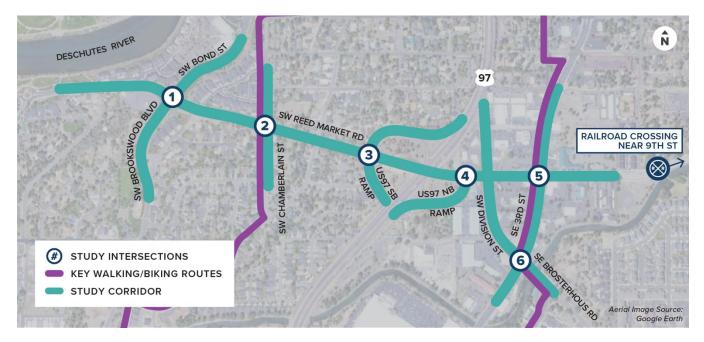


FIGURE 1. STUDY AREA AND IMPROVEMENT LOCATIONS



1. REED MARKET ROAD/BROOKSWOOD BOULEVARD/BOND STREET

Improvements

- Phase 1 \$4 million
 - Add northbound and southbound left-turn lanes and eastbound and westbound right-turn lanes.
- Phase 2 (unfunded future phase) \$700,000
 - Add metering signals to help balance long vehicle queues when congestion is heavy.

Benefits

- Reduces overall delay by more than 80 percent.
- Reduces the length of westbound queues and keeps them from blocking the US 97 interchange ramp intersections.
- Metering signals provide the ability to balance vehicle queues on approaches during peak times (Phase 2).
- Metering signals can provide a green light to help approaching emergency vehicles pass through the roundabout more quickly (Phase 2).

Challenges

• The metering signals will require further development of operational logic and queue detection strategies.

2. REED MARKET ROAD/CHAMBERLAIN STREET

Improvements - \$250,000

- Install a pedestrian crossing on the east approach and additional median cutouts and green pavement markings for people biking.
- Install wayfinding and warning signs for people walking and biking.
- Remove vegetation and enhance illumination for better visibility.
- Preserve space for future bus stops.

Benefits

• Improves safety and comfort for people walking and biking on the Chamberlain Street Key Route crossing Reed Market Road.

3. REED MARKET ROAD/US 97 SOUTHBOUND RAMPS

Improvements - \$5.7 million

- Construct a separate southbound right-turn lane.
- Shift the westbound bike lane adjacent to the curb and add a bike signal at the intersection.

Benefits

• Reduces conflicts between people biking and westbound right-turn vehicles.



• Improves safety by reducing the risk of vehicle queues spilling back onto the US 97 Parkway.

Challenges

- Adding a southbound right-turn lane would require widening along the US 97 off-ramp.
- Concept elements may require ODOT approval prior to implementation.
- Constructing a southbound right-turn lane could impact traffic during construction.

4. REED MARKET ROAD/US 97 NORTHBOUND RAMPS/DIVISION STREET

Improvements

- Phase 1 \$4 million
 - Construct a traffic signal at the US 97 northbound ramp terminal and provide a northbound bike signal to provide extra protection for people biking.
 - ^o Convert Division Street to allow only right-in and right-out movements at Reed Market Road.
 - Consider property access modifications at the north end of Division Street to increase the acceleration distance for the US 97 entrance ramp.
- Phase 2 (unfunded future phase) \$9.4 million in total if done concurrently with Phase 1
 - Separate the northbound entrance ramp from Division Street and align the new entrance ramp with the Reed Market Road/US 97 northbound ramp signalized intersection.

Benefits

- Reduces overall delay by as much as 86 percent.
- Enhances safety for people walking and biking and reduces high-severity angle crashes by 67 percent.
- Fewer conflicting turns between Division Street and the US 97 northbound ramps could reduce overall crashes by 45 percent.
- The Phase 2 ramp realignment improves the acceleration distance for safer merging onto US 97.

Challenges

- The existing driveway access on Reed Market Road will need to be evaluated and coordinated during design.
- Concept elements may require ODOT approval prior to implementation.
- Phase 2 will require a high right-of-way cost and result in the acquisition of up to two properties.

5. REED MARKET ROAD/3RD STREET

Improvements - \$10.3 million

- Construct protected intersection treatments to improve safety for people walking and biking.
- Construct separate eastbound and westbound left-turn lanes.

Benefits

• The addition of separate left-turn lanes reduces overall delay by nearly 60 percent.



- Slows right-turning traffic, reduces pedestrian crossing distances, and protects bicycle crossings at this high-traffic intersection on the 3rd Street Key Route.
- Reduces crashes involving people walking and biking by more than 35 percent.

Challenges

- Right-of-way is constrained, with buildings present in all quadrants and overhead utilities running along the south and east sides of the streets.
- The protected intersection design will be more challenging to maintain, particularly with respect to snow removal.
- Design refinements will be needed to reduce anticipated construction costs to be more in line with available funding.

6. 3RD STREET/BROSTERHOUS ROAD

Improvements

- Phase 1 \$130,000
 - Restripe bike lanes to reduce conflicts.
 - Improve the eastbound right-turn lane striping and signing.
 - Install lighting and reflectors.
 - Change signal timing to remove conflicts for eastbound and westbound left turns.
 - Redirect people walking and biking on the canal trail to use the traffic signal to cross Brosterhous Road.
- Phase 2 (unfunded future phase) no cost estimate available, assumed to be \$5 to \$10 million
 - Construct protected intersection treatments to improve safety for people walking and biking.
 - Construct separate eastbound and westbound left-turn lanes.
 - Construct an eastbound right-turn lane.

Benefits

- Slows right-turning traffic, reduces pedestrian crossing distances, and protects bicycle crossings at this high-traffic intersection on the 3rd Street Key Route.
- Reduces left-turning crashes by up to 99 percent.
- Reduces eastbound vehicle queues and keeps them from spilling back to Reed Market Road.

Challenges

- Phase 2 will require a full rebuild of the intersection, and given there was no funding allocated for a long-term enhancement at the intersection, this alternative would greatly exceed expected funding.
- The protected intersection design will be more challenging to maintain, particularly with respect to snow removal.



NEXT STEPS

Now that the concepts from the Bend TSP/MTP and US 97 Parkway Plan have been refined, they can be advanced to engineering design and construction as funding becomes available. Some of the City projects are already included in the CIP and Neighborhood Street Safety Program and have approved funding. This will allow improvements at the Bond Street/Brookswood Boulevard roundabout, Chamberlain Street, and Reed Market Road at 3rd Street to advance to design as early as 2024. Phase 1 of improvements on 3rd Street at Brosterhous Road may be completed by the end of 2023.

ODOT has not yet committed funding for the improvements at the US 97 ramp intersections. Next steps include seeking funding for scoping and construction through upcoming Statewide Transportation Improvement Program (STIP) cycles.



COST - Phase 1: \$4 million, Phase 2: \$700,000

Phase 1:

• Add northbound & southbound left-turn lanes & eastbound & westbound right-turn lanes.

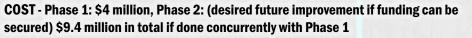
Phase 2:

• Add metering signals to help balance long queues when congestion is heavy.

DESCHUTES RIVER

COST - \$250,000

- Install new pedestrian & bicycle crossings with median cutouts.
- Install wayfinding & warning signs.
- Remove vegetation & enhance lighting for better visibility.
- Preserve space for future bus stops.



Phase 1:

- Construct a traffic signal with a bike signal to provide extra protection for people biking.
- Convert Division Street to allow only right-in & right-out movements at Reed Market Road.
- Consider property access modifications at the north end of Division Street to increase acceleration distance for the US 97 on-ramp.

Phase 2:

• Separate the northbound on-ramp from Division Street & align the new on-ramp with the Reed Market Road at US 97 northbound ramp signalized intersection.

SW REED MARKET RD

US 97 NB RAMP

COST - \$5.7 million

SWBOND ST

1

BROOKSWOOD BELD

- Construct a separate southbound right-turn lane.
- Shift the bike lane adjacent to the curb & add a bike signal at the intersection.

2

ST

CHAMBERLAIN

SW

COST - Phase 1: \$130,000, Phase 2: (unfunded future phase) no cost estimate available (assumed to be \$5-\$10 million)

Phase 1:

• Signal timing improvements to remove conflicts for eastbound and westbound left turns. **Phase 2:**

- Construct protected intersection treatments to improve safety for people walking & biking.
- Construct separate eastbound and westbound left-turn lanes and an eastbound right turn lane.

Attachment D

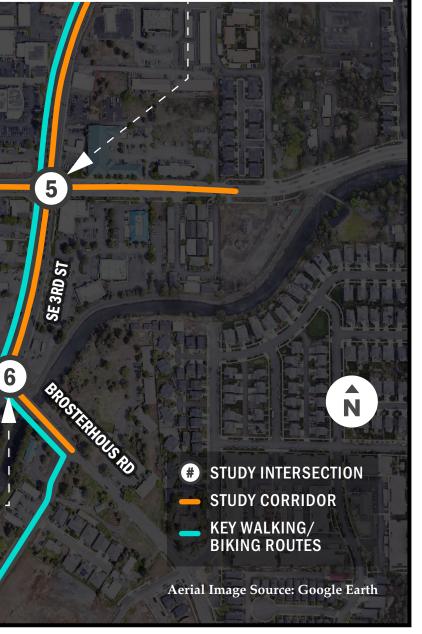


COST - \$10.3 million

SW DIVISION ST

• Construct protected intersection treatments to improve safety for people walking & biking.

• Construct separate eastbound & westbound left-turn lanes.



RECOMMENDED IMPROVEMENTS

US 97 AT REED MARKET ROAD OPERATIONS & SAFETY STUDY



Project Purpose

The Bend Transportation System Plan/Metropolitan Transportation Plan (TSP/MTP) update and the US 97 Parkway Plan identified Reed Market Road as a critical bottleneck in the transportation system with several safety deficiencies. Both studies identified conceptual projects to improve conditions, and the City of Bend committed funding for several of them through the City's Capital Improvement Program (CIP) and general obligation (GO) bonds. However, further refinement of those concepts was needed before they could advance to engineering design and construction. Therefore, the purpose of this study was to:

- Refine a set of complementary projects in the Reed Market Road corridor from Brookswood Boulevard/Bond Street to 4th Street
- Align project costs with available and reasonably anticipated funding
- Improve safety for all users
- Reduce congestion

Benefits at Intersections

Benefits of Proposed Projects



The construction of the recommended projects will result in significant safety improvements, reductions in overall congestion, and lower levels of traffic stress for people walking and biking

along the Reed Market Road corridor and surrounding Key Routes. The projects will also relieve one of the most critical future bottlenecks on the US 97 Parkway, which will have significant regional mobility benefits.

Systemwide Benefits

- The number of vehicle hours of delay experienced during the peak afternoon two-hour period on an average weekday will decrease by about 60 percent.
- Three street crossings on Key Routes will be improved, making it safer to walk and bike and easier to access transit service.
- Shorter vehicle queues and a new traffic signal will significantly improve safety for all users.

1 Reed Market Rd/Bond St/ **Brookswood Blvd**

- Reduces overall delay by more than 80 percent.
- Reduces the length of westbound queues & keeps them from blocking the US 97 interchange ramp intersections.

6 3rd St/Brosterhous Rd

- Slows right-turning traffic, reduces pedestrian crossing distances, & protects bicycle crossings at this high-traffic intersection on the 3rd Street Key Route.
- Reduces left-turning crashes by up to 99 percent.
- Reduces eastbound vehicle queues & keeps them from spilling back to Reed Market Road.



Next Steps

Now that the concepts from the Bend TSP/MTP and US 97 Parkway Plan have been refined, they can be advanced to engineering design and construction as funding becomes available. Some of the City projects are already included in the CIP and Neighborhood Street Safety Program and have approved funding. This will allow

improvements at the Bond Street/Brookswood Boulevard roundabout, Chamberlain Street, and Reed Market Road at 3rd Street to advance to design as early as 2024. The first phase of improvements on 3rd Street at Brosterhous Road may be completed by the end of 2023.

ODOT has not yet committed funding for the improvements at the US 97 ramp intersections. Next steps include seeking funding for scoping and construction through upcoming Statewide Transportation Improvement Program cycles.

2 Reed Market Rd/Chamberlain St

• Improves safety & comfort for people walking & biking on the Chamberlain Street Key Route.



5 Reed Market Rd/3rd St

- Reduces overall delay by nearly 60 percent through the addition of separate left turn lanes.
- Slows right-turning traffic, reduces pedestrian crossing distances, & protects bicycle crossings at this high-traffic intersection on the 3rd Street Key Route.
- Reduces crashes involving people walking & biking by over 35 percent.



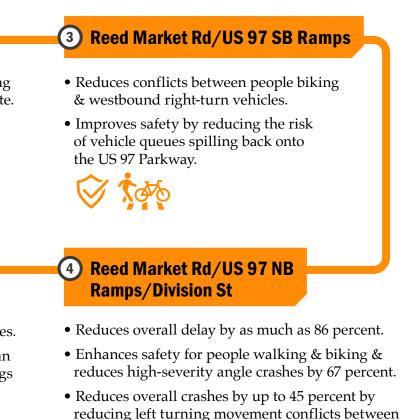


ENHANCED

SAFET)







• The Phase 2 ramp realignment improves the acceleration distance for safer merging onto US 97.

Division Street & the US 97 northbound ramps.

