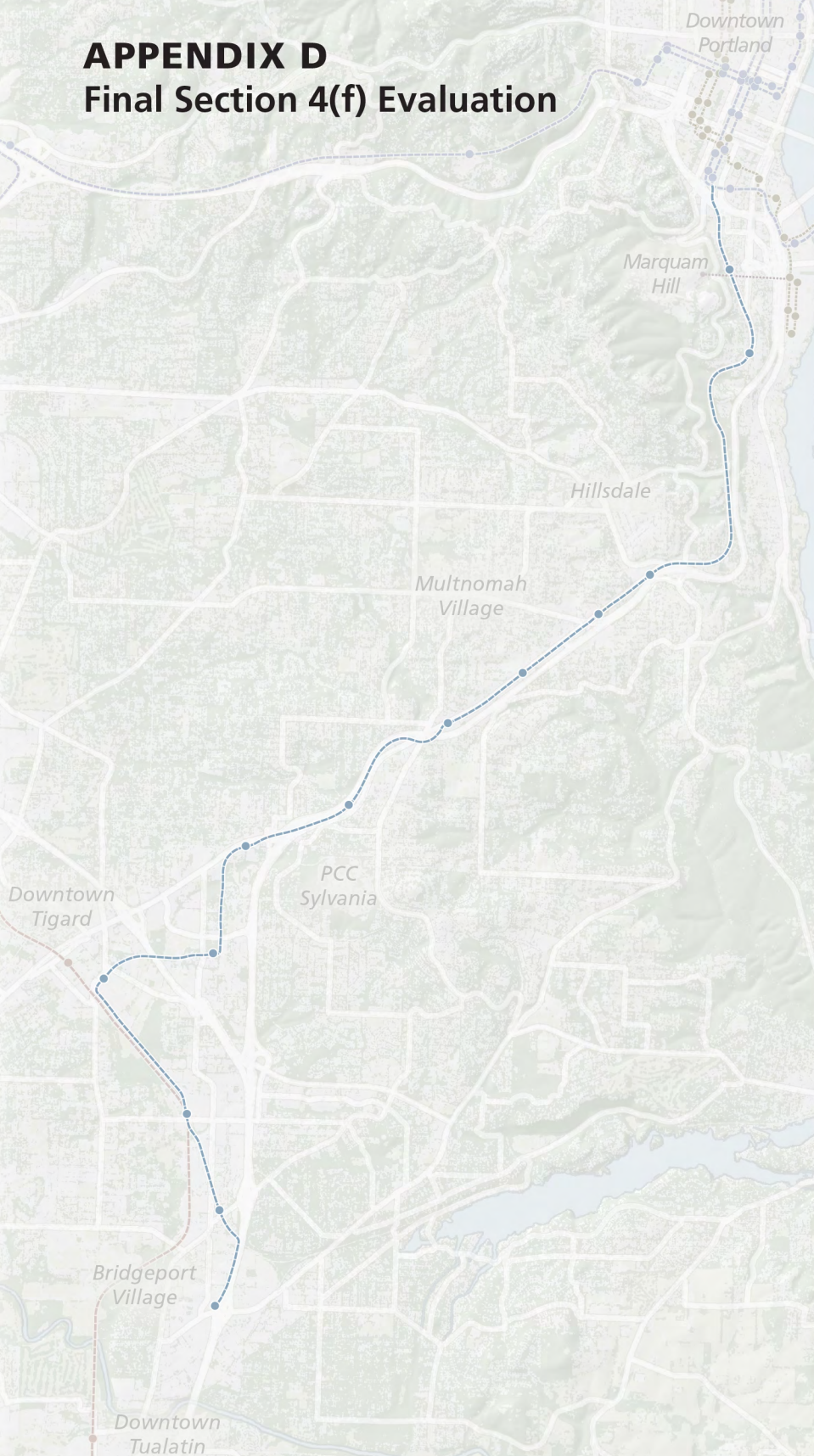


## APPENDIX D

### Final Section 4(f) Evaluation



PORTLAND • TIGARD • TUALATIN

**Corridor**  
Light Rail Project

APPENDIX D – FINAL SECTION 4(f) EVALUATION

Executive Summary

This Final Section 4(f) Evaluation for the Southwest Corridor Light Rail Project (Project) was prepared in conjunction with the Final Environmental Impact Statement (EIS) for the Project, and in compliance with the National Environmental Policy Act (NEPA) and Section 4(f) of the U.S. Department of Transportation Act of 1966 (49 United States Code [USC] 303). It identifies and evaluates the potential effects of the Project on parks and historic properties protected under Section 4(f). The Federal Transit Administration (FTA) is the lead agency for the NEPA process, and Metro (the designated Metropolitan Planning Organization for the Portland, Oregon, region) and the Tri-County Metropolitan Transportation District of Oregon (TriMet) are the local co-lead agencies.

The Project consists of a light rail investment and related transportation improvements that would serve the southwestern area of the Portland metropolitan area. A Preferred Alternative for the light rail investment was identified in 2018. FTA identified 82 Section 4(f) resources in the Project’s study area (described in Section D.3). FTA determined that the Project would result in permanent uses of 34 properties including 11 uses that would be greater than *de minimis* (see Figure D-0). There would also be 11 properties that would qualify for temporary occupancy exceptions to a Section 4(f) use and 37 properties with no use.

FTA determined that the Project has no feasible and prudent alternatives that avoid any use of Section 4(f) properties. Based on the analysis in this Final Section 4(f) Evaluation and supporting planning efforts, the Preferred Alternative and the other light rail alternatives evaluated in the EIS represent the only alternatives that are feasible and prudent (see Section D.6 for this analysis).

FTA also determined that all possible planning to minimize harm has been conducted. The efforts to minimize harm are described in Section D.7 for properties with permanent uses greater than *de minimis* and in Attachment DD2 for properties with *de minimis* impacts or temporary occupancy exceptions. In accordance with 23 CFR Part 774, the officials with jurisdiction have concurred with the *de minimis* impacts and temporary occupancy exceptions (see Attachment DD1). Mitigation commitments that would minimize harm to properties with permanent uses are documented in the Section 106 Memorandum of Agreement for historic resources (included in Attachment DD5) and in a signed agreement with the City of Portland for parks (included in Attachment DD1).

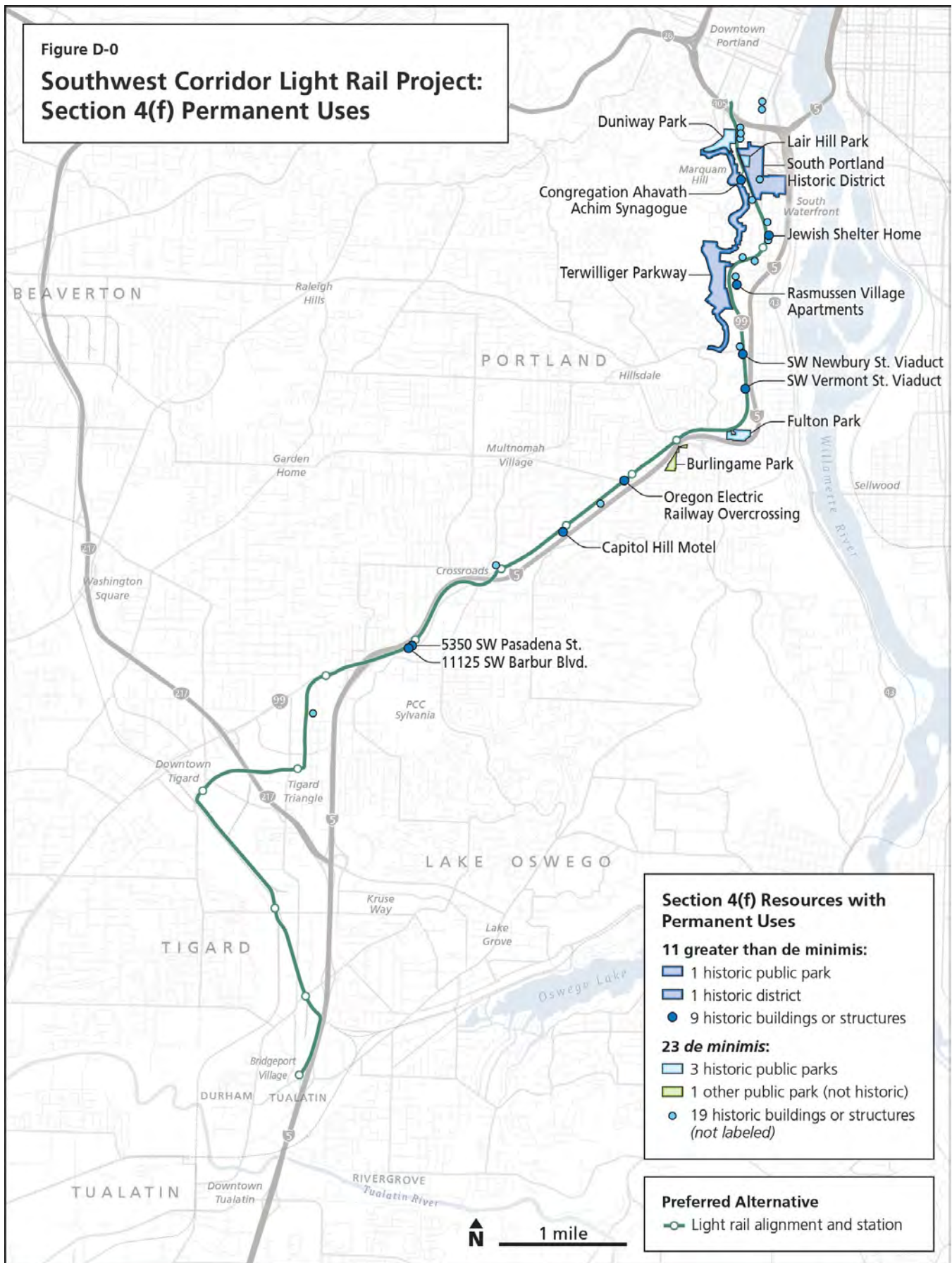
After considering the Project’s mitigation commitments and other efforts to minimize harm, FTA considers the Preferred Alternative to be the least harmful alternative for the Project.

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Figure D-0

## Southwest Corridor Light Rail Project: Section 4(f) Permanent Uses



## **D.1 Southwest Corridor Light Rail Project**

The Project consists of a light rail investment and related transportation improvements that would serve the southwestern area of the Portland metropolitan area. A Draft EIS and a Draft Section 4(f) Evaluation for the Project were published in June 2018. A Preferred Alternative was identified in 2018 and is described below. The Final EIS for the Project has been prepared in conjunction with this Final Section 4(f) Evaluation. The alternatives considered in the Draft EIS and the Final EIS, including the Preferred Alternative, are collectively referred to as the “EIS alternatives” here.

The light rail investment includes a new 11-mile Metropolitan Area Express (MAX) light rail line from downtown Portland through southwest Portland and Tigard, terminating near Bridgeport Village in Tualatin. The light rail investment includes stations, park and rides, accompanying streetscape elements, a connection to Marquam Hill, a shuttle to the Portland Community College (PCC) Sylvania campus and a new operations and maintenance facility. The Preferred Alternative represents the preferred choice for these aspects of the light rail investment.

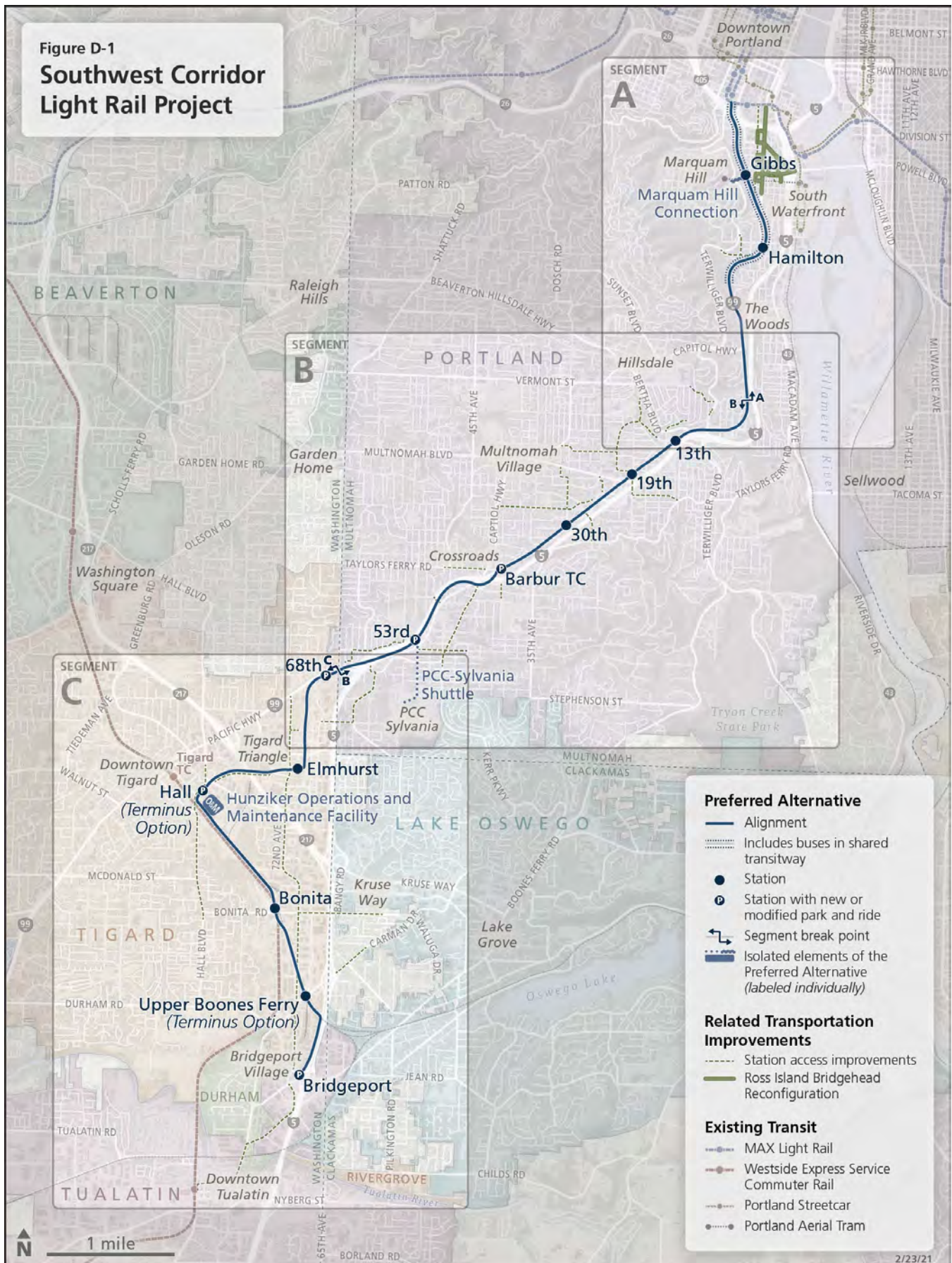
The Project’s related transportation improvements, which include the Ross Island Bridgehead Reconfiguration and station access improvements, are optional mobility and access improvements that could be implemented if funding becomes available. The Ross Island Bridgehead Reconfiguration would modify the roads and ramps at the west end of the bridge to reduce regional traffic on SW Naito Parkway, provide protected pedestrian crossings at signalized intersections, and add or enhance facilities for walking and bicycling. The station access improvements are options for new walking and bicycling infrastructure, such as sidewalks, bicycle lanes and paths, to improve access to stations.

Figure D-1 shows a map of the proposed Project for the full corridor from Portland to Tualatin. The project area is divided geographically into three segments for analysis purposes: Segment A, Inner Portland; Segment B, Outer Portland; and Segment C, Tigard and Tualatin.



Figure D-1

## Southwest Corridor Light Rail Project



### **D.1.1 Segment A: Inner Portland**

Segment A encompasses the area from the southern edge of downtown Portland to just north of the intersection of SW Barbur Boulevard and SW Brier Place (see Figure D-2). In this segment, light rail would primarily run in the center of SW Barbur Boulevard. Segment A also includes the Marquam Hill Connection, which is a part of the Preferred Alternative in addition to the light rail alignment and stations. Attachment DD3 provides additional information about the process and considerations for how the Marquam Hill Connection was selected.

The light rail alignment would tie into the Downtown Portland Transit Mall, which runs along SW Fifth and SW Sixth Avenues. The Transit Mall currently supports MAX Green, Yellow and Orange Lines. The alignment would diverge from the existing MAX tracks at SW Fifth Avenue and SW Lincoln Street. It would cross Interstate 405 (I-405) on a new structure east of and parallel to the SW Fifth Avenue bridge and on-ramp. The alignment would continue south on this structure to cross over the on-ramp, SW Broadway, SW Caruthers Street and SW Sheridan Street. The alignment would land in the center of SW Barbur Boulevard just south of SW Sheridan Street and match the roadway grade just north of SW Hooker Street. The alignment would continue running in the center of SW Barbur Boulevard at grade until the segment break point near SW Brier Place.

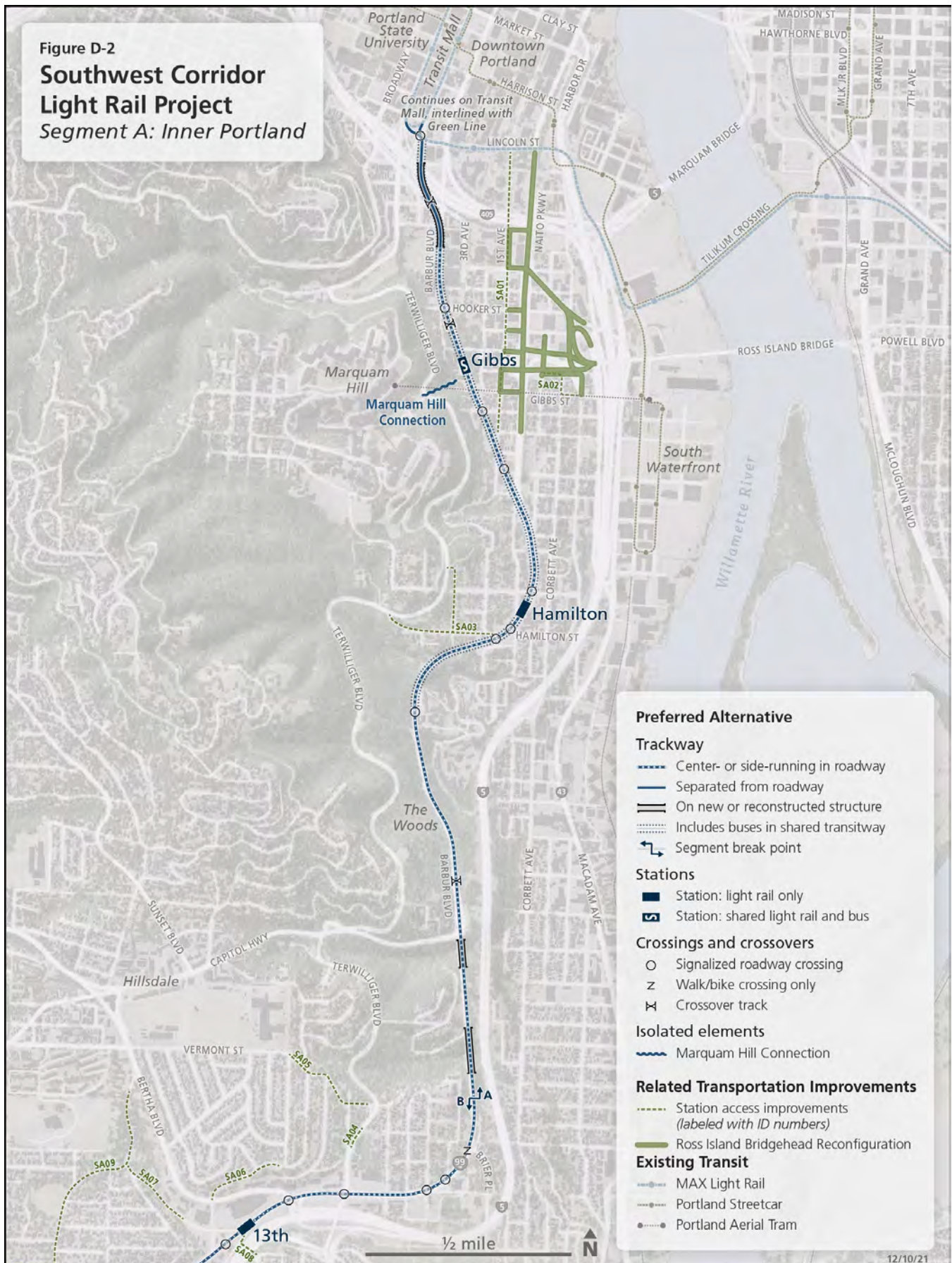
For nearly 2 miles of the light rail line along SW Barbur Boulevard, the Project would have a shared transitway to accommodate buses as well as light rail. Starting at SW Lincoln Street and continuing south to a new signalized intersection at the 4900 block of SW Barbur Boulevard near the SW Capitol Highway ramps of SW Barbur Boulevard, the shared transitway would allow buses to avoid traffic congestion, improving transit travel times and reliability.

The Marquam Hill Connection would feature dual inclined elevators on an angled structure up the hillside between the Gibbs Station on SW Barbur Boulevard and the intersection of SW Terwilliger Parkway and SW Campus Drive. This connection would serve the large complex of medical and educational facilities on Marquam Hill, including the Oregon Health & Science University (OHSU), the Veterans Affairs (VA) Portland Health Care System and the Portland Shriners Hospital for Children. Following the Draft EIS, the details of this connection were developed and refined based on public and agency comments and involvement, including close coordination with OHSU and the City of Portland.

The related transportation improvements within Segment A include the Ross Island Bridgehead Reconfiguration and three station access improvements, as shown on Figure D-2.



**Figure D-2**  
**Southwest Corridor**  
**Light Rail Project**  
**Segment A: Inner Portland**



### **D.1.2 Segment B: Outer Portland**

Segment B extends from SW Barbur Boulevard at SW Brier Place to the Portland/Tigard city boundary, near the intersection of SW Barbur Boulevard and Pacific Highway (99W) with SW 65th Avenue (see Figure D-3). The Preferred Alternative would run in the center of SW Barbur Boulevard through the northern portion of this segment, and then transition to run adjacent to Interstate 5 (I-5) south of the Barbur Transit Center.

The Preferred Alternative would run in the center of SW Barbur Boulevard until the Barbur Transit Center. SW Barbur Boulevard would be widened to accommodate light rail tracks, bicycle facilities and sidewalks. The Preferred Alternative would reconstruct the existing SW Barbur Boulevard bridges over SW Multnomah Boulevard and SW 26th Way. The alignment would depart from the center of SW Barbur Boulevard at SW Taylors Ferry Road, including a signalized crossing of the northbound lanes of SW Barbur Boulevard. The trackway would run through a portion of the existing park and ride at Barbur Transit Center, then cross over I-5, SW Capitol Highway and SW Barbur Boulevard on a new bridge structure, and then continue adjacent to I-5 until SW 60th Avenue.

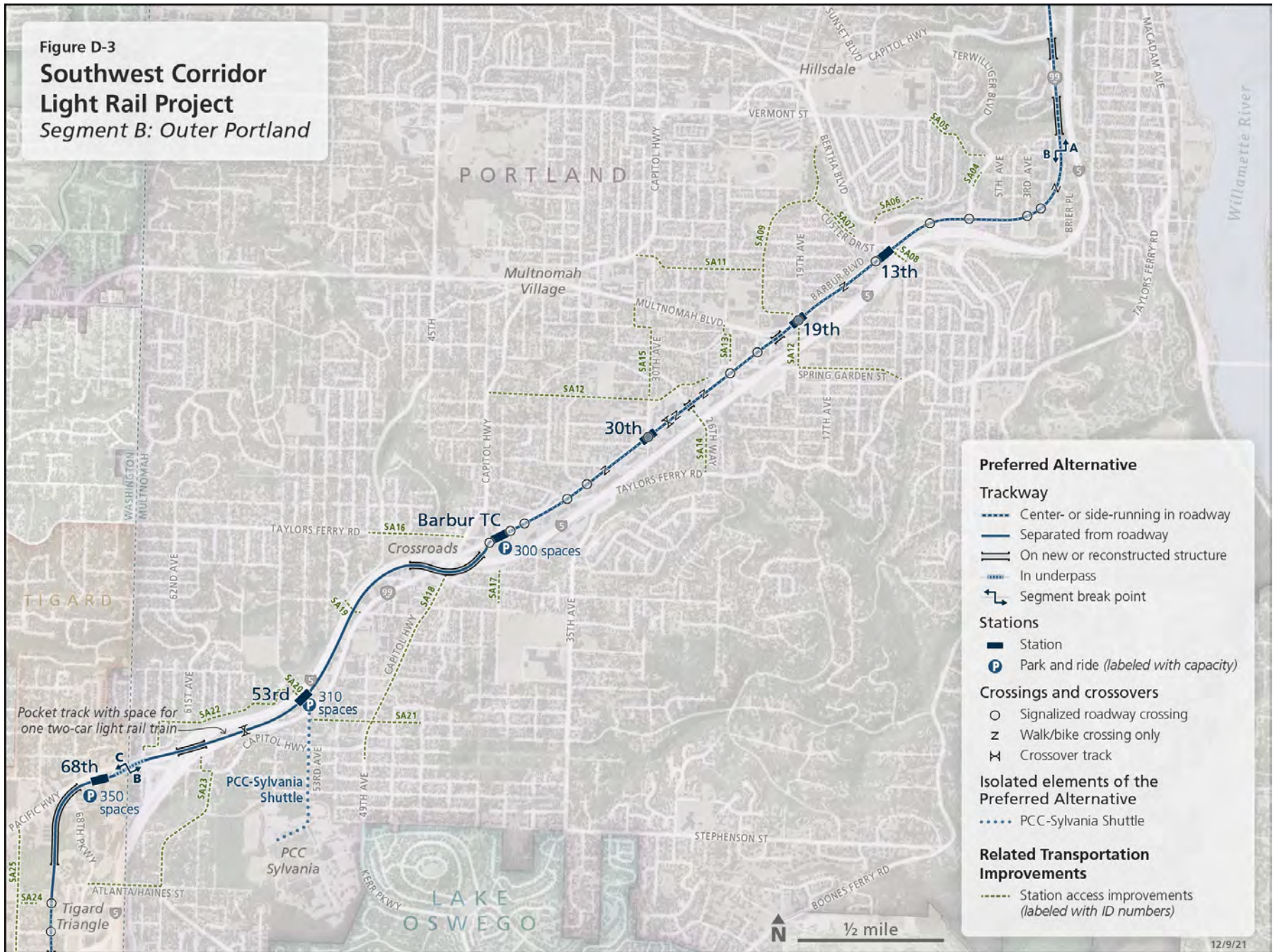
Just west of SW 60th Avenue, the alignment would cross over I-5 on a new light rail structure parallel to and north of the existing SW Barbur Boulevard bridge over I-5. On the west side of I-5, the trackway would land in between SW Barbur Boulevard and the southbound I-5 off-ramp, and then drop into a cut-and-cover underpass below SW Barbur Boulevard between SW 64th Avenue and SW 65th Avenue.

Stations would be located at grade in the center of SW Barbur Boulevard at SW 13th Avenue, SW 19th Avenue, SW 30th Avenue and the Barbur Transit Center. Another station would be located adjacent to I-5 at SW 53rd Avenue.

The related transportation improvements within Segment B include 20 station access improvements, as shown on Figure D-3.



**Figure D-3**  
**Southwest Corridor**  
**Light Rail Project**  
**Segment B: Outer Portland**



### **D.1.3 Segment C: Tigard and Tualatin**

This segment extends from the Portland/Tigard city boundary to Bridgeport Village in Tualatin, which would be the southern terminus of the light rail alignment (see Figure D-4). In this segment, the light rail trackway would primarily run adjacent to existing roads or railroads. Segment C includes the Hunziker Operations and Maintenance (O&M) Facility to support light rail operations.

The light rail trackway would cross below SW Barbur Boulevard in an undercrossing between SW 64th Avenue and SW 65th Avenue, continuing below SW Coronado Street to emerge on the south side of Pacific Highway. The alignment would then cross over SW 68th Parkway and turn south into the Tigard Triangle to connect with SW 70th Avenue (see Exhibit 2.2-2 in Chapter 2 of this Final EIS for more information on the Tigard Triangle).

In the Tigard Triangle, the alignment would be side-running along the east side of SW 70th Avenue. Between SW Baylor Street and SW Elmhurst Street, the Preferred Alternative would construct missing portions of the SW 70th Avenue roadway. At the intersection of SW 70th Avenue and SW Dartmouth Street, light rail would cross over SW Dartmouth Street on a new structure, while the auto lanes and sidewalks would remain at grade. The route would turn west on SW Elmhurst Street and then cross over Highway 217 on a new light rail structure to reach downtown Tigard. The alignment would cross SW Hunziker Street at grade at SW Knoll Drive and then run adjacent to SW Hall Boulevard until SW Commercial Street. SW Hunziker Street would be reconstructed to align with SW Scoffins Street at the intersection with SW Hall Boulevard.

South of downtown Tigard, the alignment would turn southeast to run along the east side of the existing freight rail and West Express Service (WES) Commuter Rail tracks. Between SW Tech Center Drive and SW Bonita Road, the alignment would cross to the west side of the tracks on a new light rail structure. The trackway would continue on this structure over SW Bonita Road, over Ball Creek, and over the WES Commuter Rail and freight rail tracks again to land on the east side of the freight rail tracks. The alignment would continue south on the east side of the freight rail tracks, with at-grade gated crossings at SW 72nd Avenue and SW Upper Boones Ferry Road. At I-5, the alignment would turn southwest to cross over the freight rail tracks and then run along the west side of I-5 until the terminus just north of SW Lower Boones Ferry Road.

The Preferred Alternative would include stations in the Tigard Triangle (68th and Elmhurst stations) and in downtown Tigard (Hall Station). South of downtown Tigard, stations would be at SW Bonita Road, SW Upper Boones Ferry Road and Bridgeport Village. The Preferred Alternative would include a new surface park and ride with 350 spaces at the 68th Station, a new surface park and ride with 100 spaces at the Hall Station, and a structured park and ride with up to 960 spaces on five levels at the Bridgeport Station. The Preferred Alternative would include a new light rail O&M facility in Segment C to accommodate the added light rail vehicles in the TriMet system. The Hunziker O&M Facility would be located along the light rail alignment in the industrial area east of downtown Tigard.

The related transportation improvements within Segment C include seven station access improvements, as shown on Figure D-4.



## Southwest Corridor Light Rail Project

### Segment C: Tigard and Tualatin



## D.2 Section 4(f) Regulatory Context

The U.S. Department of Transportation Act of 1966, Section 4(f), generally prohibits U.S. Department of Transportation (USDOT) agencies, including FTA, from approving projects that would use land from:

... a significant publicly-owned park, recreation area or wildlife and waterfowl refuge or any significant historic site, unless there is no feasible and prudent alternative to the use of land from the property and the action includes all possible planning to minimize harm to the property resulting from the use.

Section 4(f) applies to significant publicly owned parks and recreation areas that are open to the public; publicly owned wildlife and waterfowl refuges; and historic properties of national, state or local significance. The USDOT regulations for Section 4(f) define significant historic properties as those listed in or eligible for the National Register of Historic Places (NRHP).

### D.2.1 “Uses” of Section 4(f) Resources

Under Section 4(f), a use can be permanent, temporary or constructive.

- **Permanent Incorporation:** A permanent incorporation of a Section 4(f) resource occurs when a resource is permanently removed or integrated into a proposed transportation project. This incorporation may occur as a result of a property acquisition or permanent easement.
- **Temporary Occupancy:** A temporary occupancy of a Section 4(f) resource occurs when there is a short-term use of a resource that is considered adverse in terms of the preservation purpose of the Section 4(f) statute.
- **Constructive Use:** A constructive use can occur when a project’s proximity impacts are so severe that the property’s Section 4(f) protected activities, features or attributes of the property are substantially impaired/diminished. For example, a park property that is primarily a scenic viewpoint could have a constructive use if a transportation project blocks views from the park. Loss of access or excessive noise or vibration are other ways a project could substantially impair a property’s protected characteristics. The factors to be used to make the determination of constructive use are defined in 23 Code of Federal Regulations (CFR) Part 774.15.

### D.2.2 Section 4(f) Exception for Temporary Occupancy

In accordance with 23 CFR Part 774.13, FTA can allow a Section 4(f) exception for temporary occupancy of a property under the following conditions:

- Duration must be temporary, i.e., less than the time needed for construction of the project, and there should be no change in ownership of the land;
- Scope of the work must be minor, i.e., both the nature and the magnitude of the changes to the Section 4(f) property are minimal;
- There are no anticipated permanent adverse physical impacts, nor will there be interference with the protected activities, features, or attributes of the property, on either a temporary or permanent basis;

- The land being used must be fully restored, i.e., the property must be returned to a condition that is at least as good as that which existed prior to the project; and
- There must be documented agreement of the official (or officials) with jurisdiction over the Section 4(f) resource regarding the above conditions.

### **D.2.3 De Minimis Section 4(f) Impact**

FTA can approve a transportation *de minimis* impact of a Section 4(f) property under certain conditions.

For parks, a *de minimis* impact means FTA has determined that the use meets the following requirements:

1. The proposed use would not adversely affect the features, attributes or activities that qualify the park for Section 4(f) protection;
2. The public has been given an opportunity to review and comment on the effects of the project on the protected activities, features and attributes of the Section 4(f) resource [23 CFR Part 774.5(b)]; and
3. The officials with jurisdiction (the park owner or operator) concur.

For historic properties, a *de minimis* impact means FTA has determined, pursuant to Section 106 of the Historic Preservation Act, and in accordance with 36 CFR Part 800, that either no historic resource would be affected by the project or that the project would have “no adverse effect” on the historic resource. Before making a *de minimis* finding on a historic or archaeological site, FTA must send a written notice to the State Historic Preservation Office (SHPO). If the SHPO concurs or does not object, FTA may proceed with a *de minimis* finding.

When FTA has made a *de minimis* determination, the project is not required to analyze avoidance alternatives for that Section 4(f) property. A *de minimis* impact determination also does not require all possible planning to minimize harm, as defined in 23 CFR 774.17, because avoidance, minimization, mitigation and enhancement measures are already included as part of the determination.

### **D.2.4 Identifying Feasible and Prudent Avoidance Alternatives**

When a project’s Section 4(f) impact would be greater than *de minimis*, FTA must determine that no feasible and prudent avoidance alternative exists before approving the use of such land (see 23 CFR 774.3). The Section 4(f) regulations refer to an alternative that would not require the use of any Section 4(f) property as an avoidance alternative. Feasible and prudent avoidance alternatives are those that avoid using any Section 4(f) property and do not cause other severe problems of a magnitude that substantially outweigh the importance of protecting the Section 4(f) property (23 CFR 774.17).

Avoidance alternatives may include:

- Location alternatives: Re-routing the entire project along a different alignment or corridor
- Alternative actions: Considering a different mode of transportation, such as bus service or bus rapid transit, or some other action that does not involve construction of light rail
- Alignment shifts: Re-routing a portion of the project to a different alignment to avoid a specific resource
- Design changes: Modifying the proposed design to avoid impacts, such as reducing the planned median width, building a retaining wall or incorporating design exceptions



FTA can determine a potential avoidance alternative is not feasible if it cannot be built as a matter of sound engineering judgment (23 CFR 774.17). The regulations also define the standards for determining if a potential avoidance alternative is prudent. FTA can determine an alternative is not prudent if:

1. It compromises the project to a degree that it is unreasonable to proceed in light of the project's stated purpose and need (i.e., the alternative doesn't address the purpose and need of the project);
2. It results in unacceptable safety or operational problems;
3. After reasonable mitigation, it still causes severe social, economic or environmental impacts; severe disruption to established communities; severe or disproportionate impacts to minority or low-income populations; or severe impacts to environmental resources protected under other federal statutes;
4. It results in additional construction, maintenance or operational costs of extraordinary magnitude;
5. It causes other unique problems or unusual factors; or
6. It involves multiple factors that, while individually minor, cumulatively cause unique problems or impacts of extraordinary magnitude.

If FTA finds that an alternative is not feasible and prudent, that alternative is removed from consideration as a way to avoid a Section 4(f) use.

### **D.2.5 Identifying an Alternative with the Least Overall Harm**

If there are no prudent and feasible alternatives that can avoid all Section 4(f) properties, then FTA must determine which alternative results in the least overall harm.

FTA must apply the seven factors set forth in 23 CFR 774.3(c)(1) concerning the alternatives under consideration. The first four factors relate to the net harm that each alternative would cause to Section 4(f) property:

1. The ability to mitigate adverse impacts to each Section 4(f) property (including any measures that result in benefits to the property);
2. The relative severity of the remaining harm, after mitigation, to the protected activities, attributes or features that qualify each Section 4(f) property for protection;
3. The relative significance of each Section 4(f) property; and
4. The views of the officials with jurisdiction over each Section 4(f) property.

The remaining three factors enable FTA to take into account any substantial problem with any of the alternatives remaining under consideration on issues beyond Section 4(f). These factors are:

5. The degree to which each alternative meets the purpose and need for the project;
6. After reasonable mitigation, the magnitude of any adverse impacts to resources not protected by Section 4(f); and
7. Substantial differences in costs among the alternatives.

## D.2.6 All Possible Planning to Minimize Harm

After determining that there are no feasible and prudent alternatives to avoid the use of Section 4(f) property, the project approval process for an individual Section 4(f) evaluation requires the consideration and documentation of all possible planning to minimize harm to Section 4(f) property, in accordance with 23 CFR 774.3(a)(2). All possible planning, defined in 23 CFR 774.17, means that all reasonable measures identified in the Section 4(f) evaluation to minimize harm or mitigate for adverse impacts and effects must be included in the project. All possible planning to minimize harm does not require analysis of feasible and prudent avoidance alternatives, since such analysis will have already occurred in the context of searching for feasible and prudent alternatives that avoid Section 4(f) properties altogether under Section 774.3(a)(1).

## D.2.7 Project Background and Purpose and Need

Metro and TriMet are proposing the 11-mile light rail project to improve transit service along the Southwest Corridor, extending from downtown Portland to Tigard and Bridgeport Village in Tualatin.

The Metro Council, a regionally elected body, identified this corridor in 2009 as a near-term priority in the regional *High Capacity Transit System Plan*. The Southwest Corridor Light Rail Project will provide needed mobility options within and through the Southwest Corridor, which increasingly faces congested and unreliable freeways in an area receiving substantial residential and employment growth under the region's adopted *2040 Growth Concept*. It is also needed to improve regional access to major employers and higher education facilities already located in the Southwest Corridor, and to meet state, regional and local goals for land use and reducing greenhouse gas emissions.

The purpose of the Project is to directly connect Tualatin, downtown Tigard, southwest Portland and the region's central city with light rail, high quality transit and appropriate community investments in a congested corridor to improve mobility and create the conditions that will allow communities in the corridor to achieve their land use vision. Specifically, the Project aims to, within the Southwest Corridor:

- provide light rail service that is cost-effective to build and operate with limited local resources
- serve existing transit demand and significant projected growth in ridership resulting from increases in population and employment in the corridor
- improve transit service reliability, frequency and travel times, and provide connections to existing and future transit networks including WES Commuter Rail
- support adopted regional and local plans including the *2040 Growth Concept*, the *Barbur Concept Plan*, the *Tigard Triangle Strategic Plan* and the *Tigard Downtown Vision* to accommodate projected significant growth in population and employment
- complete and enhance multimodal transportation networks to provide safe, convenient and secure access to transit and adjacent land uses
- advance transportation projects that increase active transportation and encourage physical activity
- provide travel options that reduce overall transportation costs
- improve multimodal access to existing jobs, housing and educational opportunities, and foster opportunities for commercial development and a range of housing types adjacent to transit



- ensure benefits and impacts promote community equity
- advance transportation projects that are sensitive to the environment, improve water and air quality, and help achieve the sustainability goals and measures in applicable state, regional and local plans

Chapter 1 of this Final EIS addresses the Project's background and Purpose and Need. Chapter 2 describes the No-Build Alternative and the Preferred Alternative, and summarizes the other alternatives and concepts studied to date.

### **D.3 Section 4(f) Resources**

In the Project's Draft EIS, a Draft Section 4(f) Evaluation previously identified the Section 4(f) properties and potential impacts for all alternatives. This Final Section 4(f) Evaluation updates that information for all alternatives, based on coordination with agencies with jurisdiction over the resources, agency and public comments on the Draft EIS and the Draft Section 4(f) Evaluation, updated design information, and the results of additional environmental analysis conducted for the Final EIS.

This updated evaluation identifies the Section 4(f) resources in the study area encompassing the Preferred Alternative and other Project alternatives. The same study area was used for parks and recreation resources and for historic resources. For historic resources, the Section 4(f) study area encompasses the area of potential effects (APE) defined through the Project's Section 106 consultations between FTA and the Oregon SHPO. The APE for the Project generally extends at least 50 feet from the edge of construction of the Preferred Alternative and also extends to the edges of a property parcel if the entire parcel would be acquired. The APE was also extended beyond the APE where there is the potential for high visual, noise or other impacts. For Section 4(f) review purposes, FTA concluded the APE for historic resources also effectively covered areas where any park or recreation resources could experience a use due to physical or proximity impacts.

Section D.3.1 describes the park and recreational facilities found within the study area and assesses whether these are Section 4(f) resources. Section D.3.2 summarizes the process for how Section 4(f) historic properties were identified. There are no wildlife or waterfowl refuges in the study area. Figures D-5 to D-7 map the Section 4(f) resources identified in the study area. Figure D-5 shows the resources in Segment A. Figure D-6 shows these resources for Segment B, and Figure D-7 identifies the resources in Segment C.

#### **D.3.1 Parks and Recreation Resources**

Parks and recreation resources in the study area are owned and managed by the City of Portland Parks and Recreation, City of Tigard Public Works Department, Metro and Portland Public Schools. There are 12 park and recreation properties that are open to the public in the study area; 11 of these are considered Section 4(f) resources (see Table D-1). Several of the parks and recreation resources in the City of Portland are also historic resources, and they and their historic characteristics are also listed in Section D.3.2 Historic Properties.

**Figure D-5**  
**Section 4(f) Resources**  
**Segment A: Inner Portland**

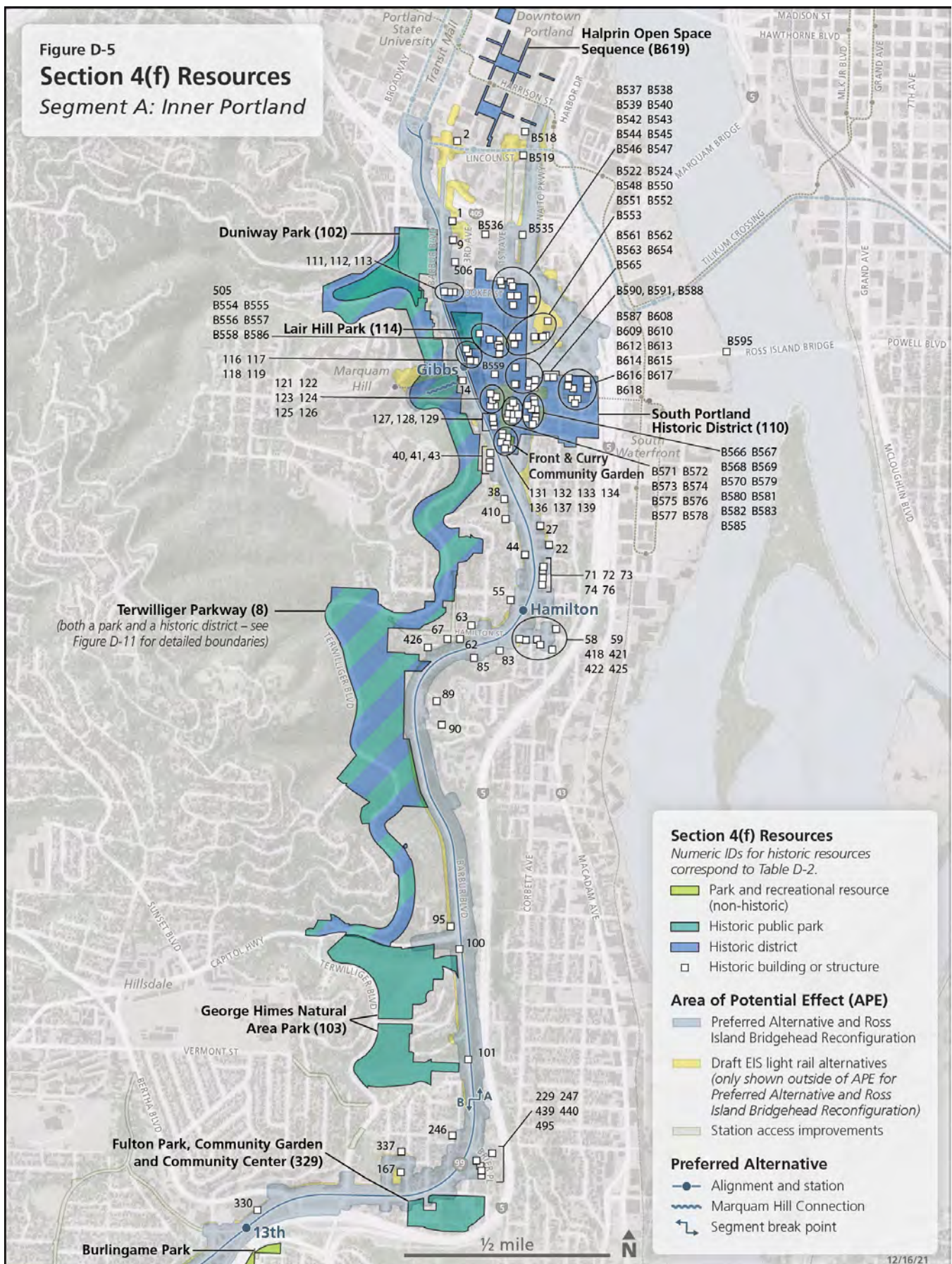




Figure D-6

# Section 4(f) Resources Segment B: Outer Portland

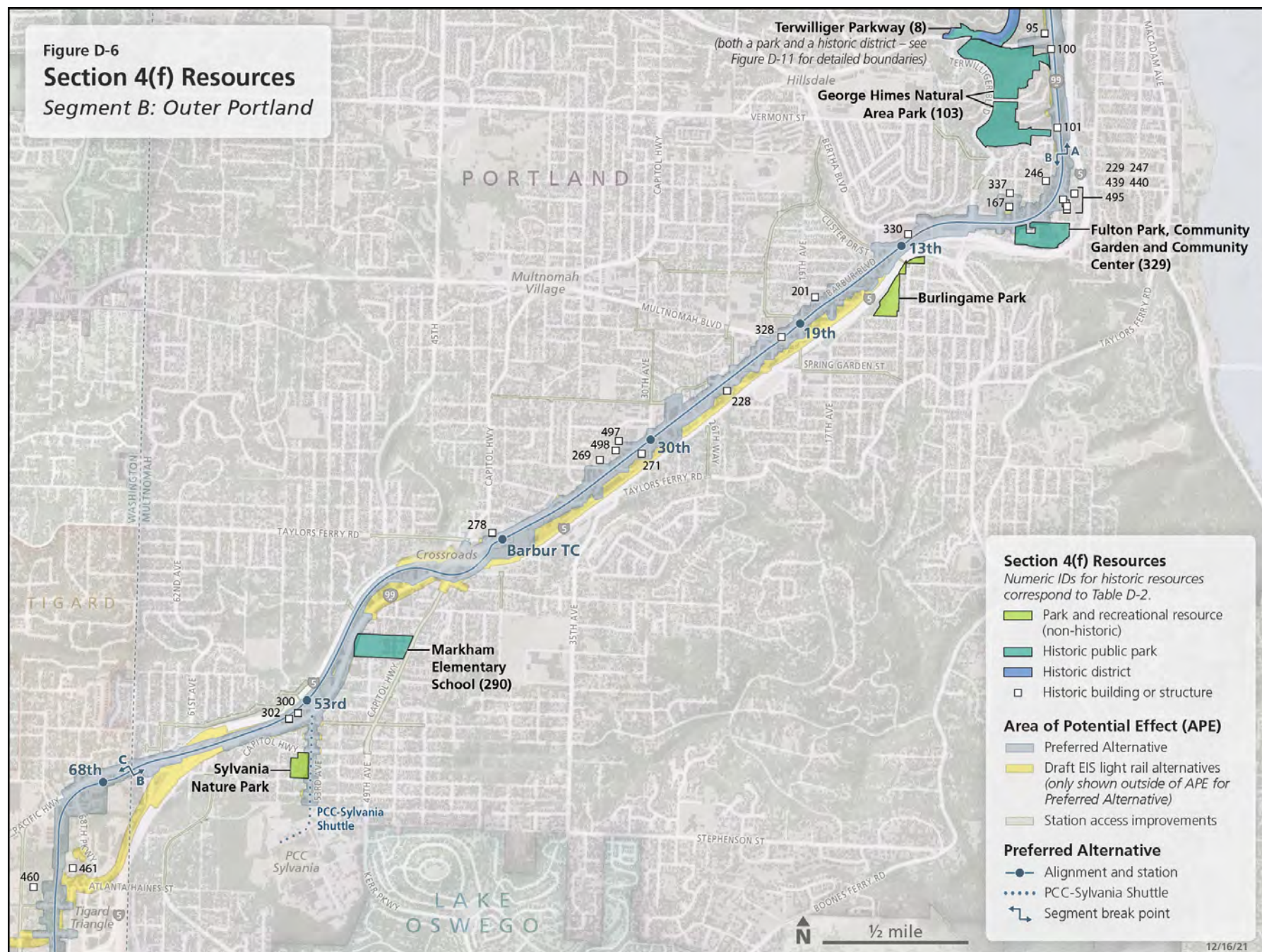
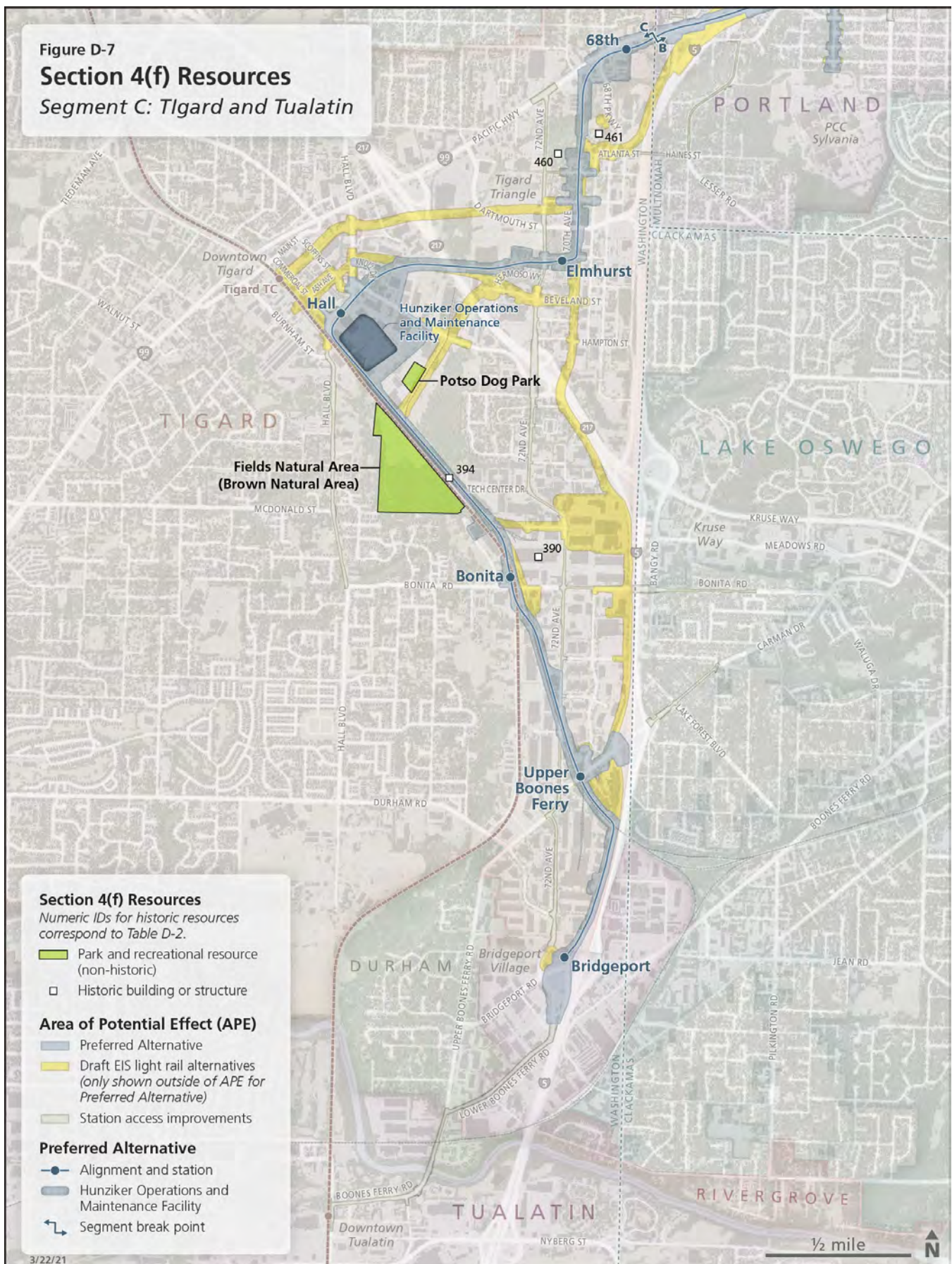




Figure D-7

## Section 4(f) Resources

### Segment C: Tigard and Tualatin





**Table D-1. Summary of Section 4(f) Park and Recreation Resources (*multipage table*)**

| Resource Name                                       | Location/<br>Property Manager or Owner   | Qualifies as Section 4(f) Resource?<br>Site Features and Characteristics   |
|---|--|--|
| <b>Segment A: Inner Portland</b>                    |  |  |
| Duniway Park*                                       | SW Barbur Blvd. and SW Sheridan St.<br>City of Portland  | Yes, qualifies as a Section 4(f) park and recreational property. The 14.03-acre park was acquired by the City of Portland in 1918. Its recreation amenities are a lilac garden with more than 125 varieties of lilacs, a newly updated synthetic surface soccer field, horseshoe pit, paved and unpaved paths, picnic tables and a newly resurfaced exercise track. The park has a small, 11-space parking area accessed only by southbound traffic on SW Barbur Blvd.   |
| Lair Hill Park*                                     | SW Barbur Blvd. and SW Woods St.<br>City of Portland   | Yes, qualifies as a Section 4(f) park and recreational property. This 3.26-acre neighborhood park features mature trees, lawns and structures. Its recreation amenities are a tennis court, tennis backboard, public art, picnic tables, playgrounds and paved paths.  |
| Terwilliger Parkway*                                | SW Terwilliger Blvd. approximately from the intersection with SW Sam Jackson Park Rd. to the intersection with SW Capitol Hwy.<br>City of Portland | Yes, qualifies as a Section 4(f) park and recreational property. This 102.8-acre linear parkway along SW Terwilliger Blvd. is part of the regional 40-Mile Loop trail system and provides paved walking paths, picnic tables, viewpoints, hiking trails, bike paths and one playground.  |
| Water and Gibbs Community Garden                    | SW Water Ave. and SW Gibbs St.   | No. Located within City of Portland Bureau of Transportation property defined as primarily for transportation use.   |
| Front and Curry Community Garden                    | SW Naito Pkwy. Frontage Rd. and SW Curry St.<br>City of Portland   | Yes, qualifies as a Section 4(f) recreational property. This 0.23-acre site was acquired in 1952, and has 25 garden plot areas and a storage garage.   |
| George Himes Natural Area Park*                     | Between SW Capitol Hwy., SW Terwilliger Blvd. and SW Barbur Blvd.<br>City of Portland  | Yes, qualifies as a Section 4(f) park property. This park consists of 32.4 acres of forested natural area with paved and unpaved paths, picnic tables and hiking trails. One of the City of Portland's hiking trails begins in park property near SW Terwilliger Blvd. but then crosses into ODOT property under SW Barbur Blvd.   |
| <b>Segment B: Outer Portland</b>                    |  |  |
| Fulton Park, Community Garden and Community Center* | SW Barbur Blvd. and SW Miles St.<br>City of Portland   | Yes, qualifies as a Section 4(f) park and recreational property. The park, community garden and community center comprise 8.21 acres and provide multiple recreation amenities, including a large community garden area (1.77 acres), basketball court, unpaved walking paths, picnic tables, a playground and a soccer field. The park also includes the Fulton Park Community Center at the east end of the park. The Community Center offers one main hall area that is rented out for community events and classes on a regular basis. |
| Markham Elementary School*                          | 10531 SW Capitol Hwy.<br>Portland Public Schools   | Yes, qualifies as a Section 4(f) recreational property. The western property boundary of this 4.38-acre school playground is located along SW Barbur Blvd. The playground contains three baseball diamonds, grass fields, a basketball court and a play structure, and is open to the public during non-school hours.  |
| Burlingame Park                                     | SW Barbur Blvd. and I-5 at SW 12th Ave. and SW Falcon St.  | Yes, qualifies as a Section 4(f) park and recreational property. It is a 4.6-acre park with recreation amenities including an accessible play area, paved and unpaved paths, picnic tables, a playground, a soccer field and a softball field. Street parking is available on SW Falcon St.  |
| Sylvania Natural Area Park                          | SW Capitol Hwy. and SW 53rd Ave.<br>City of Portland   | Yes, qualifies as a Section 4(f) park and recreational property. This 2.7-acre forested park was acquired in 2002 and contains two paths that provide access. There is no dedicated parking for this park, and pedestrian access is focused on SW Capitol Hwy. and SW Coronado St.   |

**Table D-1. Summary of Section 4(f) Park and Recreation Resources (*multipage table*)**

| Resource Name                            | Location/<br>Property Manager or Owner                            | Qualifies as Section 4(f) Resource?<br>Site Features and Characteristics  |
|--|---|---|
| <b>Segment C: Tigard and Tualatin</b>    |   |   |
| Potso Dog Park                           | SW Wall St. south of SW Hunziker St.<br>City of Tigard            | Yes, qualifies as a Section 4(f) park and recreational property. At 1.5 acres, this is Tigard's largest fenced dog park. It has perimeter fencing, a walking path, a smaller fenced area for smaller dogs and puppies, shaded picnic tables and benches. The park has off-street parking with approximately 30 parking spaces.  |
| Fields Natural Area (Brown Natural Area) | East of Tigard Library, between Fanno Creek and railroad<br>Metro | Yes, qualifies as a Section 4(f) park property. The Brown Natural Area consists of approximately 26 acres of woods and open fields. It is located east of the Tigard Library, between Fanno Creek and the railroad. Metro owns the property and has been actively conducting restoration activities to restore native Oregon white oak habitat in portions of the site. |

Source: Portland Parks and Recreation Parks Finder available at <https://www.portlandoregon.gov/parks/finder/> (July 2021).

City of Tigard Community Dog Parks available at <http://www.tigard-or.gov/community/dogparks.php> (July 2021).

\* Indicates a park and recreation resource that is also historic, because it is in or is eligible for the National Register of Historic Places.

Note: I-5 = Interstate 5.

### D.3.2 Historic Properties

For historic properties, the Section 4(f) evaluation incorporates FTA's formal Section 106 determinations of eligibility for historic properties on or qualifying for the NRHP, with concurrence from the Oregon SHPO. The Draft EIS identified properties in the APE that were already on or had previously been determined eligible for the NRHP, as well as resources likely to be eligible, covering the APE for all alternatives. For the Final EIS and related compliance with Section 106, the formal determinations of eligibility by FTA and the Oregon SHPO's written concurrence as well as the mitigation commitments are focused primarily on properties in the APE for the Preferred Alternative. These determinations are further documented in the Project's Cultural Resource Survey for the Southwest Corridor Light Rail Project, Multnomah and Washington Counties, Oregon (referred to in brief as the Cultural Resource Survey), which is included as Attachment C to the Final EIS.

Consistent with Section 106 terminology and Section 4(f) guidance, the use of the term "historic properties" in this Final Section 4(f) Evaluation covers resources listed in or eligible for listing in the NRHP. The NRHP-eligible historic properties in the study area include historic buildings, historic structures (bridges), three historic districts and a historic object. To help differentiate between the two primary categories of historic properties qualifying as Section 4(f) resources in the study area, the discussion below first addresses "archaeological resources" and then "historic resources."

#### Archaeological Resources

Project archaeologists identified 13 archaeological sites within the APE. None of these sites has been determined to be NRHP-eligible, although three have not been evaluated for eligibility. Project archaeologists also reviewed other information sources to predict the potential for undiscovered archaeological resources and conducted field reconnaissance.

In some locations, as-yet-undiscovered archaeological resources could still be present, particularly in areas that have not been disturbed by development, although most of the APE is paved or occupied by developments. Project archaeologists identified high probability areas (HPAs) using maps and records of Euro-American and Native American land use, and they analyzed remaining intact lands that could contain

archaeological artifacts. (For example, artifacts from Native Americans in the Northwest are often found near historic water bodies.) Project archaeologists defined a total of 28 HPAs within the APE.

An HPA is not automatically a Section 4(f) resource. It first must be confirmed to hold an archaeological site, and then FTA needs to determine, in consultation with the Oregon SHPO and involved tribes, that the site is significant and intact enough to be NRHP-eligible. For certain sites determined NRHP-eligible, 23 CFR 774.13(b) provides exceptions to Section 4(f) requirements when an archaeological site does not require preservation in place in order to maintain its significance. This Project includes a pre-construction commitment to identify and evaluate previously unrecorded archaeological sites or objects in areas that could not be investigated prior to completion of the Final EIS, as well as to conduct monitoring during construction. If a NRHP-eligible site is identified, FTA would evaluate the site for a potential use in accordance with Section 4(f) requirements.

## Historic Resources

All NRHP-eligible historic properties in the study area are shown on Figures D-5 to D-7. In accordance with Section 106 regulations, the Project applied the following established NRHP criteria used for determining eligibility for listing:

- A. The property must be associated with events that have made a significant contribution to the broad patterns of our history.
- B. The property must be associated with the lives of persons significant in our past.
- C. The property must embody the distinctive characteristics of a type, period, or method of construction, represent the work of a master, possess high artistic values, or represent a significant and distinguishable entity whose components may lack individual distinction.
- D. The property must show, or may be likely to yield, information important to history or prehistory.

For historic resources, which include buildings, structures and landscapes such as parks, the Project's resource specialists surveyed known and potential historic properties by documenting 619 properties, including buildings, structures, districts, sites (e.g., parks) and objects that would be 50 years old by the year 2025 and that are within or intersect the APE. Of these, 78 significant historic properties qualify as Section 4(f) resources because they are listed in the NRHP, or were previously documented as eligible, or have been determined eligible for the NRHP by FTA as part of the Project's NEPA and Section 106 processes. These properties include the South Portland Historic District that itself contains 79 individual properties that contribute to the district's significance.

The *Cultural Resource Survey*, included in the Final EIS Attachment C, provides a list, maps and photographs of the properties assessed within the APE (encompassing the Preferred Alternative, the Ross Island Bridgehead Reconfiguration, and other related transportation improvements). The *Cultural Resource Survey* report includes a baseline survey as well as property inventory forms for determinations of NRHP eligibility and findings of effect. FTA's determinations of eligibility and effect documented in the *Cultural Resource Survey* have the written concurrence of the Oregon SHPO.

Table D-2 lists NRHP-eligible historic properties within the Section 4(f) study area, corresponding to the mapping in Figures D-5 to D-7. This also includes the five historic parks addressed in Section D.3.1.



**Table D-2. Summary of Historic Properties Qualifying as Section 4(f) Resources (multipage table)**

| Map ID# | Address                           | Name  | NRHP Determination            |
|---------|-----------------------------------|---|-------------------------------|
| 1       | 2400 SW Fourth Ave.               | Duniway Plaza   | Eligible                      |
| 2       | 2000 SW Fifth Ave.                | -   | Eligible                      |
| 8       | SW Terwilliger Blvd.              | Terwilliger Parkway   | Listed (2021)                 |
| 9       | 2525 SW Third Ave.                | Marquam Plaza   | Eligible                      |
| 14      | 3225 SW Barbur Blvd.              | Ahavath Achim Synagogue   | Eligible                      |
| 22      | 4019 SW Corbett Ave.              | -   | Eligible                      |
| 27      | 3926 SW Water Ave.                | -   | Eligible                      |
| 38      | 3811 SW Barbur Blvd.              | -   | Eligible                      |
| 40      | 3635 SW Condor Ave.               | -   | Eligible                      |
| 41      | 3625 SW Condor Ave.               | -   | Listed (1978)                 |
| 43      | 3605 SW Condor Ave.               | -   | Eligible                      |
| 44      | 022 SW Lowell St.                 | -   | Eligible                      |
| 55      | 4315 SW View Point Terrace        | -   | Eligible                      |
| 58      | 018 SW Hamilton St.               | -   | Eligible                      |
| 59      | 04 SW Hamilton St.                | -   | Eligible                      |
| 62      | 218-220 SW Hamilton St.           | -   | Eligible                      |
| 63      | 127 SW Hamilton St.               | -   | Eligible                      |
| 67      | 304 SW Hamilton St.               | -   | Eligible                      |
| 71      | 4133 SW Corbett Ave.              | -   | Listed (1984)                 |
| 72      | 4145 SW Corbett Ave.              | -   | Eligible                      |
| 73      | 4205 SW Corbett Ave.              | -   | Eligible                      |
| 74      | 4215-4217 SW Corbett Ave.         | -   | Eligible                      |
| 76      | 4231-4237 SW Corbett Ave.         | -   | Eligible                      |
| 83      | 26 SW Condor Ave.                 | Tabernacle Seventh-Day Adventist Church                         | Eligible                      |
| 85      | 4619 SW Condor Ave.               | -   | Eligible                      |
| 89      | 4820 SW Barbur Blvd.              | -   | Eligible                      |
| 90      | 4950 SW Barbur Blvd.              | Rasmussen Village   | Eligible                      |
| 95      | 5910 SW Ralston Dr.               | -   | Eligible                      |
| 100     | SW Newbury St. Viaduct            | ODOT Bridge #01983  | Eligible                      |
| 101     | SW Vermont St. Viaduct            | ODOT Bridge #01984  | Eligible                      |
| 102     | SW Sixth Ave. and SW Sheridan St. | Duniway Park  | Eligible                      |
| 103     | 6400 SW Terwilliger Blvd.         | George Himes Park   | Eligible                      |
| 110     | SW Barbur Boulevard               | South Portland Historic District                                | Listed (1998)                 |
| 111     | 322 SW Meade St.                  | Murphy, Charles C & Anna House                                  | Contributing Resource – SPHD  |
| 112     | 330 SW Meade St.                  | Tartarimi, Gaetano & Victoria House #2                          | Contributing Resource – SPHD  |
| 113     | 338 SW Meade St.                  | Tartarimi House #1  | Contributing Resource - SPHD  |
| 114     | 3037 SW Second Ave.               | Lair Hill Park (and Multnomah County Hospital Nurses' Quarters) | Contributing Resources - SPHD |
| 116     | 3133 SW Second Ave.               | Durschmidt, Rudolph House                                       | Contributing Resource - SPHD  |

**Table D-2. Summary of Historic Properties Qualifying as Section 4(f) Resources (multipage table)**

| Map ID# | Address                         | Name                                     | NRHP Determination           |
|---------|---------------------------------|--|------------------------------|
| 117     | 3125 SW Second Ave.             | King, Ann House                          | Contributing Resource - SPHD |
| 118     | 3124 SW Barbur Blvd.            | Fiebiger, Victoria House                 | Contributing Resource - SPHD |
| 119     | 230 SW Woods St.                | Pulvermacher, R. House                   | Contributing Resource - SPHD |
| 121     | 3333 SW First Ave.              | Boyd, Narcissa and Thomas House #2       | Contributing Resource - SPHD |
| 122     | 117 SW Whitaker St.             | Boyd, Narcissa and Thomas House #1       | Contributing Resource - SPHD |
| 123     | 3311 SW First Ave.              | Switzler, Dennie House                   | Contributing Resource - SPHD |
| 124     | 3307 SW First Ave.              | Spageli, Fred House #2                   | Contributing Resource - SPHD |
| 125     | 3303 SW First Ave.              | Spageli, Fred House #1                   | Contributing Resource - SPHD |
| 126     | 118 SW Gibbs St.                | Dilg, Julius and Anna House              | Contributing Resource - SPHD |
| 127     | 105 SW Curry St.                | Chehak, Seraphim John House #4           | Contributing Resource - SPHD |
| 128     | 3425 SW First Ave.              | Lawton, Philip and Julia House           | Contributing Resource - SPHD |
| 129     | 3419 SW First Ave.              | Severson, R.W. and Tracy, C.W. House     | Eligible                     |
| 131     | 26 SW Curry St.                 | Thompson, D.P. House #2                  | Contributing Resource - SPHD |
| 132     | 3504 SW First Ave.              | Voos, Frederika House                    | Contributing Resource - SPHD |
| 133     | 3510 SW First Ave.              | O'Leonor, Bridget L. House               | Contributing Resource - SPHD |
| 134     | 3516 SW First Ave.              | Gervutz, S. House                        | Contributing Resource - SPHD |
| 136     | 19 SW Pennoyer St.              | Gundolph, Ferdinand House #2             | Contributing Resource - SPHD |
| 137     | 3522-3524 SW First Ave.         | Thompson, D.P. House #1                  | Contributing Resource - SPHD |
| 139     | 23 SW Pennoyer St.              | Sussman, Osias House                     | Contributing Resource - SPHD |
| 167     | 7225 SW Fourth Ave.             | -  | Eligible                     |
| 201     | 1801 SW Evans St.               | -  | Eligible                     |
| 228     | 8601 SW 24th Ave.               | Original Pancake House                   | Eligible                     |
| 229     | 7114 SW Brier Pl.               | -  | Eligible                     |
| 246     | 7037 SW Second Ave.             | -  | Eligible                     |
| 247     | 7115 SW Brier Pl.               | -  | Eligible                     |
| 269     | 3405 SW Alice St.               | Good Shepherd Lutheran Church            | Eligible                     |
| 271     | 9110 SW Barbur Blvd.            | Capitol Hill Motel                       | Eligible                     |
| 278     | 9803 SW Barbur Blvd.            | Master Wrench                            | Eligible                     |
| 290     | 10531 SW Capitol Hwy.           | Edwin Markham Elementary School          | Eligible                     |
| 300     | 5350 SW Pasadena St.            | -  | Eligible                     |
| 302     | 11125 SW Barbur Blvd.           | -  | Eligible                     |
| 328     | Hwy. 1W over SW Multnomah Blvd. | ODOT Bridge #02010                       | Eligible                     |
| 329     | 68 SW Miles St.                 | Fulton Park                              | Eligible                     |
| 330     | 7529-7601 SW Barbur Blvd.       | Burlingame Fred Meyer Sign               | Eligible                     |
| 337     | 7147 SW Fourth Ave.             | -  | Eligible                     |
| 390     | 14255 SW 72nd Ave.              | Fought & Company Inc.                    | Eligible                     |
| 394     | Linear facility                 | Southern Pacific Railroad, Tigard Branch | Eligible                     |
| 410     | 16 SW Abernethy St.             | Hudson, Harvey S. House                  | Eligible                     |
| 418     | 0219-0221 SW Hamilton St.       | -  | Eligible                     |

**Table D-2. Summary of Historic Properties Qualifying as Section 4(f) Resources (multipage table)**

| Map ID# | Address                 | Name   | NRHP Determination                                   |
|---------|-------------------------|--|--|
| 421     | 4515 SW Corbett Ave.    | Oregon Insurance Center                            | Eligible   |
| 422     | 0112 SW Hamilton St.    | -  | Eligible   |
| 425     | 4606 SW Corbett Ave.    | -  | Eligible   |
| 426     | 374 SW Hamilton Ct.     | -  | Eligible   |
| 439     | 7211 SW Brier Pl.       | -  | Eligible   |
| 440     | 7221 SW Brier Pl.       | -  | Eligible   |
| 460     | 11530 SW 72nd Ave.      | -  | Eligible   |
| 461     | 6900 SW Atlanta St.     | Oregon Education Association                       | Eligible   |
| 495     | 7301 SW Brier Pl.       | -  | Eligible   |
| 497     | 3211 SW Primrose St.    | -  | Eligible   |
| 498     | 3220 SW Primrose St.    | -  | Eligible   |
| 505     | 3030 SW Second Ave.     | Cedarwood Waldorf School                           | Contributing Resource - SPHD                         |
| 506     | 2611 SW Third Ave.      | Marquam II   | Eligible   |
| B518    | 2000 SW First Ave.      | IBM Building                                       | Eligible   |
| B519    | 2112 SW First Ave.      | -  | Eligible   |
| B522    | 036-038 SW Porter St.   | -  | Eligible   |
| B524    | 049 SW Porter St.       | Failing, Josiah School                             | Eligible   |
| B535    | 2510 SW First Ave.      | Addressograph - Multigraph Building                | Eligible   |
| B536    | 2501 SW First Ave.      | Marquam Building                                   | Eligible   |
| B537    | 2737 SW First Ave.      | Mayor Riley House                                  | Contributing Resource - SPHD                         |
| B538    | 2721-2725 SW First Ave. | Lakefish, B & Mary House and Laberson, CE House    | Contributing Resource - SPHD                         |
| B539    | 2732 SW First Ave.      | Marquam, Philip Augustus House #2                  | Contributing Resource - SPHD                         |
| B540    | 2740 SW First Ave.      | Marquam, Philip Augustus House #1                  | Contributing Resource - SPHD                         |
| B542    | 2828 SW Naito Pkwy.     | Helen Kelly Manley Community Center                | Eligible   |
| B543    | 19-21 SW Hooker St.     | Dewell, Mary E & Charles House                     | Contributing Resource - SPHD                         |
| B544    | 25 SW Hooker St.        | Warren, Mary House                                 | Contributing Resource - SPHD                         |
| B545    | 2824-2826 SW First Ave. | -  | Contributing Resource - SPHD                         |
| B546    | 26 SW Meade St.         | Rosenfeld, Maris Sophia House                      | Contributing Resource - SPHD                         |
| B547    | 2806 SW First Ave.      | Taylor, Peter and Haehlen, John & Gotlieb House #1 | Individually Listed and Contributing Resource - SPHD |
| B548    | 3004 SW First Ave.      | Pope, Seth L. House                                | Contributing Resource - SPHD                         |
| B550    | 16 SW Porter St.        | Baldwin House                                      | Contributing Resource - SPHD                         |
| B551    | 18 SW Porter St.        | -  | Eligible   |
| B552    | 26 SW Porter St.        | Perlot, John N. & Harriet E. House                 | Contributing Resource - SPHD                         |
| B553    | 25 SW Woods St.         | Jolly House  | Contributing Resource - SPHD                         |
| B554    | 3025 SW First Ave.      | Wallace, Sidney Property                           | Contributing Resource - SPHD                         |
| B555    | 3033 SW First Ave.      | Coldwell, Edward Lathrop House #2                  | Contributing Resource - SPHD                         |
| B556    | 3037 SW First Ave.      | Coldwell, Edward Lathrop House #1                  | Contributing Resource - SPHD                         |
| B557    | 3115 SW First Ave.      | Barcroft, Anna House #3                            | Contributing Resource - SPHD                         |



**Table D-2. Summary of Historic Properties Qualifying as Section 4(f) Resources (multipage table)**

| Map ID# | Address                 | Name   | NRHP Determination           |
|---------|-------------------------|--|------------------------------|
| B558    | 3125 SW First Ave.      | Corner, E.L. House                             | Contributing Resource - SPHD |
| B559    | 3207 SW First Ave.      | Vance Land Company Warehouse                   | Contributing Resource - SPHD |
| B561    | 11 SW Gibbs St.         | Wolfman House                                  | Eligible                     |
| B562    | 15 SW Gibbs St.         | Carlson House                                  | Contributing Resource - SPHD |
| B563    | 18 SW Gibbs St.         | Roberston House                                | Contributing Resource - SPHD |
| B564    | 3213-3215 SW Water Ave. | Watkins, George and Rood, E.H. House           | Contributing Resource - SPHD |
| B565    | 25 SW Gibbs St.         | Drake, John M. & Angeline House                | Contributing Resource - SPHD |
| B566    | 3317-3319 SW Water Ave. | Gavurtz, J. House                              | Contributing Resource - SPHD |
| B567    | 3325-3327 SW Water Ave. | Klump, William House #1 and #2                 | Contributing Resource - SPHD |
| B568    | 31-37 SW Whitaker St.   | Rummeline, Frank & Louise R. House #2          | Contributing Resource - SPHD |
| B569    | 23 SW Whitaker St.      | Rummeline, Frank & Louise R. House #1          | Contributing Resource - SPHD |
| B570    | 17 SW Whitaker St.      | Driskell House                                 | Contributing Resource - SPHD |
| B571    | 5 SW Whitaker St.       | Tillman House                                  | Contributing Resource - SPHD |
| B572    | 17 SW Whitaker St.      | Rudy, Marcus House #1                          | Contributing Resource - SPHD |
| B573    | 3323 SW Naito Pkwy.     | Maxwell House                                  | Contributing Resource - SPHD |
| B574    | 24 SW Whitaker St.      | Strauss, Charles A. & R.F. House               | Contributing Resource - SPHD |
| B575    | 3417 SW Naito Pkwy.     | Foulkes, Robert House                          | Contributing Resource - SPHD |
| B576    | 16 SW Whitaker St.      | Foulkes, Robert House #2                       | Contributing Resource - SPHD |
| B577    | 14 SW Whitaker St.      | Foulkes, Robert House #1                       | Contributing Resource - SPHD |
| B578    | 3405 SW Naito Pkwy.     | Long, H.R. & S.E. House                        | Contributing Resource - SPHD |
| B579    | 16 SW Whitaker St.      | Rice, Alice R. House                           | Contributing Resource - SPHD |
| B580    | 24 SW Whitaker St.      | Anderson, Richard & Beda House                 | Contributing Resource - SPHD |
| B581    | 36 SW Whitaker St.      | Francone, Marie House                          | Contributing Resource - SPHD |
| B582    | 3415 SW Water Ave.      | Hope, John B. House                            | Contributing Resource - SPHD |
| B583    | 3425 SW Water Ave.      | Smith, Earl P. & Marvel E. House               | Contributing Resource - SPHD |
| B585    | 17 SW Curry St.         | Bronaugh, Earl C. and Carter, Lorenzo C. House | Contributing Resource - SPHD |
| B586    | 3101 SW First Ave.      | Buckman Apartments                             | Contributing Resource - SPHD |
| B587    | 3204 SW Corbett Ave.    | Heubner, Julius House                          | Contributing Resource - SPHD |
| B588    | 3205 SW Corbett Ave.    | Himes, George & A.A. House                     | Contributing Resource - SPHD |
| B590    | 110 SW Grover St.       | Cardwell, B.P. House                           | Contributing Resource - SPHD |
| B591    | 116 SW Grover St.       | Smith, A.P. House                              | Contributing Resource - SPHD |
| B595    | -                       | Ross Island Bridge                             | Determined Eligible (1985)   |
| B608    | 222 SW Gibbs St.        | Forsythe, Maria L. House                       | Contributing Resource - SPHD |
| B609    | 3303 SW Kelly Ave.      | Deuschel, Emma L. House                        | Contributing Resource - SPHD |
| B610    | 3315 SW Kelly Ave.      | Hughes, Julia M. House #3                      | Contributing Resource - SPHD |
| B612    | 231 SW Gibbs St.        | The Reed Institute Building #1                 | Contributing Resource - SPHD |
| B613    | 223 SW Gibbs St.        | The Reed Institute Building #2                 | Contributing Resource - SPHD |
| B614    | 3222 SW Corbett Ave.    | Failing, Jesse House #2                        | Contributing Resource - SPHD |

**Table D-2. Summary of Historic Properties Qualifying as Section 4(f) Resources (multipage table)**

| Map ID# | Address                 | Name                        | NRHP Determination           |
|---------|-------------------------|-----------------------------|------------------------------|
| B615    | 3224 SW Kelly Ave.      | Sprover, Dora House         | Contributing Resource - SPHD |
| B616    | 3214 SW Kelly Ave.      | Donovan, R.M. House         | Contributing Resource - SPHD |
| B617    | 3206-3208 SW Kelly Ave. | Findley, May House #3       | Contributing Resource - SPHD |
| B618    | 3204 SW Kelly Ave.      | Findley, May House #2       | Eligible                     |
| B619    | -                       | Halprin Open Space Sequence | Listed (2013)                |

Note: NRHP = National Register of Historic Places; SPHD = South Portland Historic District.

## D.4 Uses of Section 4(f) Resources

The analysis described above identified 82 Section 4(f) resources in the study area. Of these, 79 are historic properties, which includes 5 historic parks. There are 3 other park resources that are not historic properties.

For the purposes of comparing potential Section 4(f) uses across alternatives and to help identify potential avoidance alternatives, FTA identified a permanent Section 4(f) use in this evaluation when any of the Project's alternatives would permanently occupy part or all of a Section 4(f) property, including when it would qualify for a *de minimis* finding. This review also considered when an alternative would have proximity impacts that would rise to the level of impairing a Section 4(f) property and resulting in a constructive use, although ultimately no such impacts were identified for any Section 4(f) property for any alternative. Finally, the analysis identified where an alternative would temporarily occupy a property and qualify for a temporary occupancy exception to a use.

The Preferred Alternative and related transportation improvements would result in permanent uses of 34 properties and temporary occupancies of 11 properties. There would be 37 properties with no use.

Section D4.1 describes uses by the Preferred Alternative and related transportation improvements, including those that qualify for *de minimis* impact determinations and those that would result in greater than *de minimis* impacts. Uses for the EIS alternatives are presented in Section D.4.2. Properties qualifying for temporary occupancy exceptions are then identified in Section D.4.3. The attachments to this Appendix D, Final Section 4(f) Evaluation, provide supporting details for determinations related to the Preferred Alternative and related transportation improvements, including records of consultation with the Oregon SHPO and the City of Portland, which have jurisdiction over certain of the affected properties.

### D.4.1 Evaluation of Uses for the Preferred Alternative and Related Transportation Improvements

The Preferred Alternative and the related transportation improvements would result in permanent uses of 34 properties, which are listed in Table D-3 and shown in Figures D-8 to D-10.

**Table D-3. Summary of Section 4(f) Resources Affected by the Preferred Alternative and Related Transportation Improvements (*multipage table*)**

| Property Name and Address  | Property Type<br>( <i>unless noted as listed in NRHP, historic properties are eligible for listing</i> ) | Impact Caused by Preferred Alternative or Related Transportation Improvements | Summary of Impacts   | Section 4(f) Determination                    |
|--|--|---|--|---|
| Terwilliger Parkway  | Historic public park   | Preferred Alternative   | Addition of inclined elevator through park property; partial parcel acquisition                | Permanent use, greater than <i>de minimis</i> |
| South Portland Historic District                                       | Historic district (listed in NRHP)   | Preferred Alternative   | Removal of 6 contributing structures and changes to the district's setting                     | Permanent use, greater than <i>de minimis</i> |
| Congregation Ahavath Achim Synagogue<br>3225 SW Barbur Blvd., Portland | Historic building or structure   | Preferred Alternative   | Removal or modification of the building  | Permanent use, greater than <i>de minimis</i> |
| Jewish Shelter Home<br>4133 SW Corbett Ave., Portland                  | Historic building or structure (listed in NRHP)  | Preferred Alternative   | Potential removal of isolation hospital addition to the building                               | Permanent use, greater than <i>de minimis</i> |
| Rasmussen Village<br>4950 SW Barbur Blvd., Portland                    | Historic building or structure   | Preferred Alternative   | Removal or modification of walls, signs and driveways/circulation                              | Permanent use, greater than <i>de minimis</i> |
| SW Newbury St. Viaduct, Bridge #01983                                  | Historic building or structure   | Preferred Alternative   | Replacement of the bridge  | Permanent use, greater than <i>de minimis</i> |
| SW Vermont St. Viaduct, Bridge #01984                                  | Historic building or structure   | Preferred Alternative   | Replacement of the bridge  | Permanent use, greater than <i>de minimis</i> |
| Duniway Park<br>SW 6th Ave. and SW Sheridan St., Portland              | Historic public park   | Preferred Alternative   | Partial parcel acquisition and reconfiguration of track area and parking along SW Barbur Blvd. | Permanent use, <i>de minimis</i>              |
| Lair Hill Park<br>3037 SW 2nd Ave., Portland                           | Historic public park   | Preferred Alternative   | Partial parcel acquisition, tree removal and modification of area along SW Barbur Boulevard    | Permanent use, <i>de minimis</i>              |
| Duniway Plaza<br>2400 SW 4th Ave., Portland                            | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition   | Permanent use, <i>de minimis</i>              |
| Marquam Plaza<br>2525 SW 3rd Ave., Portland                            | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition   | Permanent use, <i>de minimis</i>              |
| 3926 SW Water Ave., Portland   | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening  | Permanent use, <i>de minimis</i>              |
| 3605 SW Condor Ave., Portland  | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening  | Permanent use, <i>de minimis</i>              |
| 218-220 SW Hamilton St., Portland                                      | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening  | Permanent use, <i>de minimis</i>              |
| 4145 SW Corbett Ave., Portland   | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening  | Permanent use, <i>de minimis</i>              |



**Table D-3. Summary of Section 4(f) Resources Affected by the Preferred Alternative and Related Transportation Improvements (*multipage table*)**

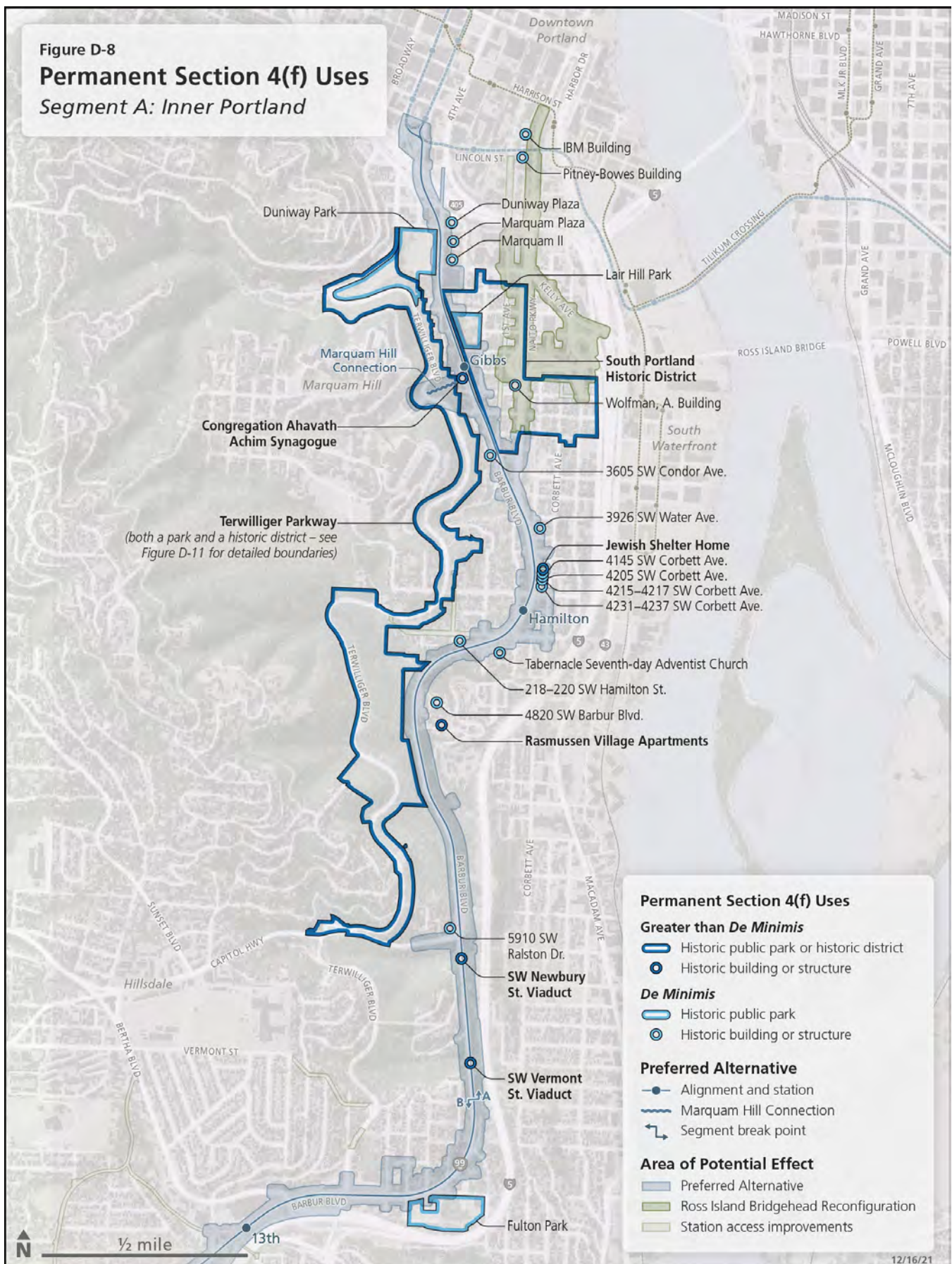
| Property Name and Address   | Property Type<br>( <i>unless noted as listed in NRHP, historic properties are eligible for listing</i> ) | Impact Caused by Preferred Alternative or Related Transportation Improvements | Summary of Impacts  | Section 4(f) Determination                    |
|---|--|---|---|---|
| 4205 SW Corbett Ave., Portland  | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| 4215-4217 SW Corbett Ave., Portland                                   | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| 4231-4237 SW Corbett Ave., Portland                                   | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| Tabernacle Seventh-day Adventist Church<br>26 SW Condor Way, Portland | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| 4820 SW Barbur Blvd., Portland  | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| 5910 SW Ralston Dr., Portland   | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| Marquam II<br>2611 SW 3rd Ave., Portland                              | Historic building or structure   | Preferred Alternative   | Partial parcel acquisition for sidewalk/street widening                         | Permanent use, <i>de minimis</i>              |
| Oregon Electric Railway Overcrossing, Bridge #02010                   | Historic building or structure   | Preferred Alternative   | Replacement of the bridge   | Permanent use, greater than <i>de minimis</i> |
| Capitol Hill Motel<br>9110 SW Barbur Blvd., Portland                  | Historic building or structure   | Preferred Alternative   | Full acquisition and removal or modification of the motel buildings             | Permanent use, greater than <i>de minimis</i> |
| 5350 SW Pasadena St., Portland  | Historic building or structure   | Preferred Alternative   | Full acquisition and removal of the house                                       | Permanent use, greater than <i>de minimis</i> |
| 11125 SW Barbur Blvd., Portland                                       | Historic building or structure   | Preferred Alternative   | Full acquisition and removal of the building                                    | Permanent use, greater than <i>de minimis</i> |
| Fulton Park<br>68 SW Miles St., Portland                              | Historic public park   | Preferred Alternative   | Partial parcel acquisition along front of property for sidewalk/street widening | Permanent use, <i>de minimis</i>              |
| Original Pancake House<br>8601 SW 24th Ave., Portland                 | Historic building  | Preferred Alternative   | Partial parcel acquisition along edge of property for sidewalk/street widening  | Permanent use, <i>de minimis</i>              |
| Master Wrench<br>9803 SW Barbur Blvd., Portland                       | Historic building  | Preferred Alternative   | Partial parcel acquisition along edge of property for sidewalk/street widening  | Permanent use, <i>de minimis</i>              |
| Oregon Education Association<br>6900 SW Atlanta St., Tigard           | Historic building  | Preferred Alternative   | Partial parcel acquisition along edge of property for guideway                  | Permanent use, <i>de minimis</i>              |

**Table D-3. Summary of Section 4(f) Resources Affected by the Preferred Alternative and Related Transportation Improvements (*multipage table*)**

| Property Name and Address                              | Property Type<br>( <i>unless noted as listed in NRHP, historic properties are eligible for listing</i> ) | Impact Caused by Preferred Alternative or Related Transportation Improvements | Summary of Impacts   | Section 4(f) Determination       |
|--|--|---|--|----------------------------------|
| IBM Building<br>2000 SW 1st Ave.,<br>Portland          | Historic building  | Related transportation improvement: Ross Island Bridgehead Reconfiguration    | Partial parcel acquisition for sidewalk/street widening                        | Permanent use, <i>de minimis</i> |
| Pitney-Bowes Building<br>2112 SW 1st Ave.,<br>Portland | Historic building  | Related transportation improvement: Ross Island Bridgehead Reconfiguration    | Partial parcel acquisition along edge of property for sidewalk/street widening | Permanent use, <i>de minimis</i> |
| Wolfman, A., Building<br>11 SW Gibbs St.,<br>Portland  | Historic building  | Related transportation improvement: Ross Island Bridgehead Reconfiguration    | Partial parcel acquisition along edge of property for sidewalk/street widening | Permanent use, <i>de minimis</i> |
| Burlingame Park  | Public park  | Related transportation improvement: a station access improvement              | Permanent easement for pedestrian bridge                                       | Permanent use, <i>de minimis</i> |

Figure D-8

# **Permanent Section 4(f) Uses** **Segment A: Inner Portland**





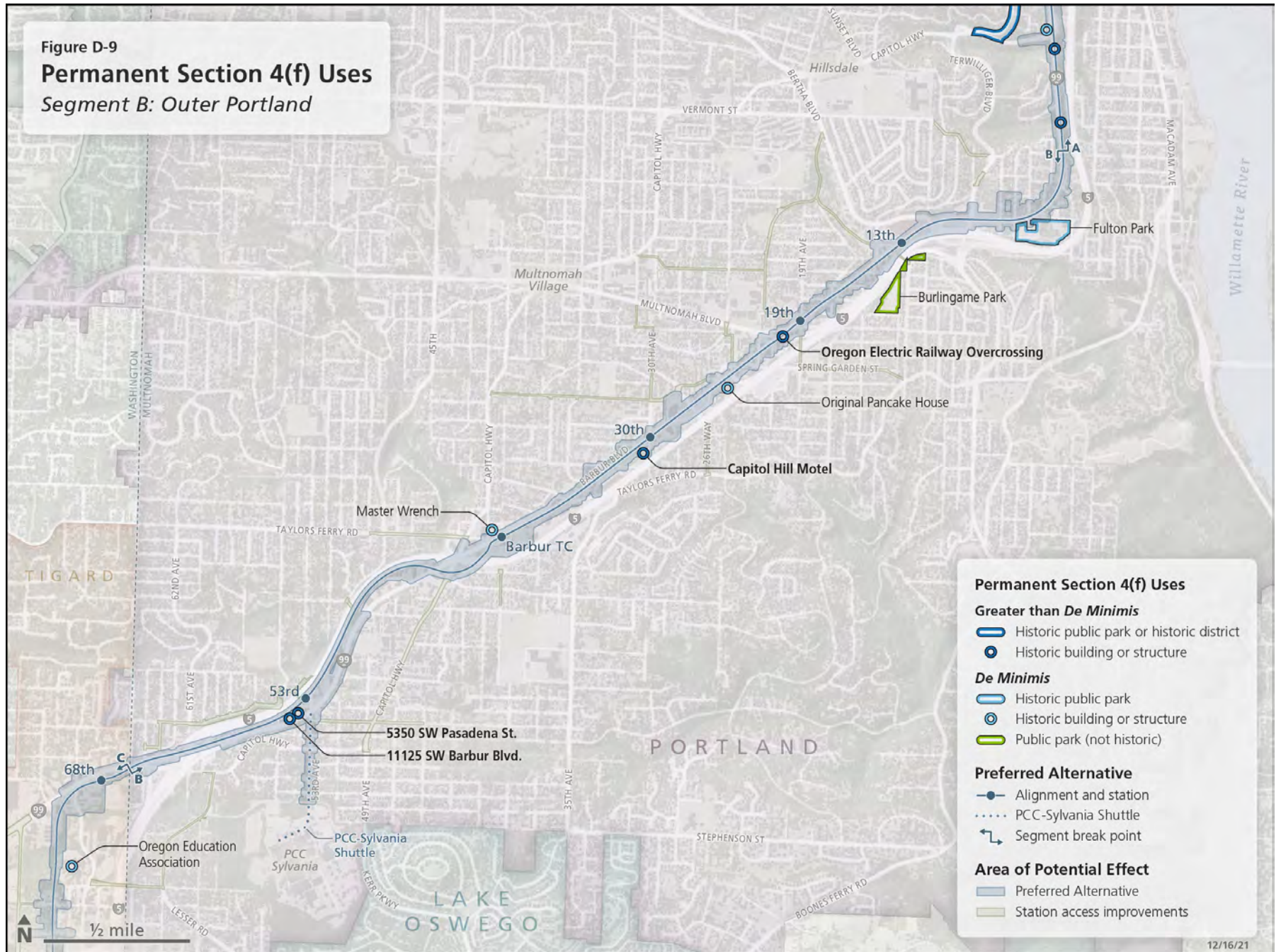
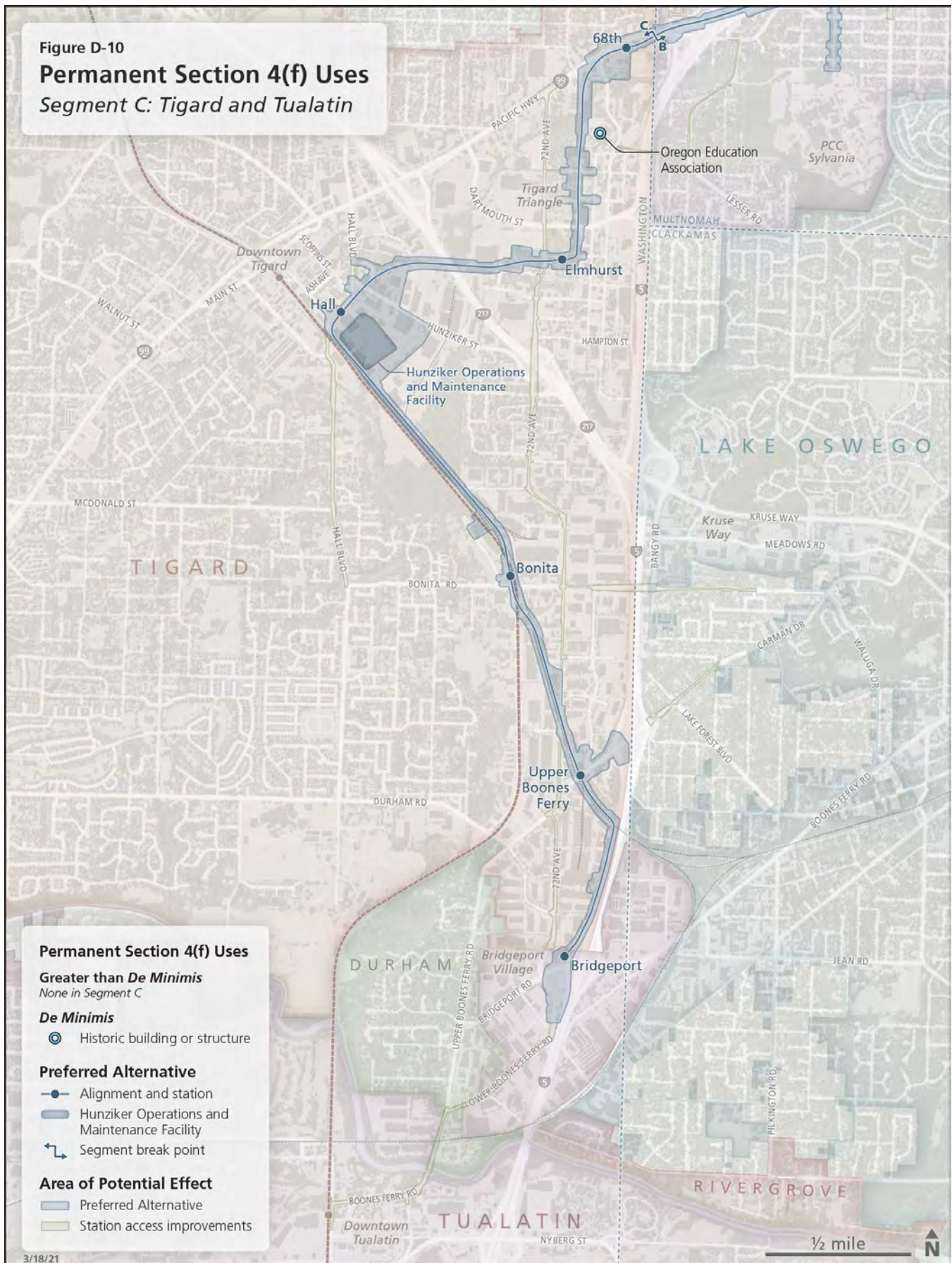




Figure D-10  
**Permanent Section 4(f) Uses**  
 Segment C: Tigard and Tualatin



## ***De Minimis Findings***

Of the 34 properties with a permanent use, the Preferred Alternative and related transportation improvements would permanently use limited areas of 23 properties but would avoid adverse effects on these resources. FTA has determined the impacts meet *de minimis* requirements. Nineteen of these properties, including 3 historic parks and 16 other historic resources, would have bordering areas that would be used by the Preferred Alternative. The three historic parks with *de minimis* impacts from the Preferred Alternative are Duniway Park, Lair Hill Park and Fulton Park. Four properties would have *de minimis* impacts from the related transportation improvements, including three historic buildings impacted by the Ross Island Bridgehead Reconfiguration and one recreational park impacted by one of the station access improvement options.

Attachment DD2 documents the effects on these properties and the impact minimization measures developed by TriMet and FTA in consultation with the City of Portland and/or the Oregon SHPO. These agencies concurred in writing with the *de minimis* findings for the specific properties under their jurisdiction.

## ***Preferred Alternative***

The following properties would have *de minimis* impacts from the Preferred Alternative:

- Duniway Park, SW Sixth Avenue and SW Sheridan Street, Portland
- Duniway Plaza, 2400 SW Fourth Avenue, Portland
- Lair Hill Park, 3037 SW Second Avenue, Portland
- Marquam Plaza, 2525 SW Third Avenue, Portland
- Marquam II, 2611 SW Third Avenue, Portland
- 3926 SW Water Avenue, Portland
- 3605 SW Condor Avenue, Portland
- 218-220 SW Hamilton Street, Portland
- 4145 SW Corbett Avenue, Portland
- 4205 SW Corbett Avenue, Portland
- 4215-4217 SW Corbett Avenue, Portland
- 4231-4237 SW Corbett Avenue, Portland
- Tabernacle Seventh-day Adventist Church, 26 SW Condor Way, Portland
- Fulton Park, 68 SW Miles Street, Portland
- 4820 SW Barbur Boulevard, Portland
- 5910 SW Ralston Drive, Portland
- 9803 SW Barbur Boulevard (Master Wrench), Portland
- Original Pancake House, 8601 SW 24th Avenue, Portland
- Oregon Education Association, 6900 SW Atlanta Street, Tigard



### ***Ross Island Bridgehead Reconfiguration***

The following properties would have *de minimis* impacts from the Ross Island Bridgehead Reconfiguration:

- IBM Building, 2000 SW First Avenue, Portland
- Pitney-Bowes Building, 2112 SW First Avenue, Portland
- Wolfman, A., Building, 11 SW Gibbs Street, Portland

### ***Station Access Improvements***

The following property would have a *de minimis* impact from a station access improvement:

- Burlingame Park, Portland

### **Permanent Uses Greater than De Minimis**

This section describes the 11 properties with permanent uses where the impact would be greater than *de minimis* for the reasons discussed further below.

#### ***Congregation Ahavath Achim Synagogue***

**Exhibit D.4-1. Congregation Ahavath Achim Synagogue**



This building (shown in Exhibit D.4-1) is a 1966 Post-Modern synagogue with associated landscaping and a parking area located immediately adjacent to the proposed Gibbs Station and the landing of the Marquam Hill Connection, an inclined elevator that would carry passengers up to the OHSU complex. FTA determined the property is eligible for listing in the NRHP under Criteria A and C. The synagogue is primarily significant as a representation of the settlement patterns of Jewish immigrants in Portland, specifically for its original role as a cultural hub for Portland's Sephardim (Criterion A), before the congregation moved to another location. It appears to be the only extant

historic-period resource in the Portland metropolitan area that is specifically associated with Sephardic Jewry, because Ahavath Achim and Beit Yosef are the only two Sephardic congregations in Portland. Of the two, Ahavath Achim was the first established. The Congregation Ahavath Achim synagogue is also significant for having distinctive Post-Modern design that is highly representative of its 1960s period of construction (Criterion C). This representative Post-Modern design is demonstrated by the building's clean lines and simple domed shape, concrete walls and stucco-cladding, the latter two of which are materials strongly associated with Modernism and Post-Modernism.

Figure D-11 illustrates the property and the areas affected by the Preferred Alternative. The Preferred Alternative would permanently use up to 100 percent of the property (19,870 square feet, or 0.46 acres) as a transportation facility. Although TriMet has reviewed adaptive reuse treatments that could retain part of the building, the adverse effect from the encroachment of the Preferred Alternative would remain in any case due to changes in the property's historic setting and the modification to complete removal of the building. This property alteration would affect the property's character-defining features important under Criteria C and diminish the property's integrity. Through the Section 106 consultation process, FTA determined the Preferred Alternative would have direct and indirect adverse effects on the Congregation Ahavath Achim synagogue. Therefore, the Section 4(f) use would result in a greater than *de minimis* impact.

Figure D-11

Congregation Ahavath Achim Synagogue



### ***South Portland Historic District***

The South Portland Historic District was listed in the NRHP in 1998. The district comprises 246 contributing structures in the Lair Hill and Corbett neighborhoods. The resources in the district are primarily single-family houses, followed by multifamily dwellings, civic buildings and religious facilities. Seventy-nine of the structures are within the APE for the Preferred Alternative. The South Portland Historic District is listed in the NRHP under Criteria A and C. Under Criterion A, the district has significant associations with early suburban development in the City of Portland and the history of several ethnic and immigrant communities in the Portland metro area. Under Criterion C, the district is a collection of built resources that embody distinctive characteristics of different types and periods of construction. Represented architectural styles include Queen Anne, Italianate, East Lake, Gothic vernacular, Colonial Revival, Georgian Revival, Gothic Revival and Craftsman.

The Preferred Alternative would remove eight residential buildings within the boundaries of the district, including seven historic houses that contribute to the significance of the district (the eighth building that would be removed is not historic and does not contribute to the district). Through the Section 106 consultation process, FTA determined the Preferred Alternative would have direct and indirect adverse effects on the South Portland Historic District. Therefore, the Section 4(f) use would result in a greater than *de minimis* impact.

Figure D-12 shows the district and areas affected by the Preferred Alternative. The Preferred Alternative would permanently use up to 1.3 percent of the district area for transportation use (0.73 acres out of a total area of 54.48 acres). An additional 0.4 percent of the district (0.23 acres) would be used temporarily for construction.

The removed historic buildings, shown in Exhibit D.4-2, would be:

- Lawton, Phillip and Julia, House, 3425 SW First Avenue. 1894 Italianate House. Primary Contributing Resource.
- Thompson, D.P., House #1, 3522-3524 SW First Avenue. 1880 Victorian-era house. Primary Contributing Resource.
- Chehak, Seraphim John, House #4, 105 SW Curry Street. 1906 Colonial Revival House. Secondary Contributing Resource.
- Fiebiger, Victoria, House, 3124 SW Barbur Boulevard. 1912 Craftsman House. Secondary Contributing Resource.
- Tartarimi, Gaetano and Victoria, House #1, 338 SW Meade Street. 1914 Craftsman Bungalow. Secondary Contributing Resource.
- Gervutz, S., House, 3516 SW First Avenue. 1910 Craftsman House. Secondary Contributing Resource.
- Pulvermacher, R., House, 230 SW Woods Street. 1902 Gothic Revival. Secondary Contributing Resource.



**Exhibit D.4-2. Affected Contributing Resources: South Portland Historic District**



Tartarimi, Gaetano & Victoria House #1, 338 SW Meade St.



Chehak, Seraphim John, House #4, 105 SW Curry St.



Fiebigler, Victoria, House, 3124 SW Barbur Blvd.



Thompson, D.P., House #1, 3522-3524 SW First Ave.



Lawton, Phillip and Julia, House, 3425 SW First Ave.



Gervutz, S., House, 3516 SW First Ave.



Pulvermacher, R., House 230 SW Woods St.



Figure D-12

# South Portland Historic District





The Preferred Alternative also would alter portions of nine other parcels with contributing resources to the district, including Lair Hill Park. On the western border of the district, the reconstruction of SW Barbur Boulevard to accommodate light rail and improve sidewalks and bicycle lanes would also remove existing street trees, construct retaining walls, install new streetlights, and develop sidewalks and stairs connecting to the district. It would modify/install overhead utilities and poles, construct the Gibbs Station for light rail and bus use, and reconstruct street intersections with SW Barbur Boulevard.

### ***Terwilliger Parkway***

**Exhibit D.4-3. Terwilliger Parkway**



Terwilliger Parkway (Figure D-13 and shown in Exhibit D.4-3) was established in 1914 and is owned and operated by the City of Portland/Portland Parks and Recreation. The nearly 103-acre park qualifies for Section 4(f) protection as an historic property and as a public park and recreation resource. In 2021, the park was listed in the NRHP as a historic district. The park follows SW Terwilliger Boulevard between SW Sam Jackson Park Road and SW Capitol Highway, linking several Portland greenspaces along a scenic corridor that was designed to celebrate the eastern viewshed from the hills of South Portland.

The park centers on SW Terwilliger Boulevard, a two-lane road with bicycle lanes and a 9-foot-wide sidewalk/trail. The park was envisioned by the Olmstead Brothers and built between 1910 and 1914.

The mostly forested parkway is midway up Portland's west hills, and features views of the city, Mount St. Helens, Mt. Hood, the Willamette River and the wooded hills of the parkway itself. The park's features include the Terwilliger Trail (a continuous paved walking path), as well as areas with picnic tables, viewpoints, multiple hiking trails and one playground. SW Terwilliger Boulevard also features bicycle lanes. As one of several larger, connected greenspaces in Portland's west hills, the parkway features multiple areas designated for sensitive wildlife habitat.

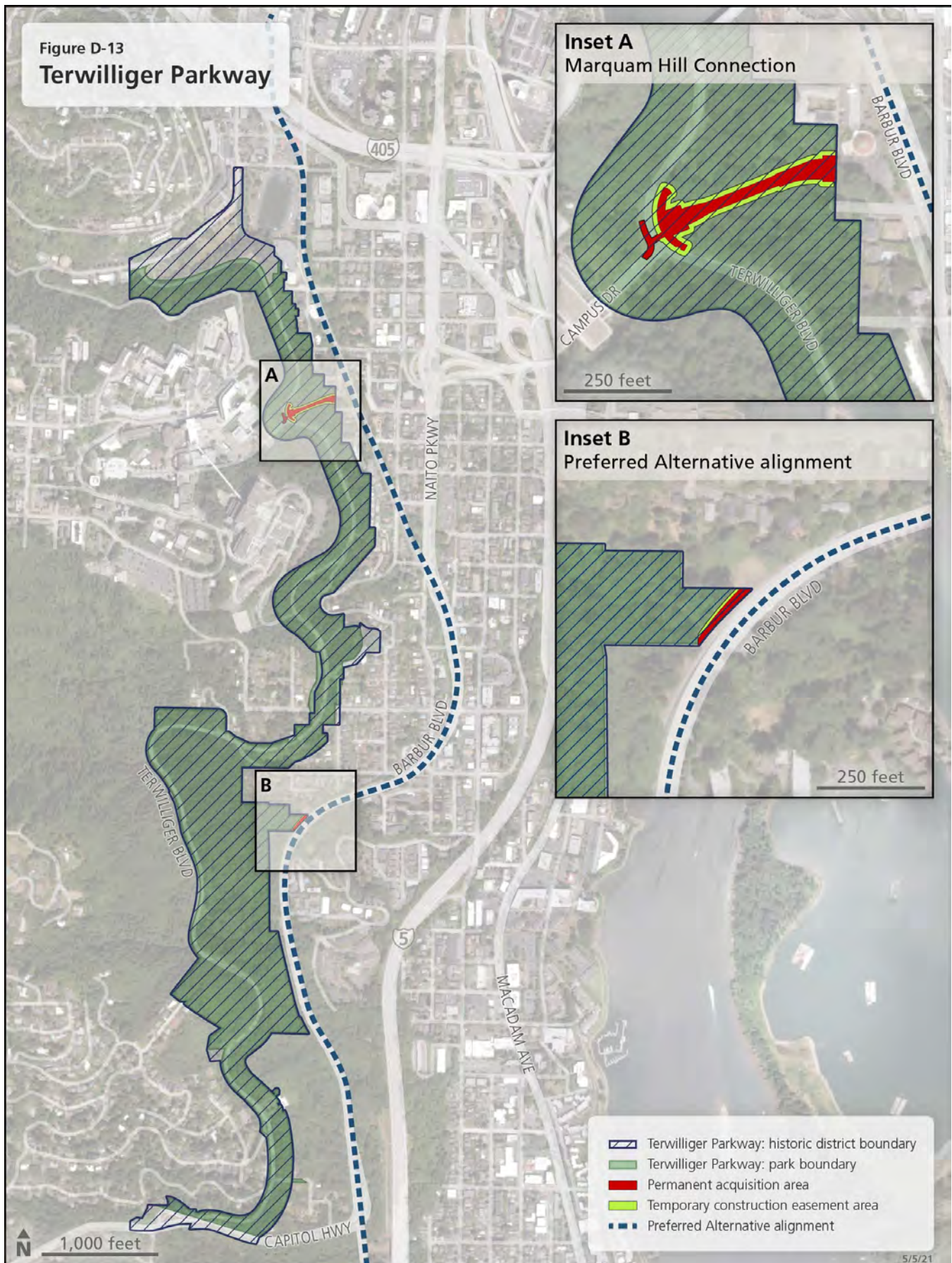
As noted in the Terwilliger Parkway Design Guidelines, adopted by the Portland City Council by Ordinance No. 155245 in 1983, the parkway's original natural lands and the original 200-foot setback for development in surrounding areas were meant to "allow people to enjoy the natural beauty and setting of Portland while moving through it." The guidelines also note "views of the city, Mt. Hood, Mt. St. Helens [...] are contrasted by sections of the boulevard that are lush and enclosed by tall stands of deciduous trees and second growth fir" and "urban development adjacent to the parkway is sometimes hidden from the trail and boulevard." An earlier design zone from 1959 noted: "Primary consideration shall be given to safeguarding unobstructed views and to preserving the heavily wooded character. Improvements shall make a minimal amount of interruption to the natural topography."

Based on discussions with the City of Portland, the views from the parkway and its heavily wooded character are the most significant features of the park and recreation resource.

In terms of the park as a historic property, the Preferred Alternative would alter several historically important characteristics of the parkway, affecting its original design intent focused on the natural scenic setting of the winding boulevard drive and trail. The Preferred Alternative would also introduce modern transportation infrastructure, including the station house building, structures, elevator cars and lighting, and alter visual characteristics. This would result in an adverse effect to the historic property under Section 106, and a Section 4(f) use with a greater than *de minimis* impact.



Figure D-13  
Terwilliger Parkway



For the park as a recreational property, the Project would interrupt a strip of natural area on the hillside, impacting an estimated 31 existing trees, and would develop the inclined elevator to land adjacent to SW Terwilliger Boulevard and the eastern sidewalk/Terwilliger Trail, developing a platform area and the headhouse at the top of a ravine, adjacent to the trail. The area where the elevator facility and the trail intersect would become part of a small plaza, but the continuous trail function along the parkway would be maintained. The facility would increase pedestrian activity crossing the trail and SW Terwilliger Boulevard. During construction, minor detours would be needed for trail users, but the trail function would be maintained. No other changes to the park's recreation facilities are proposed.

The Preferred Alternative would permanently use up to 0.48 percent of Terwilliger Parkway for transportation use (0.50 acres out of a total area of 102.8 acres). An additional 0.27 percent of Terwilliger Parkway (0.28 acres) would be used temporarily for construction.

Based on the impacts discussed above, the Preferred Alternative, including the Marquam Hill Connection, the Section 4(f) use would result in a greater than *de minimis* impact to Terwilliger Parkway.

### ***Jewish Shelter Home***

**Exhibit D.4-4. Jewish Shelter Home**



In 1984, the Jewish Shelter Home, 4133 SW Corbett Avenue (shown in Exhibit D.4-4), was listed in the NRHP under Criteria A and B. Constructed circa 1902 as a private residence, the property later served as a shelter for Jewish children, instilling Jewish cultural values and customs, from 1919 to 1937. It is significant under Criterion A for its association with the development of the Jewish immigrant community in Southwest Portland at the turn of the 20th century, and for its association with providing cultural continuity and humanitarian services. It was one of eight benevolent agencies within the Federated Jewish Societies

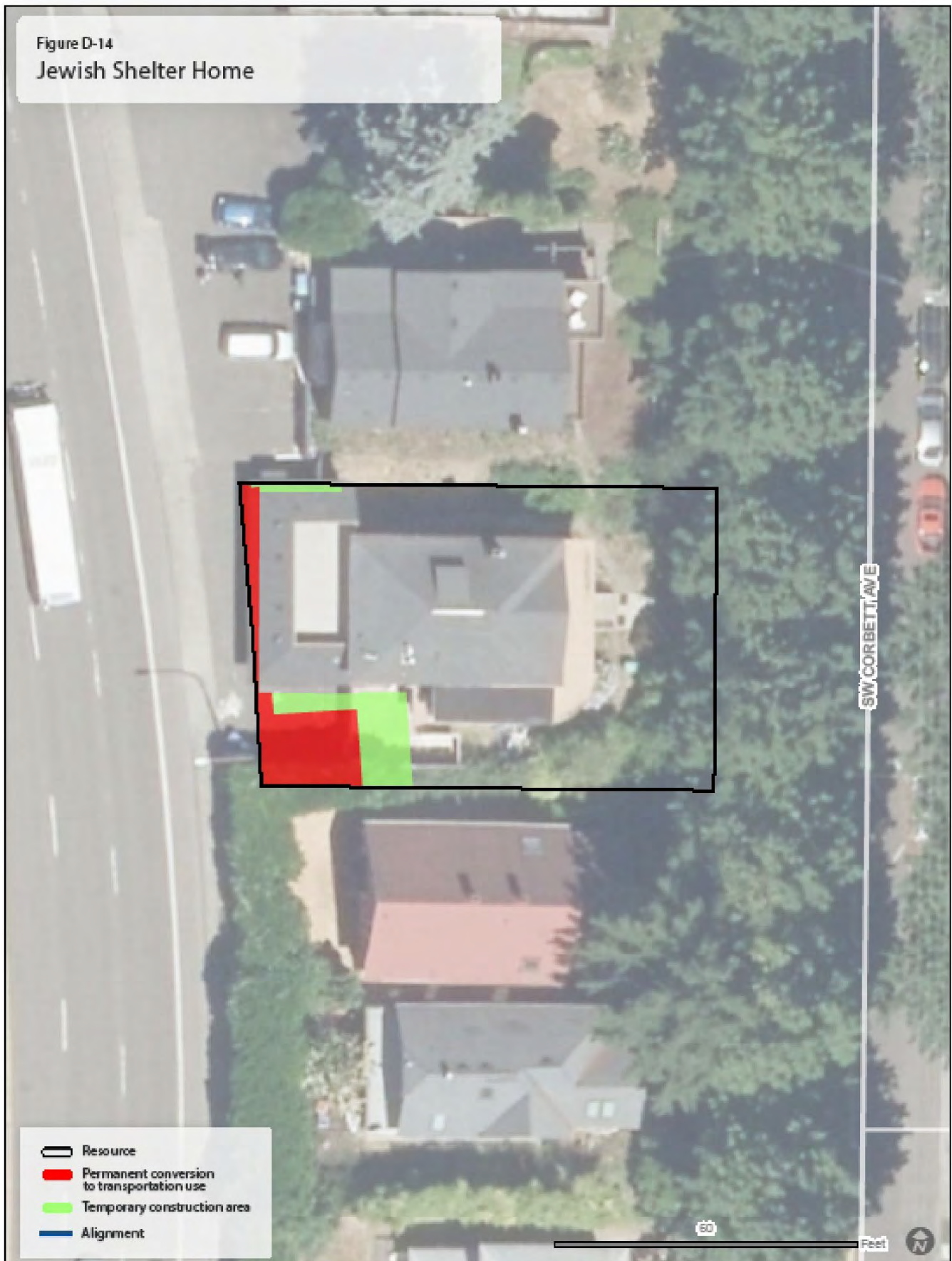
of Portland during the 1930s. The Jewish Shelter Home is also listed under Criterion B for its association with prominent local Jewish leaders such as the Meier family of Oregon's then-largest department store, Meier & Frank, and other influential Jewish leaders and businesses.

The Preferred Alternative would permanently use up to 2.4 percent of the property for transportation use (130 square feet out of a total area of 5,520 square feet). An additional 3.1 percent of the property (170 square feet) would be used temporarily for construction.

As shown in Figure D-14, the footprint of the project impact at the Jewish Shelter Home is limited to a small area on the property's western edge, affecting a portion of the building formerly used as an isolation hospital. This addition to the original residence extends to the sidewalk of the existing transportation right of way at SW Barbur Boulevard. The removal of this portion of the building would be an adverse effect under Section 106 and would result in a Section 4(f) use with greater than *de minimis* impact. However, TriMet would work with the City of Portland to obtain approval for revised designs that deviate from the City of Portland's street standards, in an effort to avoid the alteration or removal of the building addition.



Figure D-14  
Jewish Shelter Home





### ***Rasmussen Village***

Rasmussen Village, located at 4936-4950 SW Barbur Boulevard and shown in Exhibit D.4-5, is an Art Deco-style multifamily housing complex eligible for listing in the NRHP under Criterion C, because it retains distinctive characteristics of the style as applied to a multifamily dwelling from the 1940s, and is highly representative of its type and period of construction. The three architect-designed, Art Deco-style concrete and stucco buildings; the circa 1941 garage; and the circa 1941 concrete-and-stucco wall and signs on the western edge of the parcel contribute to its significance.

**Exhibit D.4-5. Rasmussen Village**



The Preferred Alternative would widen and rebuild SW Barbur Boulevard to accommodate light rail in a shared transitway and to develop safe and protected bicycle lanes and sidewalks. As shown in Figure D-15, the Preferred Alternative would permanently use up to 7.5 percent of the property for transportation use (12,710 square feet out of a total area of 168,590 square feet). An additional 1.4 percent of the property (2,370 square feet) would be used temporarily for construction.

The Preferred Alternative would modify the driveway/circulation, stucco walls and signs at the western edge of Rasmussen Village, all of which are character-defining features of the historic property. The Preferred Alternative would also remove trees that screen the property from SW Barbur Boulevard, moving the transportation infrastructure closer to the 1941 Art Deco apartment buildings, and diminishing the property's integrity of feeling and setting. Directly altering character-defining features of Rasmussen Village constitutes an adverse effect on a historic property under Section 106 and a use with greater than *de minimis* impact under Section 4(f).

Figure D-15  
Rasmussen Village





## SW Newbury Street Viaduct and SW Vermont Street Viaduct

Exhibit D.4-6. SW Newbury Street Viaduct



Exhibit D.4-7. SW Vermont Street Viaduct



The SW Newbury Street Viaduct (Bridge #01983, shown in Exhibit D.4-6), built in 1934 along with the SW Vermont Street Viaduct, is on SW Barbur Boulevard (Pacific Highway), just south of the intersection of SW Barbur Boulevard and SW Capitol Highway (Highway 10). The SW Vermont Street Viaduct (Bridge #01984, shown in Exhibit D.4-7) is to the south on SW Barbur Boulevard, south of the road's intersection with SW Parkhill Drive. Both viaducts convey SW Barbur Boulevard over ravines. Both viaducts are eligible for listing in the NRHP under Criteria A and C. They are significant under Criterion A for their association with local transportation history and with New Deal-era programs undertaken to stimulate the economy during the Great Depression. The viaducts were constructed by the Oregon State Highway Department, the predecessor agency to the Oregon Department of Transportation (ODOT), and funded through the National Industrial Recovery Act of 1933. They are eligible under Criterion C, because they retain integrity to their original design and construction techniques, featuring substructures of

pressure-treated timber and steel topped with a concrete slab superstructures.

As shown in Figures D-16 and D-17, the Preferred Alternative would remove the SW Newbury Street Viaduct (27,450 square feet) and the SW Vermont Street Viaduct (32,160 square feet) and replace them with new bridges; the removal and replacement constitutes an adverse effect under Section 106 and a use with greater than *de minimis* impact under Section 4(f).



Figure D-16

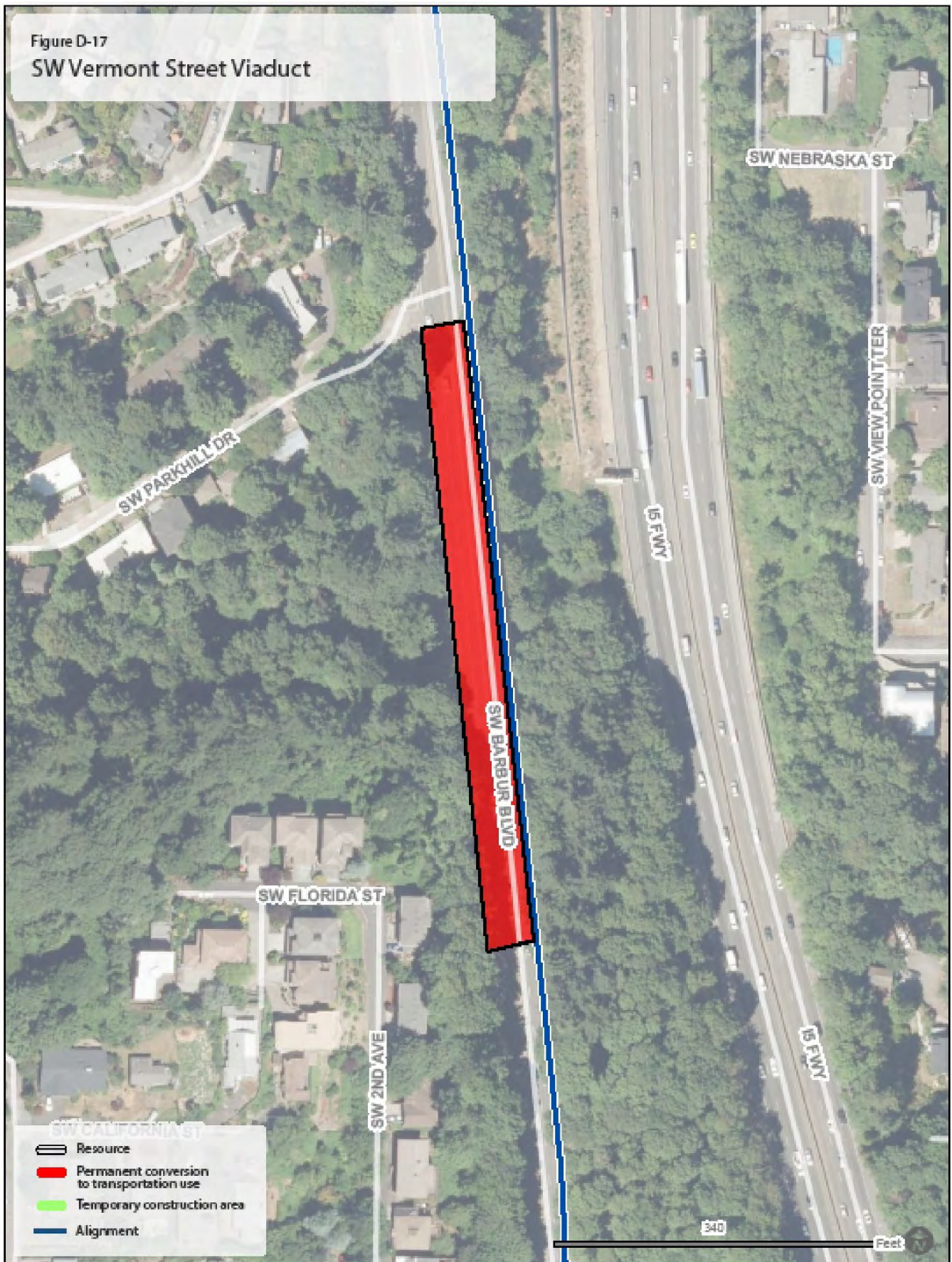
SW Newbury Street Viaduct





Figure D-17

SW Vermont Street Viaduct





### ***The Oregon Electric Railway Overcrossing***

The Oregon Electric Railway Overcrossing (Bridge #02010, (shown in Exhibit D.4-8)) conveys SW Barbur Boulevard over the former alignment of Oregon Electric Railway, which has since been converted to SW Multnomah Boulevard. A remnant from the transmission line that paralleled the Oregon Electric Railway alignment is attached to the northern bridge bent. Constructed in 1935, the overcrossing is eligible for listing in the NRHP under

Criterion A for its association with the National Industrial Recovery Act of 1933 and for its association with early- to mid-20th century highway development in Oregon and New Deal-era projects to stimulate local economies throughout the country during the Great Depression.

As shown in Figure D-18, the Preferred Alternative would remove the bridge (19,900 square feet) and replace it with a new structure, resulting in an adverse effect under Section 106 and a use with greater than *de minimis* impact under Section 4(f).

### ***Capitol Hill Motel***

Capitol Hill Motel, a 1940 Minimal Traditional-style auto court at 9110 SW Barbur Boulevard (shown in Exhibit D.4-9), consists of two motel buildings, two neon signs, an asphalt-paved parking lot, two paved driveways and landscaping. It is eligible for listing in the NRHP under Criteria A and C. The motel is significant under Criterion A for its local association with a nationwide historical trend of auto tourism that combined automobile transportation and leisure in the mid-20th century. Under Criterion C, it retains integrity as an example of auto court motels of the period.

The widening of SW Barbur Boulevard to accommodate light rail and a reconfigured street that includes safety, traffic and sidewalk improvements and related infrastructure would intrude into the western portion of the parcel and buildings. As shown in Figure D-19, the Preferred Alternative would permanently use at least 11,510 square feet of the total 24,780 square feet for transportation use as a result of the widening of SW Barbur Boulevard. Direct alteration of the setting and some to all of the character-defining features of the Capitol Hill Motel constitutes an adverse effect on a historic property under Section 106 and a use with greater than *de minimis* impact under Section 4(f).

**Exhibit D.4-8. The Oregon Electric Railway Overcrossing**



**Exhibit D.4-9. Capitol Hill Motel**





Figure D-18

# Oregon Electric Railway Overcrossing

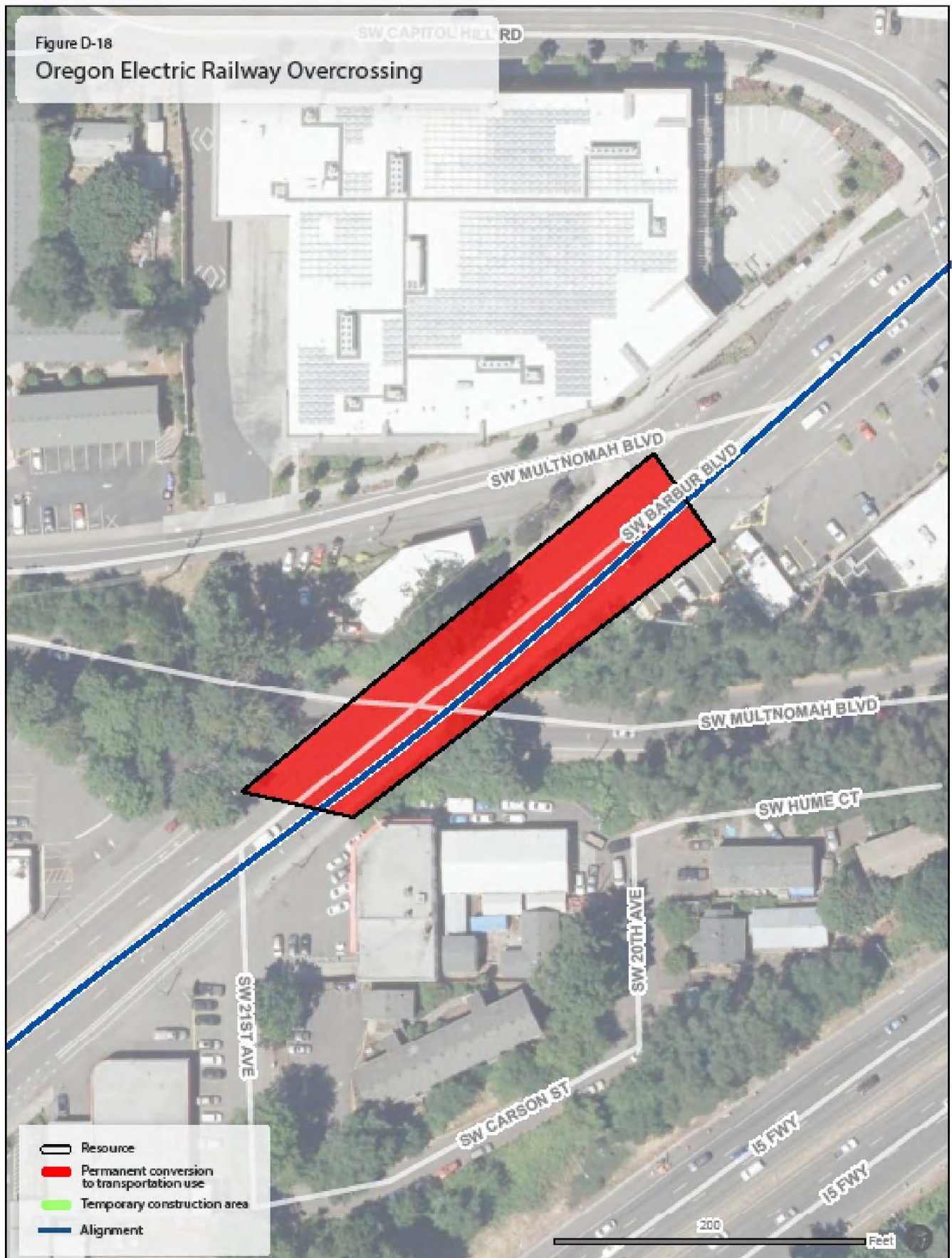




Figure D-19  
Capitol Hill Motel



### **5350 SW Pasadena Street**

The house at 5350 SW Pasadena Street (shown in Exhibit D.4-10) is eligible for listing in the NRHP under Criterion C. The house embodies distinctive characteristics of its period of construction, because it retains architectural elements of Tudor Revival and Minimal Traditional housing styles that were near their peak in popularity when the house was constructed in 1938.

The Preferred Alternative would construct a park and ride and a light rail station at SW 53rd Avenue that would overlap the property, requiring the removal of the house. As shown in Figure D-20, the Preferred Alternative would use 100 percent of the property (21,512 square feet) for transportation use. This would be an adverse effect under Section 106 and a use with greater than *de minimis* impact under Section 4(f).

**Exhibit D.4-10. 5350 SW Pasadena Street**



### **11125 SW Barbur Boulevard**

**Exhibit D.4-11. 11125 SW Barbur Boulevard**



The commercial building at 11125 SW Barbur Boulevard (shown in Exhibit D.4-11) is eligible for listing in the NRHP under Criterion C. Built in 1969, the building appears to be architect-designed and is a good example of a regionally influenced iteration of Modern commercial architecture. The building features narrow windows with wood siding, stained in a wood-toned color that blends with its associated landscaping. The building retains its integrity as a good example of its commercial type and period of construction.

The Preferred Alternative would construct a park and ride and a light rail station at SW 53rd Avenue that would overlap the property, requiring the removal of the building. As shown in Figure D-21, the Preferred Alternative would use 100 percent of the property (27,826 square feet) for transportation use. This would be an adverse effect under Section 106 and a use with greater than *de minimis* impact under Section 4(f).



Figure D-20  
5350 SW Pasadena Street

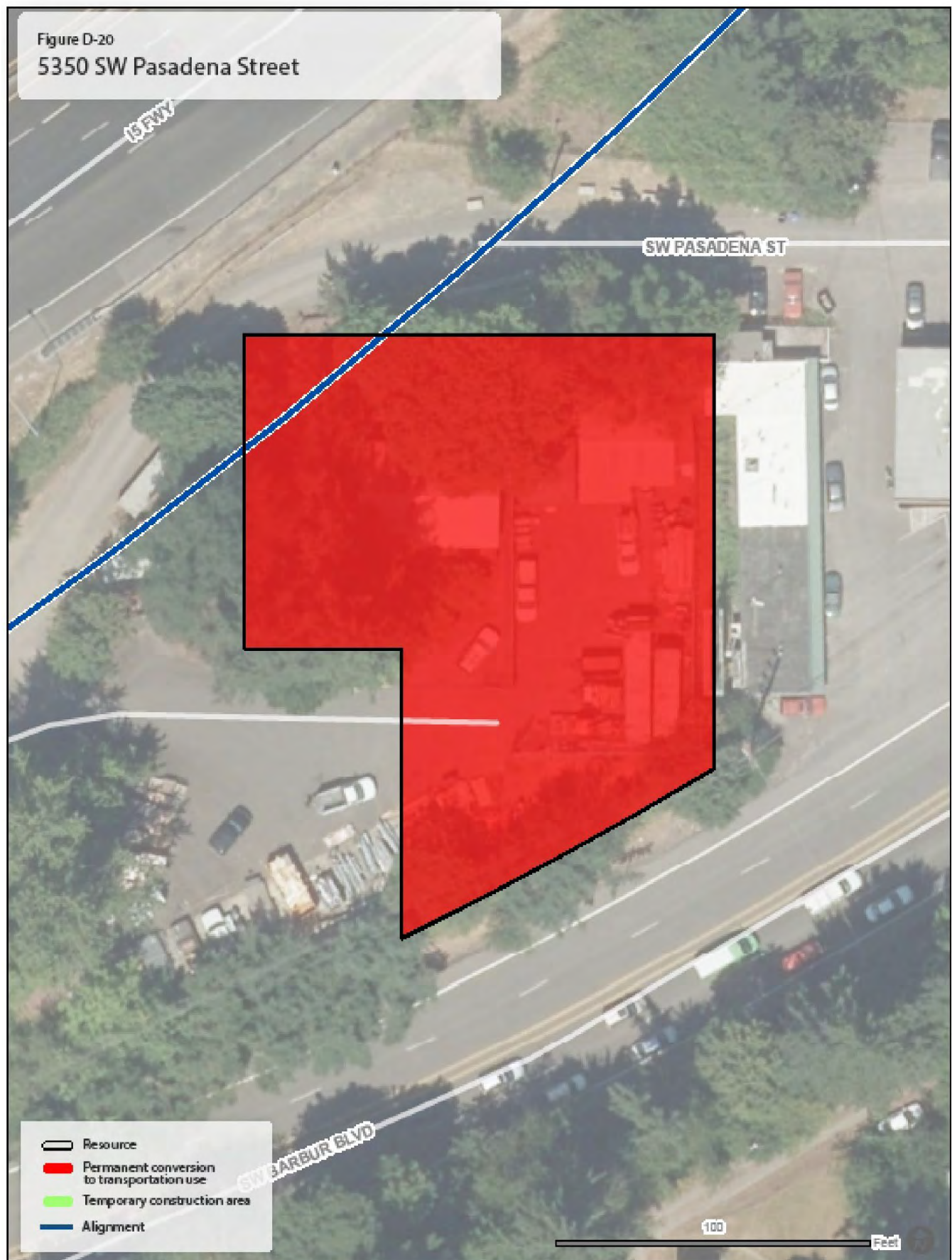
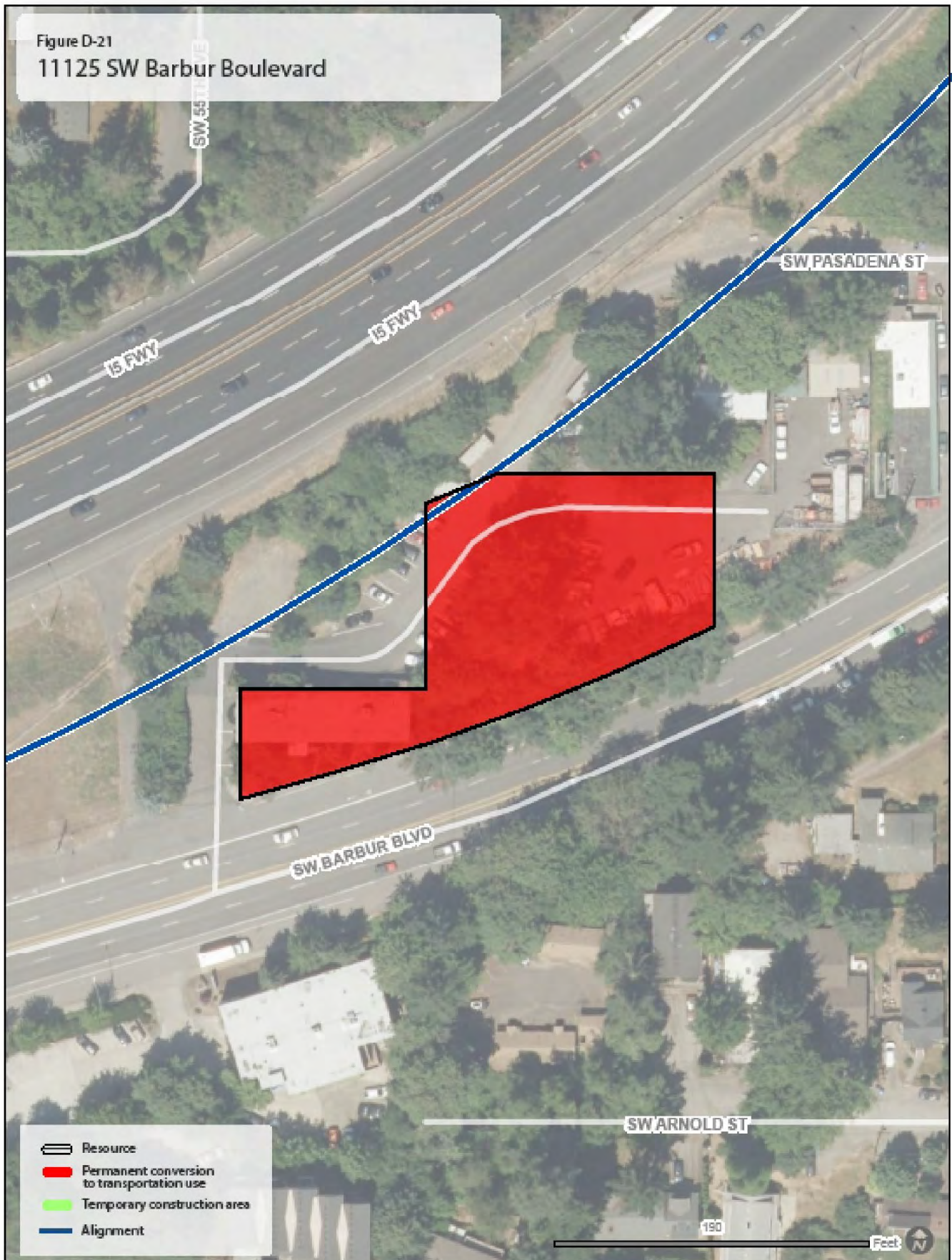




Figure D-21  
11125 SW Barbur Boulevard





## D.4.2 Evaluation of Uses for All EIS Alternatives

This section describes the uses that would be expected for the other EIS alternatives. In the Draft EIS, the light rail corridor was broken into three segments, Segment A, Segment B and Segment C. The Draft EIS alternatives evaluated options for different light rail alignment for each of these segments, which are presented in Table D-4, Table D-5 and Table D-6, respectively. Based on the analysis summarized in these tables, and considering all of the EIS alternatives:

- In Segment A, none of the EIS alternatives would avoid any use of Section 4(f) properties, and many of the same properties would be affected by all alternatives. The Preferred Alternative would have 22 permanent uses of Section 4(f) properties, including 7 uses that are greater than *de minimis*; an additional 3 *de minimis* uses would result with the Ross Island Bridgehead Reconfiguration. The total for the Preferred Alternative includes properties in the South Portland Historic District, involving removal of six buildings that contribute to the historic significance of the District. Alternative A2-BH: Naito with Bridgehead Reconfiguration would have 21 uses of Section 4(f) properties, 7 of which would be greater than *de minimis*; this also includes the South Portland Historic District, where Alternative A2-BH would remove four buildings contributing to the District. Alternative A2-LA: Naito with Limited Access would have 22 permanent uses of Section 4(f) properties, 11 of which would be permanent uses greater than *de minimis*, including the South Portland Historic District, where 7 contributing buildings would be removed.
- In Segment B, none of the EIS alternatives would avoid any use of Section 4(f) properties. The Preferred Alternative, which was based on Alternative B2, would have 7 permanent uses, 3 of which would be *de minimis*. The other Segment B alternatives would have 6 to 7 permanent uses, 3 of which would be *de minimis*. For all Segment B alternatives, a station access option for an elevated pedestrian bridge (a related transportation improvement), would add one additional use that would be *de minimis*.
- In Segment C, none of the EIS alternatives would avoid any use of Section 4(f) properties, but all of the uses would be *de minimis*. The Preferred Alternative would have one permanent use that would be *de minimis*, while the other alternatives would have *de minimis* uses that would range from two to four uses.

The uses summarized in Table D-4 through Table D-6 do not include the related transportation improvements (i.e., the Ross Island Bridgehead Reconfiguration and the station access improvements) in the totals. Many of the related transportation improvements could be implemented for any of the alternatives evaluated, and none of the related transportation improvements would involve a permanent use that would be greater than a *de minimis* impact. The Ross Island Bridgehead Reconfiguration would involve uses of four additional Section 4(f) properties, all of which would be *de minimis*. One of the station access improvements in Segment B would result in a *de minimis* impact.

**Table D-4. Section 4(f) Permanent Uses by Alternative – Segment A: Inner Portland (*multipage table*)**

| Property Name and Address | Summary of Effect (Based on Preferred Alternative)  | Preferred Alternative (Draft EIS A1: Barbur)  | A2-BH: Naito Bridgehead <sup>1</sup>          | A2-LA: Naito Limited Access <sup>1</sup>      |
|---------------------------|---|---|---|---|
| Terwilliger Parkway       | Addition of inclined elevator through park property | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i> |

**Table D-4. Section 4(f) Permanent Uses by Alternative – Segment A: Inner Portland (*multipage table*)**

| Property Name and Address  | Summary of Effect (Based on Preferred Alternative)  | Preferred Alternative (Draft EIS A1: Barbur)  | A2-BH: Naito Bridgehead <sup>1</sup>                       | A2-LA: Naito Limited Access <sup>1</sup>                   |
|--|---|---|--|--|
| South Portland Historic District                                       | Removal of contributing structures and changes to the district's setting                        | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i>              | Permanent use, greater than <i>de minimis</i>              |
| Congregation Ahavath Achim Synagogue<br>3225 SW Barbur Blvd., Portland | Removal or modification of the building   | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i> <sup>2</sup> | Permanent use, greater than <i>de minimis</i> <sup>2</sup> |
| Jewish Shelter Home<br>4133 SW Corbett Ave., Portland                  | Potential removal of isolation hospital addition to the building                                | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i>              | Permanent use, greater than <i>de minimis</i>              |
| Rasmussen Village<br>4950 SW Barbur Blvd., Portland                    | Removal or modification of walls, signs and driveways/circulation                               | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i>              | Permanent use, greater than <i>de minimis</i>              |
| SW Newbury St. Viaduct, Bridge #01983                                  | Replacement of the bridge   | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i>              | Permanent use, greater than <i>de minimis</i>              |
| SW Vermont St. Viaduct, Bridge #01984                                  | Replacement of the bridge   | Permanent use, greater than <i>de minimis</i> | Permanent use, greater than <i>de minimis</i>              | Permanent use, greater than <i>de minimis</i>              |
| Duniway Park<br>SW Sixth Ave. and SW Sheridan St., Portland            | Partial parcel acquisition and reconfiguration of existing parking spaces along SW Barbur Blvd. | Permanent use, <i>de minimis</i>              | No use   | No use   |
| Lair Hill Park<br>3037 SW Second Ave., Portland                        | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | No use   | No use   |
| Duniway Plaza (Farley Building)<br>2400 SW Fourth Ave., Portland       | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | N/A  | N/A  |
| Marquam Plaza<br>2525 SW Third Ave., Portland                          | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | N/A  | N/A  |
| 3926 SW Water Ave., Portland   | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | N/A  | Temporary occupancy  |
| 3605 SW Condor Ave., Portland  | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | N/A  | N/A  |
| 218-220 SW Hamilton St., Portland                                      | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, <i>de minimis</i>                           |
| 4145 SW Corbett Ave., Portland   | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, greater than <i>de minimis</i>              |
| 4205 SW Corbett Ave., Portland   | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, greater than <i>de minimis</i>              |
| 4215-4217 SW Corbett Ave., Portland                                    | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, <i>de minimis</i>                           |
| 4231-4237 SW Corbett Ave., Portland                                    | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, <i>de minimis</i>                           |
| Tabernacle Seventh-day Adventist Church<br>26 SW Condor Way, Portland  | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, <i>de minimis</i>                           |
| 4820 SW Barbur Blvd., Portland   | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, <i>de minimis</i>                           |
| 5910 SW Ralston Dr., Portland  | Partial parcel acquisition  | Permanent use, <i>de minimis</i>              | Permanent use, <i>de minimis</i>                           | Permanent use, <i>de minimis</i>                           |



**Table D-4. Section 4(f) Permanent Uses by Alternative – Segment A: Inner Portland (*multipage table*)**

| Property Name and Address  | Summary of Effect (Based on Preferred Alternative) | Preferred Alternative (Draft EIS A1: Barbur)  | A2-BH: Naito Bridgehead <sup>1</sup>       | A2-LA: Naito Limited Access <sup>1</sup>      |
|--|--|---|--|---|
| Marquam II<br>2611 SW Third Ave., Portland   | Partial parcel acquisition                         | Permanent use, <i>de minimis</i>              | N/A  | N/A   |
| George Himes Park<br>6400 SW Terwilliger Blvd., Portland   | Temporary construction easement                    | Temporary occupancy                           | Temporary occupancy                        | Temporary occupancy                           |
| Front and Curry Community Garden   | Temporary construction easement                    | Temporary occupancy                           | Permanent use, potential <i>de minimis</i> | Permanent use, potential <i>de minimis</i>    |
| 4019 SW Corbett Ave., Portland   | Temporary construction easement                    | Temporary occupancy                           | Temporary occupancy                        | Temporary occupancy                           |
| 3811 SW Barbur Blvd., Portland   | Temporary construction easement                    | Temporary occupancy                           | Permanent use, potential <i>de minimis</i> | Permanent use, potential <i>de minimis</i>    |
| 022 SW Lowell St., Portland  | Temporary construction easement                    | Temporary occupancy                           | Temporary occupancy                        | Permanent use, greater than <i>de minimis</i> |
| 4515 SW Corbett Ave., Portland   | Temporary construction easement                    | Temporary occupancy                           | N/A  | N/A   |
| 2000 SW Fifth Ave., Portland   | No adverse impacts                                 | No use  | N/A  | N/A   |
| 3635 SW Condor Ave., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| Holt-Saylor-Liberto<br>3625 SW Condor Ave., Portland   | No adverse impacts                                 | No use  | N/A  | N/A   |
| 4315 SW View Point Terr., Portland   | No adverse impacts                                 | No use  | N/A  | N/A   |
| 018 SW Hamilton St., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| 04 SW Hamilton St., Portland   | No adverse impacts                                 | No use  | N/A  | N/A   |
| 127 SW Hamilton St., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| 304 SW Hamilton St., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| 4619 SW Condor Ave., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| Hudson, Harvey S., House<br>16 SW Abernethy St., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| 0219-0221 SW Hamilton St., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| 0112 SW Hamilton St., Portland   | No adverse impacts                                 | No use  | N/A  | N/A   |
| 4606 SW Corbett Ave., Portland   | No adverse impacts                                 | No use  | N/A  | N/A   |
| 374 SW Hamilton Ct., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| Neighborhood House<br>3030 SW Second Ave., Portland  | No adverse impacts                                 | No use  | N/A  | N/A   |
| IBM Building<br>2000 SW First Ave., Portland   | Partial parcel acquisition                         | Permanent use, <i>de minimis</i> <sup>3</sup> | Temporary occupancy                        | Temporary occupancy                           |
| Pitney-Bowes Building<br>2112 SW 1st Ave., Portland  | Partial parcel acquisition                         | Permanent use, <i>de minimis</i> <sup>3</sup> | Permanent use, potential <i>de minimis</i> | Permanent use, potential <i>de minimis</i>    |
| Addressograph-Multigraph Building;<br>Summa Institute<br>2510 SW First Ave., Portland  | N/A  | N/A   | Permanent use, potential <i>de minimis</i> | Permanent use, potential <i>de minimis</i>    |
| Helen Kelly Manley Community Center (South Portland Settlement Center); National University of Natural Medicine Administration Building<br>2828 SW Naito Pkwy., Portland | N/A  | N/A   | Temporary occupancy                        | N/A   |

**Table D-4. Section 4(f) Permanent Uses by Alternative – Segment A: Inner Portland (multipage table)**

| Property Name and Address   | Summary of Effect (Based on Preferred Alternative) | Preferred Alternative (Draft EIS A1: Barbur)             | A2-BH: Naito Bridgehead <sup>1</sup>       | A2-LA: Naito Limited Access <sup>1</sup>      |
|---|--|--|--|---|
| Failing, Josiah, School; National University of Natural Medicine Academic Building<br>2828 SW Naito Pkwy., Portland | N/A  | N/A  | Permanent use, potential <i>de minimis</i> | Permanent use, potential <i>de minimis</i>    |
| House<br>036N/A038 SW Porter St., Portland  | N/A  | N/A  | Potential temporary occupancy              | N/A   |
| A. Wolfman Building<br>11 SW Gibbs St., Portland  | Partial parcel acquisition                         | Permanent use, <i>de minimis</i> <sup>3</sup>            | Permanent use, potential <i>de minimis</i> | Permanent use, greater than <i>de minimis</i> |
| <b>Segment A Total Permanent Uses (number at <i>de minimis</i> levels)</b>  |  | <b>22 to 25 <sup>4</sup><br/>(15 to 18) <sup>4</sup></b> | <b>21<br/>(15)</b>                         | <b>22<br/>(11)</b>                            |

N/A (= not applicable): Indicates a property outside the study area/area of potential effects (APE) for the alternative.

<sup>1</sup> Anticipated findings for the alternatives from the Draft EIS consider the opportunity for each of those alternatives to have the same characteristics and design refinement and minimization opportunities as the Preferred Alternative, including effects that would result in temporary occupancy or *de minimis* use.

<sup>2</sup> The alignment and stations associated with Alternatives A2-BH and A2-LA would avoid the use of this resource. However, these alignment alternatives would be paired with the Marquam Hill Connection, which would, as currently designed, affect this property.

<sup>3</sup> Preferred Alternative with property affected by Ross Island Bridgehead Reconfiguration, a related transportation improvement.

<sup>4</sup> Total properties affected if Ross Island Bridgehead option was included with the Preferred Alternative

**Table D-5. Section 4(f) Permanent Uses by Alternative – Segment B: Outer Portland (multipage table)**

| Property Name and Address   | Summary of Effect (Based on Preferred Alternative) | Preferred Alternative (Draft EIS B2: I-5 BTC to 60th) | B1: Barbur <sup>1</sup>                                 | B3: I-5 26th to 60th <sup>1</sup>                       | B4: I-5 Custer to 60th <sup>1</sup>                     |
|---|--|---|---|---|---|
| Oregon Electric Railway Overcrossing, Bridge #02010               | Replacement of the bridge                          | Permanent use, greater than <i>de minimis</i>         | Permanent use, greater than <i>de minimis</i>           | Permanent use, greater than <i>de minimis</i>           | N/A   |
| Capitol Hill Motel<br>9110 SW Barbur Blvd., Portland              | Removal or modification of the motel buildings     | Permanent use, greater than <i>de minimis</i>         | Permanent use, greater than <i>de minimis</i>           | Permanent Use, greater than <i>de minimis</i>           | Permanent use, greater than <i>de minimis</i>           |
| 5350 SW Pasadena St., Portland                                    | Removal of the house                               | Permanent use, greater than <i>de minimis</i>         | Permanent use, greater than <i>de minimis</i>           | Permanent use, greater than <i>de minimis</i>           | Permanent use, greater than <i>de minimis</i>           |
| 11125 SW Barbur Blvd., Portland                                   | Removal of the building                            | Permanent use, greater than <i>de minimis</i>         | Permanent use, greater than <i>de minimis</i>           | Permanent use, greater than <i>de minimis</i>           | Permanent use, greater than <i>de minimis</i>           |
| Fulton Park<br>68 SW Miles St., Portland                          | Partial parcel acquisition                         | Permanent use, <i>de minimis</i>                      | Permanent use, potential <i>de minimis</i>              | Permanent use, potential <i>de minimis</i>              | Permanent use, potential <i>de minimis</i>              |
| Burlingame Fred Meyer Sign<br>7529-7601 SW Barbur Blvd., Portland | Temporary construction easement                    | Temporary occupancy                                   | Temporary occupancy                                     | Temporary occupancy                                     | Temporary occupancy                                     |
| Original Pancake House<br>8601 SW 24th Ave., Portland             | Partial parcel acquisition                         | Permanent use, <i>de minimis</i>                      | Permanent use, potential <i>de minimis</i>              | Permanent use, potential <i>de minimis</i>              | Permanent use, potential <i>de minimis</i>              |
| Burlingame Park <sup>2</sup>                                      | Partial parcel acquisition or easement             | Permanent use, <i>de minimis</i> <sup>2</sup>         | Permanent use, potential <i>de minimis</i> <sup>2</sup> | Permanent use, potential <i>de minimis</i> <sup>2</sup> | Permanent use, potential <i>de minimis</i> <sup>2</sup> |
| Master Wrench<br>9803 SW Barbur Blvd., Portland                   | Partial parcel acquisition                         | Permanent use, <i>de minimis</i>                      | Permanent use, potential <i>de minimis</i>              | Permanent use, potential <i>de minimis</i>              | Permanent use, potential <i>de minimis</i>              |



**Table D-5. Section 4(f) Permanent Uses by Alternative – Segment B: Outer Portland (*multipage table*)**

| Property Name and Address   | Summary of Effect (Based on Preferred Alternative) | Preferred Alternative (Draft EIS B2: I-5 BTC to 60th) | B1: Barbur <sup>1</sup>                            | B3: I-5 26th to 60th <sup>1</sup>                  | B4: I-5 Custer to 60th <sup>1</sup>                |
|---|--|---|--|--|--|
| Sylvania Natural Area Park  | Temporary construction easement                    | Temporary occupancy                                   | Temporary occupancy                                | Temporary occupancy                                | Temporary occupancy                                |
| 1801 SW Evans St., Portland   | Temporary construction easement                    | Temporary occupancy                                   | Temporary occupancy                                | Temporary occupancy                                | N/A  |
| Good Shepherd Lutheran Church and Little Lambs Preschool/Daycare<br>3405 SW Alice St., Portland | Temporary construction easement                    | Temporary occupancy                                   | Temporary occupancy                                | Temporary occupancy                                | Temporary occupancy                                |
| 7225 SW Fourth Ave., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7114 SW Brier Pl., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7037 SW Second Ave., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7115 SW Brier Pl., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| Edwin Markham Elementary School<br>10531 SW Capitol Hwy., Portland                              | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7147 SW Fourth Ave., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7211 SW Brier Pl., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7221 SW Brier Pl., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 7301 SW Brier Pl., Portland   | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 3211 SW Primrose St., Portland  | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| 3220 SW Primrose St., Portland  | No adverse impacts                                 | No use  | No use   | No use   | No use   |
| <b>Segment B Total Permanent Uses (number at <i>de minimis</i> levels)</b>                      |  | <b>7 to 8<sup>3</sup><br/>(3 to 4)<sup>3</sup></b>    | <b>7 to 8<sup>3</sup><br/>(3 to 4)<sup>3</sup></b> | <b>7 to 8<sup>3</sup><br/>(3 to 4)<sup>3</sup></b> | <b>6 to 7<sup>3</sup><br/>(3 to 4)<sup>3</sup></b> |

Note: BTC = Barbur Transit Center.

N/A (= not applicable): Indicates a property outside the study area/area of potential effects (APE) for the alternative.

<sup>1</sup> Anticipated findings for alternatives from the Draft EIS consider the opportunity of each of those alternatives to have the same characteristics and design refinement and minimization opportunities as the Preferred Alternative, including effects that would result in temporary occupancy or *de minimis* use.

<sup>2</sup> Burlingame Park would be crossed by a pedestrian bridge if one of the related transportation improvement options were implemented.

<sup>3</sup> One additional property would be involved if Burlingame Park is included for all alternatives.

**Table D-6. Section 4(f) Permanent Uses by Alternative – Segment C: Tigard and Tualatin (*multipage table*)**

| Property Name and Address                                   | Summary of Effect (Based on Preferred Alternative) | Preferred Alternative (Hybrid of Draft EIS Alternatives and Design Options) | Draft EIS Segment C Alternatives <sup>1</sup>                           |                                |
|---|--|---|---|--------------------------------|
|   |  |   | Alternatives within APE   | Alternatives beyond APE        |
| Oregon Education Association<br>6900 SW Atlanta St., Tigard | Partial parcel acquisition                         | Permanent use, <i>de minimis</i>  | C1, C2, C3, C4, C5, C6:<br>Permanent use, <i>de minimis</i>             |                                |
| Fought & Company<br>14255 SW 72nd Ave., Tigard              | Temporary construction easement                    | Temporary occupancy   | C2, C4:<br>Temporary occupancy  | C1, C3, C5, C6:<br>N/A         |
| Southern Pacific Railroad,<br>Tigard Branch<br>Tigard       | No adverse impacts                                 | No use  | C1, C2, C3, C4, C5, C6:<br>Permanent use, potentially <i>de minimis</i> |                                |
| 11530 SW 72nd Ave., Tigard                                  | No adverse impacts                                 | No use  |   | C1, C2, C3, C4, C5, C6:<br>N/A |
| Knauss Chevrolet  | N/A  | N/A   | C3, C4  | C1, C2, C5, C6:<br>N/A         |

**Table D-6. Section 4(f) Permanent Uses by Alternative – Segment C: Tigard and Tualatin (*multipage table*)**

| Property Name and Address  | Summary of Effect (Based on Preferred Alternative) | Preferred Alternative (Hybrid of Draft EIS Alternatives and Design Options) | Draft EIS Segment C Alternatives <sup>1</sup>                              |                         |
|--|--|---|--|-------------------------|
|  |  |   | Alternatives within APE  | Alternatives beyond APE |
| 11880 SW Pacific Highway, Tigard   |  |   | Permanent use, potentially <i>de minimis</i>                               |                         |
| The Williamsburg Townhouse Apartments<br>12265 SW Hall Blvd., Tigard       | N/A  | N/A   | C1, C2, C5:<br>Permanent use, potentially <i>de minimis</i>                |                         |
| Gerber Legendary Blades;<br>Gerber Gear<br>14200 SW 72nd Ave., Tigard      | N/A  | N/A   | C1, C3, C5, C6:<br>Permanent use, potentially <i>de minimis</i>            |                         |
| Potso Dog Park   | No impact  | No use  | C1, C2, C3, C4, C5, C6:<br>No use  |                         |
| Fields Natural Area (Brown Natural Area)                                   | No impact  | No use  | C1, C2, C3, C4, C5, C6:<br>No use  |                         |
| <b>Segment C Total Permanent Uses (number at <i>de minimis</i> levels)</b> |  | <b>1 (1)</b>  | C1: <b>5 (5)</b><br>C3 and C5: <b>4 (4)</b><br>C2, C4 and C6: <b>3 (3)</b> |                         |

N/A (=not applicable): Indicates a property outside the study area/area of potential effects (APE) for the alternative.

<sup>1</sup> Anticipated findings for alternatives from the Draft EIS consider the opportunity for each of those alternatives to have the same characteristics and design refinement and minimization opportunities as the Preferred Alternative, including effects that would result in temporary occupancy or *de minimis* use.

### D.4.3 Temporary Occupancy Exceptions

As noted in Table D-4 to Table D-6 above, during construction the EIS alternatives would also occupy small parts of Section 4(f) properties. As discussed in Attachment DD2, these properties would qualify for temporary occupancy exceptions to a Section 4(f) use, as defined by 23 CFR Part 774.13. For the Preferred Alternative and the related transportation improvements, FTA has prepared additional documentation to meet the requirements for temporary occupancy exceptions for specific qualifying properties, as provided in Attachment D, Section 4(f) Evaluation Attachments. This supports a conclusion that the temporary occupancies for the Preferred Alternative would not result in Section 4(f) uses for the properties listed below. Other EIS alternatives would need similar documentation if they were to be implemented. However, this comparison of alternatives in this Final Section 4(f) Evaluation assumes that temporary occupancies by other alternatives would not result in a Section 4(f) use.

The Preferred Alternative's temporary occupation exceptions are:

- Front and Curry Community Garden, Portland
- 4019 SW Corbett Avenue, Portland
- 3811 SW Barbur Boulevard, Portland
- 022 SW Lowell Street, Portland
- George Himes Park, 6400 SW Terwilliger Boulevard, Portland
- 4515 SW Corbett Avenue, Portland
- Burlingame Fred Meyer Sign, 7529-7601 SW Barbur Blvd, Portland



- 1801 SW Evans Street, Portland
- Good Shepherd Lutheran Church and Little Lambs Preschool/Daycare, 3405 SW Alice Street, Portland
- Sylvania Natural Area Park, Portland
- Fought & Company, 14255 SW 72nd Avenue, Tigard

## D.5 Potential Avoidance Alternatives

FTA is required to analyze feasible and prudent avoidance alternatives to the use of any Section 4(f) property or properties. This analysis requires documentation of the alternatives considered and the factors that make any complete avoidance alternative infeasible or imprudent.

The evaluation of EIS alternatives discussed in Section D.4, Uses of Section 4(f) Resources, found that none of the EIS alternatives would completely avoid the use of Section 4(f) resources. Even if some of the alternatives could achieve *de minimis* use findings for some of the Section 4(f) resources, they still would involve a use and would not be an avoidance alternative. The lack of complete avoidance EIS alternatives was previously noted in the Draft EIS and its Draft Section 4(f) Evaluation. Since that time, preliminary engineering for the Preferred Alternative further developed and evaluated additional potential refinements and options to avoid Section 4(f) resources on a segment level. This effort included evaluating alternatives previously considered (see Appendix I of the Draft EIS, Project Background and Alternatives Considered) as well as refinement options identified in the Draft EIS Appendix E, Potential Design Refinements, several of which were ultimately incorporated into the Preferred Alternative. For the Final EIS and this Final Section 4(f) Evaluation, Appendix I, Preferred Alternative Selection and Project Refinements, has been further updated since the Draft EIS to reflect additional consideration of design refinements and other options to avoid or reduce the use of Section 4(f) resources. Section D.5.1 summarizes uses for EIS alternatives, and Section D.5.2 describes uses for alternatives and concepts considered, including those considered but eliminated prior to the Draft EIS.

### D.5.1 Summary of Uses by Alternatives Considered in the EIS

Table D-7 summarizes the uses of Section 4(f) properties of the Preferred Alternative and the other EIS alternatives considered in the Draft EIS, showing that in Segments A and B, none of the EIS alternatives would avoid the use of Section 4(f) resources. (Alternatives involving other modes and alignments considered prior to the Draft EIS are covered in Section D.6, below.) The specific properties involving a Section 4(f) use were identified by alternative and by geographic segment in Table D-4 to Table D-6.

**Table D-7. Comparison of Preferred Alternative Section 4(f) Uses to Other EIS Alternatives (*multipage table*)**

| Alternatives                                       | Section 4(f) Permanent Use,<br>Greater than <i>De Minimis</i> Use | Section 4(f) Permanent Use,<br>Potentially <i>De Minimis</i> | Total Uses           |
|--|---|--|----------------------|
| <b>Segment A: Inner Portland</b>                   |   |  |                      |
| No-Build   | 0   | 0  | 0                    |
| Preferred Alternative ( <i>former A1: Barbur</i> ) | 7   | 15 (+3) <sup>1</sup>   | 22 (+3) <sup>1</sup> |
| A2-BH: Naito Bridgehead                            | 5   | 15   | 20                   |
| A2-LA: Naito Limited Access                        | 10  | 11   | 21                   |

**Table D-7. Comparison of Preferred Alternative Section 4(f) Uses to Other EIS Alternatives (*multipage table*)**

| Alternatives   | Section 4(f) Permanent Use,<br>Greater than <i>De Minimis</i> Use | Section 4(f) Permanent Use,<br>Potentially <i>De Minimis</i> | Total Uses          |
|--|---|--|---------------------|
| <b>Segment B: Outer Portland</b>   |   |  |                     |
| <b>No-Build</b>  | 0   | 0  | 0                   |
| <b>Preferred Alternative</b> ( <i>former B2: I-5<br/>Barbur Transit Center to 60th</i> ) | 4   | 3 (+1) <sup>2</sup>  | 7 (+1) <sup>2</sup> |
| B1: Barbur   | 4   | 3 (+1) <sup>2</sup>  | 7 (+1) <sup>2</sup> |
| B3: I-5 26th-60th  | 4   | 3 (+1) <sup>2</sup>  | 7 (+1) <sup>2</sup> |
| B4: I-5 Custer-60th  | 3   | 3 (+1) <sup>2</sup>  | 6 (+1) <sup>2</sup> |
| <b>Segment C: Tigard and Tualatin</b>  |   |  |                     |
| <b>No-Build</b>  | 0   | 0  | 0                   |
| <b>Preferred Alternative</b>   | 0   | 1  | 1                   |
| C1: Ash- I-5   | 0   | 5  | 4                   |
| C2: Ash-Railroad   | 0   | 3  | 2                   |
| C3: Clinton-I-5  | 0   | 4  | 3                   |
| C4: Clinton-Railroad   | 0   | 3  | 2                   |
| C5: Ash-I-5 Branched   | 0   | 4  | 3                   |
| C6: Wall-I-5 Branched  | 0   | 3  | 2                   |

<sup>1</sup> Indicates additional properties related to the Ross Island Bridgehead, a related transportation improvement in Segment A

<sup>2</sup> Indicates an additional property related to a station access option, a related transportation improvement in Segment B.

## D.6 Review of Potential Feasible and Prudent Avoidance Alternatives

Any feasible and prudent avoidance alternative would need to avoid the use of any Section 4(f) properties for the Project overall. None of the alternatives considered in the EIS were able to avoid any use of Section 4(f) properties.

The following section reviews other alternatives considered prior to the identification of the EIS alternatives. For the Southwest Corridor project, the alternatives were progressively developed in north to south geographic segments, generally allowing an end-to-end overall alternative to be identified based on which alternative was best able to meet the project's Purpose and Need by segment. Therefore, the following discussion of the Section 4(f) factors related to which alternatives are feasible and prudent includes a review by segment. This covers all alternatives and options considered from earliest stages of project planning, including different modes and alignment combinations of alternatives to connect Portland to Tualatin.

Table D-8 provides a summary listing of full-corridor alternatives and options considered prior to the EIS. The discussion that then follows outlines the factors that precluded feasible and prudent alternatives that could avoid the use of any Section 4(f) resources.



**Table D-8. Alternatives Considered Prior to the EIS (*multipage table*)**

| Alternative   | Potential Avoidance Alternative?   | Feasible and Prudent?   |
|---|--|---|
| <b>Full-Corridor Concepts</b>   |  |   |
| WES Commuter Rail improvements  | <b>No:</b> WES Commuter Rail was identified as having the greatest property impacts of the initial alternatives considered, which would include impacts to potentially historic properties.  | <b>No, based on prudence criterion 1:</b> WES Commuter Rail improvements would not meet the land use and mobility goals outlined in the Purpose and Need and would not serve the north/south orientation of the corridor and the land uses targeted for growth. It would not address multimodal safety problems in the corridor, which is also a key element of the Purpose and Need.   |
| Bus rapid transit alternatives using high occupancy vehicle (HOV) or high occupancy toll (HOT) lanes on I-5                       | <b>Yes:</b> No impacts to Section 4(f) resources identified, although details of the necessary connections to reach I-5 or modify I-5 were not defined.  | <b>No, based on prudence criteria 1 and 2:</b> These alternatives would not meet the corridor land use and mobility vision outlined in the Purpose and Need, particularly the need to create a bikeable, walkable corridor with high quality transit. Few of the corridor's identified focus areas have adequate access for freeway-based transit to serve them effectively. Physical barriers would make new access difficult and not supportive of intended land use visions. |
| Streetcar   | <b>No:</b> Streetcar service would have Section 4(f) impacts, similar to light rail because existing facilities would still need to be widened to accommodate streetcar, including in the South Portland Historic District.  | <b>No, based on prudence criteria 1.</b> Streetcar service would lack the capacity to meet travel demand, as well as the speed needed to improve mobility, yet it would still carry high costs for retrofitting the corridor, making it unreasonable to proceed.  |
| Bus rapid transit in exclusive right of way   | <b>No:</b> Bus rapid transit in exclusive right of way would have overall environmental impacts very similar to those of light rail, including impacts to Section 4(f) properties. To provide speed and reliability improvements called for in the Purpose and Need, bus rapid transit would unavoidably impact Section 4(f) resources, particularly in Segments A and B where congestion affects reliability and a dedicated transitway is warranted. | <b>No, based on prudence criteria 1 and 2.</b> Bus Rapid Transit service would lack the capacity to meet travel demand, compromising the project. Operations analysis showed it would result in operational and reliability problems because buses would need to run with very high frequencies, creating problems to and from the downtown transit mall. At the same time, BRT would still carry high costs for retrofitting the corridor, making it unreasonable.             |
| <b>Partial-Corridor Concepts</b>  |  |   |
| Tunnels under Marquam Hill in South Portland, including tunnels continuing to serve Hillsdale and Multnomah Village               | <b>No:</b> All tunnel alignments under Marquam Hill would affect Section 4(f) resources, including Terwilliger Parkway and Duniway Park. Shorter tunnel alignments would affect additional Section 4(f) resources further south along SW Barbur Boulevard.   | <b>No, based on prudence criteria 1.</b> Tunnels would not address multimodal access and safety problems in northern segments of the corridor, which is a key element of the Purpose and Need.  |
| An alignment generally following I-405 and I-5 between the south end of the Portland Transit Mall and the Burlingame neighborhood | <b>Yes:</b> No impacts to Section 4(f) resources identified, although details of the necessary connections to reach I-5 via I-405, or to modify I-5, were not defined.   | <b>No, based on prudence criteria 1:</b> Freeway alignments would not meet the land use and mobility goals outlined in the Purpose and Need, particularly the need to create a bikeable, walkable corridor with high quality transit. Few of the corridor's identified focus areas have adequate access for freeway-based transit to serve them effectively. Physical barriers would make new access difficult and not supportive of intended land use visions.                 |
| South Waterfront – short (bridge/tunnel to SW Naito Pkwy.)  | <b>No:</b> A short tunnel to SW Naito Parkway would be within the South Portland Historic District and very likely to result in adverse  | <b>No, based on prudence criteria 3 and 5.</b> Tunnel portal and staging areas would also be likely to create high levels of environmental impacts, including to the South Portland Historic District and to traffic in a highly congested area. A tunnel would have construction costs of an extraordinary magnitude.  |

**Table D-8. Alternatives Considered Prior to the EIS (multipage table)**

| Alternative   | Potential Avoidance Alternative?  | Feasible and Prudent?   |
|---|---|---|
| South Waterfront – long, potentially to Burlingame area, with variations including to SW Hamilton Street, or a tunnel from South Waterfront to Marquam Hill | <b>No:</b> No impacts to specific Section 4(f) resources were identified, but details of the necessary connections to reach the Burlingame area or other connections were not highly defined. However, for all options, unavoidable Section 4(f) impacts would still remain to the South, in Segment B. A tunnel to SW Hamilton Street would still result in Section 4(f) uses to the south within Segment A as well as in Segment B. A tunnel from South Waterfront to Marquam Hill would require extensive construction and hauling along Terwilliger Parkway, a Section 4(f) property. | <b>No, based on prudence criteria 1, 3 and 5:</b> A long tunnel or other variations would not provide station locations in areas needed to meet the land use and mobility goals outlined in the Purpose and Need. They would not address the need to create a bikeable, walkable Southwest corridor. A tunnel from South Waterfront to Marquam Hill would not complete the corridor connections needed to meet the Purpose and Need. Tunnel portal and staging areas would also be likely to create high levels of environmental impacts in a corridor that is either developed or involves sensitive ecosystems. A tunnel would have construction costs of an extraordinary magnitude. |

### D.6.1 No-Build Alternative

The No-Build Alternative is required under NEPA for the comparison of alternatives. Based on the identification of uses in Section D.3 and the other potential avoidance alternatives described above, only one EIS alternative was identified that could avoid use of Section 4(f) properties: the No-Build Alternative. Therefore, the No-Build Alternative is further evaluated here using the feasible and prudent standards of Section 4(f).

The No-Build Alternative would avoid the use of any Section 4(f) property by making no alterations to the existing transportation infrastructure. However, the No-Build Alternative is not a prudent avoidance alternative under Factor 1 (see Section D.2.5 for the list of factors), because it would fail to meet the Purpose and Need. Specifically, the No-Build Alternative would not meet the purpose of the Project, which is to directly connect Tualatin, downtown Tigard, southwest Portland and the region's central city with high quality transit and appropriate community investments in a congested corridor to improve mobility and create the conditions that will allow communities in the corridor to achieve their land use vision.

### D.6.2 Other Alternatives Considered in Earlier Project Planning

The Final EIS and the alternatives analysis reports that it incorporates detail the three major phases of project planning and development that have defined the alternatives currently being considered in the Final EIS, as well as the alternatives removed from consideration. This definition of alternatives includes the proposal for light rail itself as well as the types of alignments being considered.

Between 2009 and 2011, Metro's Southwest Corridor Steering Committee established an initial Purpose and Need focused on a Southwest Corridor Land Use Vision and a more effective, reliable and safe regional transportation network.

Early scoping for NEPA occurred in 2011, which allowed public comment on the Purpose and Need and the range of alternatives under consideration. From 2013 to 2016, Metro's steering committee further considered high capacity transit alternatives featuring light rail transit or bus rapid transit on a variety of corridors, primarily on or near SW Naito Parkway or SW Barbur Boulevard in South Portland, and on or along SW Barbur Boulevard in Southwest Portland toward Tigard.



Finally, between 2013 and 2016, the project refinement process focused on identifying a reasonable range of proposed high capacity transit alternatives that would best meet the Purpose and Need adopted in 2014. Chapter 2, Alternatives Considered, and Appendix I of the Draft EIS provide more details on the Project's early planning and refinement process.

The alternatives analysis and project refinement phase in 2013 through 2016 that led to the start of the Draft EIS included the review of many alternatives to connect Portland to Tigard and Tualatin using alternate routes; termination points; and combinations of bus rapid transit, light rail, streetcar and improved WES Commuter Rail. Table D-8 summarizes the alternatives considered prior to the EIS, including these, for their ability to avoid Section 4(f) use or to be feasible and prudent avoidance alternatives. The alternatives considered and removed from further consideration during the alternatives analysis and project refinement phases are listed below:

- WES Commuter Rail improvements were eliminated, because they would have resulted in high property impacts, including impacts to potentially historic properties. They would not be Section 4(f) avoidance alternatives, and they did not meet the land use and mobility goals outlined in the Purpose and Need.
- Bus rapid transit alternatives using high occupancy vehicles or high occupancy toll lanes on I-5 would not meet the corridor land use and mobility vision outlined in the Purpose and Need, particularly the need to create a bikeable, walkable corridor with high quality transit.
- Streetcar service would not offer the capacity needed to meet the passenger demand in the corridor, and it would be slower and less reliable without fully dedicated right of way. In any case, it would have had similar Section 4(f) impacts to light rail, because existing facilities would still need to be widened to accommodate the streetcar. Therefore, streetcar would not be a Section 4(f) avoidance alternative.
- Bus rapid transit in exclusive right of way would have overall environmental impacts very similar to those of light rail in exclusive right of way. To provide speed and reliability improvements called for in the Purpose and Need, bus rapid transit would have unavoidably impacted Section 4(f) resources, particularly in Segments A and B, where congestion affects reliability and a dedicated transitway is warranted. In addition, bus rapid transit lacked the capacity to accommodate long-term ridership demand and would have had higher operational costs, making it not prudent.
- Three tunnels under Marquam Hill in South Portland for bus rapid transit were removed from consideration, because they would have reduced the major advantage of bus rapid transit over light rail, which was reduced capital costs; they lacked the capacity to serve overall future corridor demand; and they did not meet the multimodal purpose stated in the Purpose and Need. They also would not have been Section 4(f) avoidance alternatives, because they would have affected Section 4(f) resources including Terwilliger Parkway and Duniway Park.
- Other tunnels to bypass portions of Segments A and B to travel south were considered and removed, including alternatives from Duniway Park to Hillsdale to Burlingame/SW Capitol Highway, because they had costs and impacts of a much higher magnitude than surface alternatives. They also would not have been Section 4(f) avoidance alternatives, because they still would have permanently occupied and adversely impacted Section 4(f) resources such as Duniway Park and Terwilliger Parkway. They would still have required a connection to SW Barbur Boulevard, where other Section 4(f) properties would be

unavoidably affected. They would not have created the multimodal corridor with transit, bicycle and pedestrian facilities on SW Barbur Boulevard, which project partners considered essential to the land use goals outlined in the Purpose and Need.

- A major realignment generally following I-405 toward I-5, and following I-5 to the Burlingame neighborhood, seeking to fully avoid the South Portland Historic District and the Newbury and Vermont Viaducts, was considered, but it failed based on multiple factors, including limited mobility and multimodal benefits, because it would have bypassed some of the densest areas of Portland, including OHSU and VA Portland. It would have created severe environmental impacts, including impacts to other Section 4(f) resources. Finally, it would have had high magnitude increases in construction, maintenance and operational costs, particularly related to I-5. It also would have created greater concerns about the ability to secure the state and federal approvals necessary for the substantial commitment of interstate highway lands in a location where safety and operations remain a concern because the existing highway does not meet current freeway standards. Therefore, this alternative would not be prudent.

### **D.6.3 Conclusion Regarding Feasible and Prudent Avoidance Alternatives**

Considering the factors above and a review of avoidance alternatives, FTA concludes that the Southwest Corridor Light Rail Project has no feasible and prudent alternatives that avoid any use of Section 4(f) properties. Therefore, a least overall harm alternatives analysis is required for all of the Project alternatives determined to be feasible and prudent. Based on the analysis in this evaluation and supporting planning efforts, the Preferred Alternative and the other light rail alternatives evaluated in the EIS represent the only alternatives that are feasible and prudent.

## **D.7 All Possible Planning to Minimize Harm and Least Harm Analysis**

This section addresses planning to minimize harm and the least harm analysis for the EIS alternatives. Section D.7.1 focuses on planning. Sections D.7.2 and D.7.3 address least harm factors 1 through 4 for the Preferred Alternative and the other EIS alternatives. This analysis focuses on an evaluation and comparison of Section 4(f) properties that are anticipated to result in permanent uses where the impacts would be greater than *de minimis*. For a comparison of permanent uses that would result in *de minimis* impacts, see Tables D-4, D-5, and D-6. Section D.7.4 summarizes the overall results of the least harm analysis, including evaluation of the remaining factors (5 through 7).

### **D.7.1 All Possible Planning**

The following sections discuss the planning to minimize harm for the Preferred Alternative, focusing on areas where uses of Section 4(f) properties were greater than *de minimis*. (The related transportation improvements did not result in any uses where impacts were found to be greater than *de minimis*.) Section D.8 includes a summary of tribal and agency consultations as part of the EIS process as well as specifically to resolve issues involving Section 4(f) properties and all possible planning to minimize harm.

#### **Segment A: Inner Portland**

In Segment A, the downtown Portland and South Portland neighborhoods are the most developed parts of the corridor and have the highest concentration of Section 4(f) resources. Within less than a mile, the



corridor encounters several parks, the South Portland Historic District and multiple other historic properties in the topographically constrained area presented by Marquam Hill and the Portland West Hills. The Project's Purpose and Need calls for a project that would provide multimodal connections to jobs, services and educational opportunities along this north/south corridor. The OHSU and VA complex on Marquam Hill is the largest concentration of all three of these types of attractions in the corridor. Appendix I of the Draft EIS provides background on why the Draft EIS alternatives following SW Barbur Boulevard or SW Naito Parkway were chosen: they were the only alignments close enough to notably improve connections to Marquam Hill and meet the Purpose and Need, while avoiding high environmental impacts and substantially higher costs.

In Segment A, all previously considered alternatives begin in south downtown to connect with MAX and the Portland Transit Mall, and ultimately follow SW Barbur Boulevard beyond where SW Naito Parkway and SW Barbur Boulevard converge. There are multiple historic properties on the streets connecting to the Portland Transit Mall. The primary connecting street is SW Barbur Boulevard, which was built as a cut-and-fill highway across the lower slopes and ravines of the West Hills, and it has either dense development or hillside parks and greenspaces immediately adjacent to it, many dating back to the early 1900s. SW Naito Parkway was later developed through the South Portland Historic District, and it is surrounded by historic properties and major transportation infrastructure. The physical constraints for SW Barbur Boulevard as well as SW Naito Parkway limited feasible and prudent realignment options that could avoid the use of Section 4(f) resources. The variations considered as part of project planning prior to the EIS, either resulted in the same or greater impacts on Section 4(f) resources as the EIS alternatives, or they had higher impacts for traffic-related operations, safety and the environment.

After the Preferred Alternative was identified using SW Barbur Boulevard, TriMet explored refinements to shift the roadway and light rail alignment west, trying to avoid impacts to several historic properties to the east. This additional engineering found that cutting into the steep hillside to the west would close access to multiple uphill driveways and roads, impacting blocks of individual properties from SW Gibbs Street to SW Hamilton Street, and worsening traffic on the few remaining connecting streets. Properties affected would include those from the historic era that are likely to be significant resources protected by Section 4(f), and shifting the alignment to the west in this area would nearly triple acquisition impacts to multifamily housing units. These modifications were not considered prudent and were not pursued further.

Terwilliger Parkway would be crossed by a Marquam Hill Connection for all EIS alternatives, resulting in permanent use. A variety of options for a Marquam Hill Connection were considered at several points in project development, but those that avoided a use of Terwilliger Parkway because they did not cross the parkway (i.e., shuttle buses) also would not result in improved mobility to one of the region's largest employment centers, compared to the No-Build Alternative, and therefore did not meet the Project's Purpose and Need. Other options would have still resulted in a permanent use of Terwilliger Parkway due to permanent occupation of parkway property and/or high construction area impacts, and were less effective than other available reasonable alternatives. Pre-Draft EIS options included a pedestrian tunnel with elevators; an imbedded escalator, elevator and bridge; an escalator and inclined elevator; and an elevator and bridge ("skybridge" and "tree top walk"). The Draft EIS alternatives included variations on tunnels, elevators and bridges in slightly different locations. Additional options considered after the Draft EIS and as part of a Blue Ribbon Committee engaging the City of Portland and stakeholders: pathway, bridge and elevator combinations; a funicular/inclined elevator; a tunnel and elevators; an

escalator/moving walkway; an aerial tram; a gondola; and shuttle bus. Attachment DD3 has more details on the connector concepts considered.

Beyond the South Portland Historic District and continuing along SW Barbur Boulevard, impacts to the Rasmussen Apartments and two historic viaducts south of the SW Capitol Highway were present for all EIS alternatives. The viaducts represent an additional location where the lack of feasible and prudent alternatives was apparent. Expanding but retaining the bridges to accommodate light rail, bicycles and pedestrians would require major modifications to the viaducts and still would have an adverse effect to them under Section 106, resulting in a Section 4(f) use. Bypassing the viaducts with a new bridge to the west would have increased impacts to other Section 4(f) resources, including Terwilliger Parkway and George Himes Park. A new bridge to the west would have required a complex system of flyovers for the transitway and continuous bicycle and pedestrian facilities. This in turn would create safety and operational problems. It also would conflict with the SW Capitol Highway ramps to SW Barbur Boulevard.

Any bypass concept would still adversely impact the setting and views of the historic viaducts, particularly the Newbury Viaduct, even if a bypass could avoid a Section 4(f) use of the viaduct. Similar problems would occur with a bypass to the east (as examined in the post-Draft EIS Refinement 1 – Barbur Woods East-Side Running), which would move the alignment east of SW Barbur Boulevard and toward I-5. This design refinement would still involve a use of the historic Rasmussen Village apartments. It would introduce more conflicts with I-5 infrastructure, increase conflicts with the flyovers and with the SW Capitol Highway ramps, and present adverse effects to the historic viaducts due to impacts to their settings. The topography challenges with the steeply sloping hillside on the east side also presented more technical, cost and environmental challenges. In addition, more continuous new right of way would be needed alongside SW Barbur Boulevard from north of the Newbury Viaduct to the south of the Vermont Viaduct, with much higher impacts to natural areas and hillsides, and greater concerns over resulting harm to ecosystems, including endangered salmon. There also would be little opportunity to address existing untreated stormwater from SW Barbur Boulevard, which would remain unimproved.

## **Segment B: Outer Portland**

In Segment B, there are developed properties on either side of SW Barbur Boulevard and on both sides of I-5, including in neighborhoods with several hundreds of buildings developed in the historic era (1975 or before). The Section 4(f) uses involve properties immediately on or adjacent to SW Barbur Boulevard. While the EIS alternatives presented some trade-offs in their ability to avoid individual Section 4(f) properties, none were able to avoid all properties.

To meet the Project's Purpose and Need, the corridor in Segment B must connect from Segment A near Burlingame and continue toward Tigard, while serving key destinations on or near SW Barbur Boulevard, including the Barbur Transit Center. The existing Barbur Transit Center at the "Barbur Crossroads" (or "The Crossroads") was identified from the beginning of corridor planning as an essential destination to be served (see Draft EIS Appendix I). It would be imprudent to advance alternatives not in proximity or connecting to this existing major multimodal transportation hub because they would not be effective in meeting the Purpose and Need.

The transportation networks of the surrounding communities all feed toward SW Barbur Boulevard. As in Segment A, there are no other existing parallel north/south transportation corridors other than I-5 and SW Barbur Boulevard that would make these connections, with I-5 typically within several hundred yards

or closer to SW Barbur Boulevard. In addition, any new corridor developed through existing neighborhoods in the area would present extraordinary community disruption and as such would not be prudent.

### **Segment C: Tigard and Tualatin**

Through additional planning during the Final EIS, FTA and TriMet have confirmed the Preferred Alternative for Segment C would have only *de minimis* uses or temporary occupancy exceptions, with no Section 4(f) use greater than *de minimis*. While a *de minimis* finding would still represent a use, all other build alternatives would involve some or all of the same *de minimis* uses as the Preferred Alternative or would have permanent uses that would be greater than *de minimis*. All build alternatives were designed to connect to the Tigard Transit Center, which was an essential destination to be served. The transit center is adjacent to the Southern Pacific Railroad, an historic property. To avoid high impacts and extraordinary disruption to the surrounding Tigard neighborhoods while allowing the Project to continue to continue south to Tualatin, all alternatives would occupy a portion of the Southern Pacific Railroad right of way, constituting an unavoidable Section 4(f) use, even though it would potentially be *de minimis* for all the EIS alternatives.

## **D.7.2 Least Harm Analysis of the Preferred Alternative (Least Harm Factors 1 to 4)**

In addition to the planning, design refinement and coordination conducted to minimize the effects to Section 4(f) properties, the Preferred Alternative has undergone other refinements to minimize adverse environmental effects to other resources not protected by Section 4(f). Chapter 2, Alternatives Considered, of the Final EIS provides further detail on design changes following the identification of the Preferred Alternative.

The following sections discuss the Section 4(f) use of properties affected by the Preferred Alternative where the permanent use would be greater than *de minimis*. The section applies the least harm evaluation factors first for the Preferred Alternative, and the next section describes other EIS alternatives, before concluding with a comparison of environmental effects across all alternatives.

For the Section 4(f) properties that are historic, the Section 106 Memorandum of Agreement (MOA), signed by FTA, TriMet and the Oregon SHPO, along with the *Cultural Resource Survey*, provides additional documentation of the efforts to minimize harm in conjunction with the Section 106 process. The MOA and the *Cultural Resource Survey* are incorporated by reference as part of this Final Section 4(f) Evaluation, because they are the detailed documentation for conclusions regarding effects on historic resources and related determinations on the Section 4(f) use of such properties for the Project, focused on the Preferred Alternative. The MOA is also provided as Attachment DD5 to this evaluation. As part of the Project's Section 106 compliance efforts, FTA consulted with the Oregon SHPO, engaged the public and other consulting parties (see Attachments DD1 and DD4), and received written concurrence from the Oregon SHPO with the determinations of eligibility and findings of effect for historic properties, as well as the mitigation commitments defined for the Project to reduce harm.

### **Congregation Ahavath Achim Synagogue**

The 1966 Post-Modern synagogue is eligible for listing in the NRHP under Criteria A and C. The Preferred Alternative would cause an adverse effect due to changes to the property and its historic setting, with alterations ranging from modification of the building, to potentially the complete removal of the building.



- **Ability to mitigate adverse impacts to the Section 4(f) resource.** Based on the results of outreach as part of the Section 106 process, TriMet has explored opportunities to avoid the complete removal of the synagogue building, although modification to the foundation appears unavoidable without realigning SW Barbur Boulevard and thus increasing impacts to the west and impacting other Section 4(f) properties within the South Portland Historic District. If much of the remaining synagogue structure remains, it would still be recognizable for the clean lines of its Post-Modern design, and as a visual reminder of the building's former role as a cultural hub for Portland's Sephardim. Other mitigation measures defined in the Section 106 MOA include the following:
  - TriMet will complete Historic American Buildings Survey (HABS) documentation with measured drawings, narrative history and photographs for the Congregation Ahavath Achim Synagogue. The level of the documentation (Level I, II or III) will be determined by the National Park Service. TriMet will provide the HABS documentation to the National Park Service (Pacific West Region) for review and comment. TriMet will transmit the final HABS documentation to the National Park Service for distribution to the Library of Congress and the Oregon SHPO.
  - TriMet, in consultation and collaboration with Oregon Jewish Museum and Center for Holocaust Education, will prepare an interpretive display for installation at the lower terminal of the Marquam Hill Connection. The display will provide information about the Ahavath Achim congregation and the Jewish community of South Portland, including the previous displacement of the congregation's original synagogue by the South Auditorium Urban Renewal project.
  - TriMet will publish documentation, as described above, on the Project website during construction, and will make the files available to project partners.
- **Relative severity of the remaining harm.** The Section 4(f) use determination assumes the complete removal of the synagogue building and replacement with the transportation facility. Even with mitigation, this would result in severe harm. However, based on TriMet's public outreach, including briefings with the Portland Landmarks Commission, TriMet has studied opportunities for adaptive reuse of the building. If other parties demonstrate an interest in sponsoring a future reuse for the building, TriMet would make the retained portion of the property available for reuse. While alterations to a portion of the building, including to its foundation, appear unavoidable, retaining a portion of the building would still be a visual reminder of the Post-Modern style of the building, and would continue to physically mark the relationship of the building to Jewish immigration to Portland.
- **Relative significance of the Section 4(f) resource.** The resource has been determined to be significant in the history of Sephardic Jewish immigrants to Portland and for its Post-Modern design. In recent years the building was no longer used for services by the Congregation Ahavath Achim, and the congregation was seeking to redevelop the property before they approached TriMet and asked the agency to purchase the property. The building has retained its historic significance, but ongoing maintenance was a concern after the building was no longer in regular use by the congregation.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the property is eligible for the NRHP and the Preferred Alternative would have an adverse effect. The Oregon SHPO has also suggested mitigation measures that have been incorporated within the MOA.

## South Portland Historic District

The South Portland Historic District was listed in the NRHP in 1998 and comprises 246 contributing structures in the Lair Hill and Corbett neighborhoods. The Preferred Alternative would remove eight seven historic houses that contribute to the significance of the district. The Preferred Alternative also would alter portions of nine other parcels with contributing resources to the district, including Lair Hill Park.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** The removal of seven contributing buildings within the district would adversely affect the district. The Section 106 MOA defines the following mitigation measures:
  - For those buildings that are acquired within the district boundary and will be removed to facilitate light rail construction, TriMet will offer each building to be relocated by a third party, at no cost, within 120 days after notice of demolition review is submitted to the City of Portland.
  - For those contributing buildings that are acquired within the South Portland Historic District boundary, are planned for removal, and for which no interested party has been identified for relocation, TriMet would deconstruct the building to salvage reusable building materials, which could be retained by deconstruction contractors for reuse or donated to local non-profits who specialize in reuse of building materials.
  - TriMet will survey the entire South Portland Historic District and amend the 1998 NRHP nomination form. The SPHD currently spans approximately 49 acres and 31 blocks in Portland, and currently consists of 246 resources in the Lair Hill and Corbett neighborhoods. The survey will include sections on common themes and issues affecting historical integrity and recommendations to improve historical integrity of the district in the future. Survey data will be collected at the intensive level and reported to the Oregon SHPO using the Oregon Historic Sites Database. The amendment will outline recommended changes in contributing status of individual resources in the district. TriMet will provide the amendment to the Oregon SHPO and the State Advisory Committee on Historic Preservation for review and comment, and then will submit the amendment to the Keeper of the National Register. This process will be completed within five years of the execution of the MOA. The survey's findings and recommendations will be presented at a public hearing before the City's Historic Landmarks Commission for consideration of the recommendations.
- **Relative severity of the remaining harm.** The impacts to the seven contributing properties within the district would occur along the western edge of the district. Even with the removal of the buildings, the district would be expected to retain the characteristics that merited its listing in the NRHP. In addition to the mitigation commitments, the Project's modifications to intersections on its boundaries, including measures to discourage cut-through traffic and encourage walking, biking and transit access, would help retain neighborhood character by reinforcing the pedestrian orientation of the original South Portland neighborhood.
- **Relative significance of the Section 4(f) resource.** The district is of high significance as an NRHP-listed district with multiple buildings that carry historic significance in their own right as well as collectively. Of the seven individual contributing properties that would be removed, two are primary contributing resources, meaning that they retain characteristics that would likely merit NRHP eligibility on their own, and five are secondary contributing properties that remain consistent with the district's

overall residential and historic characteristics but lack some elements of integrity or distinction. At least one of the secondary contributing properties has been notably altered since the original district nomination was completed over 20 years ago.

- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the NRHP-listed District would experience an adverse effect under the Preferred Alternative. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including an updated survey of the District, detailed documentation of the individual properties affected, and offering affected buildings at no cost to parties willing to relocate them.

### **Terwilliger Parkway**

Terwilliger Parkway, established in 1914 is owned by the City of Portland/Portland Parks and Recreation and is listed in the NRHP as a historic district. The Preferred Alternative would develop an inclined elevator through a section of the park.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** Based on coordination and through a written agreement with the City of Portland and an MOA developed in consultation with the Oregon SHPO, mitigation measures have been incorporated into the Project to minimize the effects to historic characteristics as well as the park and recreation characteristics of the parkway. From September 2018 through March 2020, the Project coordinated with the city and stakeholders to develop and evaluate options to minimize impacts, considering several locations and using different designs to make the connection to Marquam Hill. The proposed Marquam Hill Connection minimizes and mitigates impacts to the park with:
  - an alignment that avoids impacts to native oak habitat important to the park's characteristics
  - an alignment located in a hillside valley to limit visual impacts to Terwilliger Parkway and designated view corridors, and that uses an existing utility corridor to avoid impacts to the existing SW Trail #1 or other valued park features
  - a funding commitment to develop alternative pedestrian routes via SW Trail improvements instead of creating a more impactful connector with an adjacent stairway or structure for pedestrians
  - a straight alignment to minimize the width of the trackway to reduce the footprint
  - a passenger cab orientation and access plan that maintains passenger capacity but minimizes the landing footprint
  - a design that maintains enough clearance under the inclined structure to support wildlife passage and allow native plantings
  - an "open canopy" design plan for the landing, using glass or transparent railing features to minimize the visibility of the headhouse from SW Terwilliger Boulevard, and avoiding obstruction of views
  - a landing positioned at-grade on the east side of the intersection of SW Terwilliger Boulevard and SW Campus Drive, avoiding significant impacts that would have been caused with a prior design that cut into the hillside to cross under SW Terwilliger Boulevard
  - a structural type that minimizes grading and earthwork impacts to the slope



Additional mitigation for historic property effects to Terwilliger Parkway would include:

- TriMet would develop an interpretive display at or near the upper terminal of the Marquam Hill Connection. The display would describe the historic attributes and features of Terwilliger Parkway, provide information on the Olmsted Brothers and their plan for Portland parks, and provide information on the City Beautiful movement in Portland.
- TriMet will develop install up to two gateway signage signs for Terwilliger Parkway consistent with existing gateway signage at the north end of the parkway. Locations to be determined in consultation with PBOT and Portland Parks and Recreation and subject to local permits.
- TriMet will provide up to five new streetlight poles that meet PBOT standards to match existing streetlights on Terwilliger Parkway. The streetlights will be installed near the upper terminal of the Marquam Hill Connection, in the vicinity of the intersection of SW Campus Drive and Terwilliger Parkway.
- During the detailed design of the Marquam Hill Connection, TriMet would employ a collaborative process involving the City of Portland to review design concepts. The goal of this process would be to solicit community feedback and reduce impacts to the parkway's historic characteristics, attributes and features.

Additional mitigation for park and recreation effects to Terwilliger Parkway would include:

- TriMet would restore understory plantings and replant trees at ratios equal to or greater than the removed trees, as defined by the City of Portland/TriMet written agreement. TriMet will work with the city to identify areas for tree replantings, including areas to improve Oregon White Oak habitat.
- During construction, TriMet would coordinate with the City of Portland to assist the city in improving protected views that are currently blocked by trees and overgrowth, potentially involving the removal or trimming of select trees and vegetation at the turnout on Terwilliger Parkway, which is a designated viewpoint.
- TriMet would work with the City of Portland/Portland Parks and Recreation to develop design details for the inclined elevator system to minimize impacts to wildlife; these design details would include bird-friendly cabs and elevator headhouse, with an elevator guideway span clearance designed to accommodate wildlife passage while minimizing impacts to views.
- TriMet would contribute funds to Portland Parks and Recreation for the development of a Natural Resource Management Plan covering the adjacent natural areas of Terwilliger Parkway, Marquam Nature Park and George Himes Park.
- TriMet would integrate measures related to the historic aspects of Terwilliger Parkway, such as a historically sensitive design concept for the roadway improvements at SW Campus Drive and SW Terwilliger Boulevard.
- In consultation with the city, and consistent with measures to minimize impacts to the park's historic characteristics, TriMet would design and install a Terwilliger Parkway historic interpretive signage/panel near the western headhouse or along SW Terwilliger Boulevard.

- TriMet would contribute funds to the City of Portland/Portland Parks and Recreation to support recreational trail improvements at SW Trail #1 and/or a trail from SW Slavin Road to SW Trail #3.
- TriMet would install a second Terwilliger Parkway monument sign at the south end, at SW Seventh Avenue, similar to the one in Duniway Park, and consistent with Portland Parks and Recreation signage guidance.
- TriMet would fulfill requirements of non-park use permits by the City of Portland, including meeting the requirements of the City of Portland Tree Code.
- **Relative severity of the remaining harm.** While the conversion of the strip of land through the resource would be an adverse effect, the mitigation measures would provide benefits that would also enhance the public's access to the resource, and they would provide more information about its importance as an historic property and a public park with natural resource values. After the Project is developed and mitigation is in place, the parkway would continue to retain the defining characteristics that enable it to be eligible for listing in the NRHP as a historic resource, and it would continue to qualify as a park and recreation resource contributing to the belt of larger natural area preserves along Portland's southwest hills.
- **Relative significance of the Section 4(f) resource.** The parkway is one of the most prominent historic and park resources in the City of Portland and enjoys the support of multiple advocacy groups devoted to its preservation and enhancement as a recreational and natural area park and as a historic property tied to the City Beautiful movement from the early 19th century.
- **Views of the City of Portland and the Oregon SHPO, the officials with jurisdiction.** FTA's finding that the permanent use would be greater than *de minimis* was based on the comments of the Oregon SHPO regarding the adverse effects of the Project on historic characteristics, including the modern infrastructure to be introduced. During planning up to that point, the City of Portland had agreed that the mitigation and enhancement measures included in the Preferred Alternative would not result in an adverse impact to the parkway as a park and recreation resource, and it supported the inclined elevator because it minimized impacts compared to other Marquam Hill connection options that had been evaluated to date. The City and the Oregon SHPO have suggested mitigation measures that have been incorporated as part of the Project.

### **Jewish Shelter Home**

The Jewish Shelter Home, 4133 SW Corbett Avenue, constructed in 1902, is listed in the NRHP. The Preferred Alternative would encroach on the Jewish Shelter Home property, affecting a home addition that was formerly used as an isolation hospital.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** The Jewish Shelter Home would be adversely affected by the removal of the isolation hospital addition currently attached to the property. Retaining the isolation hospital addition would require a deviation from City of Portland street design requirements and a subsequent permit approval. Avoidance and mitigation measures are the following:
  - TriMet, during final design of the undertaking, would seek a deviation from street design requirements from the City of Portland to avoid the removal of the isolation hospital addition. If the

City of Portland permits the deviation, the adverse effect to the Jewish Shelter Home would be avoided.

- If the City of Portland does not permit the deviation, and demolition of the isolation hospital structure is necessary, TriMet would restore the back side of the Jewish Shelter Home after the isolation hospital is demolished, consistent with the historic character of the property and in accordance with Secretary of Interior Standards. TriMet would provide the SHPO an opportunity to review and comment on the restoration plan before the demolition of the isolation hospital.
- **Relative severity of the remaining harm.** The Jewish Shelter Home would remain in place, even if the removal of the isolation hospital is warranted. Despite the removal of the isolation hospital, with restoration measures to the original structure, the Jewish Shelter Home would retain the majority of the characteristics and associations qualifying it for the NRHP.
- **Relative significance of the Section 4(f) resource.** As indicated by its listing in the NRHP under Criteria A and B, the property has high significance. Its local designation as City of Portland Historic Landmark further indicates the multiple layers of relationship the property has to Portland history, the Jewish community in Portland, and to significant people in Portland's and Oregon's history.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the NRHP-listed building would experience an adverse effect under the Preferred Alternative. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including an updated survey of the building and detailed documentation.

### Rasmussen Village

Rasmussen Village at 4936-4950 SW Barbur Boulevard, is eligible for listing in the NRHP, and the Preferred Alternative would modify character-defining features of the property.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** To mitigate the partial acquisition and modification of this resource, TriMet would complete Oregon State Level Documentation (i.e., documentation done to the Oregon SHPO's Standards) for Rasmussen Village. The documentation will include a detailed architectural description, including its context, a detailed physical description, its history, digital photographs capturing the character and appearance of the property's interior and exterior areas, and relevant archival materials. For Rasmussen Village and other properties along SW Barbur Boulevard, TriMet would also compile a historic context detailing SW Barbur Boulevard's construction during the 1930s and its mid-20th century evolution. The historical context would be distributed via project websites hosted by Metro and TriMet, and information would be shared in a public presentation in Portland. TriMet would provide the historical context to the Oregon SHPO.
- **Relative severity of the remaining harm.** The Section 106 adverse effect and the Section 4(f) use would result from impacts to a portion of the property, but the majority of the property would remain. The Project would remove character-defining frontage features of the Rasmussen Village complex, including a wall and driveway entrance matching the white stucco of the historic apartment buildings on the property. None of the apartment buildings would be altered or removed, and thus most of the property's defining features would be preserved. In addition, with replanting and restoration measures, the property is expected to retain the Art Deco characteristics that qualify it as eligible for the NRHP.



The documentation and mitigation measures above would also increase the recognition of Rasmussen Village as a significant historic property.

- **Relative significance of the Section 4(f) resource.** In the Portland area, there are limited other Art Deco apartment buildings from the historic period that retain integrity.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the property is NRHP-eligible and that it would experience an adverse effect under the Preferred Alternative. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including a survey of the property and detailed documentation.

### **SW Newbury Street Viaduct and SW Vermont Street Viaduct**

The SW Newbury Street Viaduct and the SW Vermont Street Viaduct are eligible for listing in the NRHP. The Preferred Alternative would remove the viaducts and replace them with new bridges.

- **Ability to mitigate adverse impacts to the Section 4(f) resources.** The viaducts are individual Section 4(f) resources, but they share similar historic characteristics and mitigation measures. To mitigate the removal of these properties:
  - TriMet would complete Historic American Engineering Record (HAER) documentation for the SW Newbury Street Viaduct and the SW Vermont Street Viaduct. The documentation would include measured drawings, narrative history and photographs.
  - TriMet would develop and install a display in the vicinity of the SW Newbury Street Viaduct. The display would include historical information about the design and construction of both viaducts.
  - TriMet would incorporate historical markers commemorating the SW Newbury Street Viaduct and the SW Vermont Street Viaduct into the design of the replacement structures.
  - In conjunction with the other historic properties impacted along SW Barbur Boulevard, TriMet would compile a historic context detailing SW Barbur Boulevard's construction during the 1930s and its evolution in the mid-20th century, including the Newbury and Vermont viaducts as Depression-era Federal-aid projects. The historical context would be distributed via project websites hosted by Metro and TriMet, and information would be shared in a public presentation in Portland.
- **Relative severity of the remaining harm.** The removal of these two historic structures would remain a severe harm, but their historic characteristics would be documented.
- **Relative significance of the Section 4(f) resource.** The viaducts are significant under two NRHP criteria: for their historic associations with New Deal-era highway programs during the Great Depression, and as early examples of timber and concrete bridges. ODOT ranks them as Category II bridges, meaning that they are a more common type and have had past rehabilitations that are less consistent with their historic-era design.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the removal of the NRHP-eligible viaducts would result in an adverse effect. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including detailed documentation, displays and historic markers.

## The Oregon Electric Railway Overcrossing

The Oregon Electric Railway Overcrossing is NRHP-eligible. The Preferred Alternative would remove the bridge and replace it with a new structure, resulting in an adverse effect under Section 106 and a use under Section 4(f).

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** The mitigation measures for this bridge are the same as those identified for the Vermont and Newbury viaducts above, involving HAER documentation, a historic display, and a marker integrated as part of the replacement bridge design, and as an element of the SW Barbur Boulevard historic context document.
- **Relative severity of the remaining harm.** The removal of the historic bridge would remove it as an example of its type of construction, but its historic characteristics would be documented.
- **Relative significance of the Section 4(f) resource.** The structure is significant for its association with national and state highway programs of the 1930s, but ODOT ranks it as a Class II structure (i.e., a common type with some loss of integrity from its historic design).
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the removal of the NRHP-eligible bridge would result in an adverse effect. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including detailed documentation, a public information display, and an historic marker.

## Capitol Hill Motel

The Capitol Hill Motel, a 1940 Minimal Traditional-style auto court at 9110 SW Barbur Boulevard, is eligible for listing in the NRHP. The widening of SW Barbur Boulevard to accommodate light rail and a reconfigured street that includes safety, traffic and sidewalk improvements and related infrastructure would intrude into the western portion of the parcel and buildings.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** The mitigation for the hotel would be the same as for the Rasmussen Village apartments, including Oregon State Level Documentation of the building for its historic and architectural significance, and inclusion in the SW Barbur Boulevard historic context document as an example of automobile-focused businesses and tourism.
- **Relative severity of the remaining harm.** The change of setting and removal of some to all of the structures of the motel complex would remain a severe harm, but its historic characteristics and context would be documented.
- **Relative significance of the Section 4(f) resource.** The Capitol Hill Motel is one of the last three mid-20th century auto court motels remaining on SW Barbur Boulevard, but it was a common type for its period. It retains characteristics qualifying it for the NRHP under Criteria A and C.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the property is NRHP-eligible and that it would experience an adverse effect under the Preferred Alternative. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including a survey of the property and detailed documentation.

### 5350 SW Pasadena Street

The house at 5350 SW Pasadena Street is eligible for listing in the NRHP. The Preferred Alternative would construct a park and ride and a light rail station that would overlap the property, requiring the removal of the house.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** TriMet would complete Oregon State Level Documentation for the building, recording its historic and architectural significance.
- **Relative severity of the remaining harm.** The complete removal of the building would remain a severe harm, but its historic characteristics and context would be documented.
- **Relative significance of the Section 4(f) resource.** The single-family residential building retains integrity as an example of a popular style of the 1930s, but its setting has transitioned from residential to commercial and highway uses, including I-5. It has no other significant historic associations.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the property is NRHP-eligible and that it would experience an adverse effect under the Preferred Alternative. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including a survey of the property and detailed documentation.

### 11125 SW Barbur Boulevard

The 1969 commercial building at 11125 SW Barbur Boulevard is NRHP-eligible and would be removed by the Preferred Alternative.

- **Ability to mitigate adverse impacts.** TriMet would complete Oregon State Level Documentation for the building, recording its historic and architectural significance.
- **Relative severity of the remaining harm.** The complete removal of the building would remain a severe harm, but its historic characteristics and context would be documented.
- **Relative significance of the Section 4(f) resource.** The building is a good example of regionally influenced iteration of Modern commercial architecture of the 1960s, but it has no other significant historic associations.
- **Views of the Oregon SHPO, the official with jurisdiction.** The Oregon SHPO has concurred with FTA's determination that the property is NRHP-eligible and that it would experience an adverse effect under the Preferred Alternative. The Oregon SHPO suggested mitigation measures that have been incorporated within the MOA, including a survey of the property and detailed documentation.

## D.7.3 Least Harm Analysis of Other EIS Light Rail Alternatives (Least Harm Factors 1 to 4)

This section evaluates least harm factors 1 through 4 for the other EIS light rail alternatives, in comparison to the Preferred Alternative discussed above in Section D.7.2. This analysis focuses on Section 4(f) properties where permanent uses would be expected to result in greater than *de minimis* impacts.



### Wolfman, A., Building, 11 SW Gibbs Street

This 1952 Modern Commercial building is potentially eligible for listing in the NRHP under Criterion C as a good example of its type and period of construction (see Exhibit D.7-1). It is therefore a Section 4(f) resource. The Preferred Alternative would not have a Section 4(f) use of the building. Alternative A2-BH (Naito with Bridgehead Reconfiguration) would use a portion of the property, which would involve a potential *de minimis* use (assuming other procedural requirements would be met). Alternative A2-LA (Naito with Limited Access)

would remove the building, resulting in a permanent use that would be greater than *de minimis*.

Exhibit D.7-1. Wolfman, A., Building, 11 SW Gibbs Street



- **Ability to mitigate adverse impacts.** For Alternative A2-LA, TriMet would complete Oregon State Level Documentation for the building, recording its historic and architectural significance. For Alternative A2-BH and a potential *de minimis* finding, TriMet would coordinate with the Oregon SHPO to obtain concurrence in writing but also would relandscape disturbed areas to pre-construction conditions or better.
- **Relative severity of the remaining harm.** For Alternative A2-BH, which would involve site modifications that do not alter the building, the property would remain eligible for the NRHP. Alternative A2-LA would completely remove the building, which would be a severe harm, but its historic characteristics and context would be documented.
- **Relative significance of the Section 4(f) resource.** The building is a good example of regionally influenced iteration of Modern commercial architecture of the 1950s, but it has no other significant historic associations.
- **Views of the SHPO, the official with jurisdiction.** The Oregon SHPO was consulted regarding property eligibility, concurred with the determination of eligibility, and reviewed the Draft EIS, which indicated that the complete removal of the building would result in an adverse effect under Section 106.

### Congregation Ahavath Achim Synagogue

The alignment and stations associated with Alternative A2-BH (Naito with Bridgehead Reconfiguration) and Alternative A2-LA (Naito with Limited Access) would avoid the use of this resource. However, these alignment alternatives would be paired with the Marquam Hill Connection, which would, as currently designed, affect this property. Thus, this analysis assumes that Alternatives A2-BH and A2-LA would have the same use of this resource as the Preferred Alternative, and Factors 1 to 4 would be the same.

### South Portland Historic District

Alternative A2-BH (Naito with Bridgehead) and Alternative A2-LA (Naito with Limited Access) would each have a use of the NRHP-listed South Portland Historic District, with adverse effects due to the removal of multiple contributing resources to the district. Alternative A2-LA would remove seven contributing properties in the South Portland Historic District. Alternative A2-BH would remove three contributing properties. Exhibit D7.3-1 contains photographs of the contributing properties. Both alternatives would

affect portions of 7 to 12 other properties but may not require their removal. To develop light rail along the eastern portion of the district, both alternatives would reconstruct SW Naito Parkway to accommodate light rail and improve sidewalks and bicycle lanes. They would remove existing street trees, construct retaining walls and overpasses, install new intersections and streetlights, and reconfigure connections to the Ross Island Bridge.

Alternative A2-BH would remove three primary contributing properties and would occupy parts of five other contributing properties, but would not require their removal. The removed historic properties would be:

- Robertson, John, 1888 Queen Anne House, Primary Contributing Resource, 018 SW Grover Street, Portland
- Carlson, John and Sophia, 1888 Victorian Eclectic House, Primary Contributing Resource, 015 SW Gibbs Street, Portland
- Driskell, C. E., House, 1904 Colonial Revival House, Secondary Contributing Resource, 017 SW Whitaker Street, Portland

Alternative A2-LA would remove seven primary contributing properties and would occupy parts of two other contributing properties, but would not require their removal (see Exhibit D.7-2). The removed historic properties would be:

- Baldwin, LeGrand M., 1913 Italianate Building (House), Secondary Contributing Resource, 16 SW Porter Street, Portland
- Jolly, William B., 1906 Bungalow (House), Secondary Contributing Resource, 25 SW Woods Street, Portland
- Maxwell, Mary L., 1904 Colonial Revival Building (House), Secondary Contributing Resource, 3323 SW Naito Parkway, Portland
- Tillman, Constance and Frank, 1890 Italianate Building (House), Primary Contributing Resource, 5 SW Whitaker Street, Portland
- Robertson, John, 1888 Queen Anne House, Primary Contributing Resource, 018 SW Grover Street, Portland
- Carlson, John and Sophia, 1888 Victorian Eclectic House, Primary Contributing Resource, 015 SW Gibbs Street, Portland
- Driskell, C. E., House, 1904 Colonial Revival House, Secondary Contributing Resource, 017 SW Whitaker Street, Portland

**Exhibit D.7- 2. Affected Contributing Resources: South Portland Historic District, Other EIS Light Rail Alternatives**



Robertson, John, House  
1888 Queen Anne Building  
018 SW Grover St., Portland



Driskell, C.E., House  
1904 Colonial Revival House  
017 SW Whitaker St., Portland



Carlson, John & Sophia, House  
1888 Victorian Eclectic House  
015 SW Gibbs St., Portland



Baldwin, LeGrand M., House  
1913 Italianate Building  
16 SW Porter St., Portland



Maxwell, Mary L., House  
1904 Colonial Revival Building  
3323 SW Naito Pkwy., Portland



Jolly, William, House  
1906 Bungalow  
25 SW Woods St., Portland



Tillman, Constance & Frank, House  
1890 Italianate Building  
5 SW Whitaker St., Portland



- **Ability to mitigate adverse impacts to the Section 4(f) resource.** To mitigate adverse impacts, Alternative A2-BH and Alternative A2-LA would employ the same measures defined in the Section 106 MOA for the Preferred Alternative, adjusted to address the specific contributing buildings that would be affected. These measures would include offering buildings at no cost to be relocated by others, conducting salvage and reuse when buildings cannot be relocated, and surveying and documenting the entire South Portland Historic District.
- **Relative severity of the remaining harm.** As with the Preferred Alternative, both Alternative A2-BH and Alternative A2-LA would remove contributing buildings within the district and adversely affect the district. In addition, both of these alternatives would develop light rail along SW Naito Parkway, which would increase the cumulative effect of separation within the district that occurred when SW Naito Parkway was originally developed. The construction of SW Naito Parkway bisected the district and created a barrier to the free flow of local east-west traffic. It also introduced a high traffic corridor in the middle of the residential district. The addition of light rail to this corridor may further exacerbate harm to the district by increasing the sense of it being bifurcated/broken into smaller pockets of historic buildings that feel disconnected from one another, along with increasing the potential for redevelopment pressure. These effects would present a greater threat to the integrity and character of the district than the sum of effects on individual contributing resources of the district if light rail is constructed on SW Barbur Boulevard, outside of the district boundary. In terms of the specific buildings removed, under Alternative A2-LA, the remaining harm would be greater than the Preferred Alternative, because three of the seven removed properties are primary contributing resources, and are larger and more visibly prominent buildings within the district. For Alternative A2-BH, two primary contributing resources and one secondary contributing resource would be removed, similar to the Preferred Alternative, but the harm would still be greater overall due to the increased bisection of the district that would occur with light rail on SW Naito Parkway. However, even with the removal of the buildings and these other effects, the district would be expected to retain the characteristics that would merit its continued listing in the NRHP.
- **Relative significance of the Section 4(f) resource.** As noted with the Preferred Alternative, the district is of high significance as an NRHP-listed district with multiple buildings that carry historic significance in their own right as well as collectively.
- **Views of the SHPO, the official with jurisdiction.** The Oregon SHPO did not provide a view regarding the effects of this alternative on the South Portland Historic District.

### **Terwilliger Parkway**

Alternative A2-BH (Naito with Bridgehead Reconfiguration) and Alternative A2-LA (Naito with Limited Access) would have the same use of this resource as the Preferred Alternative, and Factors 1 to 4 would be the same.

### **Jewish Shelter Home**

Alternative A2-BH (Naito with Bridgehead Reconfiguration) and Alternative A2-LA (Naito with Limited Access) would have the same use of this resource as the Preferred Alternative, and Factors 1 to 4 would be the same.

## **Rasmussen Village**

Alternative A2-BH (Naito with Bridgehead Reconfiguration) and Alternative A2-LA (Naito with Limited Access) would have the same use of this resource as the Preferred Alternative, and Factors 1 to 4 would be the same.

## **SW Newbury Street Viaduct and SW Vermont Street Viaduct**

Alternative A2-BH (Naito with Bridgehead Reconfiguration) and Alternative A2-LA (Naito with Limited Access) would have the same use of this resource as the Preferred Alternative, and Factors 1 to 4 would be the same.

## **The Oregon Electric Railway Overcrossing**

Alternative B4 (I-5 Custer to 60th) would avoid a use of the overcrossing structure. Alternative B2 (I-5 Barbur Transit Center to 60th) and Alternative B3 (I-5 26th to 60th) would both remove the structure, the same as the Preferred Alternative, and Factors 1 to 4 would be the same.

## **Capitol Hill Motel**

Alternative B3 (I-5 26th to 60th) and Alternative B4 (I-5 Custer to 60th) would both cross behind the Capitol Hill Motel, removing building units toward the back of the property; this would result in an adverse effect to the property and would be a Section 4(f) use. Alternative B2 (I-5 Barbur Transit Center to 60th) would remove the front buildings and signage of the motel, the same as the Preferred Alternative.

- **Ability to mitigate adverse impacts to the Section 4(f) resource.** For all other alternatives, the mitigation for the hotel would be the same as for the Preferred Alternative, including Oregon State Level Documentation of the building for its historic and architectural significance, and inclusion in the SW Barbur Boulevard historic context document as an example of automobile-focused businesses and tourism.
- **Relative severity of the remaining harm.** For all alternatives, the removal of all or portions of the motel would remain an adverse effect.
- **Relative significance of the Section 4(f) resource.** As stated for the Preferred Alternative, the Capitol Hill Motel is one of the last mid-20th century auto court motels remaining on SW Barbur Boulevard.
- **Views of the SHPO, the official with jurisdiction.** The Oregon SHPO did not provide a view regarding the effects of this alternative on the South Portland Historic District.

## **5350 SW Pasadena Street**

All other Draft EIS light rail alternatives (B2, B3 and B4) would result in a use to this property, the same as the Preferred Alternative, and Factors 1 to 4 would be the same.

## **11125 SW Barbur Boulevard**

All other Draft EIS light rail alternatives (B2, B3 and B4) would result in a use to this property, the same as the Preferred Alternative, and Factors 1 to 4 would be the same.

#### **D.7.4 Comparison of Harm Resulting from Available Feasible and Prudent Alternatives (Least Harm Factors 5 to 7)**

This section evaluates the EIS alternatives against the least harm factors 5 through 7.

##### **Degree to Which Each Alternative Meets the Purpose and Need for the Project**

The Preferred Alternative and the other EIS light rail alternatives would achieve the Project's purpose to directly connect Tualatin, downtown Tigard, southwest Portland and the region's central city with light rail, high quality transit and appropriate community investments in a congested corridor to improve mobility and create the conditions that will allow communities in the corridor to achieve their land use visions.

However, the Preferred Alternative best meets the Project's Purpose and Need by offering notable advantages over the other alternatives considered. In Segment A, the Preferred Alternative would offer greater mobility improvements with a shorter and more direct alignment connecting from downtown to Marquam Hill to South Portland, improving travel times for light rail riders as well as the riders on buses within the shared transitway. In Segment B, the Preferred Alternative, which would remain entirely along SW Barbur Boulevard, offers the greatest potential to improve mobility and achieve community land use visions. It would focus its investments by improving safety and multimodal conditions along the corridor and all intersections, and would place its stations to be directly accessible along SW Barbur Boulevard, rather than having one or more stations adjacent to I-5. This placement of stations would increase the ability of the Project to foster transit-oriented developments along SW Barbur Boulevard, consistent with community land use visions.

##### **After Reasonable Mitigation, the Magnitude of Any Adverse Impacts on Resources Not Protected by Section 4(f)**

The Preferred Alternative would have limited residual adverse impacts on resources not protected by Section 4(f). The magnitude of any adverse impacts on environmental resources would be similar to or less than any of the other feasible and prudent light rail alternatives considered, assuming that the other alternatives would include the same types of mitigation that are now included with the Preferred Alternative. One of the primary areas of least harm is the ability to mitigate adverse impacts to listed fish species (see the Biological Opinion prepared for the Project, included in the Final EIS as Appendix L). As noted above, the overall investment in an alignment along SW Barbur Boulevard in Segments A and B allows the greatest opportunity to retrofit SW Barbur Boulevard, and improve stormwater management and related water quality and habitat conditions critical to salmon species along the entire roadway. Other alternatives away from SW Barbur Boulevard would not involve the same degree of comprehensive stormwater management improvements to existing facilities.

The majority of the Preferred Alternative's initially identified adverse impacts to traffic and freight operations have been mitigated through preliminary design. Some freeway ramp queues would require additional mitigation (this would also occur with the No-Build Alternative and other alternatives). The other EIS light rail alternatives would require mitigation to achieve the same results, but in Segments A, B and C, each would likely increase other impacts, because additional property would be needed to make such mitigation improvements. This would increase impacts related to mitigation in Segment A in particular, with Alternatives A2-BH and A2-LA along SW Naito Parkway, where the Draft EIS revealed that higher levels of congestion would occur than with the Preferred Alternative.



Table D-9 summarizes the differences in the magnitude of adverse impacts between the Preferred Alternative and the other EIS light rail alternatives. The magnitude of any adverse impacts on environmental resources from the Preferred Alternative would be similar to or less than any of the other feasible and prudent light rail alternatives considered.

### **Substantial Differences in Cost Among Alternatives**

The Preferred Alternative and the EIS light rail alternatives would not have substantial differences in costs. This similarity in costs is largely a reflection of the similar lengths of the alternatives, similar topographic challenges, and related costs for property acquisition and mitigation.

**Table D-9. Comparison of the Magnitude of Harm by Segment Alternative (*multipage table*)**

| Resource                                    | Adverse Impacts   | Segment A <sup>1</sup>  |                                   | Segment B <sup>2</sup>                         |                                   | Segment C <sup>3</sup>                              |   |
|---|---|-------------------------|-----------------------------------|--|-----------------------------------|---|---|
|   |   | Preferred Alternative   | Draft EIS Light Rail Alternatives | Preferred Alternative                          | Draft EIS Light Rail Alternatives | Preferred Alternative                               | Draft EIS Light Rail Alternatives   |
| Transportation                              | Intersections exceeding V/C ratio targets                                 | 4 intersections         | 2–6 intersections                 | 7 intersections                                | 9–10 intersections                | 3 intersections                                     | 8 intersections   |
|   | Impacts due to queue lengths  | 2 queuing impacts       | 4 queuing impacts                 | No queuing impacts                             | 1 queuing impact                  | 2 queuing impacts                                   | 4–6 queuing impacts   |
| Acquisitions, Displacements and Relocations | Residential displacements   | 35 residential units    | 41–125 residential units          | 39 residential units                           | 32–78 residential units           | 21 residential units                                | 5–85 residential units  |
|   | Business displacements  | 13 businesses           | 15–23 businesses                  | 66 businesses                                  | 54–66 businesses                  | 35 businesses                                       | 31–55 businesses  |
| Land Use                                    | Acres of land converted to transportation use                             | 6.3 acres               | 8.0–10.7 acres                    | 20.6 acres                                     | 24.0–30.3 acres                   | 51.5 acres  | 32.4–56.0 acres   |
| Economics                                   | Affected employees  | 150 employees           | 108–371 employees                 | 447 employees                                  | 469–565 employees                 | 821 employees                                       | 323–839 employees   |
| Communities                                 | Neighborhood cohesion, neighborhood quality of life, community facilities | · Church parking impact | · Church parking impact           | · Church parking impact and Childcare facility | · <i>None of note</i>             | · Childcare facility                                | · Community lodge<br>· Counseling/medical businesses<br>· Tigard Post Office<br>· Medical clinic<br>· Ash Ave. area apts. |
| Visual Quality                              | Overall visual impact   | Moderate                | Moderate                          | Moderate                                       | Moderate                          | Moderate to High in Tigard Triangle (low elsewhere) | High in Tigard Triangle and downtown Tigard   |
| Geology, Soils and Hydrology                | No significant adverse impacts  | N/A                     | N/A                               | N/A  | N/A                               | N/A   | N/A   |
| Ecosystems                                  | Permanent wetland impacts   | <0.2 acre               | 0.1 acre                          | <0.3 acre                                      | 0.1 acre                          | <0.1 acre   | 0.4–1.6 acres   |
| Water Resources                             | Floodplain impacts  | N/A                     | N/A                               | N/A  | N/A                               | Floodplain Impact                                   | Floodplain Impact (all except Alt. C6)  |
| Noise and Vibration                         | Severe noise impacts  | 12                      | Up to 8                           | 0  | Up to 1                           | 0   | Up to 15  |
|   | Moderate noise impacts  | 64                      | Up to 353                         | 59   | Up to 147                         | 46  | Up to 72  |
|   | Vibration impacts   | 20                      | Up to 76                          | 9  | Up to 29                          | 5   | Up to 21  |
| Air Quality and Greenhouse Gases            | No significant adverse impacts  | N/A                     | N/A                               | N/A  | N/A                               | N/A   | N/A   |

**Table D-9. Comparison of the Magnitude of Harm by Segment Alternative (*multipage table*)**

| Resource            | Adverse Impacts                        | Segment A <sup>1</sup> |                                   | Segment B <sup>2</sup> |                                   | Segment C <sup>3</sup> |                                   |
|---------------------|--|------------------------|-----------------------------------|------------------------|-----------------------------------|------------------------|-----------------------------------|
|                     |  | Preferred Alternative  | Draft EIS Light Rail Alternatives | Preferred Alternative  | Draft EIS Light Rail Alternatives | Preferred Alternative  | Draft EIS Light Rail Alternatives |
| Energy              | No significant adverse impacts         | N/A                    | N/A                               | N/A                    | N/A                               | N/A                    | N/A                               |
| Hazardous Materials | Acquired properties with contamination | 1 site                 | None                              | 4 sites                | 3 sites                           | 2 sites                | 2–5 sites                         |
| Utilities           | No significant adverse impacts         | N/A                    | N/A                               | N/A                    | N/A                               | N/A                    | N/A                               |
| Public Services     | No significant adverse impacts         | N/A                    | N/A                               | N/A                    | N/A                               | N/A                    | N/A                               |
| Safety and Security | No significant adverse impacts         | N/A                    | N/A                               | N/A                    | N/A                               | N/A                    | N/A                               |

Note: EIS = Environmental Impact Statement; N/A = not applicable; O&M = operations and maintenance; PCC = Portland Community College; V/C = volume-to-capacity ratio.

<sup>1</sup> The Draft EIS light rail alternatives include a range of the Segment A alignment alternatives combined with the Marquam Hill connection options. The Preferred Alternative includes the Segment A alignment and stations and the Marquam Hill Connection (inclined elevator).

<sup>2</sup> The Draft EIS light rail alternatives include a range of the Segment B alignment alternatives combined with the PCC-Sylvania shuttle options. The Preferred Alternative includes the Segment B alignment and stations and the PCC-Sylvania Shuttle (SW 53rd Avenue route).

<sup>3</sup> The Draft EIS light rail alternatives include a range of the Segment C alignment alternatives combined with the O&M facility options. The Preferred Alternative includes the Segment C alignment and stations and the Hunziker O&M Facility.



## **D.8 Coordination with the Public, Tribes and Officials with Jurisdiction**

The Project has conducted extensive consultations with the public, tribal governments, the Oregon SHPO and the City of Portland, both as part of the EIS process as well as specifically to resolve issues involving Section 4(f) properties and all possible planning to minimize harm. This includes providing multiple opportunities to participate in the development of the Draft EIS and the development of its alternatives. Following the release of the Draft EIS, these parties were invited to comment on impacts and the proposed Preferred Alternative. The Project has continued to engage these parties in defining design modification measures for the Preferred Alternative, as well as to suggest mitigation.

In December 2020, FTA provided an additional opportunity for tribes and the public, as well as the Oregon SHPO and the City of Portland, to review and comment on the preliminary Section 4(f) findings and the measures being developed for the Section 106 MOA and for the specific Section 4(f) properties affected by the Preferred Alternative. Public comments received during these periods are presented in Attachment DD4. Comments from the Oregon SHPO that were received during this period are provided in Attachment DD1. No comments were received during this period from the involved tribes or the City of Portland.

FTA, TriMet and Metro coordinated with the Oregon SHPO on proposed changes to the MOA in May through August 2021, including multiple videoconference meetings and review drafts of the MOA. At the request of the Oregon SHPO, TriMet also consulted with the City of Portland on certain proposed revisions to the MOA during this timeframe. In October 2021, FTA invited the involved tribes, the Oregon SHPO and the City of Portland to review and comment on the updated Section 106 MOA; no comments were received.

FTA also requested in writing from the Oregon SHPO and the City of Portland their concurrence with FTA's *de minimis* impact and temporary occupancy findings for affected properties under their jurisdiction, and coordinated directly with them on mitigation for properties that would have impacts greater than *de minimis*. This correspondence is provided in Attachment DD1 as further discussed below.

The following discusses the coordination by FTA, TriMet and Metro with the Oregon SHPO and the City of Portland to conduct all possible planning to minimize harm to resources protected by Section 4(f).

### **D.8.1 State Historic Preservation Office**

FTA initiated Section 106 consultation with the Oregon SHPO and requested comment on the initial APE in April 2017. At the same time, FTA initiated Section 106 consultation with five tribes (Confederated Tribes of Grand Ronde Community of Oregon, Confederated Tribes of the Warm Springs, Confederated Tribes of Siletz Indians of Oregon, Yakama Nation and Cowlitz Indian Tribe) and invited six agencies or organizations to become a consulting party for the Section 106 process. The Oregon SHPO attended several tours of the corridor as part of the Draft and Final EIS development, and participated in additional briefings and informal discussions regarding individual property eligibility and effect determinations. This coordination with the Oregon SHPO and tribal governments continued through the development of the Final EIS, leading up to FTA's letter on December 31, 2020, requesting the Oregon SHPO's review and concurrence on the determination of eligibility and finding of effect. To develop and complete the MOA, all consulting parties were given opportunities to comment on the Section 106 findings as well as the MOA stipulating the Project's mitigation commitments. The MOA signed in December 2021 by FTA, TriMet and the Oregon SHPO (Attachment DD5), along with the Oregon SHPO's signed responses to FTA's Section 4(f) concurrence letters (Attachment DD1), documents the results of this coordination.

## **D.8.2 City of Portland**

FTA and TriMet have coordinated extensively with the City of Portland since early alternatives analysis phases of the project, and this coordination continued through the Final EIS and the completion of this Section 4(f) Evaluation. The City and TriMet reached a written agreement in defining their approach to mitigating all impacts to parks and recreation properties to levels that the City agreed would minimize harm. Attachment DD1 contains the correspondence between FTA and the City of Portland regarding the Section 4(f) properties under the City's jurisdiction, including their written concurrence for properties with *de minimis* impacts and properties with temporary occupancy exceptions.

## **D.8.3 U.S. Department of the Interior**

To meet additional Section 4(f) coordination and review requirements [23 CFR Section 774.5(a)], FTA sent this evaluation to the U.S. Department of Interior (USDOI) on December 2, 2021, for a 45-day review and comment period. As of the publication date of this Final EIS, no comments have been received from USDOI. Any comments received from USDOI will be addressed in the Final Section 4(f) Evaluation attached to the Record of Decision.

## **D.9 Conclusion**

Based on the analysis presented in this evaluation, including the Project's commitments to implement mitigation measures defined in the Section 106 MOA and the measures identified in Appendix M, Mitigation Plan, of the Final EIS, FTA has met the Section 4(f) regulatory requirements of 23 CFR Part 774 to determine that:

- There is no feasible and prudent alternative that completely avoids the use of Section 4(f) resources.
- The Preferred Alternative is the alternative that causes the least overall harm and meets the Project's Purpose and Need.
- The Preferred Alternative incorporates all possible planning to minimize harm to Section 4(f) resources.

## ATTACHMENTS TO APPENDIX D, FINAL SECTION 4(f) EVALUATION

The attachments to the Section 4(f) evaluation consist of the following:

- **Attachment DD1, Records of Consultation.** This attachment includes copies of key correspondence with agencies with jurisdiction over Section 4(f) resources.
- **Attachment DD2, Section 4(f) Property Determinations for Permanent *De Minimis* Uses and Temporary Occupancy Exceptions.** This attachment provides supporting information for permanent *de minimis* uses and temporary occupancy exemptions. As required in 23 Code of Federal Regulations (CFR) 774.17, FTA has determined the Preferred Alternative's effects on these properties meet conditions for a *de minimis* impact determination or a temporary occupancy exemption to a Section 4(f) use.
- **Attachment DD3, Background for the Marquam Hill Connection.** This attachment provides background on the planning for the Marquam Hill Connection and Terwilliger Parkway, conducted to support the inclined elevator as an element of the Preferred Alternative.
- **Attachment DD4, Public Comments.** This attachment includes copies of comments received from the public during the Section 106 and Section 4(f) public comment period in December 2020 and January 2021 that was focused on impacts to parks and historic resources and associated mitigation measures.
- **Attachment DD5, Memorandum of Agreement for Historic and Archaeological Resources.** This attachment is the signed Section 106 Memorandum of Agreement documenting mitigation commitments for historic and archaeological resources.



## ATTACHMENT DD1 – RECORDS OF CONSULTATION

This attachment provides copies of key correspondence from agencies with jurisdiction over Section 4(f) resources:

1. **10/28/20 letter of agreement between the Tri-County Metropolitan Transportation District of Oregon (TriMet) and Portland Parks & Recreation (PP&R)** documenting mitigation for impacts to PP&R park properties
2. **12/23/20 letter from the Federal Transit Administration (FTA) to the Oregon State Historic Preservation Office (SHPO) (1 of 2)** requesting concurrence with Section 106 eligibility and effects determinations and notifying the Oregon SHPO of intent to use concurrence to meet Section 4(f) requirements
3. **12/23/20 letter from FTA to the Oregon SHPO (2 of 2)** requesting concurrence with Section 4(f) temporary occupancy exception determinations; SHPO concurred on 5/27/21
4. **02/12/21 letter from the Oregon SHPO to FTA** generally concurring with the Section 106 evaluations of eligibility and findings of effects on historic resources
5. **05/27/21 letter from the Oregon SHPO to FTA** concurring that four archaeological resources are unevaluated and requesting more information on four other archaeological resources that FTA had determined to be not eligible
6. **7/13/21 letter from FTA to PP&R** requesting concurrence with Section 4(f) *de minimis* impact and temporary occupancy exception determinations; PP&R concurred on 7/20/21
7. **10/20/21 letter from the Oregon SHPO to FTA** concurring with the finding of an adverse effect to historic properties and concurring with the determination of not eligible for four archaeological sites

## 1. 10/28/20 letter of agreement between TriMet and PP&R

October 28, 2020

City of Portland  
Portland Parks & Recreation  
1120 SW 5<sup>th</sup> Avenue #1302  
Portland, OR 97204

TriMet  
Engineering and Construction  
1800 SW First Ave, Suite 300  
Portland, OR 97201

RE: Letter of Agreement on Southwest Corridor Light Rail Project and City of Portland Parks & Recreation Properties

This letter is an agreement between TriMet and the City of Portland Parks & Recreation Bureau ("PP&R") related to Southwest Corridor Light Rail Project ("Project") Section 4(f) impacts on PP&R park properties ("Park or Parks") and agreed upon Project mitigations.

The Project is an 11-mile expansion of the MAX light rail system, connecting downtown Portland to downtown Tigard and Tualatin. The Project will bring significant transit, pedestrian and bicycle improvements to the Southwest Corridor of the region. Within the City of Portland, the locally preferred alternative ("LPA") Project alignment generally runs along SW Barbur Boulevard from downtown Portland to Barbur Transit Center, and adjacent to Interstate 5 from Barbur Transit Center to the City of Portland's western boundary. Other key Project connections include an inclined elevator between the Gibbs Street Station and Marquam Hill, and streetscape improvements along SW 53<sup>rd</sup> Avenue to Portland Community College (PCC) Sylvania Campus.

Affected PP&R Parks include Duniway Park, Lair Hill Park, Terwilliger Parkway, George Himes Park, Fulton Park, Front & Curry Community Garden, Burlingame Park and Sylvania Natural Area Park. The Project has worked to avoid and minimize impacts to these Parks and has sought significant public input through the Green Ribbon Committee and Technical Working Group process for the Marquam Hill Connection. The Project also sought public opinion through open houses and on-line open houses in 2019 and 2020. Over the last ten months, Project staff have engaged with PP&R staff - including Planning, Land Stewardship and Urban Forestry - to refine the appropriate mitigation strategies for the impacts to these affected Parks.

In the event the Project successfully secures a Federal Transit Administration Capital Investment Grant, it has agreed to implement the mitigation strategies listed in Attachment A. In return for this Section 4(f) mitigation commitment, PP&R agrees it will execute the letter or similar letter on this subject from the Federal Transit Administration.

City of Portland  
Parks & Recreation Director

Adena Long

Digitally signed by Adena Long  
Date: 2020.11.02 14:39:17  
-08'00'

Adena Long

Date

TriMet  
Engineering and Construction Executive Director

Steven D Witter

Digitally signed by Steven D  
Witter  
Date: 2020.10.28 11:19:10 -07'00'

Steve Witter

Date

## Attachment A – Mitigation Approach



**Southwest Corridor Light Rail Project - Section 4(f) Mitigation Approach**      **October 28, 2020**

The purpose of this document is to list agreed upon mitigation for Section 4(f) impacts to the City of Portland Parks and Recreation Bureau's ("PP&R") park properties ("Park or Parks") by the Southwest Corridor Light Rail Project ("Project"). This agreement will result in a letter declaring that the impacts to Duniway Park, Lair Hill Park, Terwilliger Parkway, Fulton Park, and Burlingame Park are *de minimis* and will have a Temporary Occupancy to allow for temporary construction activities. George Himes Park, Sylvania Natural Area Park, and Front and Curry Community Garden meet the criteria for a Temporary Occupancy Exception.

The intent of this document is to balance the impacts to key Park attributes with appropriate mitigations. Key guiding mitigation principles are to avoid impacts where possible, minimize impacts and to replace in-kind and restore to like manner.

The Project will pay for permanent easement on PP&R Parks with an appraisal completed when the easements are being secured. The Project will pay all relevant Non-Park Use Permit (NPUP) fees for temporary occupancy for construction work occurring at all Parks, unless noted below. Urban Forestry regulatory permitting will be managed outside the NPUP.

Summary of Impacts and agreed upon mitigations are described in detail below.

**Duniway Park**

The Project has worked to minimize the impacts on the Park. The permanent impacts based on 20% design drawings are expected to be about 3,110 square feet (SF), or 0.5% of the Park with temporary impacts of approximately 25,160 SF, or 4.1% of the Park to accommodate rebuilt driveway and parking area.

As mitigation, the Project would reconfigure the driveway and parking area at the Parks eastern edge by the circular track, short-term encroachment on outer lanes of track, restoring and re-landscaping other disturbed areas as shown or similar to Exhibit A.

**Lair Hill Park**

At the west side of Lair Hill Park along SW Barbur Blvd, the Project will require rebuilding sidewalk and a retaining wall on sloping right-of-way up to the Park border, removing trees within the fronting street right-of-way and in the Park. The Project anticipates permanent impact of about 3,450 SF, or 2.8% of the Park bordering SW Barbur Blvd and temporary impacts of 2,060 SF or 1.7% of the Park. The current Project design estimates the potential removal of up to 13 existing Park trees (12 of which are equal to or greater than 6" Diameter Breast Height ("DBH")) and 13 street trees (equal to or greater than 6" DBH) for an estimate of 26 total Park and street tree removals.

Mitigation includes re-landscaping, restoration, and tree replacement. The Project commits to working with PP&R staff on the design, appearance, and construction of a wall type and finish that enhances the aesthetics of the wall and minimizes impacts to existing tree roots. In addition to standard Title 11 requirements and fees, the Project commits to additional

mitigation for both Park and street trees adjacent to Lair Hill Park. See 'Terwilliger Parkway' section below for tree mitigations for Lair Hill Park.

**Terwilliger Parkway**

The Project proposes to construct an inclined elevator that connects the proposed Gibbs Street Station to SW Terwilliger Parkway at SW Campus Drive. This proposal would impact existing trees, views, and the historic and unique character of Terwilliger Parkway, including wildlife, natural and recreational areas. The permanent area is approximately 19,210 SF (0.44 acre), or 0.4% of Parkway and the temporary impacts are anticipated to be approximately 11,400 SF (0.26 acre), or 0.26% of Parkway. The current Project design estimates the removal of 31 existing Park trees (equal to or greater than 6" DBH).

Project Mitigation measures are as follows:

1. In addition to Title 11 Tree Code and Admin Rule PRK 2.04, the Project will mitigate Section 4(f) tree impacts at Lair Hill Park and Marquam Hill Connector/ Terwilliger Parkway calculated as follows:
  - a. Section 4(f) Calculation:
    - Street trees (on right-of-way directly fronting Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway only):
      - Equal to or greater than 6" DBH: Section 4(f) mitigation = Existing DBH inches minus 5 inches
    - Park Trees (within Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway only):
      - 6"-12" trees: Section 4(f) mitigation = Existing DBH inches minus 3 inches
      - More than 12" and up to 20": Section 4(f) mitigation = Existing DBH inches minus 4.5 inches
      - More than 20" and up to 25": Section 4(f) mitigation = Existing DBH inches minus 7.5 inches
      - More than 25": Section 4(f) mitigation = Existing DBH inches minus 9 inches
  - b. Section 4(f) Mitigation Formula:
    - Adjusted DBH (calculated per above) = Section 4(f) tree mitigation requirement in number of new tree caliper inches. Mitigation inches that are not reconciled through tree planting will be subject to a monetary fee in-lieu based on the fee schedule that is in place at the time of payment. This fee in-lieu is currently \$450 per inch.
  - c. The intent of the above mitigation calculation is to have the sum of the Title 11 mitigation and the Section 4(f) mitigation equal inch for inch mitigation for trees that are not dead, dying, or dangerous.
  - d. The Project agrees that a minimum target of 50% of the Section 4(f) tree mitigation for Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway would be planted in low income and/or low canopy density neighborhoods, as

provided by PP&R Urban Forestry. Street tree planting opportunities must be prioritized prior to the potential opportunity for planting 4f mitigation trees in open space, PP&R property, and/or private property. After which, the remainder of trees will have the option of being planted or be paid as monetary fee in lieu using the Urban Forestry fee schedule in effect at the time of payment.

- e. TriMet role and responsibilities will be as project owner, providing project funding, project management, obtaining written property owner approvals, and public communications to fulfill Section 4(f) mitigation commitments as stated in this document. Under this agreement, TriMet may fund and seek assistance through local non-profit groups to complete required planting in accordance with City of Portland PP&R Urban Forestry Street Tree Planting Standards.
- f. To streamline the process, mitigation tree plantings will be coordinated and permitted under one permit through the Urban Forestry Capital Improvement Project Process. If both parties agree that multiple or phased permits (ex: to accommodate planting seasons and/or different regions of the city) would satisfy a simpler permitting process, that approach would be acceptable. For project oversight, TriMet will coordinate with PP&R for a planting review prior to final permitting and prior to the commencement of tree planting. Any changes not permitted in the Capital permit will require a permit revision(s).
- g. For proposed tree plantings, TriMet will create schematic planting plans that show location, species, planting size and quantities. TriMet will provide PP&R with a spreadsheet inventory including address, location, and species prior to permit issuance. This spreadsheet will be updated to include planting dates after trees are planted.
- h. All Section 4(f) mitigation planting will comply with current City of Portland PP&R Urban Forestry Street Tree Planting Standards.
- i. TriMet will be responsible for the first two (2) years of tree watering/ establishment following planting. Any trees that do not survive this two (2)-year establishment period must be replaced, but TriMet will not be responsible for additional maintenance or watering.
- j. TriMet shall fulfill required Section 4(f) tree planting within the first two (2) full planting seasons (Oct 1 – Apr 30) following opening day of the Southwest Corridor Light Rail Project completion.
- k. Estimated tree removal quantities at Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway are subject to change with further design refinement. The Project team will work in good faith with PP&R staff to reduce the overall impact to this resource. Any trees in or directly fronting these Parks that are able to be preserved will not require mitigation (Title 11 or added Section 4(f)). Any additional trees within or fronting Lair Hill Park and Terwilliger Parkway required for removal would be subject to the same Title 11 and Section 4(f) mitigation as defined in this mitigation approach. Additional tree removal beyond what is expected will require additional Urban Forestry review prior to approval. There are some trees near the anticipated impacts that are expected



- to be preserved due to species and size. Approval to remove these trees should not be expected.
  - l. At Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway, updated tree impact studies and tree health evaluations will be performed prior to permit applications for tree removals.
  - m. Per Title 11 and this agreement, trees that are dead, dying and/or dangerous would not have required mitigation (Title 11, nor added Section 4(f) mitigation).
  - n. The Project will work with PP&R and its Urban Forestry staff related to sites on Project property that could accommodate Oregon White Oak planting, where feasible. These trees will count towards either the Section 4(f) mitigation requirements or the Title 11 requirements.
  - o. The Project will not be subject to Non Park Use Permit ("NPUP") fees to pay for replanting trees within PP&R Parks.
2. Invasive understory vegetation will be removed and the area restored with appropriate species near the inclined elevator as shown in Exhibit B. Temporary impacts will restore understory plantings at 1:1 ratio of impacts, and permanent impacts will be restored at 2:1 ratio. The Project will identify areas of tree mitigation, specifically for Oregon White Oak habitat connection within this restoration area, if feasible.
  3. To improve protected views, PP&R has asked the Project to include additional tree work to improve the view shed at the turnout on Terwilliger Parkway at the designated viewpoint in consultation with PP&R. Any applicable Title 11 requirements for this work would be fulfilled by PP&R. No NPUP fees would be applicable for this work or expected of TriMet. Any trees related to the view clearing work outside of the other Southwest Corridor Light Rail Project tree work that require Title 33 review will be included in the environmental review application submitted by TriMet. Any additional Title 33 mitigation accrued by this view clearing work will be paid for by PP&R with other funds expected from TriMet as part of the Section 4(f) agreement. TriMet will apply for and obtain any necessary design review and permits for the view clearing work, and will perform any view clearing work as part of their larger tree work in the area for the inclined elevator.
  4. The inclined elevator system will be designed to minimize impacts to the wildlife, including bird friendly cabs and head house and a span clearance designed to accommodate wildlife passage. The design will be balanced with the need to address Crime Prevention Through Environmental Design (CPTED) and view protection issues. The Project will work with PP&R to inform designs.
  5. The Project will contribute \$650,000 to PP&R for the development of a Natural Resources Management Plan for Terwilliger Parkway, Marquam Nature Park, and/or George Himes Park.
  6. The Project will work to reflect historic aspects of Terwilliger Parkway, such as the enhanced design of the roadway improvements at SW Campus Drive and SW Terwilliger.
  7. A historic interpretive signage about Terwilliger Parkway will be designed and installed along Terwilliger Parkway at the western landing of the inclined elevator.
  8. The Project will contribute \$600,000 to PP&R for recreational trail improvements at SW Trail #1 and/or a trail from SW Slavin Road to SW Trail #3.

9. Install a second Terwilliger Parkway monument sign at the south end of the Parkway at SW 7th Ave similar to the one in Duniway Park and consistent with PP&R signage guidance.

**George Himes Park**

The Project will replace a viaduct, which will involve construction staging areas in a wooded ravine in order to replace the existing structure. Impacts will include tree and vegetation removal, closure of one access point to a Park trail during construction (SW Trail #3). There are no permanent impacts, but will result in temporary impacts to 5,770 SF, or 0.4% of the Park.

Mitigation measures are as follows:

1. Areas impacted due to construction will be restored, including vegetation restoration of SW Trail #3.
2. The Project will not close the trail within George Himes Park. The Project will not be subject to NPUP fees for closing the Trail or restoring the trail base that is outside of the Park.
3. The Project will contribute \$150,000 for the development of the Natural Resources Management Plan described above under Terwilliger Parkway mitigation.

**Fulton Park**

The Project has worked to minimize impacts to Fulton Park. There would be up to 70 SF of permanent impacts, or 0.03% of Fulton Park and there would be a temporary impact of about 1,300 SF, or 0.4% of the Park. This would result in *de minimis* and temporary occupancy. No mitigation is required.

**Sylvania Natural Area Park**

The Project has worked to minimize impact to Sylvania Natural Area Park. The work adjacent to the Sylvania Natural Area Park involves street reconstruction and vegetation with restoration of disturbed areas. There would be no permanent impacts to the Park and there would be a temporary impact of about 1,170 SF or 0.86% of the Park. The Project commits to install a PP&R Park identification sign at SW 53<sup>rd</sup> Avenue.

**Front & Curry Community Garden**

The Project activities in the area of the Front & Curry Community Garden involve a new crosswalk at SW Naito Parkway with sidewalk improvements at Park corner, restoration of disturbed areas. There be no permanent impacts and there would be a temporary impact of approximately 800 SF to develop sidewalk/new crosswalk. No mitigation is required.

**Burlingame Park**

The Project activities in the area of Burlingame Park involve a related transportation improvement option for a pedestrian bridge that would cross a corner of the 4.6 acre Park, but would be away from major features and activity areas. Based on initial conceptual designs, the 14-foot-wide pedestrian bridge over I-5 and the north end of the Park would not permanently occupy or convert land within the Park to a transportation use, and in accordance with Section

4(f) policy, would not interfere with the Park's significant activities, features, and attributes. This would however result in a *de minimis* impact of 440 SF, or 0.19% of the Park and a temporary occupancy for the pedestrian bridge construction of 360 SF, or 0.15% of the Park within the northern tip of Burlingame Park, which consists of a low-quality natural area. As with the other Parks, affected areas would be restored to existing conditions or better.

## PP&R - Responsibilities

The Project staff and PP&R have worked to avoid impacts to parks where possible, minimize impacts to the degree possible, and commit to meaningful mitigation parks. As a result, PP&R commits to:

1. Issue a letter concurring the Section 4(f) determinations for Duniway Park, Lair Hill Park, Terwilliger Parkway, George Himes Park, Fulton Park, Burlingame Park, and Sylvania Natural Area Park. A summary of the impacts and recommended Section 4(f) determination are shown in the table below.
2. PP&R agrees not to increase mitigation requirements in the NPUP unless designs/construction result in significant changes.
3. For all tree impacts, Title 11 protection and mitigation requirements will still apply above and beyond the Section 4(f) mitigation as described.
4. This Section 4(f) agreement acknowledges that trees currently proposed for removal within or directly fronting Terwilliger Parkway and Lair Hill Park will be approved by PP&R staff at the time of permitting.
5. Under this agreement, additional Section 4(f) tree mitigation for Park trees and street trees directly adjacent to PP&R Parks **applies only** to the Marquam Hill Connector (Terwilliger Parkway and Lair Hill Park). All other tree impacts within PP&R Parks or directly fronting PP&R Parks will follow standard Title 11 guidelines.
6. PP&R will work together with the Project with best efforts and intention to resolve issues that may arise.
7. PP&R acknowledges that the Project will need to secure a Federal Full Funding Grant Agreement to move into construction. Payments to PP&R identified in this document will not be due until after the execution of the Full Funding Grant Agreement. If the Full Funding Grant Agreement is not executed, then Project will not move forward into construction and will not be responsible for the commitments included in this document.



**Approximate Park Sizes and Estimated Impacts**

| Park          | Temporary Impact (Sqft) | Permanent Impact (Sqft) | Park Size (Sqft) | % of the park temporary impact | % of park permanent impact |
|---------------|-------------------------|-------------------------|------------------|--------------------------------|----------------------------|
| Duniway       | 25,160                  | 3,110                   | 611,520          | 4.11%                          | 0.51%                      |
| Lair Hill     | 2,060                   | 3,450                   | 123,940          | 1.66%                          | 2.78%                      |
| Front & Curry | 30                      | 0                       | 9,970            | 0.30%                          | 0.00%                      |
| Terwilliger   | 11,400                  | 19,210                  | 4,362,380        | 0.26%                          | 0.44%                      |
| George Himes  | 5,770                   | 0                       | 1,452,690        | 0.40%                          | 0.00%                      |
| Fulton        | 1,040                   | 70                      | 222,960          | 0.47%                          | 0.03%                      |
| Burlingame    | 360                     | 440                     | 234,190          | 0.15%                          | 0.19%                      |
| Sylvania      | 1,170                   | 0                       | 135,690          | 0.86%                          | 0.00%                      |

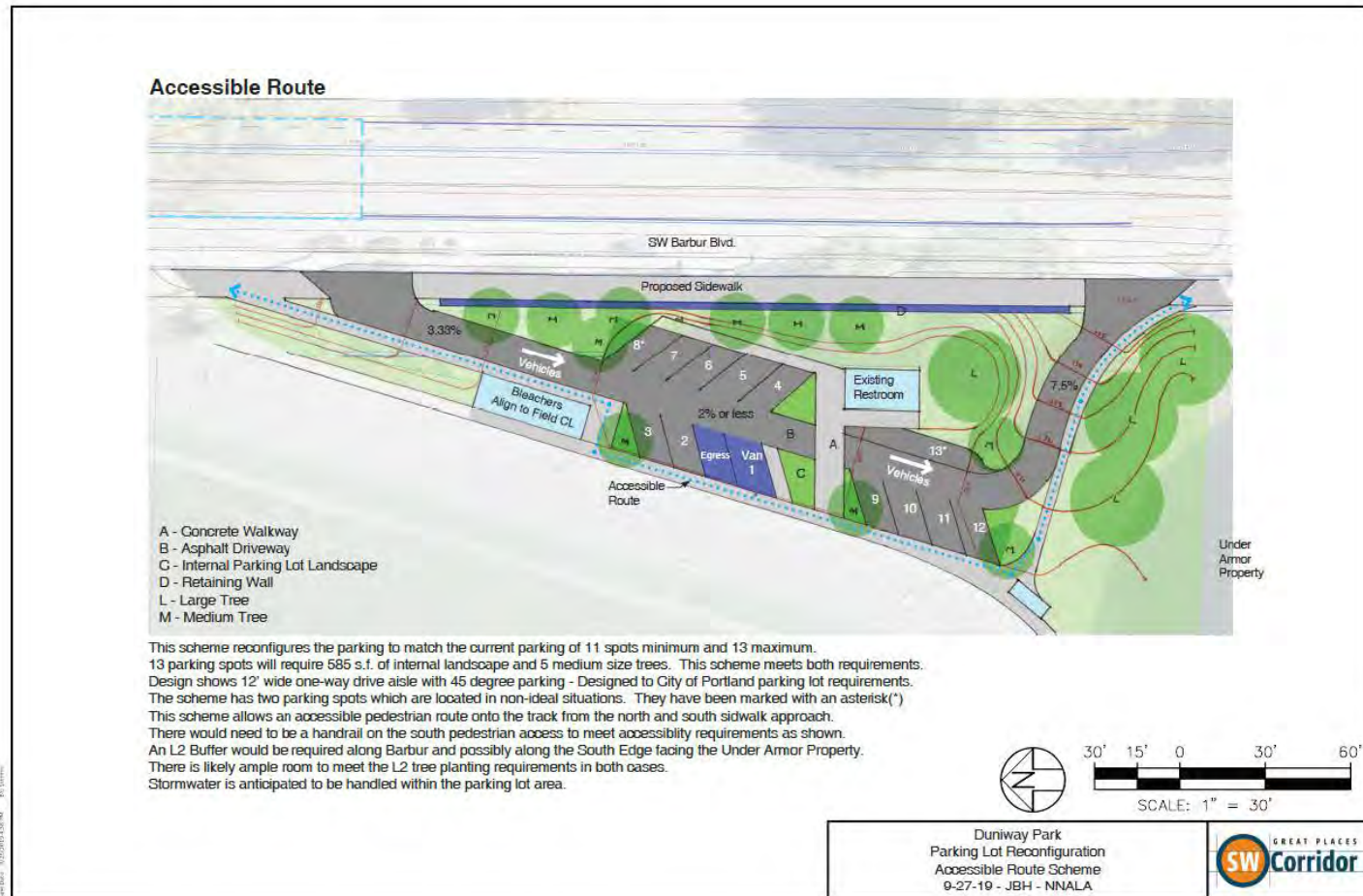
| Table 1: Parks Affected by the Southwest Corridor Light Rail Project – Locally Preferred Alternative |  |  |
|--|--|--|
| Park Name and Total Park Size in Square Feet (SF)  | Permanent or Temporary Impacts   | Recommended Section 4(f) Determination |
| Duniway Park – 611,518 SF  | <p>Involves reconfiguring driveway and parking area at east edge by circular track, short term encroachment on outer lanes of track, restoring and re-landscaping other disturbed areas. Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>Permanent: About 3,110 SF, or 0.51% of the Park, bordering SW Barbur Boulevard.</li> <li>Temporary: An additional 25,160 SF, or 4.11% of the Park.</li> </ul>                           | <i>de minimis</i>                      |
| Lair Hill Park – 123,938 SF  | <p>Involves rebuilding sidewalk and retaining wall on sloping right-of-way up to the Park border, removing street trees, potentially removing Park tree(s) within Park. Includes re-landscaping, restoration and tree replacement. Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>Permanent: About 3,450 SF, or 2.78% of the Park bordering SW Barbur Boulevard.</li> <li>Temporary: 2,060 SF, or 1.66% of the Park.</li> </ul> | <i>de minimis</i>                      |
| Terwilliger Parkway – 4,362,380 SF   | <p>Involves developing inclined elevator up a wooded park hillside, permanently replacing a vegetated area of parkland including class I riparian corridor with the transportation facility. Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>Permanent: 19,210 SF (0.44 acre), or 0.44% of Parkway.</li> <li>Temporary: 11,400 SF (or 0.26 acre), or 0.3% of Parkway (no increase for beneficial tree planting area).</li> </ul> | <i>de minimis</i>                      |
| Fulton Park, Community Garden and Community Center – 222,957 SF                                      | <p>Involves sidewalk reconstruction and street tree removal bordering Park, with restoration of disturbed areas. Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>Permanent: None to 70 SF, or 0.03% of the Park to improve sidewalks.</li> <li>Temporary: About 1,040 SF, or 0.46% of the Park.</li> </ul>   | <i>de minimis</i>                      |
| Burlingame Park – 234,185 SF   | <p>Related transportation improvement option (Station Access Project) involves pedestrian bridge over corner of park. Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>Permanent: About 440 SF of aerial easement for Custer Walk/Bike Bridge, or 0.19% of the Park.</li> <li>Temporary: About 360 SF of temporary construction easement to erect bridge, or 0.16% of the Park.</li> </ul>  | <i>de minimis</i>                      |
| Front & Curry Community Garden – 9,968 SF  | <p>Related transportation improvement option (Ross Island Bridgehead Reconfiguration) involves new crosswalk at SW Naito Parkway with sidewalk improvements at Park corner, restoration of disturbed areas. Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>Permanent: None.</li> <li>Temporary: About 30 SF to develop sidewalk/new crosswalk.</li> </ul>   | Temporary occupancy                    |
| George Himes Park – 1,452,690 SF   | <p>Involves construction staging areas in a wooded ravine in order to replace bridge, including tree and vegetation removal, restoration of disturbed areas, temporary closure of one access point to a Park trail. Preliminary estimated size of impacts:</p>   | Temporary occupancy                    |

|   |  |                     |
|---|--|---------------------|
|   | <ul style="list-style-type: none"> <li>• <i>Permanent:</i> None.</li> <li>• <i>Temporary:</i> 5,770 SF, or 0.4% of the Park.</li> </ul>  |                     |
| Sylvania Natural Area Park – 135,687 SF | <p>Involves street reconstruction and vegetation removal bordering Park, with restoration of disturbed areas.</p> <p>Preliminary estimated size of impacts:</p> <ul style="list-style-type: none"> <li>• <i>Permanent:</i> None.</li> <li>• <i>Temporary:</i> About 1,170 SF, or 0.86% of the Park.</li> </ul> | Temporary occupancy |

# Southwest Corridor Light Rail Project - Section 4(f) Mitigation Approach

October 28, 2020

## Exhibit A - Duniway Park Access Replacement Improvements

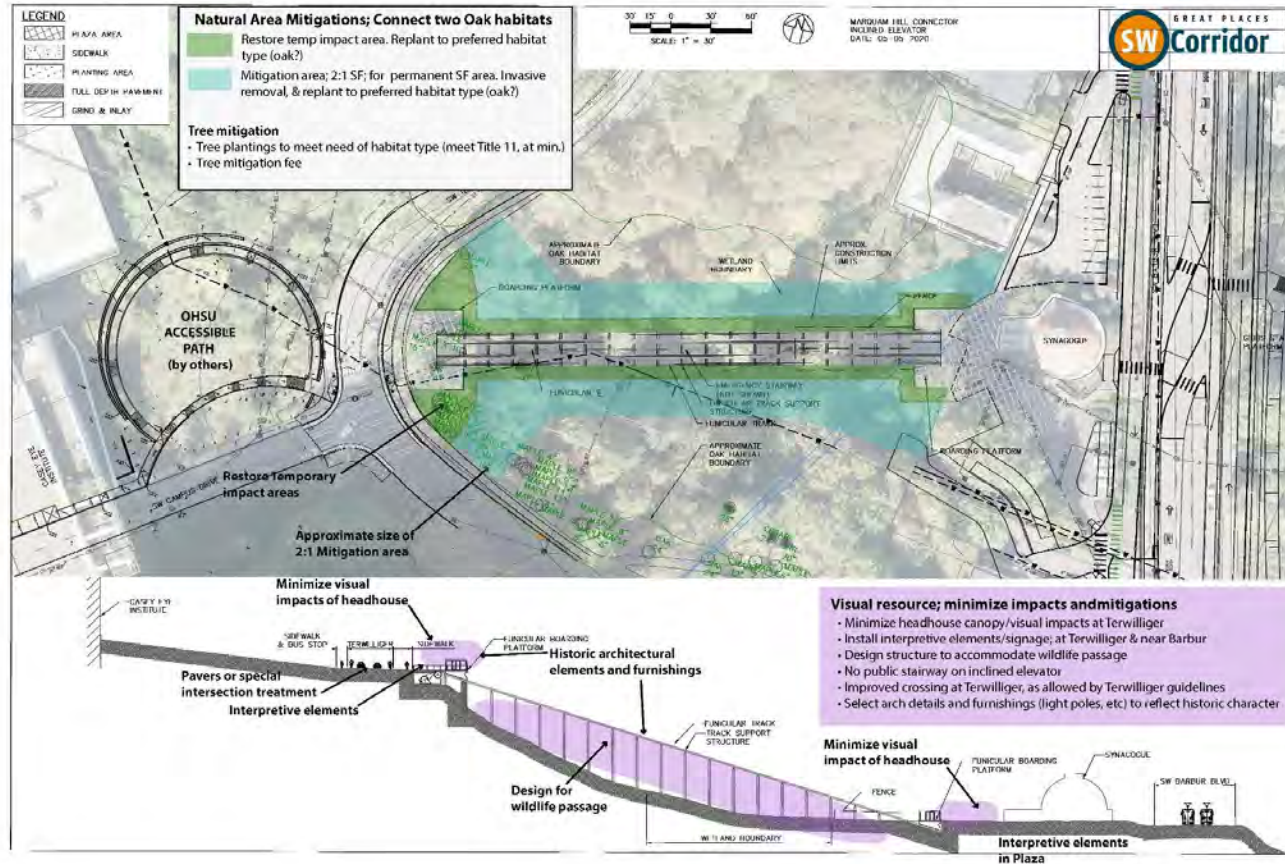




# Southwest Corridor Light Rail Project - Section 4(f) Mitigation Approach

October 28, 2020

## Exhibit B - Natural Area Mitigations at Marquam Hill Connector/ Terwilliger Parkway



**Exhibit C - Section 4(f) Tree Mitigation at Terwilliger Parkway and Lair Hill Park**

LOCATION: MARQUAM HILL CONNECTOR (TERWILLIGER PARKWAY) + LAIR HILL PARK

ESTIMATED TREE REMOVALS &amp; MITIGATION COSTS UNDER SECTION 4(F)

Updated: 8/25/2020

**SUMMARY - ESTIMATED TREE MITIGATIONS UNDER SECTION 4(F)**

|              |                              | Mitigation Calculation |                       |                        | How Mitigation gets Satisfied  |   |
|--------------|------------------------------|------------------------|-----------------------|------------------------|--|---|
|              |                              | A                      | + B                   | = C                    | D  | E   |
|              | Est Trees Removed (Quantity) | Title 11 Mitigation    | Added 4(f) Mitigation | TOTAL REPLACEMENT COST | Min. Target for tree planting: 50% of "Added 4(f) Mitigation" = (B/\$1,125 per tree)*50% | Remainder paid as fee in lieu = A+(B*50%) |
| Lair Hill    | 26                           | \$ 65,700              | \$ 202,905            | \$ 268,605             |  |   |
| MHC          | 31                           | \$ 66,825              | \$ 128,475            | \$ 195,300             |  |   |
| <b>Total</b> | <b>57</b>                    | <b>\$ 132,525</b>      | <b>\$ 331,380</b>     | <b>\$ 463,905</b>      | <b>147</b>   | <b>\$298,530</b>                          |

^(\$165,375 value)

**FORMULA ASSUMPTIONS****Title 11 Mitigation Formula:**

| Location                | Existing DBH | Replacement Ratio |
|-------------------------|--------------|-------------------|
| <b>COP Street Trees</b> |              |                   |
| Improved street         | ≥ 6"         | 2:1               |
| Unimproved Street       | >12"         | 2:1               |
| <b>COP Park Trees</b>   |              |                   |
|                         | 6-12"        | 2:1               |
|                         | >12-20"      | 3:1               |
|                         | >20-25"      | 5:1               |
|                         | >25"         | 6:1               |

**Added 4(F) Mitigation Formula:**

| Location   | Existing DBH | 4(f) adjusted DBH size (" ) |
|--|--------------|-----------------------------|
| <b>COP Street Trees (Directly Fronting to MHC and Lair Hill Park)</b>  |              |                             |
|  | ≥ 6"         | Existing DBH - (minus) 5"   |
| <b>COP Park Trees (Marquam Hill Connector and Lair Hill Park Only)</b> |              |                             |
|  | 6-12"        | Existing DBH - (minus) 3"   |
|  | >12-20"      | Existing DBH - (minus) 4.5" |
|  | >20-25"      | Existing DBH - (minus) 7.5" |
|  | >25"         | Existing DBH - (minus) 9"   |

**Notes:**

- For full write-up of Section 4(f) mitigations, please see the 'Mitigation Approach' document, an agreement between the City of Portland and TriMet.
- Estimated tree removal quantities at Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway are subject to change with further design refinement. The Project team will work in good faith with PP&R staff to reduce the overall impact to this resource. Any trees in or directly fronting these parks that are able to be preserved will not require mitigation (Title 11 or added 4F). Any additional trees within or fronting Lair Hill Park and Terwilliger Parkway required for removal would be subject to the same Title 11 and alternative 4(f) adjusted DBH calculation mitigation process as defined in this mitigation approach.
- At Lair Hill Park and Marquam Hill Connector/Terwilliger Parkway, updated tree impact studies and tree health evaluations will be performed prior to permit applications for tree removals.
- Per Title 11 and this agreement, trees that are dead, dying and/or dangerous would not be required to follow mitigation (Title 11 or added 4F mitigation).
- Under this agreement, additional 4(f) tree mitigation for park trees and street trees directly adjacent to PP&R parks **applies only** to the Marquam Hill Connector (Terwilliger Parkway and Lair Hill Park). All other tree impacts within PP&R parks or directly fronting parks will follow standard Title 11 guidelines.
- This section 4(f) agreement acknowledges that tree removal within or directly fronting Terwilliger Parkway and Lair Hill Park will not be denied by PP&R staff at the time of permitting.



# Southwest Corridor Light Rail Project - Section 4(f) Mitigation Approach

October 28, 2020

LOCATION: MARQUAM HILL CONNECTOR (TERWILLIGER PARKWAY)  
ESTIMATED TREE REMOVALS & MITIGATION COSTS UNDER SECTION 4(F)  
Updated: 8/25/2020

| Reference  | Survey Info |                |                           |                       | Estimated Mitigation              |  |                          |               |                                  |                              |
|--|-------------|----------------|---------------------------|-----------------------|-----------------------------------|--|--------------------------|---------------|----------------------------------|------------------------------|
|  | Qty         | Waypoint       |                           | Exist                 | A                                 |  | + B                      |               | = C                              |                              |
|  |             |                |                           |                       | Title 11 Mitigation               |  | Added 4f Mitigation      |               | TOTAL REPLACEMENT COST           |                              |
|  | #           | Alt ID (parks) | Park Tree or Street Tree? | Existing DBH Size (") | Standard Replacement Ratio (Park) | Cost per tree (Park Tree = 1.5"/\$675) | 4f adjusted DBH size (") | Cost per inch | Title 11 + Added 4(f) mitigation | Cost delta (% over Title 11) |
|  |             |                |                           |                       | Park Tree                         | \$ 675                                 |                          | \$450         |                                  |                              |
| 1  | 2629        | FIR            | Park                      | 20                    | 5                                 | \$ 3,375                               | 12.5                     | \$ 5,625      | \$ 9,000                         | 267%                         |
| 2  | 2724        | MAPLE          | Park                      | 18                    | 3                                 | \$ 2,025                               | 13.5                     | \$ 6,075      | \$ 8,100                         | 400%                         |
| 3  | 2725        | MAPLE          | Park                      | 30                    | 6                                 | \$ 4,050                               | 21                       | \$ 9,450      | \$ 13,500                        | 333%                         |
| 4  | 2726        | MAPLE          | Park                      | 10                    | 2                                 | \$ 1,350                               | 7                        | \$ 3,150      | \$ 4,500                         | 333%                         |
| 5  | 2727        | FIR            | Park                      | 25                    | 4                                 | \$ 4,050                               | 17                       | \$ 7,650      | \$ 11,700                        | 289%                         |
| 6  | 2728        | MAPLE          | Park                      | 10                    | 2                                 | \$ 1,350                               | 7                        | \$ 3,150      | \$ 4,500                         | 333%                         |
| 7  | 2729        | MAPLE          | Park                      | 16                    | 3                                 | \$ 2,025                               | 11.5                     | \$ 5,175      | \$ 7,200                         | 356%                         |
| 8  | 2730        | MAPLE          | Park                      | 8                     | 2                                 | \$ 1,350                               | 5                        | \$ 2,250      | \$ 3,600                         | 267%                         |
| 9  | 2731        | MAPLE          | Park                      | 12                    | 3                                 | \$ 2,025                               | 7.5                      | \$ 3,375      | \$ 5,400                         | 267%                         |
| 10   | 2732        | MAPLE          | Park                      | 10                    | 2                                 | \$ 1,350                               | 7                        | \$ 3,150      | \$ 4,500                         | 333%                         |
| 11   | 2733        | MAPLE          | Park                      | 8                     | 2                                 | \$ 1,350                               | 5                        | \$ 2,250      | \$ 3,600                         | 267%                         |
| 12   | 8569        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 13   | 8571        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 14   | 8572        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 15   | 8575        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 16   | 8580        | DEC            | Park                      | 25                    | 5                                 | \$ 4,050                               | 17.5                     | \$ 7,650      | \$ 11,700                        | 289%                         |
| 17   | 8583        | DEC            | Park                      | 16                    | 3                                 | \$ 2,025                               | 11.5                     | \$ 5,175      | \$ 7,200                         | 356%                         |
| 18   | 8599        | DEC            | Park                      | 24                    | 5                                 | \$ 3,375                               | 16.5                     | \$ 7,425      | \$ 10,800                        | 320%                         |
| 19   | 8600        | DEC            | Park                      | 8                     | 2                                 | \$ 1,350                               | 5                        | \$ 2,250      | \$ 3,600                         | 267%                         |
| 20   | 8611        | DEC            | Park                      | 16                    | 3                                 | \$ 2,025                               | 11.5                     | \$ 5,175      | \$ 7,200                         | 356%                         |
| 21   | 8613        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 22   | 8626        | DEC            | Park                      | 10                    | 2                                 | \$ 1,350                               | 7                        | \$ 3,150      | \$ 4,500                         | 333%                         |
| 23   | 8627        | DEC            | Park                      | 12                    | 3                                 | \$ 2,025                               | 7.5                      | \$ 3,375      | \$ 5,400                         | 267%                         |
| 24   | 8628        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 25   | 8635        | DEC            | Park                      | 12                    | 3                                 | \$ 2,025                               | 7.5                      | \$ 3,375      | \$ 5,400                         | 267%                         |
| 26   | 8636        | DEC            | Park                      | 6                     | 2                                 | \$ 1,350                               | 3                        | \$ 1,350      | \$ 2,700                         | 200%                         |
| 27   | 8671        | DEC            | Park                      | 14                    | 3                                 | \$ 2,025                               | 9.5                      | \$ 4,275      | \$ 6,300                         | 311%                         |
| 28   | 8673        | DEC            | Park                      | 12                    | 3                                 | \$ 2,025                               | 7.5                      | \$ 3,375      | \$ 5,400                         | 267%                         |
| 29   | 8695        | CON            | Park                      | 24                    | 5                                 | \$ 3,375                               | 16.5                     | \$ 7,425      | \$ 10,800                        | 320%                         |
| 30   | 8697        | DEC            | Park                      | 28                    | 6                                 | \$ 4,050                               | 19.0                     | \$ 8,550      | \$ 12,600                        | 311%                         |
| 31   | 2723        | MAPLE          | Park                      | 22                    | 5                                 | \$ 3,375                               | 14.5                     | \$ 6,525      | \$ 9,900                         | 293%                         |
| Subtotal   |             |                |                           |                       |                                   | \$ 66,825                              |                          | \$ 128,475    |                                  | 284%                         |
| TOTAL ESTIMATED TREE MITIGATION COST AT MARQUAM HILL CONNECTOR |             |                |                           |                       |                                   |  |                          |               | \$ 195,300                       |                              |

| Estimated Trees Removed at Marquam Hill Connector |  | Type       | Qty |
|---|--|------------|-----|
|   |  | Park Trees | 31  |
|   |  | Total      | 31  |

## Notes/Assumptions:

1. Tree Survey for impacted portion of Marquam Hill Connector completed by OTAK in two parts: February 2020 and June 2020
2. Survey info and estimated tree removal diagrams attached (Tree ID's highlighted in Orange above correspond estimated tree removal shown on diagrams)

**Southwest Corridor Light Rail Project - Section 4(f) Mitigation Approach**

October 28, 2020

LOCATION: LAIR HILL PARK

ESTIMATED TREE REMOVALS & MITIGATION COSTS UNDER SECTION 4(F)

Updated: 8/25/2020

| Survey Info  |             |                |                           |                       | Estimated Mitigation              |  |                          |               |                                  |                                       |  |
|--|-------------|----------------|---------------------------|-----------------------|-----------------------------------|--|--------------------------|---------------|----------------------------------|---------------------------------------|--|
| Reference  | Survey Info |                |                           |                       | A                                 |  | + B                      |               | = C                              |                                       |  |
| Qty  | Waypoint    |                |                           | Exist                 | Title 11 Mitigation               |  | Added 4f Mitigation      |               | TOTAL REPLACEMENT COST           |                                       |  |
|  | #           | Alt ID (parks) | Park Tree or Street Tree? | Existing DBH Size (") | Standard Replacement Ratio (Park) | Cost per tree (Park = 1.5" /\$675) (Street = | 4f adjusted DBH size (") | Cost per inch | Title 11 + Added 4(f) mitigation | Cost delta (% over standard Title 11) |  |
|  |             |                |                           |                       | Park tree                         | \$ 675                                       |                          | \$450         |                                  |                                       |  |
|  |             |                |                           |                       | Street Tree                       | \$ 1,125                                     |                          |               |                                  |                                       |  |
| 1  | 12          | 10860          | Park                      | 24.9                  | 5                                 | \$ 3,375                                     | 17.4                     | \$ 7,830      | \$ 11,205                        | 332%                                  |  |
| 2  | N/A         | 10862          | Park                      | 10.8                  | 2                                 | \$ 1,350                                     | 7.8                      | \$ 3,510      | \$ 4,860                         | 360%                                  |  |
| 3  | 18          | 10905          | Park                      | 28.0                  | 6                                 | \$ 4,050                                     | 26.5                     | \$ 9,000      | \$ 13,050                        | 322%                                  |  |
| 4  | 20          | 10890          | Park                      | 26.0                  | 6                                 | \$ 4,050                                     | 17.9                     | \$ 7,650      | \$ 11,700                        | 289%                                  |  |
| 5  | 22          | 10889          | Park                      | 30.0                  | 6                                 | \$ 4,050                                     | 23.0                     | \$ 9,450      | \$ 13,500                        | 333%                                  |  |
| 6  | 23          | 10865          | Park                      | 33.3                  | 6                                 | \$ 4,050                                     | 24.9                     | \$ 11,205     | \$ 15,255                        | 377%                                  |  |
| 7  | 24          | 10871          | Park                      | 30.1                  | 6                                 | \$ 4,050                                     | 21.4                     | \$ 9,630      | \$ 13,680                        | 338%                                  |  |
| 8  | N/A         | 10887          | Park                      | 12.4                  | 3                                 | \$ 2,025                                     | 7.9                      | \$ 3,555      | \$ 5,580                         | 276%                                  |  |
| 9  | 28          | 10940          | Park                      | 6.9                   | 2                                 | \$ 1,350                                     | 3.9                      | \$ 1,755      | \$ 3,105                         | 230%                                  |  |
| 10   | N/A         | 10911          | Park                      | 21.6                  | 5                                 | \$ 3,375                                     | 14.1                     | \$ 6,345      | \$ 9,720                         | 288%                                  |  |
| 11   | N/A         | 10929          | Park                      | 2.5                   | 0                                 | \$ -   | 0                        | \$ -          | \$ -                             |                                       |  |
| 12   | N/A         | 10930          | Park                      | 11.0                  | 2                                 | \$ 1,350                                     | 8.0                      | \$ 3,600      | \$ 4,950                         | 367%                                  |  |
| 13   | 35          |                | Park                      | 22.0                  | 5                                 | \$ 3,375                                     | 14.5                     | \$ 6,525      | \$ 9,900                         | 293%                                  |  |
| 14   | 16          | N/A            | Street                    | 41.0                  | 2                                 | \$ 2,250                                     | 36.0                     | \$ 16,200     | \$ 18,450                        | 820%                                  |  |
| 15   | 17          | N/A            | Street                    | 25.0                  | 2                                 | \$ 2,250                                     | 20.0                     | \$ 9,000      | \$ 11,250                        | 500%                                  |  |
| 16   | 26          | N/A            | Street                    | 18.0                  | 2                                 | \$ 2,250                                     | 13.0                     | \$ 5,850      | \$ 8,100                         | 360%                                  |  |
| 17   | 27          | N/A            | Street                    | 16.0                  | 2                                 | \$ 2,250                                     | 11.0                     | \$ 4,950      | \$ 7,200                         | 320%                                  |  |
| 18   | 29          |                | Street                    | 18.0                  | 2                                 | \$ 2,250                                     | 13.0                     | \$ 5,850      | \$ 8,100                         | 360%                                  |  |
| 19   | 30          |                | Street                    | 18.0                  | 2                                 | \$ 2,250                                     | 13.0                     | \$ 5,850      | \$ 8,100                         | 360%                                  |  |
| 20   | 31          |                | Street                    | 12.0                  | 2                                 | \$ 2,250                                     | 7.0                      | \$ 3,150      | \$ 5,400                         | 240%                                  |  |
| 21   | 32          |                | Street                    | 31.0                  | 2                                 | \$ 2,250                                     | 26.0                     | \$ 11,700     | \$ 13,950                        | 620%                                  |  |
| 22   | 33          |                | Street                    | 21.0                  | 2                                 | \$ 2,250                                     | 16.0                     | \$ 7,200      | \$ 9,450                         | 420%                                  |  |
| 23   | 34          |                | Street                    | 53.0                  | 2                                 | \$ 2,250                                     | 48.0                     | \$ 21,600     | \$ 23,850                        | 1060%                                 |  |
| 24   | 36          |                | Street                    | 21.0                  | 2                                 | \$ 2,250                                     | 16.0                     | \$ 7,200      | \$ 9,450                         | 420%                                  |  |
| 25   | 37          |                | Street                    | 40.0                  | 2                                 | \$ 2,250                                     | 35.0                     | \$ 15,750     | \$ 18,000                        | 800%                                  |  |
| 26   | 38          |                | Street                    | 24.0                  | 2                                 | \$ 2,250                                     | 19.0                     | \$ 8,550      | \$ 10,800                        | 480%                                  |  |
| Subtotal   |             |                |                           |                       |                                   | \$ 65,700                                    |                          | \$ 202,905    |                                  | 423%                                  |  |
| TOTAL ESTIMATED TREE MITIGATION COST AT LAIR HILL PARK |             |                |                           |                       |                                   |  |                          |               | \$ 268,605                       |                                       |  |

| Estimated Trees Removed at Lair Hill Park |  | Type       | Qty |
|---|--|------------|-----|
|   |  | Park Trees | 13  |
|   |  | Street     | 13  |
|   |  | Total      | 26  |

**Notes/Assumptions:**

1. Tree Survey for impacted portion of Lair Hill Park completed by OTAK in February 2020
2. Survey info and estimated tree removal diagrams attached. Based on surveyed property lines, trees to the west of the retaining wall are assumed to be street trees and trees to the east of the retaining wall are assumed to be park trees.

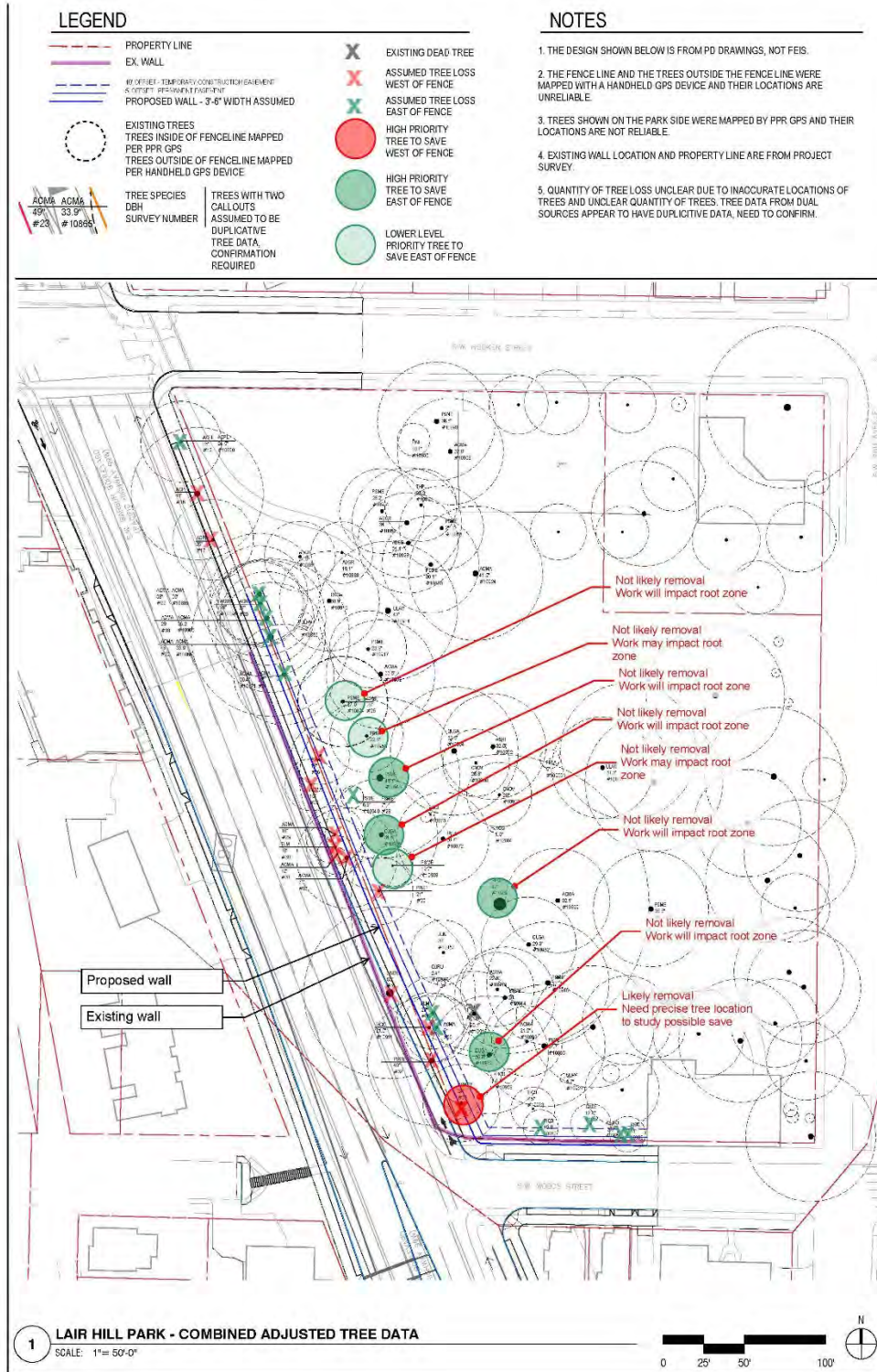


**Southwest Corridor Light Rail Project - Section 4(f) Mitigation Approach**      **October 28, 2020**

Marquam Hill Connector - Terwilliger Parkway  
Estimated Tree Impacts & Survey Info  
Section 4(f) Mitigation  
August 25, 2020







## 2. 12/23/20 letter from FTA to the Oregon SHPO (1 of 2)



U.S. Department  
of Transportation  
**Federal Transit  
Administration**

REGION X  
Alaska, Idaho, Oregon,  
Washington

915 Second Avenue  
Federal Bldg. Suite 3142  
Seattle, WA 98174-1002  
206-220-7954  
206-220-7959 (fax)

December 23, 2020

Christine Curran  
Deputy State Historic Preservation Officer  
Oregon State Historic Preservation Office  
725 Summer Street NE, Suite C  
Salem, OR 97301

**Subject: Metro and TriMet  
Southwest Corridor Light Rail Project  
National Historic Preservation Act, Section 106  
Eligibility and Effects Determination  
SHPO Case No. 16-1621**

Dear Ms. Curran:

The Federal Transit Administration (FTA), in cooperation with Metro and the Tri-County Metropolitan Transportation District of Oregon (TriMet), is continuing consultation under Section 106 of the National Historic Preservation Act, and its implementing regulations at 36 Code of Federal Regulations (CFR) Part 800, for the Southwest Corridor Light Rail Project (Project) in Portland and Tigard, Oregon. The Project would extend light rail service along an 11-mile route and provide for additional transportation improvements within Multnomah and Washington counties, from downtown Portland to Tigard, Oregon. This letter requests concurrence from the Oregon State Historic Preservation Officer (SHPO) with FTA's Section 106 Determinations of Eligibility and Effects for the Project.

The Project consists of light rail investments and related transportation improvements. The light rail investment is an 11-mile-long MAX light rail extension that roughly parallels Oregon Route 99W/SW Barbur Boulevard in Portland and Interstate 5 in Tigard, and extends between the downtown Portland Transit Mall and Bridgeport Village shopping center via downtown Tigard. The light rail investments also provide improved pedestrian and bicycle connections to light rail stations, including adding more substantial infrastructure to the medical complex on Marquam Hill and Portland Community College's Sylvania Campus. A Preferred Alternative has been selected for these project elements. The Project also includes roadway reconfiguration at the west end of the Ross Island Bridge, and supportive pedestrian and bicycle improvements throughout



the Project corridor, that would both complement the light rail investments. These are not part of the Preferred Alternative but are evaluated as related transportation improvements because these elements could eventually be implemented at a later date. These include the Ross Island Bridgehead Reconfiguration and station access improvements.

In correspondence to SHPO dated May 26, 2017, FTA initiated Section 106 consultation and provided maps of the proposed Area of Potential Effects (APE). SHPO agreed with the definition of the APE in correspondence dated March 2, 2018. The APE was later revised, and FTA provided documentation of the revised APE in correspondence dated January 7, 2020. SHPO agreed with the revised APE in correspondence dated February 3, 2020.

A cultural resources survey of the APE was conducted so that FTA could assess the potential for Project effects to historic properties located within the APE. Enclosed for your review as Attachment A is the report of this study entitled *Cultural Resource Survey for the Southwest Corridor Light Rail Project, Multnomah and Washington Counties, Oregon, in support of the Final Environmental Impact Statement*, dated October 7, 2020, prepared by Archaeological Investigations Northwest, Inc. (AINW), consultant to Metro and TriMet.

As a result of the cultural resources survey, 13 archaeological resources, 20 High Probability Areas (HPAs), and 619 historic resources of the built environment were identified. All but four archaeological resources and one historic resource have been evaluated for National Register of Historic Places (NRHP) eligibility. In summary, the cultural resource survey report findings were as follows:

#### Archaeological Resources

There are 13 documented archaeological resources in the APE. Of these 13 resources, nine were evaluated and recommended to be not eligible for listing on the NRHP. The remaining four resources cannot yet be evaluated because they are not accessible. They would be evaluated under the terms of a Section 106 Memorandum of Agreement (MOA) drafted by FTA, Metro, and TriMet (see Attachment B). Archaeological resources are as follows:

- Five of the 13 archaeological resources are historic-period sites that were previously documented and recommended to be not eligible for listing on the NRHP (35MU116, 35MU119, 35MU200, 35MU201, and 35MU206).
- Four of the 13 archaeological resources are newly identified historic-period sites that AINW has recommended to be not eligible for listing on the NRHP (17/2534-3, 17/2534-4, 17/2534-5, and 17-2534-6).
- The remaining four archaeological resources within the APE are unevaluated for listing on the NRHP, detailed as follows:
  - Sites 35MU129 and 35MU238 are previously documented historic-period sites that would have potential to be impacted by completion of the Ross Island Bridgehead Reconfiguration. If reconfiguration of the Ross Island Bridgehead is undertaken and ground-disturbing actions are proposed within the site boundaries, archaeological investigation would be needed to evaluate each site's NRHP eligibility.

- Site 17/2534-1 is a historic-period refuse scatter that has potential to be affected by the Preferred Alternative. Additional shovel tests would be needed in the Preferred Alternative APE to delineate the resource and determine its NRHP eligibility when access is available and design is sufficiently advanced.
- Site 19/2798-1 is a pre-contact isolate that has potential to be affected by construction of the Preferred Alternative. It was found during shovel testing prior to geotechnical investigations. Shovel tests excavated nearby within the geotechnical APE did not encounter artifacts. Additional shovel tests would be needed in the Preferred Alternative APE to delineate the resource and determine its NRHP eligibility when access is available and design is sufficiently advanced.

In addition to these known archaeological resources, there are 20 HPAs within the APE. Some HPAs have been surveyed, and the results are reported in Attachment A. The remaining HPAs are current inaccessible. Additional survey will occur when access is secured, and monitoring is recommended where advance survey is not possible to address the potential for encountering cultural materials during Project construction. Future surveys as well as an Inadvertent Discovery Plan are described in the Project's *Archaeological Site Protection and Monitoring Plan for the Southwest Corridor Light Rail Project, Multnomah and Washington Counties, Oregon*, dated October 20, 2020, enclosed with this letter for your review as Attachment C.

#### Historic Built Environment Resources

There are 619 historic resources in the APE. AINW has recommended that 79 of these are NRHP-eligible or listed historic properties. Of 79 historic properties, AINW has recommended there would be no adverse effect on 68 properties and adverse effects on 11 properties. The adverse effects would be as follows:

- South Portland Historic District (listed on the NRHP; the Project would remove six contributing structures to the district)
- Congregation Ahavath Achim Synagogue, 3225 SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project may alter or remove the structure)
- Terwilliger Parkway, SW Terwilliger Boulevard, Portland (eligible for listing on the NRHP; the Project would affect the historic setting of the property)
- Jewish Shelter Home, 4133 SW Corbett Avenue, Portland (listed on the NRHP; the Project may remove a contributing addition to the structure)
- Rasmussen Village, 4950 SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project would remove or relocate contributing elements to the property)
- SW Newbury Street Viaduct, Bridge #01983, SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project would demolish the structure)
- SW Vermont Street Viaduct, Bridge #01984, SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project would demolish the structure)
- Capitol Hill Motel, 9110 SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project would demolish the structure)
- House at 5350 SW Pasadena Street, Portland (eligible for listing on the NRHP; the Project would demolish the structure)

- Commercial Building at 11125 SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project would demolish the structure)
- Oregon Electric Railway Overcrossing, Bridge #02010, SW Barbur Boulevard, Portland (eligible for listing on the NRHP; the Project would demolish the structure)

Of the 68 historic properties in the APE that would not be adversely affected, 31 would be impacted by partial acquisitions and temporary construction easements to construct the Project. AINW has recommended that these acquisitions and easements would have no adverse effect on character-defining features that qualify each property for listing on the NRHP. The Project would cause indirect effects, such as changes in setting, to another 28 properties in the APE. AINW has recommended that these effects would not be adverse, as they would not diminish the character-defining features that qualify each property for listing on the NRHP. Finally, AINW has recommended that nine historic properties in the APE would not be affected by the Project.

One historic resource, a 1959 ranch house at 12265 SW 72nd Avenue in Tigard, would be fully acquired and removed to construct the Preferred Alternative. This house is obscured from public rights of way and could not be evaluated. It is assumed to be not eligible for listing on the NRHP based on available information. Once access is granted, the house will be documented to evaluate its eligibility to be listed on the NRHP.

Efforts to minimize effects on historic properties have been undertaken. An alternatives analysis completed for the Draft Environmental Impact Statement (EIS) selected a Preferred Alternative that limited the overall number of adverse effects. Project design refinements continue to minimize the adverse effects to the 11 historic properties that would result from constructing the Preferred Alternative. Proposed mitigation for adverse effects is outlined in the Draft MOA, which as mentioned above, is enclosed with this letter for your review as Attachment B.

#### Tribal, Agency, and Public Consultation

FTA has conducted government-to-government consultation with the following tribes: Confederated Tribes and Bands of the Yakama Nation, Confederated Tribes of Siletz Indians of Oregon, Confederated Tribes of the Grand Ronde Community of Oregon, Confederated Tribes of the Warm Springs Reservation of Oregon, and Cowlitz Indian Tribe. Additionally, FTA has consulted with SHPO, the Oregon Department of Transportation, the Cities of Portland and Tigard, and Restore Oregon.

Consultation with these parties has included providing the APE and revised APE, and hosting meetings on request. For example, Metro, TriMet, and the Portland Bureau of Transportation presented a project summary and proposed mitigation measures to the Portland Historic Landmarks Commission on June 22, 2020, and in response to the feedback from commissioners have explored adaptive reuse potential for the Congregation Ahavath Achim Synagogue. The listed parties above, and the general public, were also afforded the opportunity to review and comment on the draft cultural resources report which was published as part of the Draft EIS in summer 2018. Metro and TriMet will also host an online public open house in winter 2020 to present and request feedback on the findings of cultural resource surveys and proposed mitigation measures. FTA will continue to consult regarding mitigation for adverse effects.



#### Determinations and Request for Concurrence

Based on the aforementioned documentation, FTA has made the following determinations:

- There are 79 resources listed on, or eligible for, the NRHP within the Project APE, as identified in Table 9-1 of the enclosed cultural resources report. (see Attachment A).
- The Project will result in adverse effects on 11 NRHP-eligible historic properties.
- The Project overall will result in an **adverse effect** on resources listed on, or eligible for, the NRHP.

Pursuant to 36 CFR Part 800, FTA is seeking SHPO concurrence with these determinations within 30 days of receipt of this letter. FTA is also seeking comments on the Draft MOA enclosed with this letter.

#### Section 4(f) Coordination

Under Section 4(f) of the Department of Transportation Act of 1966 (Section 4(f)), and pursuant to 23 CFR part 774, SHPO is the Section 4(f) Official with Jurisdiction for the historic properties affected by the Project. As a result, FTA is required to consult with SHPO prior to making its final Section 4(f) determinations for the Project. In making Section 106 no adverse effect determinations, FTA is also considering findings of *de minimis* impact under Section 4(f) for 22 historic properties that would experience partial acquisitions as a result of the Project. Consistent with 23 CFR Part 774.5, this letter serves as notification to SHPO that FTA intends to use SHPO's written concurrence with the enclosed Section 106 no adverse effect determinations for these 22 properties to reach Section 4(f) *de minimis* impact determinations.

If FTA can provide any assistance or additional information which would aid in your prompt reply, please feel free to contact Mark Assam at (206) 220-4465 or mark.assam@dot.gov.

Thank you for your consultation on the Project.

Sincerely,

LINDA M. GEHRKE  
Digitally signed by  
LINDA M. GEHRKE  
Date: 2020.12.23  
16:13:32 -08'00'

Linda M. Gehrke  
Regional Administrator

cc: Jason Allen, Survey & Inventory Program Coordinator, Oregon State Historic Preservation Office  
Jaime French, GIS Archaeologist, Oregon State Historic Preservation Office  
Michaela Skiles, Transportation Planner, Metro  
Joe Recker, Environmental Permits Coordinator, TriMet

December 23, 2020  
Page 6

Enclosures: Attachment A - Cultural Resource Survey for the Southwest Corridor Light Rail Project, Multnomah and Washington Counties, Oregon, in support of the Final Environmental Impact Statement, October 7, 2020  
Attachment B - Memorandum of Agreement between the Federal Transit Administration and the Oregon State Historic Preservation Officer, regarding the Southwest Corridor Light Rail Project  
Attachment C - Archaeological Site Protection and Monitoring Plan for the Southwest Corridor Light Rail Project, Multnomah and Washington Counties, Oregon, October 20, 2020

### 3. 12/23/20 letter from FTA to the Oregon SHPO (2 of 2)



U.S. Department  
of Transportation  
**Federal Transit  
Administration**

REGION X  
Alaska, Idaho, Oregon,  
Washington

915 Second Avenue  
Federal Bldg. Suite 3142  
Seattle, WA 98174-1002  
206-220-7954  
206-220-7959 (fax)

December 23, 2020

Christine Curran  
Deputy State Historic Preservation Officer  
Oregon State Historic Preservation Office  
725 Summer Street NE, Suite C  
Salem, OR 97301

**Subject: Metro and TriMet  
Southwest Corridor Light Rail Project  
Department of Transportation Act, Section 4(f)  
Temporary Occupancy Exception Determination  
SHPO Case No. 16-1621**

Dear Ms. Curran:

The Federal Transit Administration (FTA), in cooperation with Metro and the Tri-County Metropolitan Transportation District of Oregon (TriMet), is proposing the Southwest Corridor Light Rail Project (Project). The Project would extend light rail service along an 11-mile route and provide for additional transportation improvements within Multnomah and Washington counties, from downtown Portland to Tigard, Oregon. TriMet intends to apply for federal funds administered by FTA for the Project, making it subject to the provisions of Section 4(f) of the Department of Transportation Act of 1966, and its implementing regulations at 23 Code of Federal Regulations (CFR) Part 774. The Project design includes temporary construction easements at nine properties that FTA has determined are eligible for listing on the National Register of Historic Places (NRHP). This letter requests written concurrence from the Oregon State Historic Preservation Officer (SHPO) with FTA's Section 4(f) Temporary Occupancy Exception Determination for these Project activities.

#### **Temporary Construction Activity Descriptions and Maps**

Attachment A enclosed with this letter provides descriptions and aerial photograph maps of the Project temporary construction easement activities at each of the nine affected properties. Areas disturbed by construction at these nine properties would be restored to existing or better conditions upon completion of construction activities.



**Section 4(f) Temporary Occupancy Exception Determination and Request for Concurrence**

The Section 4(f) regulations include an exception to the requirement for Section 4(f) approval specifically for temporary occupancies of land, at 23 CFR Part 774.13(d):

*(d) Temporary occupancies of land that are so minimal as to not constitute a use within the meaning of Section 4(f). The following conditions must be satisfied:*

- (1) Duration must be temporary, i.e., less than the time needed for construction of the project, and there should be no change in ownership of the land;*
- (2) Scope of the work must be minor, i.e., both the nature and the magnitude of the changes to the Section 4(f) property are minimal;*
- (3) There are no anticipated permanent adverse physical impacts, nor will there be interference with the protected activities, features, or attributes of the property, on either a temporary or permanent basis;*
- (4) The land being used must be fully restored, i.e., the property must be returned to a condition which is at least as good as that which existed prior to the project; and*
- (5) There must be documented agreement of the official(s) with jurisdiction over the Section 4(f) resource regarding the above conditions.*

FTA has determined that the Project temporary construction easement activities at the nine properties described in Attachment A meet the Section 4(f) Temporary Occupancy Exception provision above. FTA has also determined that SHPO is the Section 4(f) “official with jurisdiction” for these nine properties, as they are eligible for listing on the NRHP.

Pursuant to 23 CFR Part 774.13(d), FTA requests SHPO’s written concurrence with the Temporary Occupancy Exception Determination in the box provided below. This written concurrence will be included in the environmental documentation for the Project.

**SHPO Concurrence with Temporary Occupancy Exception Determination**

The Oregon State Historic Preservation Officer, which is the official with jurisdiction over the following National Register of Historic Places-eligible properties: George Himes Park, Portland; 4019 SW Corbett Avenue, Portland; 3811 SW Barbur Boulevard, Portland; 022 SW Lowell Street, Portland; 4515 SW Corbett Avenue, Portland; Burlingame Fred Meyer Sign, 7529-7601 SW Barbur Boulevard, Portland; 1801 SW Evans Street, Portland; Good Shepherd Lutheran Church and Little Lambs Preschool/Daycare, 3405 SW Alice Street, Portland; and Fought & Company, 14255 SW 72nd Avenue, Tigard, concurs that the Southwest Corridor Light Rail Project meets the conditions for a Section 4(f) Temporary Occupancy Exception pursuant to 23 CFR Part 774.13(d) for impacts to these historic properties.

Signature: Jamie L French Date: 5/27/2021  
Name: Jamie French Title: SHPO GIS Archaeologist

If FTA can provide any assistance or additional information which would aid in your prompt reply, please feel free to contact Mark Assam at (206) 220-4465 or mark.assam@dot.gov.

December 23, 2020  
Page 3

Thank you for your consultation on the Project.

Sincerely,

**LINDA M  
GEHRKE**

Digitally signed by  
LINDA M GEHRKE  
Date: 2020.12.23  
16:04:09 -0800

Linda M. Gehrke  
Regional Administrator

cc: Jason Allen, Survey & Inventory Program Coordinator, Oregon State Historic Preservation  
Office  
Jaime French, GIS Archaeologist, Oregon State Historic Preservation Office  
Michaela Skiles, Transportation Planner, Metro  
Joe Recker, Environmental Permits Coordinator, TriMet

Enclosure: Attachment A - Southwest Corridor Light Rail Project, Section 4(f) Temporary  
Occupancy Exception Descriptions and Maps

#### 4. 02/12/21 letter from the Oregon SHPO to FTA



**Oregon**  
KEOS FAIRVIEW, LINDSEY

#### Parks and Recreation Department

State Historic Preservation Office

325 Summer St NE Ste C

Salem, OR 97301-1266

Phone (503) 986-0600

Fax (503) 986-0700

[www.oregonhpo.org](http://www.oregonhpo.org)



February 12, 2021

Mr. Mark Assam  
FTA, Region X  
915 2nd Ave, Ste 3142  
Seattle, WA 98174-1002

RE: SHPO Case No. 16-1621

FTA, Metro, TriMet Portland Southwest Corridor Light Rail Transit Project (SWC LRT)  
Install light rail system Portland to Bridgeport  
, Portland to Tigard, Multnomah Washington County

Dear Mr. Assam:

We have reviewed the Federal Transit Administration's (FTA's) accounting of the identification of historic properties and evaluation of effects arising from the project. We concur with the evaluations of eligibility provided, and concur that the project will result in adverse effects to historic resources with the identification of adverse effects for the project.


We would like to clarify that, in addition to the adverse effect Terwilliger Parkway arising from the diminished integrity of setting resulting from the introduction of the connector to Oregon Health Science University there is also a direct effect resulting from the associated with the introduction a new stoplight into the parkway, interrupting the historically intended flow of automobile traffic along its length.

We look forward to receiving the remaining evaluation for the house at 12265 SW 72nd Ave. If found to be eligible for listing in the National Register, suitable mitigation will need to be developed.

At this time our office is unable to concur with eligibility regarding the archaeological resources. The required site forms need to be submitted through our online site form system before we can concur. Once that has been done please contact Jamie French ([Jamie.French@oregon.gov](mailto:Jamie.French@oregon.gov)) and she will respond to the eligibility determinations.

We have reviewed the draft MOA, as well as comments received during the public comment period, and will provide our comments and suggestions for the MOA separately.

Sincerely,

  
Jason Allen, M.A.  
Historic Preservation Specialist  
(503) 986-0579  
[jason.allen@oregon.gov](mailto:jason.allen@oregon.gov)

cc: Chris Ford, Metro

5. 05/27/21 letter from the Oregon SHPO to FTA



Oregon  
*State of Oregon*

Parks and Recreation Department

State Historic Preservation Office

725 Summer St NE Ste C

Salem, OR 97301-1266

Phone (503) 986-0690

Fax (503) 986-0793

[www.oregonheritage.org](http://www.oregonheritage.org)



May 27, 2021

Mr. Mark Assam  
FTA, Region X  
915 2nd Ave, Ste 3142  
Seattle, WA 98174-1002

RE: SHPO Case No. 16-1621

FTA, Metro, TriMet Portland Southwest Corridor Light Rail Transit Project (SWC LRT)  
Install light rail system Portland to Bridgeport  
, Portland to Tigard, Multnomah Washington County

Dear Mr. Assam:

Thank you for submitting information for the undertaking referenced above. We concur that there will be an adverse effect to historic properties and look forward to developing an appropriate approach toward mitigating the adverse effect and continuing with resource identification as the project proceeds.

Our office does not concur with the finding of not eligible for resources 17/2534-3, 4, 5, and 6. Our office does not feel that there is adequate information regarding what the resources are or how and when they were formed to make a sufficient argument to their eligibility. We request additional information on these resources. We do concur with the findings of unevaluated ISO 19/2798-1, 17/2534-1, 35MU129 and 35MU238. Information about these archaeological sites should be added to the whereas clauses prior to MOA signature.

Included is a signed 4F TOE.

If you have not already done so, be sure to consult with all appropriate Native American tribes and interested parties regarding the proposed undertaking. Additional consultation regarding this case must be sent through Go Digital. In order to help us track the undertaking accurately, reference the SHPO case number above in all correspondence.

Our office has assigned SHPO biblio number 31562, details available on bibliographic database.

Please contact our office if you have any questions, comments or need additional assistance.

Sincerely,

Jamie French, M.A.  
SHPO Archaeologist  
(503) 979-7580  
[Jamie.French@oregon.gov](mailto:Jamie.French@oregon.gov)

cc: Chris Ford, Metro



## 6. 07/13/21 letter from FTA to PP&R



U.S. Department  
of Transportation  
**Federal Transit  
Administration**

REGION X  
Alaska, Idaho, Oregon,  
Washington

915 Second Avenue  
Federal Bldg. Suite 3142  
Seattle, WA 98174-1002  
206-220-7954  
206-220-7959 (fax)

July 13, 2021

Adena Long  
Director  
Portland Parks & Recreation  
1120 SW 5th Avenue, #1302  
Portland, OR 97204

**Subject: Metro and TriMet  
Southwest Corridor Light Rail Project  
Department of Transportation Act, Section 4(f)  
*de minimis* Impact and Temporary Occupancy Exception Determinations**

Dear Ms. Long:

The Federal Transit Administration (FTA), in cooperation with Metro and the Tri-County Metropolitan Transportation District of Oregon (TriMet), is proposing the Southwest Corridor Light Rail Project (Project). The Project would extend light rail service along an 11-mile route and provide for additional transportation improvements within Multnomah and Washington counties, from downtown Portland to Tigard, Oregon. TriMet intends to apply for federal funds administered by FTA for the Project, making it subject to the provisions of Section 4(f) of the Department of Transportation Act of 1966 (Section 4(f)), and its implementing regulations at 23 Code of Federal Regulations (CFR) Part 774. The Project design includes both permanent and temporary encroachments onto seven park properties that are protected by Section 4(f) requirements. This letter requests written concurrence from Portland Parks & Recreation with FTA's Section 4(f) *de minimis* Impact and Temporary Occupancy Exception Determinations for these Project activities.

### **Project Activity Descriptions and Maps**

Attachments A and B enclosed with this letter provide aerial photograph maps and descriptions of the Project activities at each of the seven affected park properties, descriptions of proposed mitigation activities, and the Section 4(f) determinations for each affected park property. The information from Attachments A and B is summarized in Table 1 below.

**Table 1. Section 4(f) Determinations for City of Portland Park Properties Affected by the Project**

| Property Name                                      | Project Impact on Property   | Section 4(f) Determination    |
|--|--|-------------------------------|
| Duniway Park                                       | Involves tree and plant removal on northeastern boundary, reconfiguring a driveway and parking area by the circular track, and temporary closure of outer track lanes and a driveway. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent: 3,110 SF, or 0.5% of the park</li> <li>Temporary: Additional 25,160 SF for total 4.6% of the park</li> </ul> | <i>de minimis</i> Impact      |
| Lair Hill Park                                     | Involves rebuilding sidewalk and retaining wall along park border and removing street trees and park trees. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent: 3,450 SF, or 2.8% of the park</li> <li>Temporary: Additional 2,060 SF for total 4.4% of the park</li> </ul>  | <i>de minimis</i> Impact      |
| Fulton Park, Community Garden and Community Center | Involves sidewalk reconstruction and street tree removal bordering park, with restoration of disturbed areas. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent: 70 SF, or 0.03% of the park</li> <li>Temporary: Additional 1,035 SF, for total 0.3% of the park</li> </ul>   | <i>de minimis</i> Impact      |
| Burlingame Park                                    | Related transportation improvement option (Station Access Project) involves pedestrian bridge over corner of park. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent easement: 1,000 SF, or about 0.14% of the park</li> <li>Temporary: 2,000 SF, for total 0.42% of the park</li> </ul>  | <i>de minimis</i> Impact      |
| Front and Curry Community Garden                   | Involves new crosswalk and improved sidewalks at SW Naito Parkway. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent: None</li> <li>Temporary: About 30 SF, or about 0.3% of the property</li> </ul>  | Temporary Occupancy Exception |
| George Himes Park                                  | Involves construction staging areas in a wooded ravine in order to replace Newbury viaduct, including tree and vegetation removal, and closure of east access point SW Trail #3. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent: None</li> <li>Temporary: 5,770 SF, or 0.4% of the park</li> </ul>   | Temporary Occupancy Exception |
| Sylvania Natural Area Park                         | Involves street reconstruction and vegetation removal bordering park. The estimated amount of park property affected is as follows: <ul style="list-style-type: none"> <li>Permanent: None</li> <li>Temporary: About 1,170 SF, or less than 1% of the park</li> </ul>  | Temporary Occupancy Exception |

Note:  
SF: square feet

#### **Section 4(f) *de minimis* Impact Criteria**

Under the Section 4(f) regulations at 23 CFR Part 774.3, FTA cannot approve a transportation project that requires the use of any publicly owned land from a significant public park, recreation area, or wildlife and waterfowl refuge, or any land from a significant historic site, unless a determination is made that:

1. There is no feasible and prudent alternative to using the property; and the project includes all possible planning to minimize harm to the property resulting from the use; or
2. The use will have no more than a *de minimis* impact on the resource. A *de minimis* impact means a project will have no adverse effect to the activities, features, and attributes of the resource after consideration of any impact avoidance, minimization, and mitigation or enhancement measures.

Section 4(f) guidance encourages early coordination with officials with jurisdiction over the Section 4(f) resource to ascertain the position of the officials and to obtain their views. Section 4(f) regulations stipulate that officials with jurisdiction over the Section 4(f) resource must concur in writing with a *de minimis* impact determination (23 CFR Part 774.5(b)(2)). The regulations also require that the public has an opportunity to review and comment on a project's Section 4(f) effects prior to such written concurrence.

#### **Section 4(f) Temporary Occupancy Exception Criteria**

The Section 4(f) regulations include an exception to the requirement for Section 4(f) approval specifically for temporary occupancies of land, at 23 CFR Part 774.13(d):

*(d) Temporary occupancies of land that are so minimal as to not constitute a use within the meaning of Section 4(f). The following conditions must be satisfied:*

- (1) Duration must be temporary, i.e., less than the time needed for construction of the project, and there should be no change in ownership of the land;*
- (2) Scope of the work must be minor, i.e., both the nature and the magnitude of the changes to the Section 4(f) property are minimal;*
- (3) There are no anticipated permanent adverse physical impacts, nor will there be interference with the protected activities, features, or attributes of the property, on either a temporary or permanent basis;*
- (4) The land being used must be fully restored, i.e., the property must be returned to a condition which is at least as good as that which existed prior to the project; and*
- (5) There must be documented agreement of the official(s) with jurisdiction over the Section 4(f) resource regarding the above conditions.*

#### **Section 4(f) Determinations and Request for Written Concurrence**

FTA has determined that the Project activities at the four park properties described in Attachment A (i.e., Duniway Park; Lair Hill Park; Fulton Park, Community Garden and Community Center; and Burlingame Park) meet the Section 4(f) *de minimis* Impact provision above. FTA has also determined that the Project activities at the three park properties described in Attachment B (i.e., Front and Curry Community Garden; George Himes Park; and Sylvania Natural Area Park) meet the Section 4(f) Temporary Occupancy Exception provision above. In accordance with 23 CFR Part 774.5(b)(2), the public review and comment requirement for the

July 13, 2021  
Page 4

Project has been met with a public comment period that ran from December 18, 2020 through January 19, 2021, and included an online public meeting on January 7, 2021. Comments received from the public are included in Attachment C enclosed with this letter. Finally, FTA has determined that the City of Portland, Portland Parks & Recreation is the Section 4(f) "official with jurisdiction" for the seven park properties described above.

Pursuant to 23 CFR Part 774.5(b)(2) and 23 CFR Part 774.13(d) respectively, FTA requests Portland Parks & Recreation's written concurrence with the *de minimis* Impact and Temporary Occupancy Exception Determinations in the box provided below. This written concurrence will be included in the environmental documentation for the Project.

**Portland Parks & Recreation Concurrence with *de minimis* Impact and Temporary Occupancy Exception Determinations**

The City of Portland, Portland Parks & Recreation, which is the official with jurisdiction over the park properties listed below, concurs that the Southwest Corridor Light Rail Project meets the conditions for the following: 1.) a Section 4(f) *de minimis* impact determination pursuant to 23 CFR Part 774.3(b) for impacts to Duniway Park; Lair Hill Park; Fulton Park, Community Garden and Community Center; and Burlingame Park; and 2.) a Section 4(f) Temporary Occupancy Exception determination pursuant to 23 CFR Part 774.13(d) for impacts to Front and Curry Community Garden; George Himes Park; and Sylvania Natural Area Park.

Signature: **Adena Long** Digitally signed by Adena Long  
Date: 2021.07.20 09:10:46 -07'00' Date: \_\_\_\_\_  
Name: \_\_\_\_\_ Title: \_\_\_\_\_

If FTA can provide any assistance or additional information which would aid in your prompt reply, please feel free to contact Mark Assam at (206) 220-4465 or mark.assam@dot.gov.

Thank you for your consultation on the Project.

Sincerely,

**LINDA M. GEHRKE** Digitally signed by  
LINDA M. GEHRKE  
Date: 2021.07.13  
10:45:35 -07'00'

Linda M. Gehrke  
Regional Administrator

cc: Michaela Skiles, Transportation Planner, Metro  
Jamie Snook, Manager, Capital Planning, TriMet  
Joe Recker, Environmental Permits Coordinator, TriMet

Enclosure: Attachment A - City of Portland Park Properties with Proposed *de minimis* Impact Determinations  
Attachment B - City of Portland Park Properties with Proposed Temporary Occupancy Exception Determinations  
Attachment C - Public Comments



7. 10/20/21 letter from the Oregon SHPO to FTA



Oregon  
Kate Brown, Governor

Parks and Recreation Department  
State Historic Preservation Office  
725 Summer St NE, Ste C  
Salem, OR 97301-1266  
Phone (503) 986-0690  
Fax (503) 986-0793  
[www.oregonheritage.org](http://www.oregonheritage.org)



October 20, 2021

Mr. Mark Assam  
FTA, Region X  
915 2nd Ave, Ste 3142  
Seattle, WA 98174-1002

RE: SHPO Case No. 16-1621

FTA, Metro, TriMet Portland Southwest Corridor Light Rail Transit Project (SWC LRT)  
Install light rail system Portland to Bridgeport  
, Portland to Tigard, Multnomah Washington County

Dear Mr. Assam:

Thank you for submitting information for the undertaking referenced above. We concur that there will be an adverse effect to historic properties and look forward to developing an appropriate approach toward mitigating the adverse effect. We also concur with the determination of not eligible for archaeological sites 17/2534-3, 17/2534-4, 17/2534-5, and 17/2534-6.

We look forward to continuing consultation on the Memorandum of Agreement for the adverse effects identified.

If you have not already done so, be sure to consult with all appropriate Native American tribes and interested parties regarding the proposed undertaking. Additional consultation regarding this case must be sent through Go Digital. In order to help us track the undertaking accurately, reference the SHPO case number above in all correspondence.

Our office has assigned SHPO biblio numbers 31591 and 31592, details available on bibliographic database.

Please contact our office if you have any questions, comments or need additional assistance.

Sincerely,

Jamie French, M.A.  
Assistant State Archaeologist  
(503) 979-7580  
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cc: Michaela Skiles, Metro

## **ATTACHMENT DD2 – SECTION 4(F) PROPERTY DETERMINATIONS FOR PERMANENT *DE MINIMIS* USES AND TEMPORARY OCCUPANCY EXCEPTIONS**

This attachment provides supporting information for permanent *de minimis* uses and temporary occupancy exemptions. As required in 23 Code of Federal Regulations (CFR) 774.17, FTA has determined the Project's effects on these properties meet conditions for a *de minimis* impact determination or a temporary occupancy exemption to a Section 4(f) use. Information about Section 4(f) resources with permanent uses greater than *de minimis* is provided in Section D.4 of Appendix D of the Final EIS, Final Section 4(f) Evaluation.

The requirements for *de minimis* impact determinations are described in Appendix D of the Final EIS, but are defined in 23 CFR 774.17, and include documenting the coordination with the agencies with jurisdiction over each Section 4(f) property in order for a *de minimis* impact determination to be made.

For Section 4(f) properties with a temporary incorporation of land into a transportation project, Appendix D of the Final EIS and 23 CFR 774.13 state the requirements for a temporary occupancy exception, which also include documentation of the coordination with the agencies with jurisdiction.

For each of the Section 4(f) properties with either a *de minimis* impact or a temporary occupancy exception, this attachment describes the property and the factors FTA has considered in the Section 4(f) determination. The documentation also references FTA's coordination with the agencies with jurisdiction over each resource, including the City of Portland and/or the State Historic Preservation Office (SHPO) of Oregon.

This attachment addresses the following Section 4(f) resources. The locations of these resources are shown in Figures D-8, D-9, and D-10 of the Final Section 4(f) Evaluation.

- DD2-1: Duniway Park
- DD2-2: Lair Hill Park
- DD2-3: Fulton Park
- DD2-4: Burlingame Park
- DD2-5: Front and Curry Community Garden
- DD2-6: George Himes Park
- DD2-7: Sylvania Natural Area Park
- DD2-8: Duniway Plaza, 2400 SW Fourth Avenue, Portland
- DD2-9: Marquam Plaza, 2525 SW Third Avenue, Portland
- DD2-10: Marquam II 2611 SW Third Avenue, Portland
- DD2-11: 3926 SW Water Avenue, Portland
- DD2-12: 3605 SW Condor Avenue, Portland
- DD2-13: 218-220 SW Hamilton Street, Portland
- DD2-14: 4145 SW Corbett Avenue, Portland
- DD2-15: 4205 SW Corbett Avenue, Portland

- DD2-16: 4215-4217 SW Corbett Avenue, Portland
- DD2-17: 4231-4237 SW Corbett Avenue, Portland
- DD2-18: Tabernacle Seventh-Day Adventist Church, 26 SW Condor Way, Portland
- DD2-19: 4820 SW Barbur Boulevard, Portland
- DD2-20: 5910 SW Ralston Drive, Portland
- DD2-21: 9803 SW Barbur Boulevard (Master Wrench), Portland
- DD2-22: Original Pancake House, 8601 SW 24th Avenue, Portland
- DD2-23: Oregon Education Association, 6900 SW Atlanta Street, Tigard
- DD2-24: 4019 SW Corbett Avenue, Portland
- DD2-25: 3811 SW Barbur Boulevard, Portland
- DD2-26: 022 SW Lowell Street, Portland
- DD2-27: 4515 SW Corbett Avenue, Portland
- DD2-28: 1801 SW Evans Street, Portland
- DD2-29: Good Shepherd Lutheran Church and Little Lambs Preschool/Daycare, 3405 SW Alice Street, Portland
- DD2-30 Burlingame Fred Meyer Sign, 7529-7601 SW Barbur Boulevard, Portland
- DD2-31: Fought & Company, 14255 SW 72nd Avenue, Tigard
- DD2-BH-1: IBM Building, 2000 SW First Avenue, Portland
- DD2-BH-2: Pitney-Bowes Building, 2112 SW First Avenue, Portland
- DD2-BH-3: Wolfman, A., Building, 11 SW Gibbs Street, Portland

## DD2-1 DUNIWAY PARK

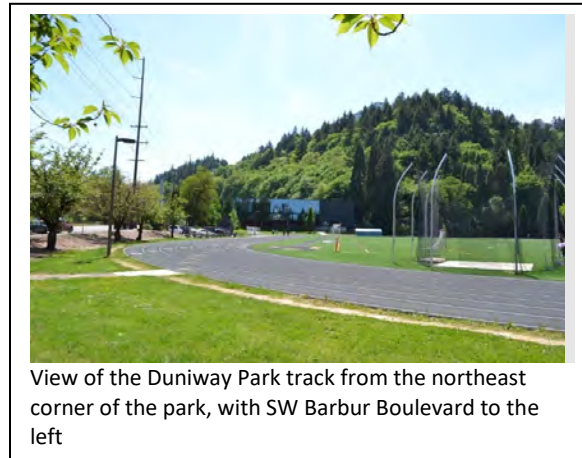
### Property Description

Duniway Park is a 14.10-acre (611,520 square feet) public park in the Lair Hill and Homestead neighborhoods of South Portland. Duniway Park is owned and operated by the City of Portland/Portland Parks and Recreation. This *de minimis* impact determination is for the park as both a historic resource and a park and recreation resource.

The park is bounded by SW Sheridan Street to the north, SW Barbur Boulevard to the east, and SW Terwilliger Boulevard to the south and west.

**Park and Recreation Activities, Features and Attributes.** The property has a lilac garden with more than 125 varieties of lilacs, large lawn areas, stands of mature trees, a horseshoe pit, paved and unpaved paths, and picnic tables. In the area of impact, there is an eight-lane synthetic surface track encircling a synthetic surface soccer field. The park has a small, 11-space parking area accessed only by southbound traffic on SW Barbur Boulevard.

**Historic Characteristics.** Through the Section 106 process, the Federal Transit Administration (FTA) has determined and the State Historic Preservation Office (SHPO) has concurred that Duniway Park is eligible for inclusion in the National Register of Historic Places (NRHP). It is historically significant for its association with settlement and development patterns of South Portland during the 20th century. Overall, the park property retains few intact historic buildings or materials, and those that remain represent several different periods of development. The construction of modern amenities, the expansion of the park's original boundaries, the removal and modification of historic-period park features, and stark changes to the immediate area surrounding the park have diminished its integrity of design, setting, materials, workmanship and feeling. The grading of the park, which provides a lower terrace for track and field activities and an upper terrace with a picnic area and lilac garden, also gives it the feeling of being two separate parks.



View of the Duniway Park track from the northeast corner of the park, with SW Barbur Boulevard to the left

Character-defining features that contribute to the historic significance of the park and its setting include:

- two stone comfort stations
- a lilac garden
- the park's connection to Terwilliger Parkway
- continued history of recreational use
- terraced landform

Character-defining features that do not contribute to the historic significance of the park and its setting include:

- historic-period lampposts that line SW Terwilliger Boulevard at the park's western edge and appear to be historically associated with the roadway and not the park



- little to no vegetation to screen traffic and noise from SW Barbur Boulevard and other nearby roadways
- park furniture, which is limited to benches and other seating that appears to represent a mixture of historic-period and modern manufacture
- a synthetic turf field and track
- an unpaved exercise path
- a horseshoe pit
- a marker and plaque celebrating the accomplishments of Abigail Scott Duniway
- a sign that marks the gateway to Terwilliger Parkway

## **Project Assessment of Use**

The Project would permanently use 3,110 square feet of Duniway Park as a transportation facility (about 0.5 percent of the park), and an additional 25,160 square feet would be used temporarily for construction. This would result in a total use of 28,270 square feet, or about 4.6 percent of the park. See Figure DD2-1A.

The permanent use would allow for the widening of SW Barbur Boulevard to accommodate light rail and bicycle lanes, with improved sidewalks. The light rail line in the center of SW Barbur Boulevard would be elevated and within view of the eastern areas of Duniway Park. The area physically affected in Duniway Park would be at the northeast corner at the intersection of SW Barbur Boulevard and SW Sheridan Street, and along the eastern edge of the park that abuts SW Barbur Boulevard, adjacent to the track and field area.

At the northeast corner of the park and along its eastern edge, trees and bordering landscaping would be removed. Retaining walls and a parking area/drive would be rebuilt, adjacent to the eastern portion of the circular track. The temporary construction area would encroach upon the outer lanes of the track, temporarily closing the driveway to the parking area.

## **Effects on Parks and Recreation Activities, Features or Attributes**

During construction as well as permanently, the majority of the park would remain open to public use, and none of the important park and recreation activities, features and attributes would be impaired (see Table DD2-1). The parking area would be temporarily closed, and access from the western sidewalk of SW Barbur Boulevard would be restricted or require temporary detours. Public use of the track would be maintained during construction. Per written agreement between the Tri-County Metropolitan Transportation District of Oregon (TriMet) and the City of Portland/Portland Parks and Recreation, the Project would reconfigure the driveway and parking area at the park's eastern edge near the circular track, restore and re-landscape other disturbed areas, and pay compensation to the city for the use of park property. TriMet would fulfill requirements of non-park use permits by the City of Portland, including meeting the requirements of the City of Portland Tree Code. Tree removal and replacement would be consistent with the requirements of the City of Portland Tree Code. The track and field area and the adjacent areas would be permanently restored to the same or better condition than existing previously. Figures DD2-1A and 1B show the area affected by the Project and include a concept illustrating the nature of the restoration actions.

## Effects on Historic Characteristics

Through the Section 106 process, FTA has determined the Project would have no adverse effect on Duniway Park's historic characteristics, and SHPO has concurred. As shown in Table DD2-1, none of the important historic characteristics of Duniway Park would be altered by the Project, through either direct physical alteration or through vicinity impacts. The removal of trees that were planted circa 1970 at the park's northeast corner, changes to a circa 1970 parking area at SW Barbur Boulevard, and the introduction of light rail infrastructure within the viewshed of the park would have minor direct and indirect effects on the park's setting and design. The park would retain its character-defining features that qualify the property for Section 4(f) protection.

## Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements, including a 30-day comment period that began on December 17, 2020 and a public meeting held on January 7, 2021, and through consultations with both the SHPO and the City of Portland/Portland Parks and Recreation and receiving their written approvals, FTA has made a determination of *de minimis* impact for the proposed use of a corner of the park to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the park, and to modify park features in this area, as described above. The letters of concurrence from the SHPO and the City of Portland in Attachment DD1 further support FTA's finding that the Project would not permanently adversely affect the features, attributes or activities that qualify Duniway Park for protection by Section 4(f) as a park and recreation property or as a historic property.

Figure DD2-1A  
Duniway Park

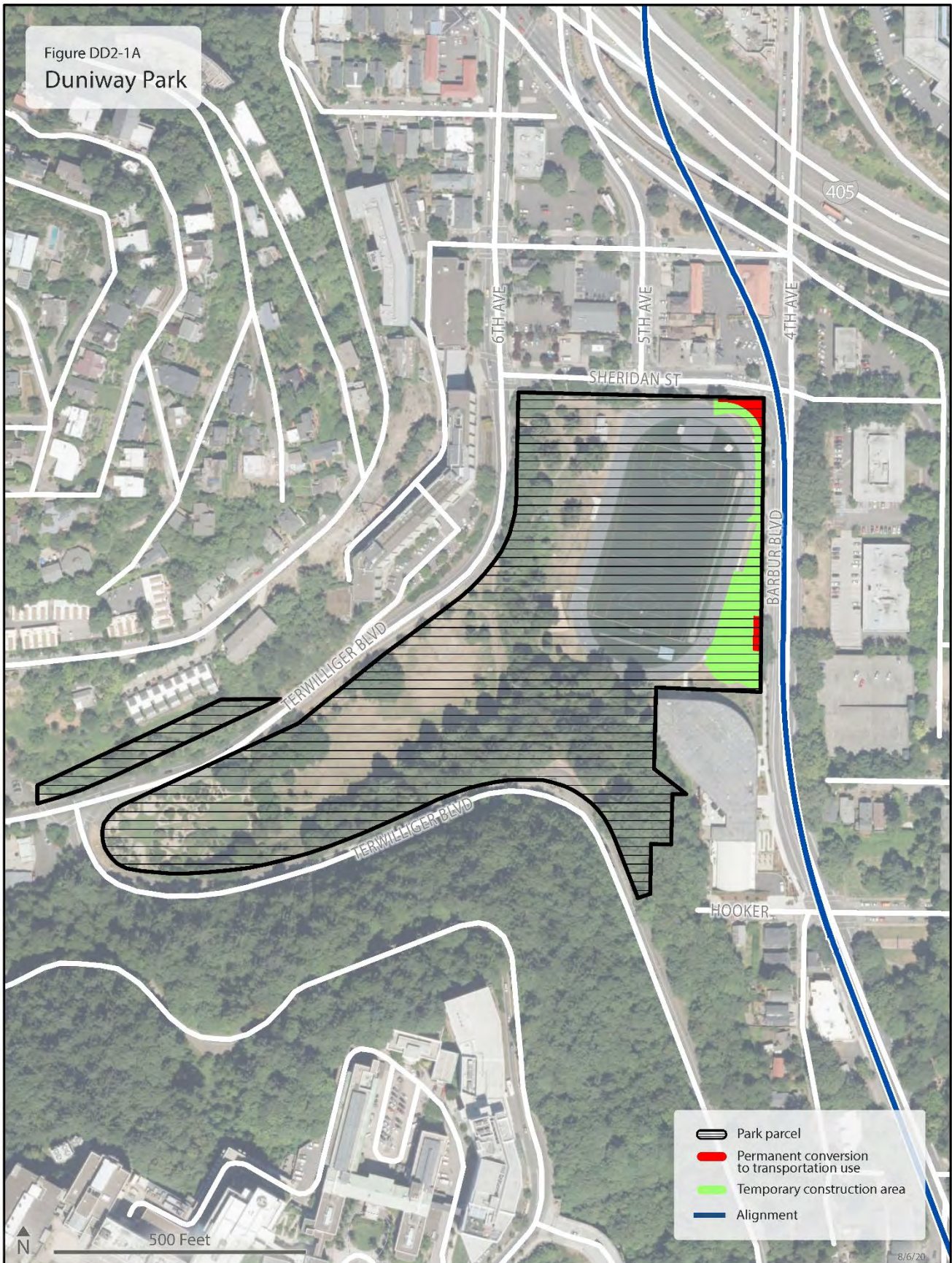
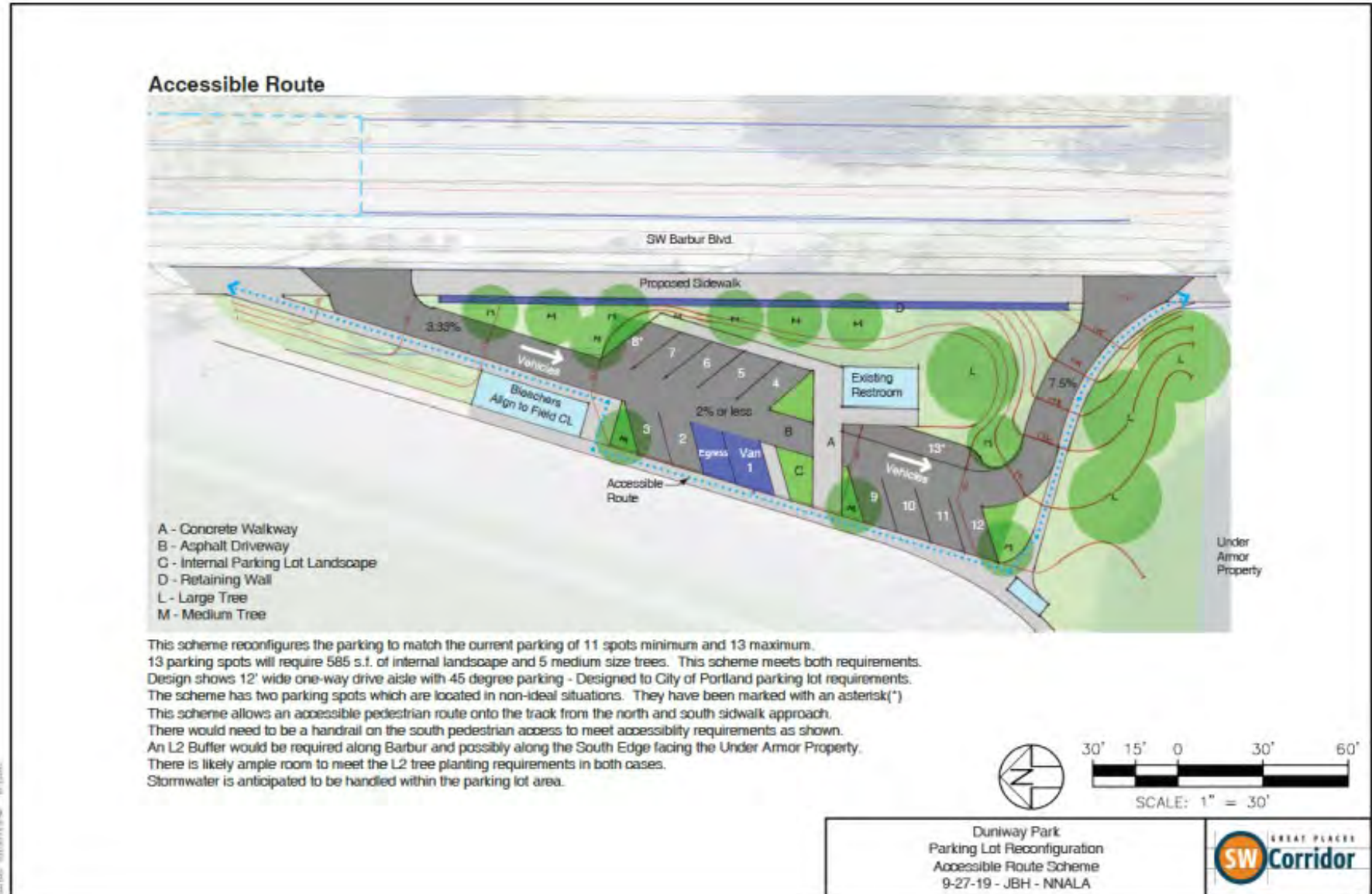




Figure DD2-1B. Duniway Park Restoration Concept





**Table DD2-1. Duniway Park**

| Character-Defining Feature                                     | Impact/No Impact   |
|--|--|
| <b>Parks and Recreation Activities, Features or Attributes</b> |  |
| Lilac garden   | No impact  |
| Large lawn areas   | No impact  |
| Stands of mature trees   | No impact  |
| Horseshoe pit  | No impact  |
| Paved and unpaved paths  | No impact  |
| Picnic tables  | No impact  |
| 8-lane synthetic surface track                                 | No impact  |
| Synthetic surface soccer field                                 | No impact  |
| 11-space parking area  | Impacted but mitigated through relocation in adjacent area of the park |
| <b>Historic Characteristics</b>                                |  |
| Association with South Portland's historic development         | No impact  |
| Two stone comfort stations                                     | No impact  |
| A lilac garden   | No impact  |
| The park's connection to Terwilliger Parkway                   | No impact  |
| Continued history of recreation use                            | No impact  |
| Terraced landform  | No impact  |

## DD2-2 LAIR HILL PARK

### Property Description

Lair Hill Park spans 3.26 acres (142,090 square feet) that was deeded to the City of Portland by Multnomah County in 1927. Lair Hill Park is owned and operated by the City of Portland/Portland Parks and Recreation. This *de minimis* impact determination is for the park as both a historic resource and a park and recreation resource.

### Park and Recreation Activities, Features and Attributes

The City of Portland/Portland Parks and Recreation characterizes the property as a neighborhood park with mature trees, lawns, a sculpture and buildings. Recreation amenities include:

- a handball court
- a tennis court
- public art
- picnic tables
- playgrounds
- paved paths



Northwest corner of Lair Hill Park, with handball court in near background, and one of the park's historic buildings in the far background

The west side of the park is nearest to the Project and includes mature trees both within the park and along the SW Barbur Boulevard right of way, where a sidewalk, retaining wall and slope are adjacent to a chain link fence.

### Historic Characteristics

Lair Hill Park is significant as a contributing property to the South Portland Historic District, which is listed in the NRHP. The park has important historic characteristics related to its association with the District, and for associations with the broad patterns of history regarding the development of social infrastructure for recreation, learning and healthcare in South Portland during the early 20th century. The park also encompasses two historic buildings that have distinctive characteristics of their type and period of construction.

Character-defining features that contribute to the historic significance of the park and its setting include:

- the Multnomah County Hospital Nurses' Quarters building and the South Portland/Carnegie Library, both of which are highly representative of their period of construction and architectural styles and functioned as significant community buildings during the historic period
- the placement of buildings and recreation facilities at the edges of the park, preserving a central open area for unstructured play and relaxation
- mid-20th century recreation facilities installed to meet local demand, including the handball court, tennis court, wading pool and sunken play area
- the northeast viewshed towards Mount St. Helens

The boundary of the Lair Hill Park historic property aligns with the original tract of land deeded to the City of Portland by Multnomah County in 1927. This boundary encompasses only a portion of a historic-period retaining wall adjacent to sidewalks on the south and west sides of the park. However, the retaining wall does not contribute to the eligibility of the park; it has diminished historical integrity, does not embody the park's significant historical associations under Criteria A (events affecting the patterns of history), or have distinctive characteristics under Criteria C (type, period or method of construction). Overall, the park property retains integrity of location, materials, workmanship, feeling and association, but its integrity of design and setting have been slightly diminished as features of the park and its surrounding environment have changed over time.

## Project Assessment of Use

The Project would occupy a narrow strip of parkland along the western boundary of Lair Hill Park to widen SW Barbur Boulevard (see Figure DD2-2A). The Project would remove a retaining wall and remove evergreen and deciduous trees and plantings along the western boundary. The Project would rebuild a small portion of the northwest entrance path, potentially up to the edge of the handball court in the northwestern corner of the park. An 11-foot wall would replace the existing 3- to 5-foot retaining wall, slope and street trees adjacent to the park boundary.



The Project anticipates a permanent use of approximately 3,450 square feet, or 2.4 percent of the park. An additional 2,060 square feet would be needed during construction, for a total of 5,500 square feet, or 3.9 percent of the park. The Project's conceptual design estimates a potential impact on up to 26 park and street trees, most of which would involve root impacts that could be reduced through final design, although several trees would need to be removed in any case (see Figure DD2-2B).

## Effects on Parks and Recreation Activities, Features and Attributes

None of the park's recreation facilities would be altered. During reconstruction of the northwest entrance path, the back edge of the handball court may need to be fenced to separate the pathway reconstruction area from the court, but this would be a short-term effect. During construction, the western edge of the park would be fenced and closed to public access, but there are no formal recreation activities or features in this area, and other entrances to the park would remain open.

Measures to minimize the impacts to the park and recreation activities, features or attributes includes re-landscaping and restoration of disturbed areas, including pathways and lawn areas. Park trees and adjacent street trees would be replaced in accordance with a written mitigation approach agreement between TriMet and the City of Portland/Portland Parks and Recreation. TriMet would fulfill requirements of non-park use permits by the City of Portland. The Project would provide compensation to the city, and commits to working with the city on the design and construction of a wall type that minimizes impacts to existing tree roots adjacent to the west side wall, and on the details of mitigation tree planting and landscaping plans for areas within the park. See Figure DD2-2B for a diagram of potential tree impacts.

## Effects on Historic Characteristics

Through the Section 106 process, FTA has determined the Project would have no adverse effect on Lair Hill Park's historic characteristics, and SHPO has concurred. None of the property's significant historic features would be altered (see Figure DD2-2C). The determination of no adverse effect was also supported by design measures that have minimized the number of trees that might be impacted by the removal and replacement of a circa 1930/1950 retaining wall that lines a portion of the park's perimeter. The retaining wall is both within and outside of the historic property boundary of the park and does not contribute to the park's significance. The new retaining wall would be built in a slightly different alignment than the existing retaining wall and would not be visible from most locations in the park. In addition, the Project would include landscape restoration and replanting measures for the areas that would be temporarily disturbed by the Project.

## Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements, including a 30-day comment period that began on December 17, 2020 and a public meeting held on January 7, 2021, and through consultations with both the SHPO and the City of Portland/Portland Parks and Recreation and receiving their written approvals, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the park to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the park, and to modify park features in this area, as detailed above and summarized in Table DD2-2.

**Table DD2-2. Lair Hill Park**

| Character-Defining Feature  | Impact/No Impact |
|---|------------------|
| <b>Parks and Recreation Activities, Features or Attributes</b>  |                  |
| A handball court  | No impact        |
| A tennis court  | No impact        |
| Public art  | No impact        |
| Picnic tables   | No impact        |
| Playgrounds   | No impact        |
| Paved paths   | No impact        |
| <b>Historic Characteristics</b>   |                  |
| Association with South Portland's Historic Development  | No impact        |
| Multnomah County Hospital Nurses' Quarters building   | No impact        |
| South Portland/Carnegie Library   | No impact        |
| The placement of buildings and recreation facilities at the edges of the park, preserving a central open area for unstructured play and relaxation  | No impact        |
| Mid-20th century recreation facilities installed to meet local demand, including the handball court, tennis court, wading pool and sunken play area | No impact        |
| The northeast viewshed towards Mount St. Helens   | No impact        |

The letters of concurrence from the SHPO and the City of Portland in Attachment DD1 further support FTA's finding that the Project would not permanently adversely affect the features, attributes or activities that qualify Lair Hill Park for protection by Section 4(f) as either a park and recreation property or as a historic property.



Figure DD2-2A  
Lair Hill Park





**Figure DD2-2B. Lair Hill Park Potential Tree Impact (Street Trees and Trees in Park)**

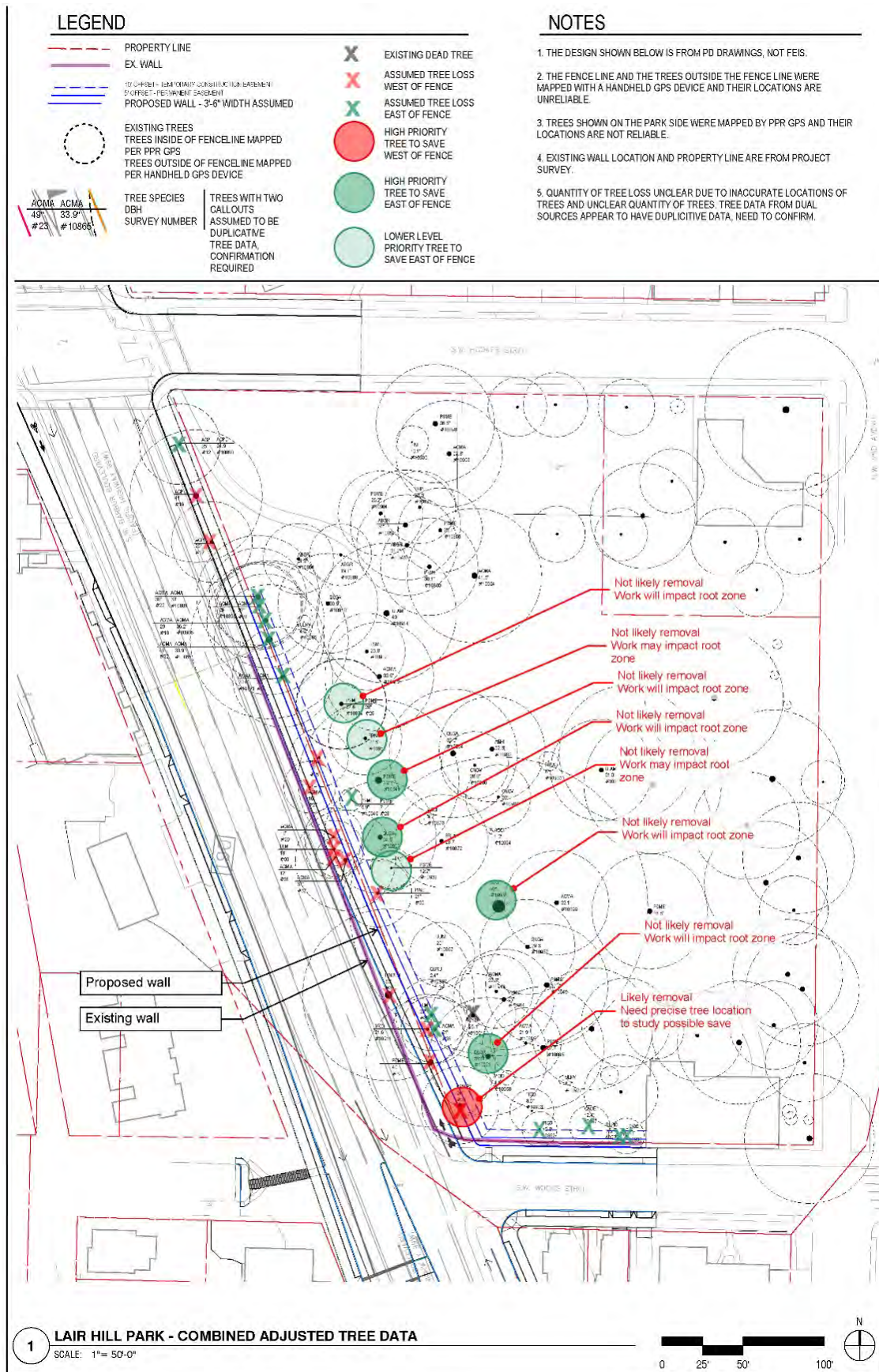




Figure DD2-2C. Lair Hill Park Facilities and Features Detail with Area of Impact



## DD2-3 FULTON PARK

### Property Description

Fulton Park is owned and operated by the City of Portland/Portland Parks and Recreation. This *de minimis* impact determination is for the park as both a historic resource and a park and recreation resource.

### Park and Recreation Activities, Features and Attributes

Fulton Park is an 8.2-acre park located between SW Barbur Boulevard and Interstate 5 (I-5). Its recreation features are:

- a large community garden comprising approximately 150 plots
- a composting area
- active recreation areas
- a forested area
- a basketball court
- picnic tables
- a playground
- a soccer field
- unpaved walking paths
- mature planted trees and some street trees that border the park but are within the SW Barbur Boulevard right of way.
- the former Fulton Park School, which is at the east end of the park and offers one main hall area that can be rented out for community events

### Historic Characteristics

The current park boundary is considered the historic property boundary. FTA has determined that Fulton Park is eligible for listing in the NRHP under Criteria A (events affecting patterns in history) and C (type, period or method of construction). Character-defining features that contribute to the historic significance of the park and its setting include:

- Fulton Park School, which was constructed in 1914, is a Rank II resource in the City of Portland Historic Resource Inventory. Fulton Park School is currently used by a private French immersion school, but it is still used at times to host community events.
- A community garden was added in 1975 when a city-wide community garden program was initiated by Portland Parks and Recreation.

### Project Assessment of Use

The light rail alignment would pass by Fulton Park in the center of SW Barbur Boulevard, which would be widened to accommodate light rail, bicycle lanes and improved sidewalks. A permanent use of 70 square feet along the northwestern edge of the park would be needed, along with 1,035 square feet of temporary construction area for a total affected area of 1,105 square feet (see Figure DD2-3). The entrances to the park at the SW Third Avenue and SW Fourth Avenue intersections with SW Barbur Boulevard would be



improved. This work would occur outside of the park boundary, and may affect street trees and street landscaping, but they would be restored at the close of construction, consistent with City of Portland permitting requirements.

### **Effects on Park and Recreation Activities, Features and Attributes**

The proposed modifications to the park would be limited to the park's frontage with SW Barbur Boulevard and within the existing transportation rights of way for SW Third and Fourth Avenues, and would not physically alter the community garden or other areas of the park (see Table DD2-3). Approximately 4 of the 150 community garden plots closest to the park's western edge would be adjacent to the construction area. Community gardening would continue. The park's central undeveloped area would be avoided, and the Fulton Park School and associated play areas are not adjacent to the project construction areas. Access to the park would be maintained during construction, and access would be improved after construction is complete. TriMet would fulfill requirements of non-park use permits by the City of Portland, including meeting the requirements of the City of Portland Tree Code for any removed trees, and disturbed areas would be restored to be the same or better than existing conditions.

### **Effects on Historic Characteristics**

The minor removal of land would not affect the Fulton Park School or the community garden, which contribute to the property's historic significance. Once the Project is constructed and the light rail is operational, Fulton Park would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A (events affecting patterns of history) and C (type, period or method of construction).

Through the Section 106 process, FTA has determined that the loss of bordering vegetation, including some street trees, and the improvement of the park's entrances at the SW Third Avenue and SW Fourth Avenue intersections with SW Barbur Boulevard, both of which would remain within transportation right of way and not within the park's historic boundaries, would have no adverse effect on the historic property, and the SHPO has concurred.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements, including a 30-day comment period that began on December 17, 2020, and a public meeting held on January 7, 2021, and through consultations with both the SHPO and the City of Portland/Portland Parks and Recreation and receiving their written approvals, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the park to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the park, and to modify park features in this area. Table DD2-3 summarizes the Project's effects on the defining characteristics of the property.

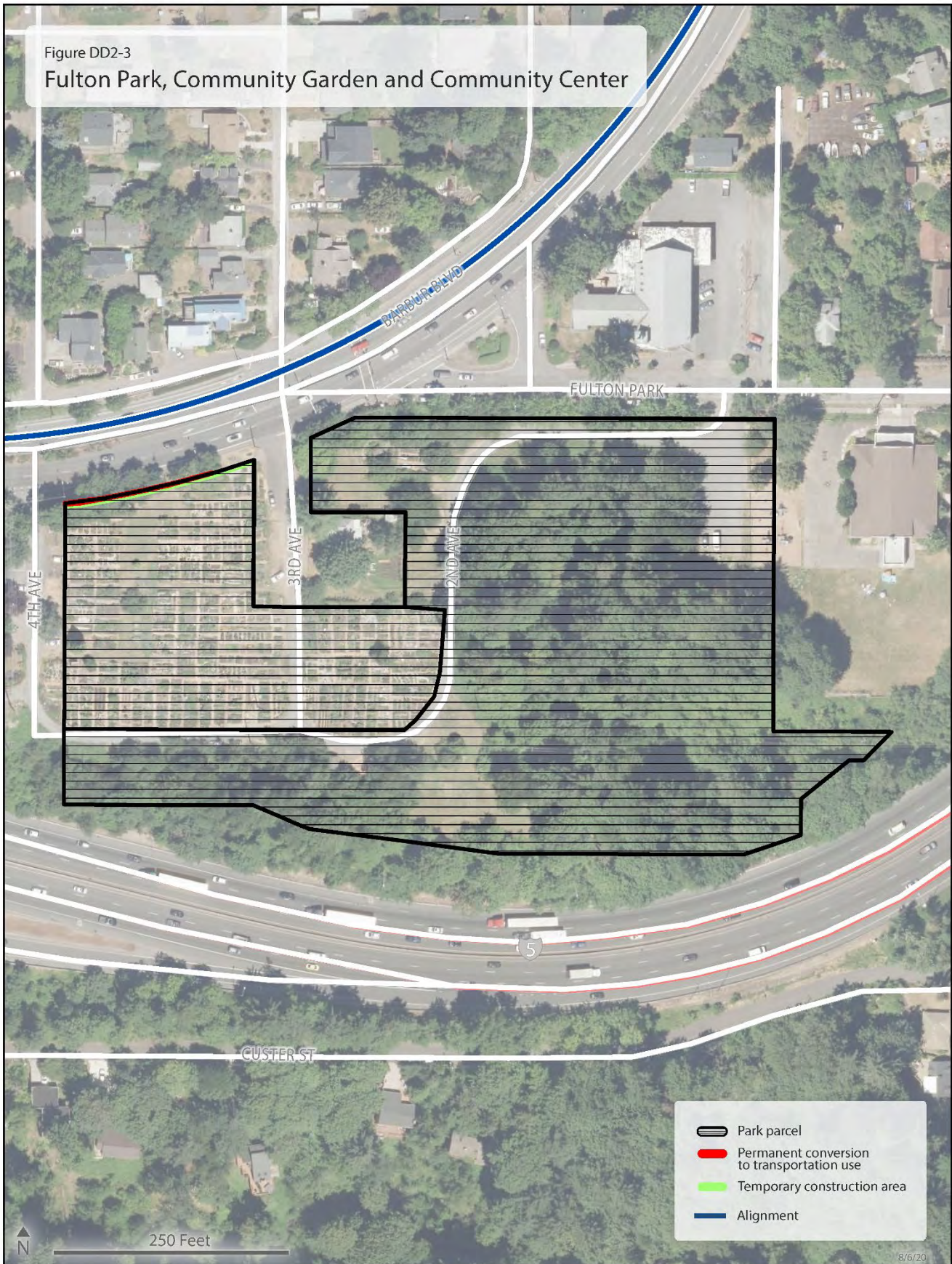
**Table DD2-3. Fulton Park**

| Character-Defining Feature   | Impact/No Impact  |
|--|---|
| <b>Parks and Recreation Activities, Features or Attributes</b>                         |   |
| A large community garden comprising approximately 150 plots                            | Limited impact during construction, with no loss of garden area |
| A composting area  | No impact   |
| Active recreation areas  | No impact   |
| A forested area  | No impact   |
| A basketball court   | No impact   |
| Picnic tables  | No impact   |
| A playground   | No impact   |
| A soccer field   | No impact   |
| Unpaved walking paths  | No impact   |
| Mature planted trees and some street trees within the SW Barbur Boulevard right of way | Limited impact, mitigated by replacement                        |
| The former Fulton Park School  | No impact   |
| <b>Historic Characteristics</b>  |   |
| Fulton Park School   | No impact   |
| Community garden   | No impact   |

The letters of concurrence from the SHPO and the City of Portland in Attachment DD1 further support FTA's finding that the Project would not permanently adversely affect the features, attributes or activities that qualify Fulton Park for protection by Section 4(f) as either a park and recreation property or as a historic property.

Figure DD2-3

Fulton Park, Community Garden and Community Center



## DD2-4 BURLINGAME PARK

### Property Description

Burlingame Park is owned and operated by the City of Portland/Portland Parks and Recreation. This *de minimis* impact determination is for the park as a park and recreation resource.

Burlingame Park spans 3.24 acres and was deeded to the City of Portland by Multnomah County in 1927. The park is adjacent to I-5 and near SW Canby Street and SW 11th Avenue. Its character-defining features include:

- forested areas near I-5
- grass fields
- a play area
- paved and unpaved paths
- picnic tables
- a playground
- a soccer field
- a softball field
- street parking

### Project Assessment of Use

A related transportation improvement option for a pedestrian bridge would cross a corner of 4.6-acre Burlingame Park, but it would be away from major features and activity areas. Based on initial conceptual designs, the 14-foot-wide pedestrian bridge over I-5 and the northern end of the park would involve a permanent easement of approximately 440 square feet, most of which would be aerial but would have the potential for structural footings, depending on the bridge type, which is yet to be determined. The bridge landing and connections to SW Canby Street and SW 11th Avenue would be within the existing street right of way, but they could remove street trees buffering the park. A temporary construction area of approximately 360 square feet would be required for bridge construction (see Figure DD2-4). The bridge and any ground structural elements would not interfere, either temporarily or permanently, with the park's significant park and recreation activities, features and attributes listed above.

At the end of construction, affected areas would be restored to existing conditions or better, including tree replacement as required by the City of Portland Tree Code.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements, including a 30-day comment period that began on December 17, 2020, and a public meeting held on January 7, 2021, and through consultations with the City of Portland/Portland Parks and Recreation and receiving their written approvals, FTA has made a determination of *de minimis* impact for the proposed use of a corner of the park to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the park, and to modify park features in this area, as described above and summarized in Table DD2-4. The letter of concurrence from the City of Portland in Attachment DD1



further supports FTA's finding that the Project would not permanently adversely affect the features, attributes or activities that qualify Burlingame Park for protection by Section 4(f) as a park and recreation property.

**Table DD2-4. Burlingame Park**

| Character-Defining Feature                                     | Impact/No Impact |
|--|------------------|
| <b>Parks and Recreation Activities, Features or Attributes</b> |                  |
| Forested areas near I-5  | No impact        |
| Grass fields   | No impact        |
| A play area  | No impact        |
| Paved and unpaved paths  | No impact        |
| Picnic tables  | No impact        |
| A playground   | No impact        |
| A soccer field   | No impact        |
| A softball field   | No impact        |
| Street parking   | No impact        |

Figure DD2-4  
Burlingame Park



## DD2-5 FRONT AND CURRY COMMUNITY GARDEN

### Property Description

Located on the west side of the SW Naito Parkway frontage road, south of SW Curry Street, the Front and Curry Community Garden is owned and operated by Portland Parks and Recreation includes approximately 25 garden plot areas and a storage garage. The garden plots are the property's defining feature as a park and recreation resource. This temporary occupancy impact determination is for the park as a park and recreation resource.

### Section 4(f) Use Determination

FTA has determined the Project would meet Section 4(f) temporary occupancy requirements defined in 23 CFR 774.13(d), which includes the written approval of the City of Portland (Attachment DD1).

As shown in Figure DD2-5, the Project would require less than 0.01 acre of temporary construction area at the northeastern corner of Front and Curry Community Garden to accommodate a wider sidewalk. The area for this temporary activity is less than 1 percent of the 0.3-acre property. Construction activities would not interfere with the qualifying activities, features and attributes of the community garden (see Table DD2-5). The temporary construction easement at the park's northeastern corner would have no direct impacts or modifications affecting the park's interior. The Project would meet all applicable permitting requirements, including the replacement of trees in accordance with the City of Portland Tree Code requirements, as well as the City's non-park use permits. The area used for construction would be fully restored and returned to a condition as good as, or better than, what existed prior to the Project. The construction period affecting the park would be less than the overall duration of the project construction. Section 4(f) Use Evaluation for the Historic Property.

**Table DD2-5. Front and Curry Community Garden**

| Parks and Recreation Activities, Features or Attributes | Impact/No Impact |
|---|------------------|
| 25 garden plots   | No impact        |
| Storage garage  | No impact        |

Based on the above, FTA has determined the Project activity is not a Section 4(f) use because all of the following conditions defined in 23 CFR 774.13(d) have been met:

- The land use is of short duration (less than the time needed for the construction of the project)
- There will be no change in the City of Portland's ownership of the land
- The scope of the work will be minor
- There are no temporary or permanent adverse changes to the activities, features, or attributes of the Front and Curry Community Garden
- The land will be fully restored to a condition at least as good as prior to the Project



Figure DD2-5

Front and Curry Community Garden





## **DD2-6 GEORGE HIMES PARK**

### **Property Description**

George Himes Park lies between SW Capitol Highway, SW Terwilliger Boulevard and SW Barbur Boulevard. George Himes Park is owned and operated by the City of Portland/Portland Parks and Recreation, which acquired the park in 1903. This temporary occupancy impact determination is for the park as both a historic resource and a park and recreation resource.

### **Parks and Recreation Activities, Features and Attributes**

This City of Portland public park consists of 32.4 acres of steeply sloping forested natural area with paved and unpaved paths, picnic tables and hiking trails. One of the hiking trails (SW Trail #3) connects George Himes Park with the Willamette River and Willamette Park by passing into Oregon Department of Transportation (ODOT) right of way, under SW Barbur Boulevard at the site of the Newberry trestle bridge, and then under I-5 at SW Iowa Street. The section of SW Trail #3 in George Himes Park is also considered part of the planned Red Electric Regional Trail that would create a 16-mile bicycle and pedestrian route connecting the Tualatin and Willamette Rivers.

### **Historic Characteristics**

FTA has determined, through the Section 106 process, that George Himes Park meets minimum qualifications for listing in the NRHP under Criteria A (events affecting patterns of history). Although it was not specifically included in the Olmsted Brothers' 1903 plan for Portland parks, it shares a significant association with the influence of the Olmsted Brothers landscape architects and the City Beautiful movement on park planning and development in the City of Portland during the early 20th century. When viewed within the broader context of park and urban development in Portland, George Himes Park has potential to contribute to other thematic groupings and historic districts under Criteria A.

The park's current park boundary is recommended as the historic property boundary, with the slight amendment of including the 1935 stone marker that is immediately adjacent to the park's west boundary but is in the roadway right of way. Construction of modern amenities and minor alterations to trails for Americans with Disabilities Act (ADA) compliance has been relatively minimal. Contributing elements to the historic significance of the park and its setting include:

- its preserved natural landscape, through which trails pass that generally follow their historic-period alignment
- the stone marker with a dedication plaque installed in 1935 to honor George Himes

### **Section 4(f) Use Evaluation for the Park and Recreation Property**

FTA, with the written approval of the City of Portland, has determined that the Project would meet Section 4(f) temporary occupancy exception requirements defined in 23 CFR 774.13(d) (see Attachment DD1 Documentation of Consultation), which include the written approval of the City of Portland.

As shown in Figure DD2-6, the light rail alignment would be constructed east of George Himes Park along SW Barbur Boulevard. Immediately east of the park, a new elevated structure will replace the existing SW Newbury Street trestle bridge. To facilitate construction of the new elevated structure, a temporary construction area of approximately 5,770 square feet is needed at the park's eastern boundary near the

viaduct/trestle bridge. Trees and vegetation would also be removed within the temporary construction area, and the construction area would be closed to public access. The temporary occupancy would affect 0.4 percent of the park.

The eastern entrance to Trail #3 would be closed at the park's eastern border while the existing viaduct is removed and the new bridge structure is under construction, which may take several years. The rest of Trail #3 up into the park and connections to other trails would be maintained. The duration of bridge construction would be less than for the overall Project. The wooded hillside area affected by the tree and vegetation removal does not feature other trails or features actively used by the public, and construction activities would not interfere with the qualifying activities, features and attributes of the park (see Table DD2-6).

The area used for construction would be fully restored and returned to a condition as good as, or better than, what existed prior to the Project. The construction period affecting the park would be less than the overall duration of the project construction. With replanting and restoration commitments defined in a written agreement between the City of Portland and TriMet, the Project would provide compensation to the city, meet applicable permitting requirements for activities within park land, including tree and vegetation replacement, and would:

- restore the connecting trail to SW Trail #3 where it may be impacted by construction within ODOT right of way, including vegetation restoration
- restore and replant trees and vegetation removed in the construction area within the park, and restore the park hillside to the same condition or better than existing conditions, and be consistent with the City of Portland Tree Code
- contribute to the development of a George Himes Natural Resources Management Plan, along with other park-supporting measures agreed to by the city and TriMet to improve trails and manage the natural resource values of George Himes Park and adjacent parks and open spaces

#### **Section 4(f) Use Evaluation for the Historic Property**

The restoration of disturbed areas and the preservation of the natural topography would retain George Himes Park's historic characteristics as a park with a natural landscape. The introduction of light rail infrastructure along SW Barbur Boulevard would have direct and indirect effects on the historic setting of the park through an increase in noise, changes in circulation, and foreseeable long-term modifications to existing neighborhoods along the light rail alignment to accommodate transit-oriented development. However, potential increases in noise and visual intrusion that the park would experience would be limited to its far eastern corner and would be buffered by the park's existing vegetation. Through the Section 106 process, FTA has determined that the Project would have no adverse effect on George Himes Park, and SHPO has concurred in writing.

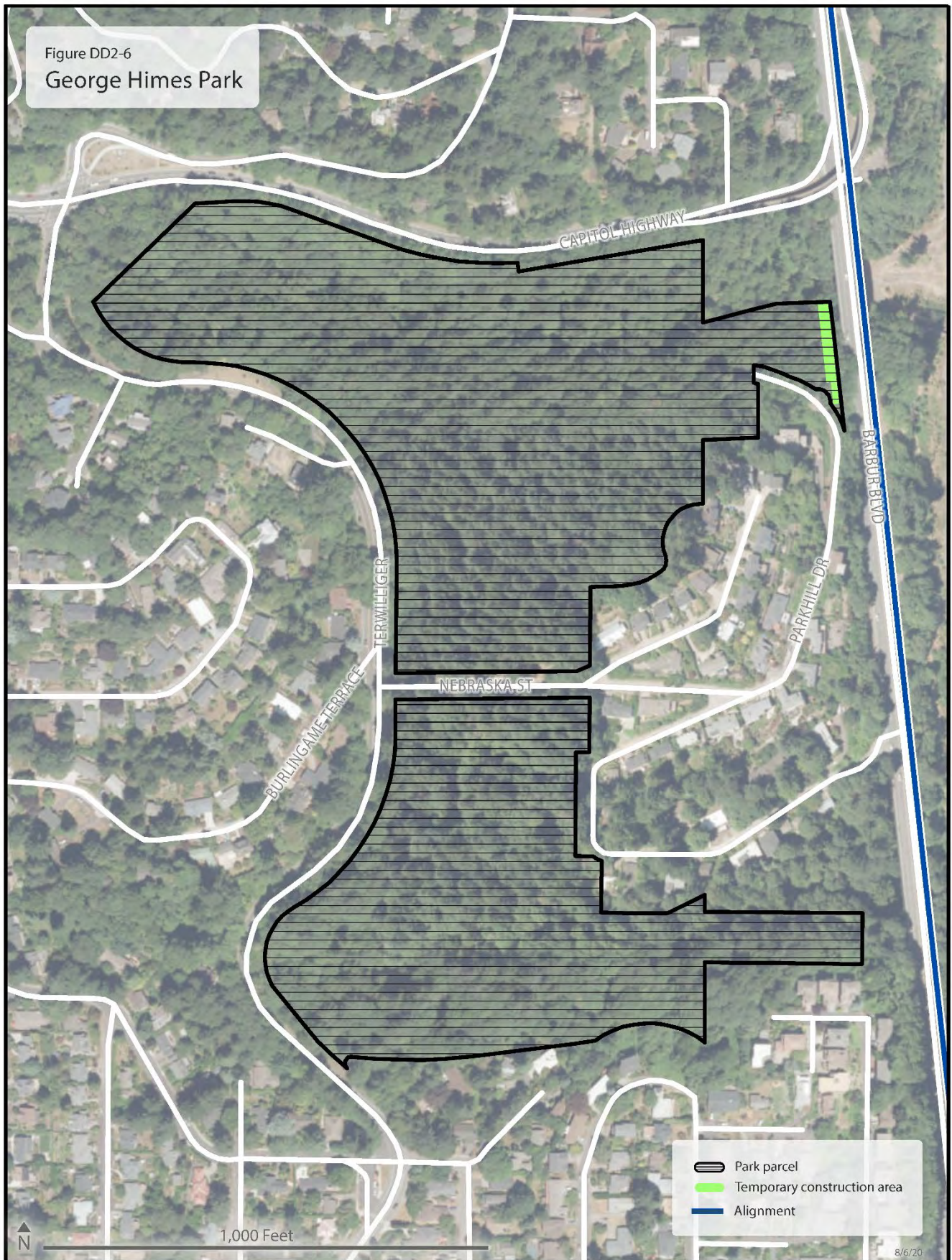
Based on the above, FTA has determined that the Project would meet Section 4(f) temporary occupancy requirements defined in 23 CFR 774.13(d). Attachment DD1 provides documentation on FTA's consultations with the SHPO.

## **Section 4(f) Use Determination for George Himes Park**

Based on the above, FTA has determined the project activity is not a Section 4(f) use because all of the following conditions defined in 23 CFR 774.13(d) have been met:

- The land use is of short duration (less than the time needed for the construction of the Project).
- There will be no change in the City of Portland's ownership of the land.
- The scope of the work will be minor.
- There are no temporary or permanent adverse changes to the activities, features, or attributes of George Himes Park, as either a parks and recreational property or as an historic property.
- The land will be fully restored to a condition at least as good as prior to the Project.
- There is documented agreement with the City of Portland/Parks and Recreation and the SHPO, which have jurisdiction over the property, regarding the above conditions.

Figure DD2-6  
George Himes Park





**Table DD2-6. George Himes Park**

| Character-Defining Feature                                     | Impact/No Impact  |
|--|---|
| <b>Parks and Recreation Activities, Features or Attributes</b> |   |
| Forested natural area with paved and unpaved paths             | No impact   |
| Picnic tables  | No impact   |
| Hiking trails  | No impact   |
| SW Trail #3  | No impact within the park; partial change in access due to closure of ODOT property providing an eastern connection, but trail would otherwise remain open in the park from other access points. TriMet would provide funds to the City of Portland for trail system planning and improvement purposes. |
| <b>Historic Characteristics</b>                                |   |
| Preserved natural landscape                                    | No impact   |
| 1935 Stone Marker  | No impact   |

Note: ODOT = Oregon Department of Transportation; TriMet = Tri-County Metropolitan Transportation District of Oregon.

## DD2-7 SYLVANIA NATURAL AREA PARK

### Property Description

Sylvania Natural Area Park is owned and operated by the City of Portland/Portland Parks and Recreation. The park is located on the south side of SW Capitol Highway, west of SW 53rd Avenue. The City of Portland acquired the 2.7-acre forested park in 2002. It contains two paths that provide access through the park from the streets that surround it. The Portland Community College Sylvania campus (PCC-Sylvania) routinely uses the park as an outdoor classroom. This temporary occupancy impact determination is for the park as a park and recreation resource.

### Section 4(f) Use Determination

FTA, with the written approval of the City of Portland, has determined that the Project would meet Section 4(f) temporary occupancy requirements defined in 23 CFR 774.13(d) (see Attachment DD1 Records of Consultation), which include the written agreement from the City of Portland.

As shown in Figure DD2-7, the Project would temporarily occupy approximately 1,170 square feet (0.03 acre), or less than 1.0 percent, of the park, allowing the reconstruction of the street with sidewalks. The majority of the construction would be within the existing SW 53rd Avenue right of way. Temporary construction impacts would be limited to vegetation and tree removal along the border of the park. There would be temporary restrictions in access from SW 53rd Avenue to one of the park's trail entrances, but all other park trail entrances would remain open. Construction activities would not interfere with the qualifying activities, features and attributes of the park.

The Project would meet all applicable City of Portland permitting requirements, including the replacement of trees in accordance with the City of Portland Tree Code requirements, as well as the city's non-park use permits. The Project also commits to install a Portland Parks and Recreation identification sign at SW 53rd Avenue. The area used for construction would be fully restored and returned to a condition as good as, or better than, what existed prior to the Project. The construction period affecting the park would be less than the overall duration of the project construction.

**Table DD2-7. Sylvania Natural Area Park**

| Parks and Recreation Activities, Features or Attributes | Impact/No Impact |
|---|------------------|
| Two unpaved paths                                       | No impact        |
| Natural area  | No impact        |

Based on the above, FTA has determined the Project activity is not a Section 4(f) use because all of the following conditions defined in 23 CFR 774.13(d) have been met:

- The land use is of short duration (less than the time needed for the construction of the project).
- There will be no change in the City of Portland's ownership of the land.
- The scope of the work will be minor.
- There are no temporary or permanent adverse changes to the activities, features, or attributes of the Sylvania Natural Area Park.

- The land will be fully restored to a condition at least as good as prior to the Project.
- There is documented agreement with the City of Portland/Parks and Recreation, which has jurisdiction over the property, regarding the above conditions.

Figure DD2-7  
Sylvania Natural Area Park





## DD2-8 DUNIWAY PLAZA, 2400 SW FOURTH AVENUE, PORTLAND

### Property Description

Duniway Plaza, located at 2400 SW Fourth Avenue in Portland, was constructed in 1966 as part of the South Auditorium Urban Renewal Project. FTA has determined the plaza is eligible for listing in the NRHP under Criteria A and C. Under Criteria A, events affecting the patterns of history, the building is eligible for listing in the NRHP for its association with the South Auditorium Urban Renewal Project, which was undertaken by the City of Portland during the 1950s and 1960s. Under Criteria C, Duniway Plaza is highly representative of its type and period of construction. Character-defining features that contribute to the historical significance of the property include its placement and relationship within the South Auditorium Urban Renewal Area, period light fixtures and the building's balanced design, which blends brick and concrete, and horizontal and vertical elements.

### Project Assessment of Use

The new light rail trackway would be elevated in the vicinity of Duniway Plaza to facilitate a crossing of Interstate 405 (I-405). The new bridge structure would begin north of I-405 and would terminate on SW Barbur Boulevard, at Duniway Park. The light rail alignment would cross through the parcel immediately west and across from SW Fourth Avenue from Duniway Plaza. At the southwestern corner of the Duniway Plaza property, a partial right of way acquisition (88 square feet) and temporary construction easement (356 square feet) are proposed to facilitate new sidewalk construction at the intersection of SW Sheridan Street and SW Fourth Avenue (see Figure DD2-8). This corner of the property is sparsely landscaped, with shrubs planted in an area bounded by a curb.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the use of a portion of the Duniway Plaza to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, Duniway Plaza would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project, because its main access is to the east. Once the Project is constructed, the building would continue to retain its character-defining features. The building would remain strongly associated with the South Auditorium Urban Renewal Project and would retain distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at Duniway Plaza to facilitate sidewalk construction, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of Duniway Plaza. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. This Final Environmental Impact Statement (EIS) has not identified significant unmitigated impacts that would

potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-8

## Duniway Plaza

Map ID 1 - 2400 SW 4th Ave., Portland



## DD2-9 MARQUAM PLAZA, 2525 SW THIRD AVENUE, PORTLAND

### Property Description

FTA has determined Marquam Plaza, located at 2525 SW Third Avenue, is eligible for listing in the NRHP under Criteria A (events affecting the pattern of history) for its important association with the South Auditorium Urban Renewal Project in Portland, and under Criteria C because it is highly representative of its type and period of construction. Marquam Plaza was constructed in 1965 as part of the South Auditorium Urban Renewal Project.

Character-defining features that contribute to the historical significance of the property and its setting include its placement within the South Auditorium Urban Renewal Area, in addition to its horizontally framed window walls, masonry elements and exposed structural columns.

### Project Assessment of Use

The new light rail trackway would be elevated on SW Barbur Boulevard as it approaches Marquam Plaza from the northwest. This new elevated structure would facilitate the crossing of I-405, and would terminate on SW Barbur Boulevard between Marquam Plaza and Duniway Park. To accommodate this new elevated structure, SW Barbur Boulevard would be widened, new vehicle travel lanes would be added, and a new sidewalk would be constructed with a retaining wall on what is now a grass-covered slope in the western portion of the Marquam Plaza property boundary. A partial acquisition of right of way (4,729 square feet), a permanent easement (2,383 square feet) and a temporary construction easement (2,398 square feet) are proposed at the property to facilitate project construction. Together, these represent a 42-foot-wide strip at the property's western edge that consists of a grass-covered slope and a parking lot (see Figure DD2-9).

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the Marquam Plaza to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, Marquam Plaza would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would remain strongly associated with the South Auditorium Urban Renewal Project and would retain distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and temporary and permanent construction easements at Marquam Plaza to facilitate sidewalk and retaining wall construction, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of Marquam Plaza. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The

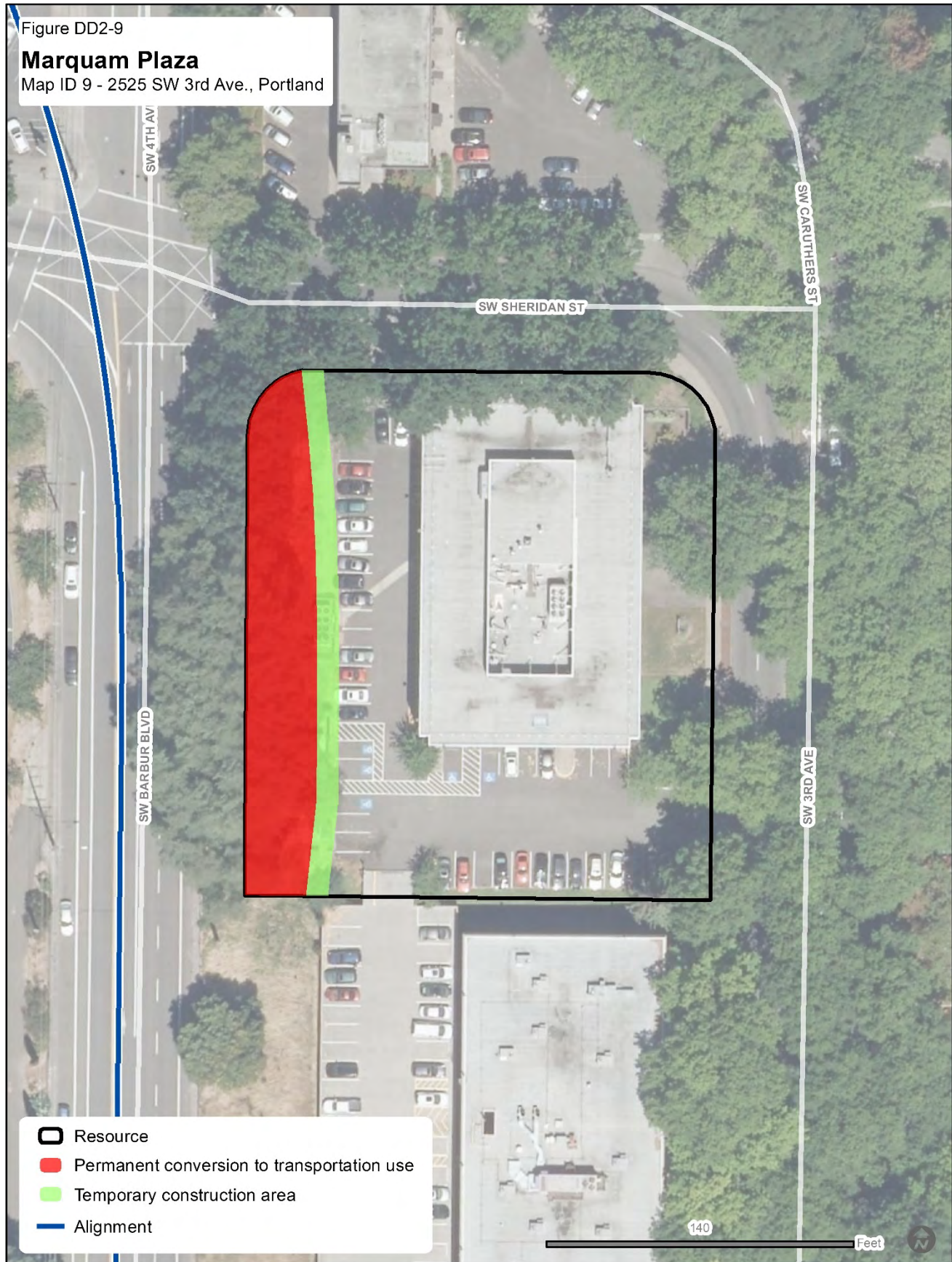


Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-9

## Marquam Plaza

Map ID 9 - 2525 SW 3rd Ave., Portland



## DD2-10 MARQUAM II 2611 SW THIRD AVENUE, PORTLAND

### Property Description

FTA has determined Marquam II, located at 2611 SW Third Avenue, is eligible for listing in the NRHP under Criteria A (events affecting the pattern of history) for its association with the South Auditorium Urban Renewal Project in Portland, and under Criteria C for its type and period of construction.

Character-defining features that contribute to the historical significance of the property and its setting include its horizontal orientation, exposed structural columns, inset glass lobby, recessed windows, the integrated parking area adjacent to the lobby and the building's placement within the South Auditorium Urban Renewal Area.

### Project Assessment of Use

To accommodate new light rail infrastructure, SW Barbur Boulevard would be widened immediately adjacent to and uphill from Marquam II. A new sidewalk with a retaining wall would be constructed on what is now a grass-covered slope in the western portion of the Marquam II property boundary; a partial acquisition of right of way (2,878 square feet), a permanent easement (2,304 square feet), and a temporary construction easement (2,304 square feet) are proposed to complete this work. This area proposed for acquisition and easements accounts for the western 32 feet of the property (see Figure DD2-10). The grade separation between SW Barbur Boulevard above and Marquam II below would limit the visibility of the Project from the historic property.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of Marquam II to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, Marquam II would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would remain strongly associated with the South Auditorium Urban Renewal Project and would retain distinctive features of its type and period of construction. Sidewalk and retaining wall construction would abut a circa 1990 parking structure that does not contribute to the historical significance of the property, and the parking structure would not be impacted or removed.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and temporary and permanent construction easements at Marquam II to facilitate sidewalk and retaining wall construction, in addition to the completion of the elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of Marquam II. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the

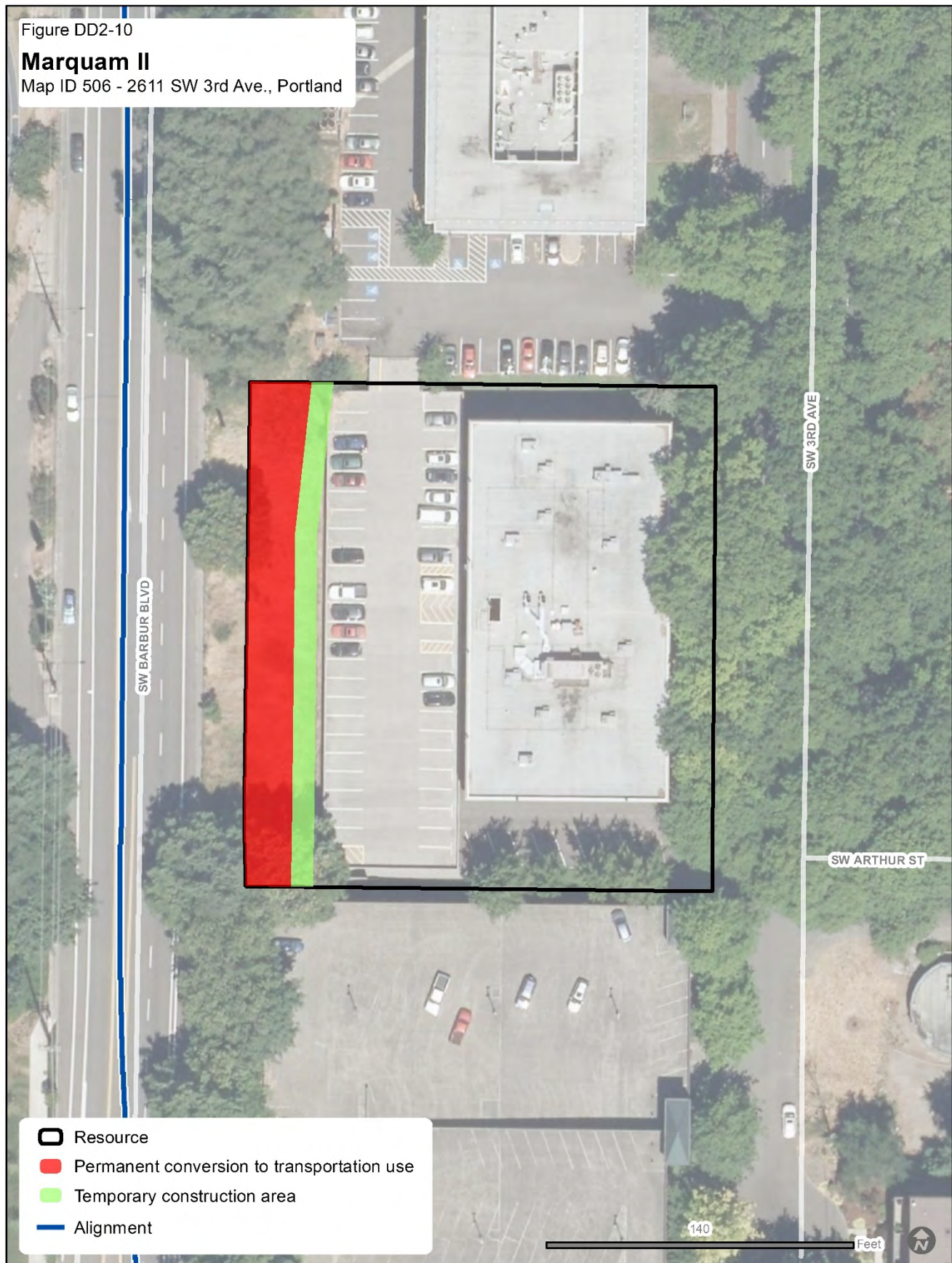
SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-10

## Marquam II

Map ID 506 - 2611 SW 3rd Ave., Portland



## DD2-11 3926 SW WATER AVENUE, PORTLAND

### Property Description

FTA has determined the house at 3926 SW Water Avenue, located immediately east of SW Barbur Boulevard, is eligible for listing on the NRHP under Criteria C (type, period or method of construction). A 1908 Craftsman bungalow, the house has adequate historical integrity to embody distinctive characteristics of its type and period of construction.

Character-defining features that contribute to the historical significance of the property include its full-width porches with square wood columns, original wood windows and shingle cladding, knee brackets and exposed rafter ends.

### Project Assessment of Use

To facilitate sidewalk and curb construction on SW Water Avenue, a partial acquisition of about 17 square feet of right of way and a temporary construction easement of about 163 square feet are proposed at the northwestern corner of the parcel (see Figure DD2-11). The acquisition and easement would not lead to any physical modifications to the historic house but may impact vegetation on the parcel. Within the vicinity of the house, SW Barbur Boulevard would be widened to facilitate construction of light rail infrastructure, and SW Barbur Boulevard's intersection with SW Water Avenue would be reconstructed.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 3926 SW Water Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, 3926 SW Water Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 3926 SW Water Avenue to facilitate the completion of the proposed light rail structure on the block immediately west would have no adverse effect on the significant historic characteristics of 3926 SW Water Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-11

**3926 SW Water Avenue, Portland**

Map ID 27 - 3926 SW Water Avenue, Portland



## DD2-12 3605 SW CONDOR AVENUE, PORTLAND

### Property Description

FTA has determined the house at 3605 SW Condor Avenue is eligible for listing in the NRHP under Criteria C (type, period or method of construction). Constructed in the Colonial Revival style circa 1905, the house is highly representative of its period of construction.

Character-defining features that contribute to the historical significance of the property include the house's Colonial Revival decoration, the gambrel roof, wood sash windows and exterior cladding.

### Project Assessment of Use

The Project proposes to widen SW Barbur Boulevard adjacent to the house at 3605 SW Condor Avenue, to accommodate construction of light rail trackway and new sidewalks. A stairway with a retaining wall is proposed for construction at the eastern edge of the historic property boundary. The stairway would connect newly constructed sidewalks along SW Barbur Boulevard with the existing sidewalk on SW Condor Avenue, which is elevated above the road grade and has a poured concrete retaining wall. This would necessitate construction of a new section of retaining wall where the stairway meets the existing sidewalk at SW Condor Avenue.

To facilitate construction of this new stairway and associated retaining wall at 3605 SW Condor Avenue, an acquisition (104 square feet), a permanent easement (225 square feet), and a temporary construction easement (343 square feet) are proposed (see Figure DD2-12). It is assumed that project construction would avoid impacting most, if not all, of the existing stone retaining wall at this property. The setting of the house would be affected by the construction of the light rail trackway and associated infrastructure, in addition to the realignment of the intersection of SW Barbur Boulevard and SW Naito Parkway.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 3605 SW Condor Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the property at 3605 SW Condor Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and temporary and permanent construction easements at 3605 SW Condor Avenue to facilitate stairway and retaining wall construction, in addition to the completion of an elevated light rail structure on the block immediately east, would have no adverse effect on the significant historic characteristics of 3605 SW Condor Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes



in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-12

**3605 SW Condor Avenue, Portland**

Map ID 43 - 3605 SW Condor Ave., Portland



## DD2-13 218-220 SW HAMILTON STREET, PORTLAND

### Property Description

FTA has determined the house at 218-220 SW Hamilton Street meets the minimum qualifications for listing in the NRHP under Criteria C (type, period or method of construction). It retains distinctive characteristics of a Folk Victorian shotgun house, and it possesses adequate historical integrity to be representative of its type and period of construction.

Character-defining features that contribute to the historical significance of the house include its shotgun form and its Victorian-era decoration.

### Project Assessment of Use

At 218-220 SW Hamilton Street, the Project proposes a 10-square-foot permanent easement and 81-square-foot temporary construction easement to facilitate the widening of SW Barbur Boulevard (see Figure DD2-13). The easements are proposed behind (south of) the house, on a sloping landform, for the construction of the new light rail trackway. Within the viewshed of the house at 218-220 SW Hamilton Street, the new light rail trackway would be constructed along SW Barbur Boulevard, and the road would be widened to accommodate the trackway.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 218-220 SW Hamilton Street to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the properties at 218-220 SW Hamilton Street would retain their character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and temporary and permanent construction easements at 218-220 SW Hamilton Street, to facilitate the completion of the new light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of 218-220 SW Hamilton Street. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-13

**218-220 SW Hamilton Street, Portland**

Map ID 62 - 218-220 SW Hamilton St., Portland





## DD2-14 4145 SW CORBETT AVENUE, PORTLAND

### Property Description

FTA has determined the house at 4145 SW Corbett Avenue is eligible for listing in the NRHP under Criteria C (type, period or method of construction). The house embodies distinctive characteristics of its type and period of construction, meeting the minimum qualifications to be eligible for listing under Criteria C. Despite changes that have occurred to the immediate setting of the house's western (rear) elevation, the house retains integrity in location, design, materials, workmanship, feeling and association.

Character-defining features that contribute to the historical significance of the property include its New Formalist style and original materials, which include precast concrete columns and poured concrete retaining wall and curbs.

### Project Assessment of Use

The Project would require a partial acquisition of approximately 177 square feet and a temporary easement of approximately 225 square feet from the property's western edge to facilitate sidewalk construction along SW Barbur Boulevard (see Figure DD2-14). The permanent acquisition of right of way would result in the loss of a strip of land from the rear (western edge) of the property about 4 feet in width. Within this acquisition area, which abuts SW Barbur Boulevard, a hedge would be removed. Within the viewshed of the property (a block west), SW Barbur Boulevard would be widened to accommodate new light rail infrastructure.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 4145 SW Corbett Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the property at 4145 SW Corbett Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

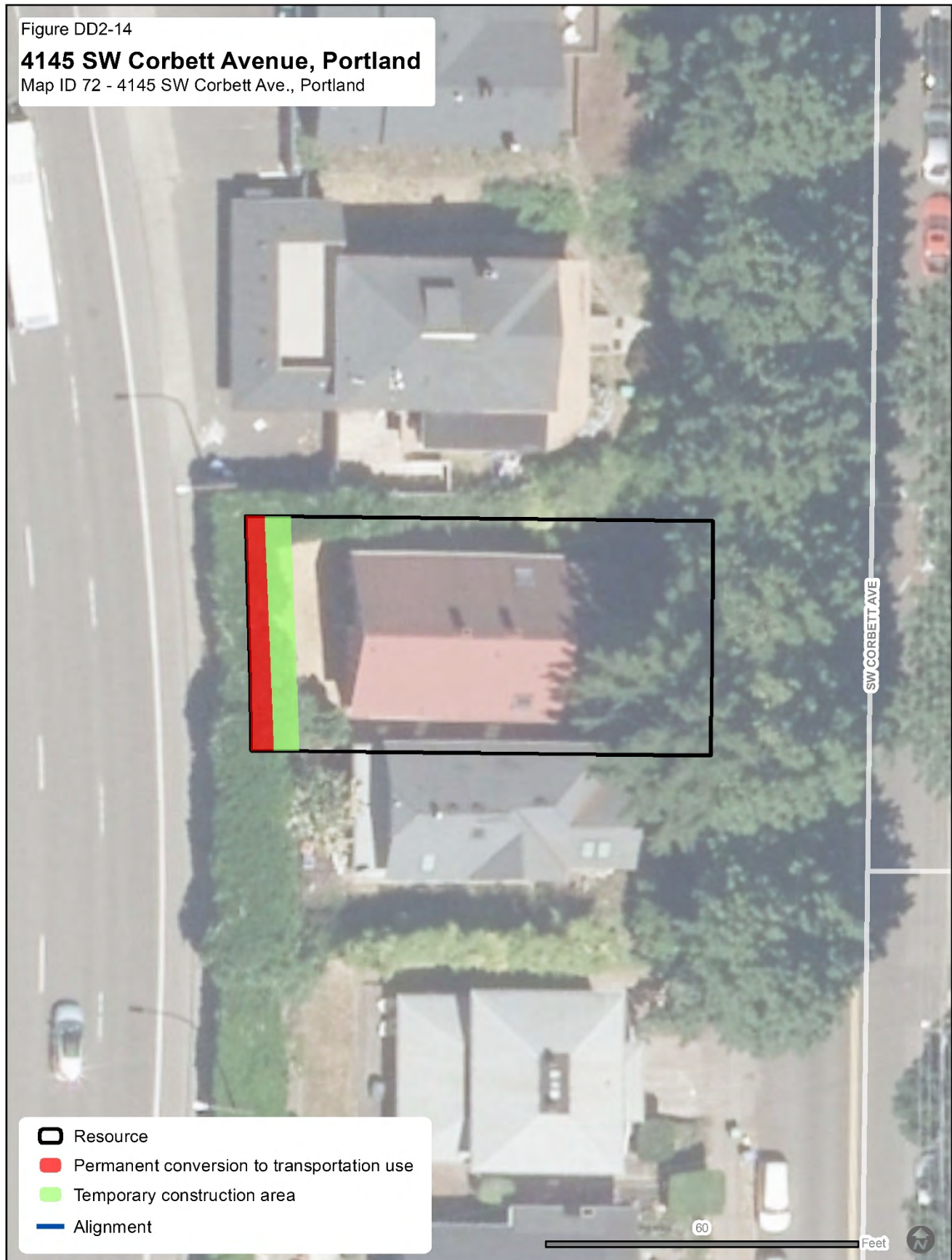
Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 4145 SW Corbett Avenue to facilitate sidewalk construction, in addition to the completion of light rail trackway on the block immediately west, would have no adverse effect on the significant historic characteristics of 4145 SW Corbett Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-14

**4145 SW Corbett Avenue, Portland**

Map ID 72 - 4145 SW Corbett Ave., Portland



## DD2-15 4205 SW CORBETT AVENUE, PORTLAND

### Property Description

FTA has determined the house at 4205 SW Corbett Avenue is eligible for listing in the NRHP under Criteria C (type, period or method of construction), because it embodies distinctive characteristics of its type and period of construction. A good example of a Queen Anne residence constructed in the local area towards the end of the 19th century, the house retains sufficient integrity to convey this association despite the construction of a new front porch and garage at the east façade between 1909 and 1950.

Character-defining features that contribute to the historical significance of the house include its wood siding and fish-scale shingles, the dominant front-facing gable and bay projection, and decorative architectural features that are typical of the Queen Anne style.

### Project Assessment of Use

The Project would require a partial acquisition of 203 square feet and temporary construction easement of 225 square feet from the western edge of the property (see Figure DD2-15). This acquisition and easement would facilitate sidewalk construction along SW Barbur Boulevard, which would be widened to accommodate new light rail infrastructure. An established hedge that extends the length of the property's western boundary would be removed as part of the Project. The hedge provides a buffer between the house at 4205 SW Corbett Avenue and SW Barbur Boulevard to the west.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 4205 SW Corbett Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the property at 4205 SW Corbett Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

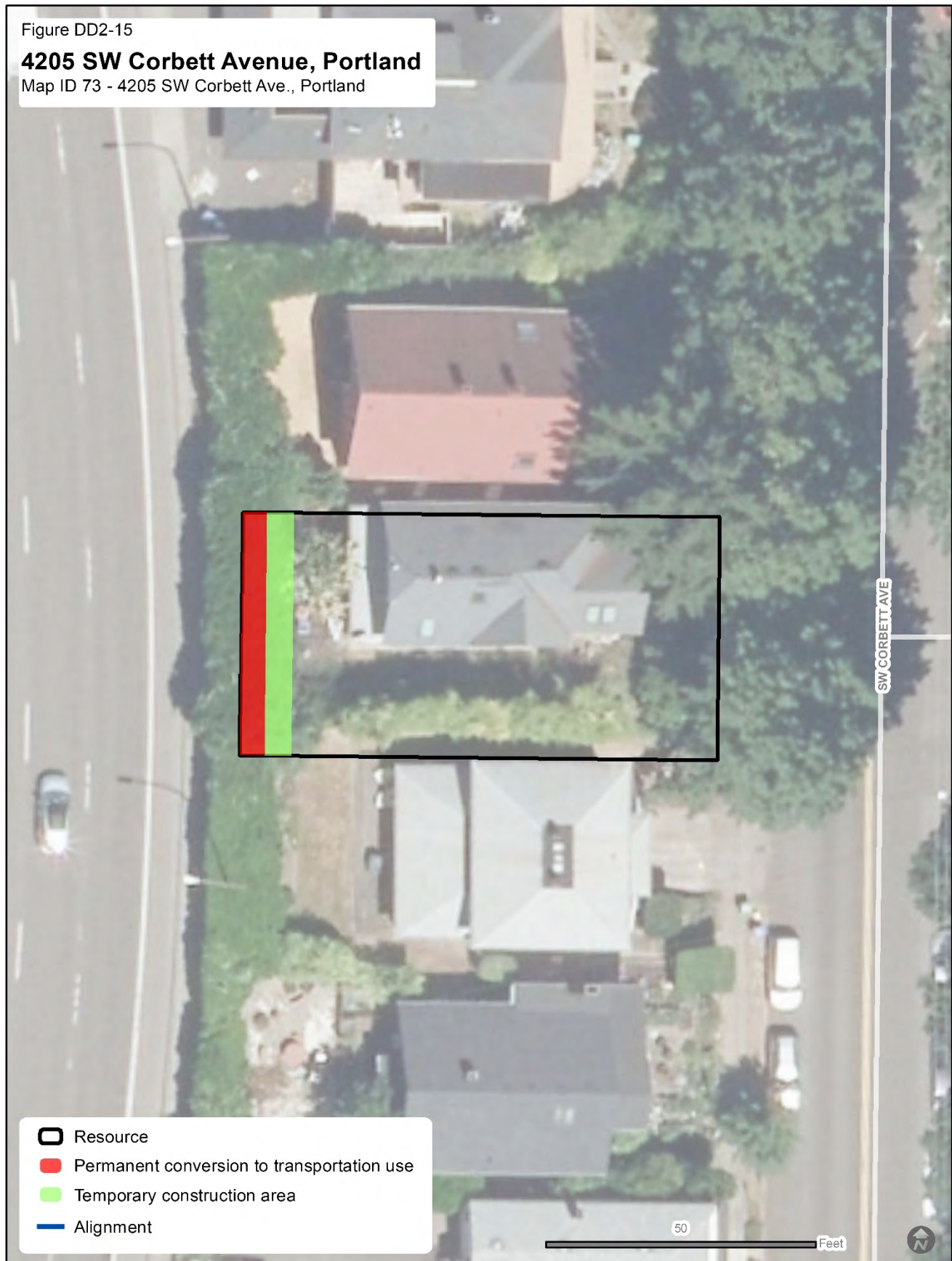
Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 4205 SW Corbett Avenue to facilitate sidewalk construction, in addition to the completion of an elevated light rail structure on the block immediately east on SW Barbur Boulevard, would have no adverse effect on the significant historic characteristics of 4205 SW Corbett Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-15

**4205 SW Corbett Avenue, Portland**

Map ID 73 - 4205 SW Corbett Ave., Portland





## **DD2-16 4215-4217 SW CORBETT AVENUE, PORTLAND**

### **Property Description**

FTA has determined the property at 4215-4217 SW Corbett Avenue is eligible for listing in the NRHP under Criteria C (type, period or method of construction). A duplex constructed in a modest iteration of the Italianate architectural style, the building embodies distinctive characteristics of its type and period of construction.

Character-defining features that contribute to the historical significance of the property include the bracketed cornice below the hip roof, pilasters at each end of the east façade and Tuscan columns at the east façade entry porch.

### **Project Assessment of Use**

Along the western boundary of the property at 4215-4217 SW Corbett Avenue, the Project would require a partial acquisition of 195 square feet and a temporary construction easement of 250 square feet (see Figure DD2-16). Within the viewshed of the property (on the block to the west), SW Barbur Boulevard would be widened to accommodate new light rail infrastructure.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 4215-4217 SW Corbett Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the property at 4215-4217 would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

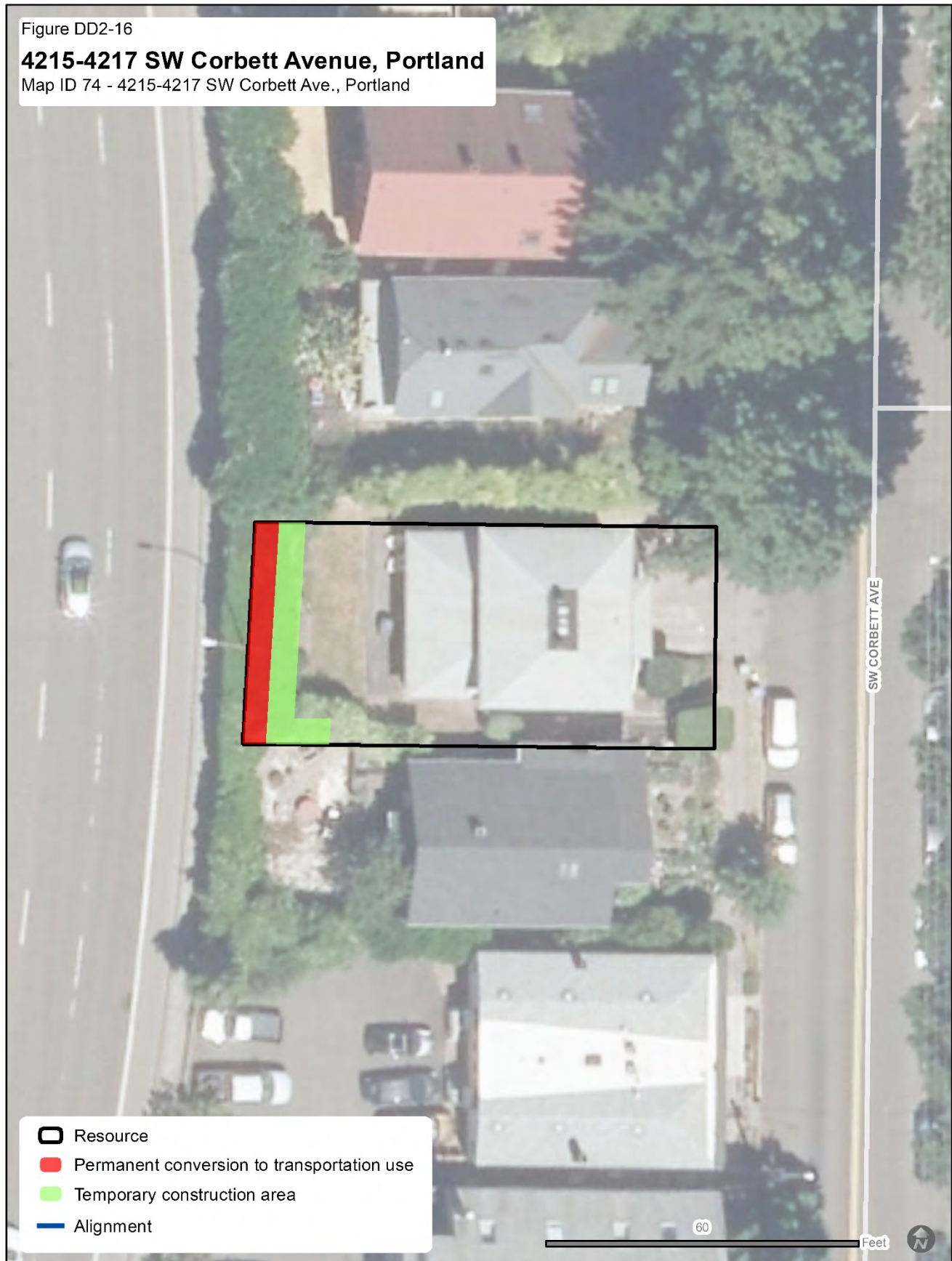
While acquisition of right of way and a temporary construction easement could require removal of a hedge that currently buffers the rear (western edge) of the property from SW Barbur Boulevard, the hedge does not contribute to the building's historical significance under Criteria C. Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 4215-4217 SW Corbett Avenue to facilitate construction of the light rail structure on the block immediately west would have no adverse effect on the significant historic characteristics of 4215-4217 SW Corbett Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-16

**4215-4217 SW Corbett Avenue, Portland**

Map ID 74 - 4215-4217 SW Corbett Ave., Portland



## DD2-17 4231-4237 SW CORBETT AVENUE, PORTLAND

### Property Description

FTA has determined the property at 4231-4237 SW Corbett Avenue is eligible for listing in the NRHP. Under Criteria C (type, period or method of construction), the building embodies distinctive characteristics of its type and period of construction. Built along the North & South Portland Line streetcar in 1906, the building is one of few remaining streetcar commercial buildings on SW Corbett Avenue, and it was the only such building documented for the Project that retains adequate integrity to convey this association.

Character-defining features that contribute to the historical significance of the building include its continued commercial use and double storefront design, which features paired entry doors with transoms, large storefront windows and articulated bulkheads.

### Project Assessment of Use

A partial acquisition of 239 square feet, a permanent easement of 176 square feet, and a temporary construction easement of 255 square feet are proposed at the western boundary of the property at 4231-4237 SW Corbett Avenue (see Figure DD2-17). The acquisition and easements would facilitate construction of light rail infrastructure along SW Barbur Boulevard, and would result in the removal of a tree from the property's western edge and a slight loss in parking area. SW Barbur Boulevard would be widened within the viewshed of the building, and the intersection of SW Barbur Boulevard and SW Bancroft Street would be improved. An existing driveway that provides access to the building's parking lot from SW Bancroft Street to the south would be maintained.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 4231-4237 SW Corbett Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the property at 4231-4237 SW Corbett Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

The acquisition and easements proposed at the property's western boundary would result in a slight loss of parking area, but they will not alter the building or its character-defining features that contribute to its significance under Criteria C. Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features and its parking area and commercial functionality.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 4231-4237 SW Corbett Avenue to facilitate the completion of the light rail structure along SW Barbur Boulevard would have no adverse effect on the significant historic characteristics of 4231-4237 SW Corbett Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not

identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-17

**4231-4237 SW Corbett Avenue, Portland**

Map ID 76 - 4231-4237 SW Corbett Ave., Portland



## **DD2-18 TABERNACLE SEVENTH-DAY ADVENTIST CHURCH, 26 SW CONDOR WAY, PORTLAND**

### **Property Description**

FTA has determined the Tabernacle Seventh-Day Adventist Church at 26 SW Condor Way meets the minimum qualifications to be eligible for listing in the NRHP under Criteria C (type, period or method of construction). The building embodies distinctive characteristics of Expressionist design and possesses adequate historical integrity to be representative of its type and period of construction.

Character-defining features that contribute to the historical significance of the property include its complex roofline of intersecting and overlapping gables, steeples clad with standing seam metal, stained glass windows, clerestory windows and ornamental pebbledash cladding.

### **Project Assessment of Use**

Within the historic property boundary of the Tabernacle Seventh-Day Adventist Church, the Project proposes a partial acquisition of 64 square feet and a temporary construction easement of 467 square feet (see Figure DD2-18). The acquisition and easement would facilitate widening SW Barbur Boulevard to accommodate the new light rail alignment. The church's associated parking lot, which is north and outside of the historic property boundary, would be fully acquired for the Project. Within the viewshed of the church, commercial buildings at 4440 SW Barbur Boulevard and 4525 SW Condor Avenue would be demolished to construct a bus stop and a stormwater basin. Retaining walls would be constructed, sidewalks would be reconstructed, and curb bump-outs would be built at the improved intersection of SW Barbur Boulevard and SW Hamilton Street.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the Tabernacle Seventh-Day Adventist Church to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Tabernacle Seventh-Day Adventist Church would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at Tabernacle Seventh-Day Adventist Church to facilitate bus stop and stormwater basin construction, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of Tabernacle Seventh-Day Adventist Church. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts

that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-18

# **Tabernacle Seventh-day Adventist Church**

Map ID 83 - 26 SW Condor Way, Portland





## DD2-19 4820 SW BARBUR BOULEVARD, PORTLAND

### Property Description

FTA has determined the Town & Country Apartments at 4820 SW Barbur Boulevard meet minimum qualifications for listing in the NRHP under Criteria C (type, period or method of construction).

Landscaping on the property appears to have changed over time and does not contribute to the eligibility of the apartment complex.

Character-defining features that contribute to the historical significance of the apartment complex include the building's flat roofs, rectangular massing, cantilevered walkways, original window and cladding materials, and continued use of the buildings as part of an apartment complex.

### Project Assessment of Use

The Project proposes a partial acquisition of approximately 7,311 square feet, a temporary construction easement of approximately 1,944 square feet, and a permanent easement of about 67 square feet western edge of 4820 SW Barbur Boulevard, along SW Barbur Boulevard (see Figure DD2-19). The acquisition and easements would facilitate the widening of SW Barbur Boulevard to accommodate the light rail trackway and bicycle lanes, and would allow for the construction of a new bus stop for northbound lanes on the east side of the roadway. Access to the apartment complex would be reconfigured because a new traffic light would be installed on SW Barbur Boulevard and a new driveway would be built to access both the Town & Country Apartments and the Rasmussen Village apartments to the south. A smaller driveway would be constructed at the property's northwestern corner, and the existing driveway near the center of the property's western edge would be replaced with a new sidewalk.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the Town & Country Apartments to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Town & Country Apartments at 4820 SW Barbur Boulevard would retain their character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at the Town & Country Apartments to facilitate bicycle lanes and a bus stop, in addition to the completion of the light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of the Town & Country Apartments. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the

SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-19

**4820 SW Barbur Boulevard, Portland**

Map ID 89 - 4820 SW Barbur Blvd., Portland



## DD2-20 5910 SW RALSTON DRIVE, PORTLAND

### Property Description

The Tudor Revival house at 5910 SW Ralston Drive is situated northwest of and above the intersection of SW Barbur Boulevard and SW Capitol Highway. It has limited public access and is blocked from most views by dense vegetation. FTA has determined the Tudor Revival house is eligible for listing in the NRHP under Criteria C (type, period or method of construction). The house's integrity of setting has been diminished by the construction of I-5 to the east in 1961 and the construction of an overcrossing of SW Capitol Highway at SW Barbur Boulevard in 1959.

Character-defining features that contribute to the historical significance of the house include its Tudor Revival form and decoration, which includes the steeply pitched roof, imitation half-timbering and period construction materials.

### Project Assessment of Use

At 5910 SW Ralston Drive, a partial acquisition of less than 3 square feet is proposed at the property's southeastern corner, and a temporary construction easement of 524 square feet is proposed at the property's southern boundary (see Figure DD2-20). The acquisition and easement would facilitate road improvements along SW Capitol Highway, just west of SW Barbur Boulevard. Within the eastern viewshed of the house, the new light rail trackway would be constructed along SW Barbur Boulevard, and the SW Newbury Street trestle bridge, which is located southeast of the house, would be replaced with a new bridge structure.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 5910 SW Ralston Drive to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Tudor Revival house would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 5910 SW Ralston Drive to facilitate the light rail structure on the block immediately east would have no adverse effect on the significant historic characteristics of 5910 SW Ralston Drive. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-20

**5910 SW Ralston Drive, Portland**

Map ID 95 - 5910 SW Ralston Dr., Portland



## **DD2-21 9803 SW BARBUR BOULEVARD (MASTER WRENCH), PORTLAND**

### **Property Description**

FTA has determined the circa 1940 service station located at 9803 SW Barbur Boulevard is eligible for listing on the NRHP under Criteria A (events affecting patterns in history) and C (type, period or method of construction). It is representative of typical automotive-related development along Pacific Highway (SW Barbur Boulevard), because it embodies distinctive characteristics of its type and period of construction (Criteria C). The circa 1940 service station retains integrity of location, design, materials, workmanship, feeling and association.

Character-defining features that contribute to the historical significance of the property include its box-type service station design, which is associated with early highway culture and the standardization of automotive-related facilities, and its representation of typical automotive-related development along Pacific Highway (SW Barbur Boulevard) that embodies the distinctive characteristics of its type and period of construction.

### **Project Assessment of Use**

The light rail trackway would be constructed south of the service station at 9803 SW Barbur Boulevard; associated infrastructure that will be constructed within the southern viewshed of the service station includes a park and ride on the south side of SW Barbur Boulevard (where the current Barbur Transit Center is located) and an elevated crossing of I-5. New curbing and sidewalks would be constructed at the intersection of SW Barbur Boulevard and SW Taylors Ferry Road. A retaining wall is proposed for construction that would support a sidewalk section along the southeastern border of the property. Partial acquisitions totaling approximately 10 square feet, a permanent easement of approximately 81 square feet, and temporary construction easements totaling 233 square feet are required from the property to construct the sidewalk and associated retaining wall (see Figure DD2-21). The acquisitions and easements are proposed at the southern end of the property, adjacent to where a modern sidewalk and bioswale were constructed circa 2015.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 9803 SW Barbur Boulevard to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the property at 9803 SW Barbur Boulevard would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 9803 SW Barbur Boulevard to facilitate construction of the light rail structure, an associated park and ride facility in place of the existing Barbur Transit Center, a retaining wall and an elevated crossing over I-5 would have no adverse effect on the significant historic characteristics of

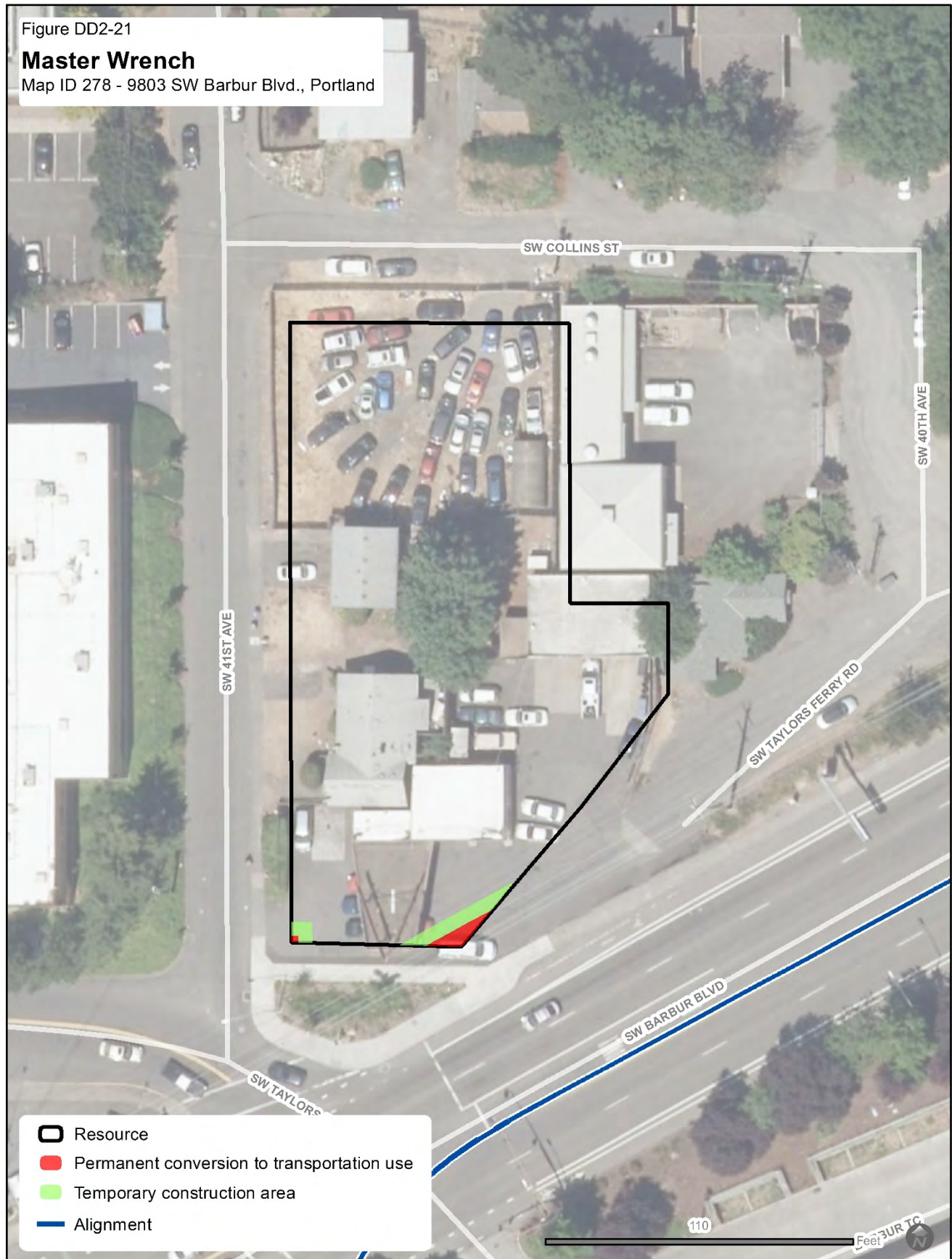
9803 SW Barbur Boulevard. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-21

## Master Wrench

Map ID 278 - 9803 SW Barbur Blvd., Portland





## DD2-22 ORIGINAL PANCAKE HOUSE, 8601 SW 24TH AVENUE, PORTLAND

### Property Description

FTA has determined the Original Pancake House at 8601 SW 24th Avenue meets the minimum qualifications for listing in the NRHP under Criteria A (events affecting the patterns of history). The property is associated with the history of commercial development along SW Barbur Boulevard during the mid-20th century, and is also associated with the history of the restaurant industry in Portland, because it is the first location of The Original Pancake House chain of restaurants (Criteria A).

Character-defining features that contribute to the historical significance of the property include continued use of the former Tudor Revival house as The Original Pancake House restaurant.

### Project Assessment of Use

The light rail trackway would be constructed in the center of SW Barbur Boulevard. The existing road right of way would be widened, and a new sidewalk would be constructed along the south side of SW Barbur Boulevard, necessitating a partial acquisition of approximately 2,753 square feet at the property's northern edge. A retaining wall would be constructed adjacent to where the current driveway is located at SW 24th Avenue. The parcel to the west (8604 SW Barbur Boulevard), which is currently used as overflow parking and is not included in the property boundary, would be fully acquired for the Project, and a new access point to the Original Pancake House parking lot would be built that enters from the west. A permanent easement of approximately 157 square feet would be needed to maintain the retaining wall proposed for construction near the northeastern corner of the property, and a temporary construction easement of 373 square feet would be needed to facilitate project construction (see Figure DD2-22).

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the Original Pancake House to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Original Pancake House would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a permanent easement at the Original Pancake House to facilitate sidewalk construction and a change in circulation, in addition to the completion of an elevated light rail structure on the block immediately east, would have no adverse effect on the significant historic characteristics of the Original Pancake House. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and

with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-22

## Original Pancake House

Map ID 228 - 8601 SW 24th Ave., Portland



## **DD2-23 OREGON EDUCATION ASSOCIATION, 6900 SW ATLANTA STREET, TIGARD**

### **Property Description**

FTA has determined the Oregon Education Association (OEA) complex at 6900 SW Atlanta Street is eligible for listing in the NRHP under Criteria C (type, period or method of construction). The complex of buildings is associated with prominent architecture firm Broome, Selig & Oringdolph (predecessor of Bora Architects), embodies distinctive characteristics of its period of construction, and is a fusion of the Northwest Regional and Brutalist architectural styles.

Character-defining features that contribute to the historical significance of the complex include its balance of wood and concrete, rectilinear pathways around the two buildings and a curvilinear parking area. Planned landscaping adjacent to the buildings and in the parking area also contribute to the character of the site. The OEA complex retains integrity of location, setting, design, materials, workmanship, feeling and association.

### **Project Assessment of Use**

The light rail alignment would diverge from Pacific Highway (Highway 99W) west of SW 68th Parkway, where it would turn south. A new bridge would be constructed over Red Rock Creek, which runs north and northwest of the property at 6900 SW Atlanta Street. The bridge would transition to ground level on the western border of the historic property, where a wall would also be constructed. The new construction would require a partial take of 23,232 square feet, a permanent easement of 11,288 square feet, and a temporary construction easement of 17,660 square feet (see Figure DD2-23). The affected area would be at the western edge of the property, in an area with dense tree cover that is north of the northern terminus of SW 70th Avenue. The removal of some trees from the western property boundary and the construction of an elevated light rail structure in their place would change, but not entirely diminish, the property's integrity of setting. The trees that would be removed are not associated with the character-defining historic landscaping that was originally on the site; rather, they are a later addition that likely serves to define and protect the grass lawn of the historic property to the east, which would be preserved.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the OEA complex to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the OEA complex would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the complex would continue to retain its character-defining features. The complex would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and temporary and permanent construction easements at the OEA complex to facilitate construction of a retaining wall and a new bridge over Red Rock Creek, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of the OEA complex. FTA advised the SHPO in writing that concurrence with the No Adverse

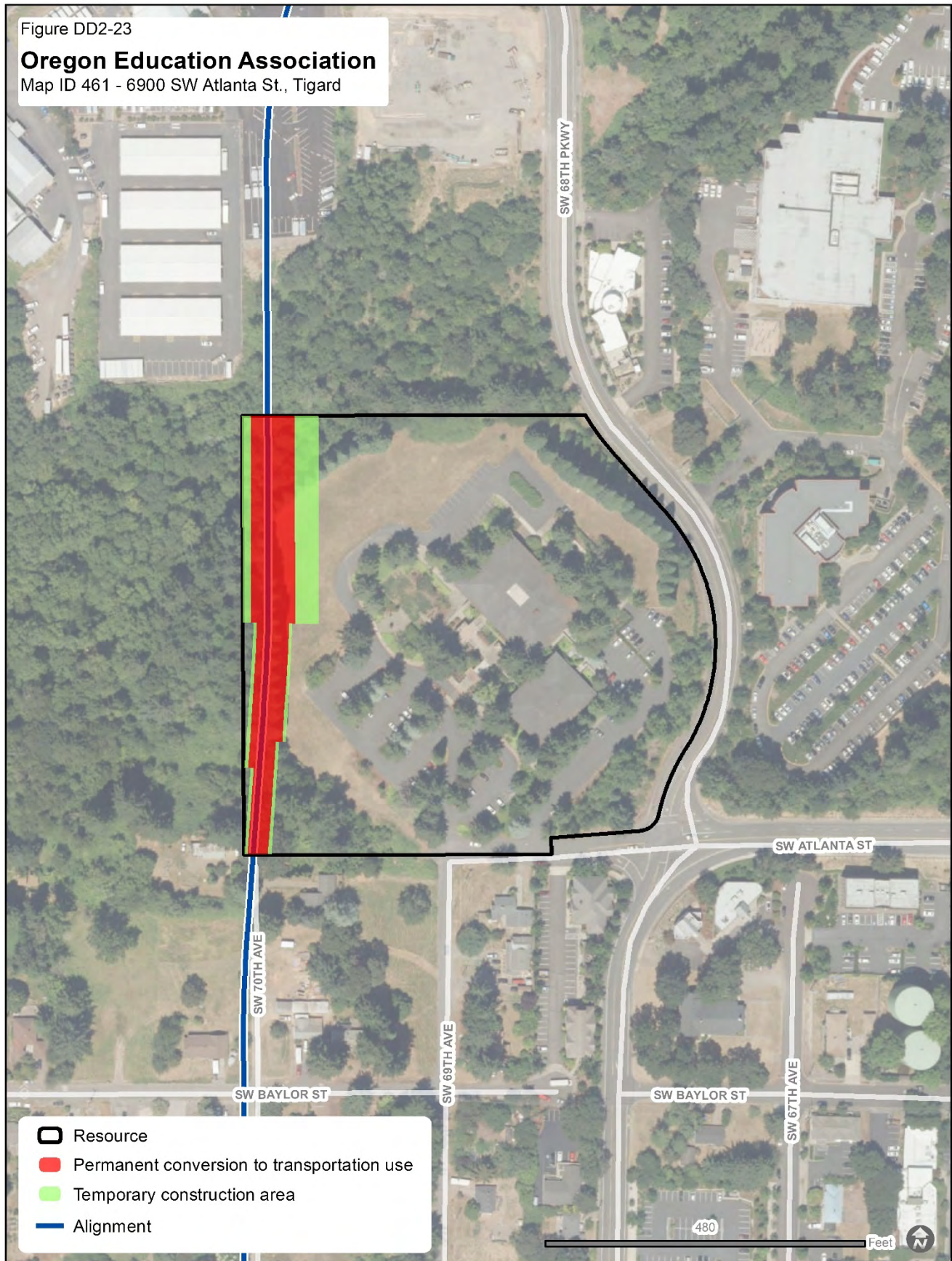


Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-23

**Oregon Education Association**

Map ID 461 - 6900 SW Atlanta St., Tigard



## **DD2-24 4019 SW CORBETT AVENUE, PORTLAND**

### **Property Description**

FTA has determined the Tudor Composite house at 4019 SW Corbett Avenue is eligible for listing in the NRHP under Criteria C (type, period or method of construction). Character-defining features that contribute to the historical significance of the house include the distinctive characteristics of its type and period of construction, such as its complex layering of gables and the arched entry of the east facade vestibule, and its being one of few Tudor Composite houses in the surrounding area. The roof and entry vestibule, in addition to the original wood windows and the asymmetrical façade, define the character of the house and clearly convey the house's type and period of construction.

### **Project Assessment of Use**

At 4019 SW Corbett Avenue, a temporary construction easement of 176 square feet is proposed along the southern property boundary (see Figure DD2-24). This easement would facilitate the construction of a new sidewalk, curb, retaining wall and driveway apron south of the house on SW Lowell Street. West of the house, SW Barbur Boulevard would be widened to accommodate the new light rail alignment.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for the proposed temporary construction easement on a portion of 4019 SW Corbett Avenue to accommodate the Project. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, 4019 SW Corbett Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the easement at 4019 SW Corbett Avenue to facilitate retaining wall, sidewalk, curbs and driveway apron construction, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of 4019 SW Corbett Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-24

**4019 SW Corbett Avenue, Portland**

Map ID 22 - 4019 SW Corbett Avenue, Portland





## **DD2-25 3811 SW BARBUR BOULEVARD, PORTLAND**

### **Property Description**

FTA has determined the building at 3811 SW Barbur Boulevard is eligible for listing in the NRHP under Criteria A (events affecting patterns in history) and C (type, period or method of construction). Built in 1960 by Boy Scouts of America, the building is associated with a broad pattern of history of the Boy Scouts organization in the Pacific Northwest (Criteria A) and embodies distinctive characteristics of its type and period of construction (Criteria C). The building retains its integrity of location, setting, materials, workmanship, feeling and association.

Character-defining features that contribute to the historical significance of the building include its low pitched roofs, generous eave overhangs, use of natural materials and fenestration scheme that are distinctive of the Northwest Regional Style.

### **Project Assessment of Use**

To facilitate new sidewalk and stairway construction at the intersection of SW Barbur Boulevard and SW Lane Street, temporary construction easements totaling 700 square feet are proposed at the northern and eastern edges of the property boundary (see Figure DD2-25). Within the viewshed of the property, SW Barbur Boulevard would be widened to accommodate the new light rail trackway, the intersection of SW Barbur Boulevard and SW Naito Parkway would be realigned, and new bicycle lines and sidewalks would be constructed. Temporary construction easements proposed along the northern and eastern edges of the property would not result in modification of the 1960 building or its character-defining features.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for the proposed temporary construction easement on a portion of 3811 SW Barbur Boulevard to accommodate the Project. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the building at 3811 SW Barbur Boulevard would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the easement at 3811 SW Barbur Boulevard to facilitate the construction of new sidewalks and bicycle lanes, and the realignment of the intersection of SW Barbur Boulevard and SW Naito Parkway, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of 3811 SW Barbur Boulevard. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's

written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-25

**3811 SW Barbur Boulevard, Portland**

Map ID 38 - 3811 SW Barbur Boulevard, Portland



## **DD2-26 022 SW LOWELL STREET, PORTLAND**

### **Property Description**

FTA has determined the house at 022 SW Lowell Street meets minimum qualifications to be eligible for listing in the NRHP under Criteria C (type, period or method of construction). It embodies distinctive characteristics of a Colonial Revival-style single-family bungalow and retains adequate historical integrity to be representative of its type and period of construction.

Character-defining features that contribute to the historical significance of the property include its Colonial Revival form and finish, in addition to original building materials.

### **Project Assessment of Use**

The Project proposes a temporary construction easement of 41 square feet at the northeastern corner of the property at 022 SW Lowell Street to replace public stairs that provide access to SW Barbur Boulevard from SW Lowell Street (see Figure DD2-26). Within view of the property, the Project would widen and improve SW Barbur Boulevard, and it would construct light rail infrastructure at the center of the widened roadway. The house at 022 SW Lowell Street would not be adversely affected by the Project. The temporary use of 41 square feet of the property to facilitate stairway construction at the intersection of SW Lowell Street and SW Barbur Boulevard would not alter the character-defining features of the house that qualify it to be eligible for listing in the NRHP.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for the proposed temporary construction easement on a portion of 022 SW Lowell Street to accommodate the Project. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the house at 022 SW Lowell Street would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed temporary easement at 022 SW Lowell Street to facilitate stairway construction, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of 022 SW Lowell Street. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-26

**022 SW Lowell Street, Portland**

Map ID 44 - 022 SW Lowell St., Portland



## **DD2-27 4515 SW CORBETT AVENUE, PORTLAND**

### **Property Description**

FTA has determined the commercial building at 4515 SW Corbett Avenue is eligible for listing in the NRHP under Criteria C (type, period or method of construction). The building is a significant example of the work of architect John W. Storrs; it embodies distinctive features of New Formalist architecture and is highly representative of its period of construction.

Character-defining features that contribute to the historical significance of the property include its New Formalist style and original materials, including the precast concrete columns and poured concrete retaining wall and curbs.

### **Project Assessment of Use**

At 4515 SW Corbett Avenue, a temporary construction easement of 85 square feet is needed to construct a new curb at the southwestern corner of intersection of SW Corbett Avenue and SW Hamilton Street (see Figure DD2-27). West of the property, the light rail trackway would be constructed along the alignment of SW Barbur Boulevard, which would be widened. To accommodate the widening of SW Barbur Boulevard, at least one building within the northwestern viewshed of the property (west of the intersection of SW Barbur Boulevard and SW Hamilton Street, at 4440 SW Barbur Boulevard) would be removed. This action would not directly impact the building or the poured concrete curb that lines the property at this location. Landscaping at the proposed location of the temporary construction easement is limited to bark mulch. The property would be left in its original condition once the Project is completed.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for the proposed temporary construction easement on a portion of 4515 SW Corbett Avenue to accommodate the Project. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the commercial building at 4515 SW Corbett Avenue would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed temporary easement at 4515 SW Corbett Avenue to facilitate the completion of an elevated light rail structure on the block immediately west would have no adverse effect on the significant historic characteristics of 4515 SW Corbett Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-27

**4515 SW Corbett Avenue, Portland**

Map ID 421 - 4515 SW Corbett Ave., Portland





## **DD2-28 1801 SW EVANS STREET, PORTLAND**

### **Property Description**

FTA has determined the house at 1801 SW Evans Street meets the minimum qualifications for listing in the NRHP under Criteria C (type, period or method of construction). It embodies distinctive characteristics of a Craftsman bungalow and retains adequate historical integrity to be representative of its type and period of construction.

Character-defining features that contribute to the historical significance of the property include its bungalow form and Craftsman details, such as bargeboard, knee brackets and original wood siding.

### **Project Assessment of Use**

Within the historic property boundary at 1801 SW Evans Street, the Project proposes a temporary construction easement of approximately 106 square feet (see Figure DD2-28). This easement would facilitate construction of a sidewalk and curbs within existing road right of way. The portion of SW Evans Street that would be overlapped by the Project has no existing sidewalks; the proposed sidewalk would connect to SW Barbur Boulevard to the east, where the light rail line would be constructed at the center of the roadway. To accommodate the light rail trackway, SW Barbur Boulevard would be widened to the northwest, and three parcels within the viewshed of the house at 1801 SW Evans Street would be acquired: 1814 SW Evans Street, 7943 SW 17th Avenue and 8005 SW Barbur Boulevard. Just one of the parcels proposed for full acquisition, 8005 SW Barbur Boulevard, has a historic building (constructed in 1951) that would be removed.

The temporary construction easement proposed within the property boundary is paved and used as a parking area. No changes are anticipated to the property's landscaping as a result of granting temporary access during project construction. The introduction of light rail infrastructure along SW Barbur Boulevard may have direct and indirect effects on the setting of the house through an increase in noise, changes in circulation, the removal of nearby buildings, and foreseeable long-term modifications to existing neighborhoods along the light rail alignment to accommodate transit-oriented development. However, the house's setting is not a character-defining feature that contributes to its eligibility for listing in the NRHP.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for 1801 SW Evans Street to accommodate adjacent Project construction. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project near the historic property. Once the Project is constructed and light rail is operational, the house at 1801 SW Evans Street would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed temporary easement at 1801 SW Evans Street to facilitate construction of sidewalks and curbs, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic



characteristics of 1801 SW Evans Street. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-28

**1801 SW Evans Street, Portland**

Map ID 201 - 1801 SW Evans St., Portland



## **DD2-29 GOOD SHEPHERD LUTHERAN CHURCH AND LITTLE LAMBS PRESCHOOL/DAYCARE, 3405 SW ALICE STREET, PORTLAND**

### **Property Description**

FTA has determined the Good Shepherd Lutheran Church complex is recommended eligible for listing in the NRHP under Criteria C (type, period or method of construction) for its design and association with architect Kurt P. Schuette of the firm Church, Newberry, Roehr and Schuette. The church complex is a good example of mid-century church design, for which Schuette was renowned.

Character-defining features that contribute to the historical significance of the property include both the original building materials and the mid-century designs that were completed by or with the involvement of architect Kurt P. Schuette.

### **Project Assessment of Use**

A temporary construction easement of 200 square feet is proposed at the southeastern corner of the property (see Figure DD2-29). This temporary easement would facilitate sidewalk construction along SW Alice Street and reconstruction of a driveway on the parcel east of the historic property. Currently, there are no sidewalks on either side of SW Alice Street; new sidewalks would connect to SW Barbur Boulevard, where the light rail trackway would be constructed at the center of the roadway. A parcel south of the property, on the opposite side of SW Alice Street, would be fully acquired to construct a communications building and to realign the intersection of SW Alice Street and SW Barbur Boulevard. This acquisition would lead to the removal of the 1970 apartment complex that is situated between the church property and SW Barbur Boulevard to the southeast.

The temporary use of the property's southeastern corner during project construction is not anticipated to result in modifications to existing landscaping, which consists of grass, bark mulch and low-lying shrubs. The two church buildings are set back from SW Alice Street and would be avoided by the Project. The realignment of the intersection of SW Alice Street and SW Barbur Boulevard, the removal of a 1970 apartment complex to the south, and the construction of light rail infrastructure within the viewshed of Good Shepherd Lutheran Church would diminish the property's integrity of setting.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for the proposed temporary construction easement on a portion of Good Shepherd Lutheran Church to accommodate the Project. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Good Shepherd Lutheran Church complex would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed temporary easement at the Good Shepherd Lutheran Church to facilitate construction of sidewalks and a driveway, in addition to the

completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of the Good Shepherd Lutheran Church. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-29

**Good Shepherd Lutheran Church and  
Little Lambs Preschool/Daycare**

3405 SW Alice St., Portland



## **DD2-30 BURLINGAME FRED MEYER SIGN, 7529-7601 SW BARBUR BOULEVARD, PORTLAND**

### **Property Description**

FTA has determined the Burlingame Fred Meyer sign at 7529-7601 SW Barbur Boulevard meets the minimum qualifications for listing in the NRHP under Criteria A (events affecting patterns in history) and C (type, period or method of construction). The sign is associated with the history of Fred Meyer, a chain of “one-stop shopping” supermarkets and department stores located in the Pacific Northwest, and with commercial development along SW Barbur Boulevard during the mid-20th century (Criteria A). The sign embodies distinctive characteristics of a mid-20th century roadside neon sign, and it retains adequate historical integrity to be representative of its type and period of construction (Criteria C). The Burlingame Fred Meyer sign retains historical integrity of location, design, materials, workmanship, feeling and association.

Character-defining features that contribute to the historical significance of the sign include its neon lighting, original script and original building materials.

### **Project Assessment of Use**

The Project proposes a temporary construction easement that would overlap the historic property boundary of the Burlingame Fred Meyer sign (see Figure DD2-30). The easement would allow the Project to access the area at the base of the sign, which is needed reconstruct the adjacent sidewalk and curbs along SW Barbur Boulevard. No impacts are anticipated to the historic object. The light rail trackway would be constructed at the center of SW Barbur Boulevard, a station platform and pedestrian crossing would be southwest of the sign, and a bus stop will be built to the northeast.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy for the proposed temporary construction easement on a portion of the historic property boundary of the Burlingame Fred Meyer sign to accommodate the Project. The temporary occupancy finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Burlingame Fred Meyer sign would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the sign would continue to retain its character-defining features. The sign would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at the Burlingame Fred Meyer sign to facilitate sidewalk and curb construction, in addition to the completion of an elevated light rail structure on the block immediately east, would have no adverse effect on the significant historic characteristics of the Burlingame Fred Meyer sign. The SHPO has concurred in writing with FTA’s No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO’s

written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-30

**Burlingame Fred Meyer Sign**

Map ID 330 - 7529-7601 SW Barbur Blvd., Portland





## **DD2-31 FOUGHT & COMPANY, 14255 SW 72ND AVENUE, TIGARD**

### **Property Description**

FTA has determined the steel fabrication plant at 14255 SW 72nd Avenue meets the minimum qualifications for listing in the NRHP under Criteria A for its association with patterns of events regarding manufacturing history in Tigard during the mid-20th century.

Character-defining features that contribute to the historical significance of the property include its continued use by Fought & Company, its utilitarian fabrication area and painted sign, the original building materials and the railroad spur connecting it to the adjacent Portland & Western Railroad (formerly Southern Pacific Railroad) line.

### **Project Assessment of Use**

Adjacent to or potentially overlapping part of the historic property boundary of the fabrication plant at 14255 SW 72nd Avenue, the Project proposes a temporary construction easement of approximately 34,408 square feet on the larger Fought & Company property (see Figure DD2-31). The easement is proposed at the northwestern corner of the complex, in an area currently used for outdoor storage, and would facilitate the construction of an elevated light rail structure within the existing railroad corridor to the west of the property, as well as sidewalks, driveways and other features. The elevated structure that is proposed for construction immediately west of the property would still allow for the continued use of Fought & Company's railroad spur and the Portland & Western Railroad, would avoid disturbance of the plant's operations and impacts to its physical features, and would be within and adjacent to an existing railroad corridor.

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of temporary occupancy impact for the proposed temporary construction easement on a portion of the property at 14255 SW 72nd Avenue to accommodate the Project. The temporary occupancy impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the Fought and Company steel fabrication plant would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would retain the distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed temporary easement at the property to facilitate construction of sidewalks and a driveway, in addition to the completion of an elevated light rail structure on the block immediately west, would have no adverse effect on the significant historic characteristics of the property. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) temporary occupancy determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's

written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-31

**Fought and Company**

Map ID 390 - 14255 SW 72nd Ave., Tigard



**RELATED TRANSPORTATION IMPROVEMENTS: *DE MINIMIS* DETERMINATIONS  
RELATED TO ROSS ISLAND BRIDGEHEAD RECONFIGURATION**



## DD2-BH-1 IBM BUILDING, 2000 SW FIRST AVENUE, PORTLAND

### Property Description

FTA has determined the commercial building at 2000 SW First Avenue meets the minimum qualifications for listing in the NRHP under Criteria A (events affecting patterns in history) and C (type, period or method of construction). The building is significant under Criteria A for its association with the South Auditorium Urban Renewal Project, which redeveloped 110 acres of South Portland after demolishing homes, businesses, places of worship and community centers. Under Criteria C, the building embodies distinctive characteristics of its type and period of construction. This *de minimis* impact determination is for the property as a historic resource only.

Character-defining features that contribute to the historical significance of the building include its placement in the South Auditorium Urban Renewal Area and its precast concrete exterior.

### Project Assessment of Use

The Ross Island Bridgehead Reconfiguration, an optional related transportation improvement that could be phased to be built before, with or after the Project's light rail investment, would construct a southbound bicycle lane on SW Naito Parkway. The bicycle lane would be constructed in existing road right of way, where a sidewalk is currently located, at the eastern edge of the IBM Building property. Within the historic property boundary at 2000 SW First Avenue, the Project proposes a partial acquisition of approximately 1,829 square feet and a temporary construction easement of approximately 2,708 square feet (see Figure DD2-BH-1). The acquisition of right of way and a temporary construction easement to facilitate bicycle lane and sidewalk construction on SW Naito Parkway would impact modern landscaping at the rear of the building while avoiding the parking garage that contributes to the building's eligibility for listing in the NRHP.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of the IBM Building property to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the IBM Building property would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would remain strongly associated with the South Auditorium Urban Renewal Project and would retain distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at the IBM Building property to facilitate bicycle lane and sidewalk construction, in addition to the completion of an elevated light rail structure, would have no adverse effect on the significant historic characteristics of the IBM Building property. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to

physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-BH-1

## IBM Building

Map ID - 2000 SW 1st Avenue, Portland



## DD2-BH-2 PITNEY-BOWES BUILDING, 2112 SW FIRST AVENUE, PORTLAND

### Property Description

FTA has determined the building at 2112 SW First Avenue meets the minimum qualifications for listing in the NRHP under Criteria A (events affecting patterns in history) and C (type, period or method of construction). Under Criteria A, the building was designed for use as the Portland headquarters of Pitney-Bowes, Inc. and was built as part of the South Auditorium Urban Renewal Project. Under Criteria C, the building embodies distinctive features of its type and period of construction. This *de minimis* impact determination is for the property as a historic resource only.

Character-defining features that contribute to the historical significance of the building include its placement within the South Auditorium Urban Renewal Area, narrow aluminum windows, concrete cladding and asymmetrical façade with projecting concrete surround.

### Project Assessment of Use

The Ross Island Bridgehead Reconfiguration, an optional related transportation improvement that could be phased to be built before, with or after the Project's light rail investment, would construct a southbound bicycle lane on SW Naito Parkway. The bicycle lane would be constructed in existing road right of way, where a sidewalk is currently located, at the eastern edge of the Pitney-Bowes Building. Within the historic property boundary at 2112 SW First Avenue, the Project proposes an acquisition of approximately 879 square feet and a temporary construction easement of approximately 1,000 square feet (see Figure DD2-BH-2). The acquisition of right of way and a temporary construction easement to facilitate bicycle lane and sidewalk construction on SW Naito Parkway would impact modern landscaping at the rear of the building while avoiding the parking garage that contributes to the building's eligibility for listing in the NRHP.

### Section 4(f) Use Determination

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 2112 SW First Avenue to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the building at 1801 SW Evans Street would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria A and C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would remain strongly associated with the South Auditorium Urban Renewal Project and would retain distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 2112 SW First Avenue to facilitate bicycle lane and sidewalk construction, in addition to the completion of an elevated light rail structure, would have no adverse effect on the significant historic characteristics of 2112 SW First Avenue. FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding



(see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.

Figure DD2-BH-2

## IPitney-Bowes Buildings

Map ID - 2112 SW 1st Avenue, Portland



## **DD2-BH-3 WOLFMAN, A., BUILDING, 11 SW GIBBS STREET, PORTLAND**

### **Property Description**

FTA has determined the commercial building at 11 SW Gibbs Street meets the minimum qualifications for listing in the NRHP under Criteria C (type, period or method of construction). It embodies distinctive characteristics of the Northwest Regional style and retains adequate historical integrity to be representative of its type and period of construction. This *de minimis* impact determination is for the property as a historic resource only.

Character-defining features that contribute to the historical significance of the building include its wide overhanging eaves, irregular form, vertical wood siding and large wood-sash windows.

### **Project Assessment of Use**

The Ross Island Bridgehead Reconfiguration, an optional related transportation improvement that could be phased to be built before, with or after the Project's light rail investment, would remove the looping westbound off-ramp that provides access to southbound Pacific Highway/SW Naito Parkway immediately east of the A. Wolfman Building. Instead, traffic exiting the bridge on westbound lanes would intersect Pacific Highway/SW Naito Parkway approximately 430 feet north-northeast of the A. Wolfman Building and would continue south towards the property along a widened Pacific Highway/SW Naito Parkway alignment.

Immediately east of the property, Pacific Highway/SW Naito Parkway would accommodate four lanes of vehicle traffic and two bicycle lanes separated by a central median; new curbs and sidewalks would also be constructed. Southeast of the A. Wolfman Building, the intersection of SW Gibbs Street and Pacific Highway/SW Naito Parkway would be signalized, and crosswalks would be added. To facilitate the widening of Pacific Highway/SW Naito Parkway and the construction of a new sidewalk and curbs, an acquisition of approximately 1,050 square feet and a temporary construction easement of approximately 646 square feet would be needed along the eastern edge of the property boundary (see Figure DD2-BH-3).

### **Section 4(f) Use Determination**

In accordance with 23 CFR 774.7(b) requirements and through consultations with the SHPO, FTA has made a determination of *de minimis* impact for the proposed use of a portion of 11 SW Gibbs Street to accommodate the Project. The *de minimis* impact finding includes temporary construction activities needed to develop the portion of the Project within and near the historic property. Once the Project is constructed and light rail is operational, the building at 11 SW Gibbs Street would retain its character-defining features and continue to meet minimum eligibility requirements for listing in the NRHP under Criteria C.

Access to the property would not be altered by the Project. Once the Project is constructed, the building would continue to retain its character-defining features. The building would remain strongly associated with the South Auditorium Urban Renewal Project and would retain distinctive features of its type and period of construction.

Through the Section 106 process, FTA has determined that the proposed acquisition of right of way and a temporary construction easement at 11 SW Gibbs Street to facilitate roadway widening, bicycle lane and sidewalk construction, and other roadway improvements, in addition to the completion of an elevated light rail structure, would have no adverse effect on the significant historic characteristics of 11 SW Gibbs Street.

FTA advised the SHPO in writing that concurrence with the No Adverse Effect finding for the property would be used to support a Section 4(f) *de minimis* determination. The SHPO has concurred in writing with FTA's No Adverse Effect finding (see Attachment DD1). The Section 106 No Adverse Effect finding addresses changes due to physical modifications as well as direct or indirect changes in setting for the historic property. The Final EIS has not identified significant unmitigated impacts that would potentially affect the property, and with the SHPO's written concurrence of No Adverse Effect, supports the conclusion that no Section 4(f) constructive use would occur.



Figure DD2-BH-3

**Wolfman, A., Building**

Map ID - 11 SW Gibbs Street, Portland



## **ATTACHMENT DD3 – BACKGROUND FOR THE MARQUAM HILL CONNECTION**

This attachment provides additional background on the planning, coordination, and decision-making efforts related to the Marquam Hill Connection. The attachment includes three memorandums summarizing the rationale to proceed with the inclined elevator as the proposed design for the Marquam Hill Connection.

The decision to proceed with the inclined elevator was made after coordination with the Oregon State Historic Preservation Office (SHPO) and the City of Portland over several years. In 2019, TriMet and Metro focused on developing and evaluating alternatives in coordination with the City of Portland, and 2020 and 2021 were focused on workshops with SHPO, meetings with Friends of Terwilliger, and public comment opportunities. Agreement with the City of Portland to move forward with the inclined elevator occurred in Spring 2020. Consultation with SHPO continued through 2020 in coordination with the Section 106 process, the determination of effect, and subsequently the listing of the property in the National Register of Historic Places and the development of mitigation measures to be incorporated. A public meeting was held in January 2021 to share project developments and solicit feedback and comment (see Attachment DD4 for copies of the comments received).

April 9, 2020

**Southwest Corridor Light Rail Project**

**From:** David Unsworth, TriMet  
Chris Ford, Metro

**Subject:** Marquam Hill Connector

The purpose of this document is to inform FTA that the Project team is proposing to move forward with the **inclined elevator** as the preferred Marquam Hill connector option. The Project team is also providing two attachments in support of this decision:

- Attachment A – Memo on the draft Section 4(f) determination for the Marquam Hill connector option (and for other parks)
- Attachment B – Memo comparing the potential Section 4(f) impacts of the three Marquam Hill connector options

**Background Information**

The Marquam Hill connector is located in the Terwilliger Parkway, which is a park resource under the jurisdiction of the City of Portland. It is also eligible for listing in the National Register of Historic Properties under Section 106.

The inclined elevator would be sited largely in the same location as options addressed in the Draft EIS. Since publication of the Draft EIS, OHSU's campus planning has changed and a secondary structure to the west of Terwilliger Boulevard is no longer being proposed. A comparison of the Preferred Alternative relative to the Draft EIS was previously provided to FTA.

**Reasons for Selection**

The Project team in coordination with public input described below has determined that the inclined elevator option is the least impactful to the Terwilliger parkway under Section 4(f). Attachment B provides a summary of Section 4(f) considerations in making the determination. This determination was based on considering the potential impacts of the different option on the natural setting, designated scenic views, and related visual characteristics that are of primary importance to the parkway's values as a park and as an historic property. Habitat loss and wildlife impacts were also considered, along with other factors including the parkway's physical and recreational features and the conversion of land as a percentage of the total resource.

The primary difference between the bridge options and the inclined elevator options was in how visually prominent the bridge and tower would be from of the parkway. The inclined elevator also provides more opportunities for further design refinement and replanting to minimize impacts on the parkway. Otherwise, the impacts from both options were similar.

**Local Input**

During this process, the Project has consulted with Portland Parks and Recreation and, set up a specially formed public Green Ribbon Committee comprised of key agency and neighborhood representatives along with a working group. The Project team has also collected community input through two sets of open community open houses and has sought direction from the Project Steering Committee. The

inclined elevator option has also been the most supported option in multiple rounds of public engagement on the connector.

**Next Steps**

- Section 4(f):
  - In the near term, the Project team is approaching Portland Parks and Recreation with a draft *de minimis* determination (see Attachment A) for Marquam Hill and other parks in the City's jurisdiction.
  - The Project team is planning to solicit input on the findings and mitigation in May 2020.
  - Finalize Section 4(f) determination with the City of Portland and FTA.
- Section 106 (specific to Terwilliger Parkway):
  - The Project team is drafting Determination of Eligibility and Findings of Effect for this resource in consideration of factors specific to Section 106.
  - Once complete, it will be provided to Anchor QEA/FTA for review per the process that has been followed for the Project overall and will be folded into the Section 106 MOA process.





700 NE MULTNOMAH, SUITE 1000 | PORTLAND, OR 97232 | P 503.233.2400 | 360.894.5020

## MEMORANDUM

DATE: April 9, 2020  
TO: Chris Ford, Metro  
Dave Unsworth, TriMet  
FROM: Daryl Wendle  
SUBJECT: Section 4(f) Parks Properties for letter of concurrence request by City of Portland  
CC:  
PROJECT NUMBER: 274-1919-042  
PROJECT NAME: SW Corridor Final EIS

Based on discussions to date with the City of Portland, TriMet, Metro and FTA are requesting a letter from the City that would support the Final EIS's Section 4(f) evaluation. This memo provides the substance of the letter, details of which can be refined or adjusted through further discussion with FTA and the City. A public meeting would be held using this information to summarize findings and allow public comment prior to the City signing a concurrence letter.

### DRAFT TEXT for Concurrence Request Letter:

As part of the Southwest Corridor Light Rail Transit Project Final Environmental Impact Statement (EIS) process, FTA, as the lead federal agency for the project, is evaluating the impacts of the project on public parks, recreational facilities, and historic resources. The City of Portland has jurisdiction over parks that the project could partly occupy during construction or permanently. Metro, TriMet and FTA are requesting the City's written response with the description of effects on these resources and the measures being proposed to minimize harm.

Under Section 4(f) of the U.S. Department of Transportation Act of 1966, FTA may only approve a transportation project that requires the use of land from park or historic properties if:

- There is no prudent and feasible alternative to the use of that land and all possible planning to minimize harm due to the use has been included as part of the proposed project, or
- The Administration determines that the use of the property, including any measure(s) to minimize harm, will have a *de minimis* impact on the property, as defined in 23 CFR 774.17.

In addition, the law exempts "temporary occupancies" of land that are so minimal as to not constitute a use. The law also allows "*de minimis*" determinations when a permanent use of the property, including any measures to minimize harm (such as avoidance, minimization, mitigation or enhancement measures) will not adversely affect the features, attributes and activities qualifying the property for protection under Section 4(f).

Table 1 shows the public parks and recreational facilities owned by the City of Portland and the permanent and temporary effects of the Preferred Alternative. The table also shows the recommended Section 4(f) determinations. Table 2 shows the same information for the Related Transportation Investments, including the Bridgehead Reconfiguration and station access improvements.

**Table 1 Parks affected by the SW Corridor Light Rail Project Preferred Alternative**

| Park Property                                      | Permanent or Temporary Effects   | Recommended Section 4(f) Determination                             |
|--|--|--|
| Duniway Park                                       | <p>Involves reconfiguring driveway and parking area at east edge by circular track, short term encroachment on outer lanes of track, restoring and re-landscaping other disturbed areas.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> About 6,000 sf, or 1.0% of the park, bordering SW Barbur Boulevard.</li> <li>• <i>Temporary.</i> An additional 3,000 sf, or 0.5%.</li> </ul>                                     | <i>De minimis</i>  |
| Lair Hill Park                                     | <p>Involves rebuilding sidewalk and retaining wall on sloping right-of-way up to the park border, removing street trees, potentially removing park tree(s) within park. Includes re-landscaping, restoration and tree replacement.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> About 900 sf, or 0.6% of the park bordering SW Barbur Boulevard.</li> <li>• <i>Temporary.</i> 3,300 sf or 2.3% of the park.</li> </ul> | <i>De minimis</i> if the City of Portland concurs, otherwise a use |
| Terwilliger Parkway                                | <p>Involves developing inclined elevator up a wooded park hillside, permanently replacing a vegetated strip of parkland with the transportation facility.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> 27,200 SF (0.624 acre), or 0.6 percent of parkway.</li> <li>• <i>Temporary.</i> 47,989 SF (or 1.1 acre), or 1.1% of parkway.</li> </ul>   | <i>De Minimis</i> if the City of Portland concurs; otherwise a use |
| Water and Gibbs Community Garden                   | <p>Involves new crosswalk at SW Naito Parkway with sidewalk improvements at park corner, restoration of disturbed areas.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> None.</li> <li>• <i>Temporary.</i> About 800 sf to develop sidewalk/new crosswalk.</li> </ul>  | Temporary occupancy  |
| George Himes Park                                  | <p>Involves construction staging areas in a wooded ravine in order to replace bridge, including tree and vegetation removal, restoration of disturbed areas, closure of one access point to a park trail.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> None.</li> <li>• <i>Temporary.</i> 5800 or 0.4% of the park.</li> </ul>   | Temporary occupancy  |
| Fulton Park, Community Garden and Community Center | <p>Involves sidewalk reconstruction and street tree removal bordering park, with restoration of disturbed areas.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> None to 100 sf, or 0.03% of the park to improve sidewalks.</li> <li>• <i>Temporary.</i> About 1,300 sf, or 0.4% of the park.</li> </ul>  | Temporary occupancy  |
| Sylvania Natural Area Park                         | <p>Involves street reconstruction and vegetation removal bordering park, with restoration of disturbed areas.</p> <ul style="list-style-type: none"> <li>• <i>Permanent.</i> None.</li> <li>• <i>Temporary.</i> About 1200 sf or 1.0% of the park.</li> </ul>  | Temporary occupancy  |

**Table 2 Parks affected by the Bridgehead Reconfiguration or Station Access Options**

| Park Property                    | Permanent and Temporary Effects   | Recommended Section 4(f) Determination |
|----------------------------------|---|--|
| Front and Curry Community Garden | Involves new crosswalk at SW Naito Parkway with sidewalk improvements, restoration of disturbed areas. <ul style="list-style-type: none"> <li>• <i>Permanent.</i> None.</li> <li>• <i>Temporary.</i> About 100 sf to develop sidewalks along SW Naito Parkway.</li> </ul>   | Temporary occupancy                    |
| Burlingame Park                  | Involves developing a pedestrian bridge over I-5 and crossing a corner of the park, with restoration of disturbed areas. <ul style="list-style-type: none"> <li>• <i>Permanent.</i> About 1000 sf of aerial easement for Custer Walk/Bike Bridge.</li> <li>• <i>Temporary.</i> About 2000 sf of temporary construction easement to erect bridge.</li> </ul> | <i>De minimis</i>                      |

**Requirements for approving *De minimis* impacts.** For parks, recreation areas, and wildlife/waterfowl refuges, a *de minimis* impact is one that would not adversely affect the features, attributes, or activities qualifying the property for protection under Section 4(f). Avoidance, minimization, mitigation, and enhancement measures can be considered in making the *de minimis* determination. The resources above that are recommended for a *de minimis* impact findings assume the mitigation measures as project commitments to restore, replace or offset the permanent or temporary changes to each resource, incorporating the project planning and coordination to date with the City of Portland, as well as information developed through the Draft EIS and related public comments.

A *de minimis* determination can only be made when:

- Officials with jurisdiction over the resource concur in writing (in this case, the City of Portland)
- There has been an opportunity for public review and comment on the effect of the project on the park resource.

The Draft EIS, released in June 2018, was an opportunity for public review and comment on preliminary Section 4(f) determinations for most of the resources affected above. Following the Draft EIS, The Marquam Hill Connection options were refined to help identify options to reduce impacts compared to the options defined in the Draft EIS. For this reason, and to provide updated information on all affected City park resources and the proposed mitigation measures, Metro, TriMet and FTA are providing an additional public comment opportunity in May 2020.

**Requirements for a temporary occupancy exception.** A temporary occupancy of property does not constitute a use of a Section 4(f) resource when all of the following conditions are satisfied:

- Duration is less than the time needed for construction of the project and there is no change in ownership of the land;
- The nature and magnitude of the changes to the Section 4(f) property are minimal;
- There are no anticipated permanent adverse physical impacts, nor is there interference with the protected activities, features, or attributes of the property on either a temporary or permanent basis;
- The land being used will be fully returned to a condition at least as good as that which existed prior to the project; and
- There is a documented agreement of the official(s) with jurisdiction over the Section 4(f) resource regarding the above conditions.

#### **Mitigation Measures:**

All of the affected parks properties are assumed to include the following mitigation commitments:

TriMet will purchase rights to develop and operate the transit project within the defined park areas described in this Section 4(f) evaluation and will pay fair compensation to the City of Portland for these property rights. The compensation will be based on an appraisal to be conducted after the Record of Decision, in negotiation with the City of Portland.

TriMet will restore temporarily affected areas to be the same or better than current conditions, with restoration plans to be developed during final design and subject to approval by the City of Portland.

TriMet will fulfill all requirements of Title 11 for tree impacts and replacement and will fulfill the requirements of the non-park use permits of the City of Portland.

During final design and permitting, TriMet will develop final designs and negotiate required permits for the transit project, working in coordination with the City. These designs and permitting documents will address details of the measures to minimize and mitigate construction period and permanent impacts to ensure the project does not impair each park's essential features, attributes and activities.

***This letter will include attachments for each of the City of Portland parks where the project temporarily or permanently overlaps with park property. These attachments further describe each affected property, its significant features, attributes and activities, the effects of the project, the minimization, mitigation and enhancement measures for each property, and the proposed Section 4(f) conclusion.***





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## MEMORANDUM

**DATE:** April 9, 2020  
**TO:** Chris Ford, Metro  
Dave Unsworth, Metro  
**FROM:** Daryl Wendle  
**SUBJECT:** Summary Comparison of Marquam Hill Connector Options applying Section 4(f) resource impact factors  
**CC:**  
**PROJECT NUMBER:** 274-1919-042  
**PROJECT NAME:** Southwest Corridor Final EIS

This memo summarizes a comparative Section 4(f) impact evaluation of Marquam Hill Connector options that involve the use of property within the City of Portland's Terwilliger Parkway, which is a Section 4(f) resource. This evaluation was developed in direct coordination with the City of Portland and builds on the results of previous planning and outreach conducted after the Draft EIS to further develop and refine alternatives for the Marquam Connector. In February and March, 2020, TriMet, Metro and the City of Portland met five times to discuss this comparative evaluation.

### OPTIONS CONSIDERED

Through the Marquam Hill Connector planning and the "Green Ribbon Committee" process, TriMet developed two bridge and elevator options, with an elevator tower and plaza near Gibbs Station at SW Barbur Boulevard up to a bridge that extends over the parkway hillside to SW Terwilliger Boulevard. A third option, an inclined elevator, that connects from boarding plaza near Gibbs station at SW Barbur Boulevard up the parkway hillside to a boarding plaza at SW Terwilliger Boulevard, was also considered.

Table 1 lists the park-related features of all three options. Assumptions common to all options include:

- A developed transportation facility crossing a currently undeveloped natural areas of the parkway's hillside, requiring the removal of existing large trees and vegetation.
- Terwilliger Boulevard plazas and retaining walls to support bridge landings or a boarding platform/station house, with widening or reconstruction of Terwilliger Boulevard sidewalks, and a signalized intersection and crosswalk at Terwilliger Boulevard and Campus Drive to the OHSU Campus.
- Facility improvements to meet American with Disabilities Act (ADA) as well as other access, safety and security measures for users, including those with mobility and sensory disabilities, including ADA-compliant ramps, lighting, and wayfinding.
- Estimated daily trips of about 10,000, with a 1,400 person per hour system capacity during peak hours.

- Lighting for all passenger facilities, including in loading or waiting areas, but with shielding to limit spillover into natural areas.

**Table 1. Park-Related Features of Marquam Hill Connector Options**

| Part of Connector                       | Marquam Hill Connector Options  |  |  |
|---|---|--|--|
|   | Bridge and Elevator:<br>Canyon Alignment  | Bridge and Elevator:<br>Turnout Alignment  | Inclined Elevator:<br>Canyon Alignment   |
| SW Barbur Blvd. to SW Terwilliger Blvd. | <ul style="list-style-type: none"> <li>• 300 foot long, 15 feet wide bridge within/over park</li> <li>• One to two support piers within park</li> <li>• 140 foot elevator tower and emergency stairs (from SW Barbur Boulevard, outside of park)</li> <li>• Widened sidewalk at western bridge landing at Terwilliger Boulevard</li> <li>• Bridge is largely at-grade with Terwilliger Boulevard, and tower is about 20 feet above grade</li> <li>• Elevator tower and emergency stairs located at park boundary, with connecting plaza to SW Barbur Boulevard and Gibbs Station</li> </ul> | <ul style="list-style-type: none"> <li>• 220 foot bridge, 15 feet wide bridge within/over park</li> <li>• One to two support piers within park</li> <li>• 140 foot elevator tower and emergency stairs (from SW Barbur Boulevard, outside of park)</li> <li>• Bridge is largely at grade with SW Terwilliger Boulevard, and tower is about 20 feet above grade of SW Terwilliger Boulevard</li> <li>• Widened sidewalk along SW Terwilliger Blvd to pullout/bridge landing.</li> <li>• Elevator tower and emergency stairs located at park boundary, with connecting plaza to SW Barbur Boulevard and Gibbs Station</li> </ul> | <ul style="list-style-type: none"> <li>• 300 foot long, 20 to 30 foot wide Inclined elevator trackway with parallel emergency stairs, and an option for a separate set of stairs.</li> <li>• SW Terwilliger Boulevard landing has at-grade connection to plaza/passenger platform and one-story elevator house, with additional infrastructure and retaining walls below grade.</li> <li>• Multiple (10 to 20) structural supports needed along trackway structure</li> <li>• Maintains at least 15 feet of clearance over grade to allow wildlife passage.</li> </ul> |
| Crossing SW Terwilliger Blvd.           | • At-grade pedestrian crossing at existing crosswalk, and assuming a signalized intersection  |  |  |
| West of SW Terwilliger Blvd.            | <ul style="list-style-type: none"> <li>• <i>Planned improvements to be constructed by OHSU (not part of the Project action):</i></li> <li>• New stairs and path</li> <li>• Express elevator in new hospital expansion</li> </ul>  |  |  |

OHSU = Oregon Health & Science University.

## COMPARISON OF SECTION 4(F) IMPACTS

This comparative Section 4(f) analysis focuses on impacts of the three Marquam Hill Connector Options on the parkway's essential characteristics, features and attributes. Table 1 summarizes the impact comparison for the three options. Several drafts of this table were discussed in meetings in February and March 2020 with the City of Portland, helping develop general agreement with the characterization of the impacts and the essential characteristics, features and attributes of the parkway. Visual impacts emerged as the primary factor that differentiated the alternatives, and the visual characteristics of the parkway also emerged as a dominant essential feature of the resource. Taken with earlier "Green Ribbon Committee" planning and development meetings and comparative evaluations of the options dating back to 2018, the Inclined Elevator emerged as the option with the most support and the best potential to be an element of a least harm alternative for the light rail project overall.



**Table 2. Initial Impact Comparison of Marquam Hill Connector Options**

| Impact   | Marquam Hill Connector Options  |   |  |
|--|---|---|--|
|  | Bridge and Elevator:<br>Canyon Alignment  | Bridge and Elevator:<br>Turnout Alignment   | Inclined Elevator:<br>Canyon Alignment   |
| Permanent footprint/easement   | · 17,200 SF (0.395 acre), or 0.4% of parkway  | · 6,107 SF (0.140 acre) or 0.1 percent of parkway   | · 27,200 SF (0.624 acre), or 0.6 percent of parkway  |
| Temporary easement   | · 32,719 SF (0.751 acre), or 0.8% of park property  | · 32,107 (0.750 acre) or 0.8% of park property  | · 47,989 SF (or 1.1 acre), or 1.1% of parkway  |
| Terwilliger Boulevard Sidewalk/Terwilliger Trail   | · Widened. Increase in activity levels of Terwilliger Boulevard sidewalk at Campus Drive.   | · Widened from turnout to Campus Drive. Increase in activity levels of sidewalk between turnout and Campus Drive.   | · Widened. Increase in activity levels of Terwilliger Boulevard sidewalk at Campus Drive.  |
| Vegetation/Oak tree impacts  | · 8,522 SF/0  | · 10,479 SF/3   | · 10,647 SF/0  |
| Visual Impacts to Park   | · High from nearby publicly accessible park areas due to tree and vegetation removal and landing, and high from other locations along the boulevard and trail and below the park due to the height and mass of the visually prominent bridge and tower. | · High from nearby publicly accessible park areas due to tree and vegetation removal and landing, and high from other locations along the boulevard and trail and below the park due to the height and mass of the visually prominent bridge and tower. | · Moderate to high based on location. High from immediately adjacent publicly accessible parkway areas due to tree and vegetation removal and more prominent plaza landing, but moderate from other locations on the trail and below the park due to lower profile structures generally following slope. |
| Designated View Impacts  | · Intrudes but does not obstruct  | · Partially obstructs; option for viewpoint replacement   | · Unobstructed.  |
| Impacts to views of park from areas adjacent to parkway (SW Barbur Boulevard and South Portland) | · Highly visible structures and cleared areas   | · Highly visible structures and cleared areas   | · Visible cleared areas within ravine, moderately visible structures   |
| Wildlife habitat   | Limited considering existing constrained natural area and invasive species; allows wildlife movement  | Limited considering existing constrained natural area and invasive species; allows wildlife movement  | Limited considering existing constrained natural area and invasive species; allows wildlife movement   |
| Noise impacts to designated park activities  | · None  | None  | None   |
| Other impacts to designated park activities, attributes and features                             | None  | Impacts Terwilliger Boulevard access point to Trail #1; which would need to be relocated  | None   |

#### Mitigation Measures Assumed

- TriMet will purchase rights to develop and operate the transit project improvements, and compensation for the property rights, which may be in the form of permanent and temporary easements, would be based on an appraisal to be conducted after the Record of Decision and would be negotiated with the City of Portland.
- TriMet will restore temporarily affected areas and mitigate or offset impacts to permanently affected facilities, functions, features and attributes within affected areas of the property.
- TriMet will fulfill all requirements of Title 11 for tree impacts and replacement.
- TriMet commits to fulfill requirements of non-park use permits by the City of Portland.
- TriMet will develop final designs and restoration plans in coordination with the City to minimize of temporary impacts and durations so as not to impair ongoing park functions, and to minimize temporary and permanent impacts to the essential activities, features, or attributes that qualify Terwilliger Parkway

for Section 4(f) protection. This includes measures to minimize impacts to the parkway's characteristics as a park and recreation facility, as well as its characteristics as a significant historic property.

## TERWILLIGER PARKWAY

Based on descriptions in the Draft EIS, public information, the 1983 Terwilliger Parkway Design Guidelines, and earlier workshops and meetings with the City of Portland and others, the following describes the parkway's key characteristics, features and attributes that were used to evaluate the Section 4(f) impacts.

Terwilliger Parkway is a 98.87-acre, public park and greenspace following SW Terwilliger Boulevard between SW Sam Jackson Park Road and SW Capitol Highway. The mostly forested parkway is midway up Portland's southwest hills, and features views of the City, Mt. St. Helens, Mt. Hood, the Willamette River, and the wooded hills of the parkway itself. It connects several other Portland parks and greenspaces. The park's features include the Terwilliger Trail (a continuous paved walking path), as well as areas with picnic tables, viewpoints, multiple hiking trails, and one playground. Terwilliger Boulevard also features a northbound bike lane. As one of several larger, connected greenspaces in Portland's southwest hills, the parkway features multiple areas designated for sensitive wildlife habitat.

As noted in the Terwilliger Parkway Design Guidelines, adopted by the Portland City Council by Ordinance No 155245 in 1983, the parkway's original natural lands and the original 200-foot setback for development in surrounding areas were meant to "allow people to enjoy the natural beauty and setting of Portland while moving through it." The guidelines also note "views of the city, Mt. Hood, Mt. St. Helens [...] are contrasted by sections of the boulevard that are lush and enclosed by tall stands of deciduous trees and second growth fir" and "urban development adjacent to the parkway is sometimes hidden from the trail and boulevard."

An earlier design zone from 1959 noted: "Primary consideration shall be given to safeguarding unobstructed views and to preserving the heavily wooded character. Improvements shall make a minimal amount of interruption to the natural topography."

Based on discussions with the City of Portland, the views from the parkway and its heavily wood character are dominant essential features of the park and recreation resource.

There are a number of recreational features and activities found along the winding and heavily wooded parkway as it follows Terwilliger Boulevard for approximately 2.5 miles. The recreational features include:

- **Passive Recreational Facilities:** The park provides picnic tables in several locations along the parkway and near automobile pull-outs, although none are adjacent to the areas considered for the Marquam Hill Connector.
- **Active Recreational Facilities:** The park includes a paved walking path (Terwilliger Trail) along the eastern side of Terwilliger Boulevard, as well as a northbound bike lane. These facilities are a popular destination for cyclists, walkers and runners. The park also includes one playground. There are trailheads for multiple urban trails (known as the SW Trails) connecting through the parkway to Southwest Portland destinations like the Marquam Trail, the Buhler Cutoff Trail, and local roads and neighborhoods. SW Trail #1 is a 6.7 mile urban trail with a section in or adjacent to the areas being considered for the Marquam Hill Connector, with a short section in the park that uses the walking path as part of route connecting from South Portland up through OHSU and Marquam Nature Park, SW Fairmount Boulevard, Bridlemile, and Raleigh Hills.
- **Connections to Other Parks.** Terwilliger Parkway provides important path connections between Duniway Park to the north, Marquam Hill Nature Park and Keller Woods to the west, and George Himes Park to the South. A short road segment along SW Woods St and down a set of stairs to a crossing of SW Barbur Blvd. also connects Terwilliger Parkway to Lair Hill Park.



- **Recreational viewpoints:** While largely blocked by tall vegetation, scenic viewpoints of Portland and Mt. Hood are available from several locations along the walking path/Terwilliger Trail and bike lane along Terwilliger Blvd and from the Elk Point Viewpoint. During winter in particular, there are several locations near the Marquam Hill Connector options where long range views are available from SW Terwilliger Boulevard and the trail.

## **ATTACHMENT DD4 – PUBLIC COMMENTS**

This attachment provides copies of comments from the general public, ordered chronologically and numbered as follows:

- 1. 12/22/20 public comment email** from Wayne Stewart
- 2. 12/23/20 public comment email** from Anne and Steve
- 3. 01/07/21 oral public comment** from Anton Vetterlein
- 4. 01/18/21 public comment email** from Jeff Lang
- 5. 01/19/21 public comment email** from Richard Stein
- 6. 01/19/21 public comment email** from Robin Vesey
- 7. 01/19/21 public comment email** and attachment from Anton Vetterlein

## 1. 12/22/20 public comment email from Wayne Stewart

**Agosto, Amparo**

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**From:** Carolyn and Wayne Stewart <[REDACTED]>  
**Sent:** Tuesday, December 22, 2020 2:15 PM  
**To:** SW Corridor  
**Cc:** [REDACTED]  
**Subject:** Comments on impacts to Terwilliger Parkway, an historic and cultural property and City of Portland park

The proposed Barbur to Terwilliger connection project (an inclined elevator) will cause an adverse effect on Terwilliger Parkway, an historic and cultural resource, in that it will diminish the integrity of the Parkway, require damage and destruction, change the forested character of the Parkway, and introduce incompatible visual elements. Section 106 requires exploration of measures to avoid or reduce adverse impacts to historic properties.

Section 4(f) requires that special effort be made to preserve the natural beauty of park lands and historic sites. A project can be approved ONLY IF there is no prudent and feasible alternative and if the project includes ALL possible planning to MINIMIZE harm. The selected alternative that has the LEAST IMPACT on the resource MUST BE SELECTED. The proposed project does not fulfill the requirements of Section 106 nor of Section 4(f). Terwilliger Parkway is a two-lane scenic road used by motorists and bicyclists with a nine foot sidewalk used by many walkers, joggers, and families with small children. The natural setting of the Parkway, which was essential to the 1903 plan for Terwilliger Parkway proposed by the nationally admired Olmsted Brothers, includes a slow speed winding road and trail set in this heavily forested corridor. The proposed inclined elevator would introduce jarring urban infrastructure elements (e.g., station house, auxiliary structures, urban scale plaza, elevator cars, bright lighting, signalized intersection) into this scenic forested corridor.

There are two alternatives to the inclined elevator proposal that would create less of an impact on Terwilliger Parkway. First, a shuttle bus system would have the least impact on this natural resource and would meet the Section 4(f) requirement that the alternative with the LEAST IMPACT on the resource MUST BE SELECTED. In fact, a shuttle bus system integrated with the MAX schedule would be much superior to the proposal in that it would provide weather protected service directly to key buildings on the OHSU and VA campuses. As a side note, the inclined elevator proposal will only bring staff, patients and visitors to the east side of Terwilliger Parkway, far from any of the destinations on the vast OHSU and VA campuses. The projected 10,000 users per day, including those with mobility and other issues, would be forced to navigate the hilly campuses on foot and without weather protection.

The second alternative is for the previously considered Tower and Bridge Concept. While this alternative is not the "least impactful" solution, it does somewhat reduce the impacts to Terwilliger Parkway over the proposed inclined elevator project. The bridge would touch down at Terwilliger and reduces the impact on tree cover, does not impede wildlife movement, does not require a large plaza, does not require any buildings, and can be fitted with low level path lighting. Unfortunately, a signalized crossing of Terwilliger may still be needed, although queueing will be less of an issue, the daily users would only be brought to Terwilliger, leaving them far from their destinations on campus.

In summary, the inclined elevator proposal fails to meet the requirements of Section 106 and Section 4(f) in the following regards:

1. The integrity of Terwilliger Parkway will be significantly diminished.
  2. The character of Terwilliger Parkway will be changed from a slow speed winding road and sidewalk in a heavily forested setting into an highly urbanized street intersection serving 10,000 people per day.
  3. Incompatible visual elements will be introduced (e.g., signalized intersection, urban plaza, buildings and structures, elevator cars, urban level lighting).
- Under Section 4(f), a "special effort" must be made to preserve the natural beauty of park and recreation lands and historic sites.

Under Section 4(f), the alternative that has the "least overall impact on the resource MUST be selected".  
The proposed mitigating efforts (interpretive signage, monument sign, tree planting) will not, in any way, compensate for the scale of damage that would be done to this historic and cultural resource should the proposed project be implemented.  
Please go back to the drawing board and come up with a proposal that will preserve Terwilliger Parkway in its current natural state for the enjoyment of future generations of Oregonians.  
Wayne P. Stewart  
[REDACTED]

Sent from my iPad



## 2. 12/23/20 public comment email from Anne and Steve

**Agosto, Amparo**

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**From:** A Olsofka [REDACTED] >  
**Sent:** Wednesday, December 23, 2020 12:16 PM  
**To:** SW Corridor  
**Subject:** Public Parks and Historic Properties

Good Day,

We have lived in SW Portland for 35 years and have followed the SW Corridor Project. First I would like to say that the planning and design were poorly executed and a huge waste of Tax Payer Dollars. The best route would be to follow I5 or SW Barber BLVD. The planners made the route convoluted rather than following a logical path.

It is unconscionable that now the project wants to impact our Public Parks to the extent noted in the publication. The buildings and properties mentioned should be left as they are. They are an integral part of Portland's history.

Thousands of older growth trees have been lost in SW Portland in the last 10 years due to PBOT and Metro Projects and infill. Please reconsider the impacts to our neighborhoods and the residents that live in Southwest.

Thanks for the opportunity to comment,  
Anne and Steve

### 3. 01/07/21 oral public comment from Anton Vetterlein

***Transcribed oral comment:***

Good evening, I am Anton Vetterlein with Friends of Terwilliger. We are preparing some comments to send to FTA or TriMet and I just wanted to summarize. The main concern we have is that it seems that the proposed mitigation for the historic aspect, I believe that is the 106, seems really paltry. A couple of historic signs doesn't seem to come anywhere close to compensating for the impacts to the parkway. It is a major urban intrusion in a forested park area, but also by pushing all of the impacts down onto the parkway and not connecting directly to OHSU, the project – as some of the other proposals did – it saved the project tens of millions of dollars and so I think a couple of interpretive signs doesn't come anywhere close to making up for that. The impacts have been pushed off of OHSU and down onto the parkway, and we've talked before about how we'd like to see something that works to kind of tie the parkway together from one end to the other. Improvements to the lighting system or something else and so, I'll say more about that in our letter. Thank you.

#### 4. 01/18/21 public comment email from Jeff Lang

##### **Agosto, Amparo**

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**From:** JEFFREY M LANG [REDACTED] >  
**Sent:** Monday, January 18, 2021 10:33 PM  
**To:** SW Corridor  
**Subject:** RE: 3225 SW Barbur Blvd-Portland, Or. Public Record/west side Light Rail  
FEIS/106-4F/1966 Historic preservation Act-eligibility

##### **Aster Moulton** (They/Them)

Community Affairs Representative  
Transit Equity, Inclusion and Community Affairs  
Office: 503-962-2284 Mobile: 503-956-9702  
Email: MoultonA@TriMet.org

To whom it may concern & representatives, Board, Staff and agency of record TriMet,

Please consider this a public notice that a group of individuals located in South Portland neighborhoods have interest in investigating the possibility of preserving the Building known as "Barbur Blvd Bee Hive," referenced above. We were unable to testify at Trimet public hearing last week and ask that this document be added to the record.

The Signer below have no affiliation or representation to the buildings current tenant, Congregation Ahavath Achim Synagogue.

The Signer below is a Board member of the South Portland Neighborhood Association (SPNA) but this request/notice is not written by or represent SPNA.

Contacts have been made with the Bee Hive Building designer & Architect, John Storrs' family. Members of Portland Architectural community have expressed interest. The SPNA have interest in further research, analysis and exploration of preservation of this unique-historical building. The SPNA Land-use committee has reviewed the buildings current situation.

The Bee Hive Building built in 1966 is a very unique structure on the West Coast. Its stained glass lit catenary style dome and non-electrical natural audio amplification system make it a very arresting building. Built and formerly occupied by Turkish and island of Rhodes diaspora Sephardic Jews who made Portland their home since the late 1890's.

We have received comments from neighbors and Architects that believe the building has the possibility of many utilitarian purposes. Coffee Shop, Community Choral Center or Neighborhood administrative offices. etc. etc.

Deliberations are on-going. We will advise Trimet of our progress.

Thanks for the opportunity to testify and good luck lifting the South West Corridor "Pause."

Respectfully yours, Jeffrey

Jeff Lang

JM Lang, LLC





## 5. 01/19/21 public comment email from Richard Stein

**Agosto, Amparo**

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**From:** richard stein [REDACTED] >  
**Sent:** Tuesday, January 19, 2021 1:16 PM  
**To:** SW Corridor  
**Cc:** Earl; Senator Jeff Merkley; Senator Ron Wyden  
**Subject:** No to the historical Terwilliger Parkway land being taken for SW Corridor transportation infrastructure

I ask that you please vote against taking part of the Terwilliger Parkway for the proposed Light Rail transportation infrastructure.

Terwilliger Parkway was clearly seen as a legacy piece by the Portland city council in the early 1900's and again in the 1970's when adopting the Terwilliger Parkway Design Guidelines Plan. Threats to the Parkway have been staved off for over 100 years both by activists and elected officials. This legacy is in **our** hands now for the benefit of many future generations of Portlanders. As Ru Paul says to those on his t.v. program, "Don't fuck it up!"

Let's all be exemplary stewards of this incredibly valuable public park.

Thank you,  
Richard Stein

901 SW Westwood Drive  
Portland, OR. 97239

P.S. rather than repeat what my neighbor Robin Vesey has already stated, I've included her letter and please know I agree completely with all her points.

Robin's letter:

### **No to historical Terwilliger Parkway land being taken for SW Corridor transportation infrastructure. RE: Sections 4(f) and 106**

I'm asking that you rule against the Marquam Hill Connection (MHC), part of the SW Corridor Light Rail Project, due to its planned adverse and permanent impacts to a historic park and a local green treasure: Terwilliger Parkway. Taking public, historic parkland for building a transportation connection would require a major and life-long alteration to this park. It would lose its integrity and function as a wildlife corridor due to this permanent interruption. It would set a precedent by "paving" the way to the taking of other historic Portland parks.

Terwilliger Parkway is a historic, tree-lined **linear park** designed in 1903 and opened in 1912. Three land grants between 1910 and 1912 formed the beginnings of this linear park. The park is defined by the city of Portland

as "city or parks bureau-owned property adjacent to and/or within 400 feet of Terwilliger Boulevard", the road. "The deeds of gift for the donated lands mandated that the Parkway be improved for public enjoyment rather than commercial use." In 1959, "an overlay design zone was adopted using the (Terwilliger Parkway) boundary established in 1928. The objective for the design zone stated that: Primary consideration shall be given to safeguarding unobstructed views and to preserving the heavily wooded character. Improvements shall make a minimal amount of interruption to the natural topography."

This MHC as it is proposed, will create immense destruction by cutting down hundreds of trees, changing the hilly topography, offering the potential for landslides, and removing land from the public's hands.

I encourage you to abandon the proposed MHC infrastructure therefore not requiring use of Section 4(f) and continued protection of this historic resource, regulated under Section 106.

Sincerely,

Robin Vesey

SW Portland resident

## 6. 01/19/21 public comment email from Robin Vesey

**Agosto, Amparo**

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**From:** Robin Vesey [REDACTED] >  
**Sent:** Tuesday, January 19, 2021 8:11 AM  
**To:** SW Corridor  
**Cc:** Blumenauer, Earl; Senator Jeff Merkley; Senator Ron Wyden  
**Subject:** No to Historical Terwilliger Parkway land being taken for SW Corridor

### **No to historical Terwilliger Parkway land being taken for SW Corridor transportation infrastructure. RE: Sections 4(f) and 106**

I'm asking that you rule against the Marquam Hill Connection (MHC), part of the SW Corridor Light Rail Project, due to its planned adverse and permanent impacts to a historic park and a local green treasure: Terwilliger Parkway. Taking public, historic parkland for building a transportation connection would require a major and life-long alteration to this park. It would lose its integrity and function as a wildlife corridor due to this permanent interruption. It would set a precedent by "paving" the way to the taking of other historic Portland parks.

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This MHC as it is proposed, will create immense destruction by cutting down hundreds of trees, changing the hilly topography, offering the potential for landslides, and removing land from the public's hands.

I encourage you to abandon the proposed MHC infrastructure therefore not requiring use of Section 4(f) and continued protection of this historic resource, regulated under Section 106.

Sincerely,

Robin Vesey

SW Portland resident

<sup>[1]</sup> Terwilliger Parkway Design Guidelines, page4

<sup>[2]</sup> Terwilliger Parkway Corridor Plan, page3

<sup>[3]</sup> Terwilliger Parkway Design Guidelines, page 1

## 7. 01/19/21 public comment email and attachment from Anton Vetterlein

Email:

**Agosto, Amparo**

**From:** Anton Vetterlein [REDACTED] >  
**Sent:** Tuesday, January 19, 2021 1:12 PM  
**To:** SW Corridor  
**Subject:** SW Corridor Light Rail Project EIS Comments  
**Attachments:** SWCP EIS RESPONSE to FTA.docx

Comments on "Potential Impacts and Mitigations for Historic Properties and Public Parks document" – SW Corridor Light Rail Project EIS

Friends of Terwilliger is a 501c(3) non-profit whose mission is to protect and enhance the historic, scenic, natural, and recreational character of Terwilliger Parkway. Terwilliger Parkway is a linear Portland park whose oldest historic section was conceived by the Olmsted Brothers of Brookline, Mass. It is 2.5 miles long and 115 acres, from the edge of downtown Portland to SW Capitol Hwy. We have submitted a nomination to list it on the National Register of Historic Places that has been approved by the Oregon State Parks Department and forwarded to the National Park Service for their consideration in March 2021.

TriMet's Section 106 statement of adverse effects to the historic resources of Terwilliger Parkway does not fully describe the impacts that the Southwest Corridor Project's Marquam Hill Connector will cause. A particular vulnerability of a narrow linear park is its susceptibility to fragmentation. The Connector will bifurcate the park and interrupt the linear continuity of the scenic and natural experience that the Olmsteds conceived. The Connector cuts a swath of urban transportation infrastructure through a wooded canyon, and its head house and a small plaza will crowd the park pathway on the east side next to the roadway. A new traffic light and roadway changes will be required at the intersection for all the pedestrian traffic. The Terwilliger Parkway Corridor Plan (CoP ord. 155241, 1983) Transportation Policy A.2 states "*Traffic signals, channelization and other spot improvements are inconsistent with the character of Terwilliger; ...*" which makes clear that such intrusions should not be taken lightly. And changes such as long ADA ramps and lighting within the park west of the roadway will be required to convey pedestrians up to OHSU (these associated improvements may not be part of TriMet's project but will certainly be required due to the project and thus should be included among the impacts.)

Terwilliger Parkway is very popular with runners and walkers throughout the day, week, and year and there will undoubtedly be conflicts between Connector users and recreationalists where their paths meet in the narrow space between the top of the Connector and the roadway. The parkway is also a very popular recreational and commuter bike route that will likewise be interrupted at the crossing. The impacts of the Connector will be felt beyond its immediate location and could discourage park users from passing its congested location and cause fragmentation of the whole corridor. Once it has been justified in this location, it can be justified elsewhere.

The Terwilliger Parkway Corridor Plan calls for a "Forest Corridor" at this location and defines it as "*A continuous, visually uninterrupted segment of the roadway which is heavily enclosed by native forest plantings and hillsides. Development is completely screened from view*". The Forest Corridor has already been largely eliminated on the west side of the park due to OHSU development, and now the Connector project will eliminate a swath of it on the east side of the park. Screening will be impossible because it will be built right up to the pathway and roadway.

The Connector will violate almost every Goal of the Terwilliger Parkway Corridor Plan, which are as follows:



- A. To preserve and enhance the scenic character and natural beauty of Terwilliger Parkway and Boulevard.
- B. To maintain and enhance unobstructed views from Terwilliger Boulevard and Trail.
- C. To improve opportunities for a variety of recreational uses along Terwilliger and reduce conflicts between these uses.
- D. To guide the siting, scale, landscaping, traffic impacts and design of new development to enhance the aesthetic experience of Terwilliger.
- E. To manage the location and design of new vehicular and pedestrian access to Terwilliger in order to reduce traffic hazards and incompatible visual impacts.
- F. To reinforce the primary transportation function of the parkway as a leisurely, scenic drive and bicycle commuting path, rather than a heavily used route for vehicle through traffic.
- G. To improve public safety and protect citizens from crime.
- H. To reduce maintenance and improvement costs.

The Connector proposal of an Inclined Elevator terminating on the east side of Terwilliger Blvd. has placed all the impacts in the park in order to minimize project costs and reduce the impacts on OHSU (Oregon Health and Science University, which is the primary destination of the Connector.) Numerous options were considered in the planning process that would have minimized impacts to the park and connected closer and more directly to the main levels of OHSU, but these were rejected because of cost and because OHSU is unwilling to bear the associated impacts. Cost estimates for a pedestrian tunnel or second aerial tram, both of which would have far fewer long term impacts to the parkway, were from \$5 million to \$80 million more than the proposed Inclined Elevator option. That savings comes at the expense of the historic, scenic, recreational, wildlife, and habitat resources of Terwilliger Parkway. TriMet's proposed mitigation of a couple signs and a "collaborative process" does not come close to mitigating for the permanent impacts or compensating for the reduced cost and logistical advantage of building the Connector on park property.

Compared to the mitigations proposed for the Section 4(f) impacts, the Section 106 mitigations seem token at best. A commemorative sign may be appropriate to memorialize something of low historical value, or a very minor intrusion, or something that was marred in an earlier age that we now regret. But erecting a sign to commemorate something that you are planning on destroying or significantly altering is a cynical ploy. We would welcome commemorative or interpretive signage in the parkway only in addition to more robust mitigation. We are also very skeptical of the offer of a "collaborative process" in designing the Connector because there is little to be decided at this point that will compensate for the damage done by placing the Connector in the park in the first place.

Friends of Terwilliger have tried throughout the EIS process to engage with TriMet and Metro in a discussion about appropriate mitigation but we have been held at arms length. They listen but haven't responded in any way to our proposals. They mentioned commemorative signage at the outset and they haven't changed that proposal regardless of our arguments. Because the Connector project interrupts the continuity of the linear parkway corridor we think appropriate mitigation should reinforce the continuity and identity of the parkway so that it does not become fragmented. The one element (besides the roadway itself) that identifies and characterizes the continuity of the parkway is the lighting system with its regularly placed flared concrete light

poles, underground wiring, and unique globe light fixtures on top. Many of the light poles are old and deteriorating, and many have been carelessly replaced by the Portland Bureau of Transportation with new poles of varying height and often in non-original locations, creating a haphazard look. And some poles have simply been eliminated without replacement. Restoring and replacing the light poles in their original locations between SW Sheridan St. and SW Capitol Hwy. is appropriate mitigation that would greatly enhance the historic identity of Terwilliger Parkway.

The other mitigation that would reinforce the identity of the parkway is gateway signs marking the major entry points. One such sign was erected near SW Sheridan St. at the north entrance to the parkway as part of the 2012 Centennial celebration of the parkway. That sign was intended to be a prototype for additional gateway signs. The location for the south gateway sign has already been prepared near Barbur Blvd. at the intersection of SW 7th Ave. and Terwilliger Blvd. The third major entry point is at the Capitol Hwy. intersection with Terwilliger Blvd. where a site for a gateway sign that is highly visible has been identified close to the N.E. corner. If gateway signage is being considered as mitigation for the Connector then at least two new signs should be required. Moreover, additional design elements were part of the gateway sign design but were omitted on the only one built because of limited funding from Portland Parks and Recreation. Those additional design elements (stone work and plantings) should also be completed for all three gateway signs.

If TriMet has determined that it is absolutely necessary to irreparably alter and interrupt Terwilliger Parkway then mitigation should be required that attempts to make the park whole again. Interpretive signs are a welcome addition to the park if sensitively done, but they by no means mitigate for the extensive harm that the Connector project will cause to the historic and scenic qualities of the park. We ask that FTA require more robust mitigation.

Sincerely,

Anton Vetterlein

Friends of Terwilliger president

[REDACTED]  
[REDACTED]  
[REDACTED]

**Attachment:**

Comments on "Potential Impacts and Mitigations for Historic Properties and Public Parks document" – SW Corridor Light Rail Project EIS – Portland, Oregon – Jan. 19, 2021

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Sincerely,

Anton Vetterlein  
Friends of Terwilliger president



## **ATTACHMENT DD5 – MEMORANDUM OF AGREEMENT FOR HISTORIC AND ARCHAEOLOGICAL RESOURCES**

This attachment provides the Section 106 Memorandum of Agreement (MOA) signed by the Oregon SHPO, FTA and TriMet.

## **MEMORANDUM OF AGREEMENT**

### **BETWEEN THE FEDERAL TRANSIT ADMINISTRATION AND THE OREGON STATE HISTORIC PRESERVATION OFFICER,**

### **REGARDING THE SOUTHWEST CORRIDOR LIGHT RAIL PROJECT**

**WHEREAS**, subject to commitment of local funding, the Federal Transit Administration (FTA) plans to provide funding for the Southwest Corridor Light Rail Project (Undertaking) to the Tri-County Metropolitan Transportation District (TriMet) pursuant to the Fixed Guideway Capital Investment Grants Program (49 United States Code [U.S.C.] §5309); and

**WHEREAS**, the Undertaking consists of a light rail investment in Oregon, including an 11-mile-long light rail extension that roughly parallels Oregon Route 99W/SW Barbur Boulevard in Portland and Interstate 5 in Tigard, extending from the City of Portland in Multnomah County to the Cities of Tigard and Tualatin in Washington County, and related transportation improvements that would improve access to the South Portland neighborhood at the Ross Island Bridge, and includes other access facilities in support of the light rail system; and

**WHEREAS**, FTA has defined the Undertaking's Area of Potential Effects (APE) to encompass areas that may experience potential direct or indirect effects on historic resources (including noise, vibration and visual effects), generally including the area within 50 feet from the outer edge of the project design footprint, as well as full-parcel property acquisitions, as mapped and described in Attachment A; and

**WHEREAS**, FTA has determined that the Undertaking will have an adverse effect on the following historic properties, which are listed or eligible for listing in the National Register of Historic Places (NRHP): Congregation Ahavath Achim Synagogue (3225 SW Barbur Boulevard); Terwilliger Parkway; the Jewish Shelter Home (4133 SW Corbett Avenue); Rasmussen Village Apartments (4936-4950 SW Barbur Boulevard); Capitol Hill Motel (9110 SW Barbur Boulevard); a commercial building at 11125 SW Barbur Boulevard; a residence at 5350 Pasadena Street; SW Newbury Street Viaduct (Bridge #01983); SW Vermont Street Viaduct (Bridge #01984); the Oregon Electric Railway Overcrossing (Bridge #02010); and the South Portland Historic District (SPHD); and

**WHEREAS**, FTA has determined that ground-disturbing work for the Undertaking may adversely affect archaeological resources that may be eligible for listing in the NRHP (including, but not limited to Isolate 19/2798-1 and Sites 17/2534-1, 35MU129, and 35MU238), but are located in areas that are currently not accessible for testing and evaluation; and

**WHEREAS**, FTA has consulted with the Oregon State Historic Preservation Officer (SHPO) under SHPO Case# 16-1621 pursuant to 36 Code of Federal Regulations (CFR) Part 800, the regulations implementing Section 106 of the National Historic Preservation Act (54 U.S.C. §306108); and

**WHEREAS**, FTA has consulted with the Confederated Tribes of Grand Ronde Community of Oregon, Confederated Tribes of the Warm Springs Reservation of Oregon, Confederated Tribes of Siletz Indians of Oregon, Cowlitz Indian Tribe, and Confederated Tribes and Bands of the Yakama Nation regarding the effects of the Undertaking on historic properties and the development of mitigation measures and stipulations; and



**WHEREAS**, FTA acknowledges its continued responsibility to engage in meaningful consultation with the above Tribes throughout the process of carrying out the stipulations of this Agreement as applicable; and

**WHEREAS**, FTA has consulted with the Oregon Department of Transportation, City of Portland, City of Tigard, and Restore Oregon regarding the effects of the Undertaking on historic properties and the development of mitigation measures and stipulations; and

**WHEREAS**, FTA has coordinated with Friends of Terwilliger and the public on the effects of the Undertaking on historic properties and the development of mitigation measures and stipulations; and

**WHEREAS**, FTA has invited TriMet to be a signatory to this Agreement; and

**WHEREAS**, in accordance with 36 CFR Part 800.6(a)(1), FTA notified the Advisory Council on Historic Preservation (ACHP) of its adverse effect determination with specified documentation on April 28, 2021, and the ACHP chose on May 13, 2021 *not to* participate in the consultation pursuant to 36 CFR Part 800.6(a)(1)(iii); and

**NOW, THEREFORE**, FTA and SHPO agree that the Undertaking shall be implemented in accordance with the following stipulations in order to take into account the effects of the Undertaking on historic properties.

## **STIPULATIONS**

FTA shall ensure that the following measures are carried out:

### **D) General Requirements**

- A) As a condition of the award of any funding, FTA shall require that TriMet carry out the requirements of this Agreement.
- B) Signatories and consulting parties shall keep sensitive cultural resources information confidential to the extent allowed by state and federal law. Sensitive cultural resources information is defined as information about the location, character, or ownership of a historic property if it is determined that disclosure may cause a significant invasion of privacy, risk harm to a historic property, impede the use of a traditional religious site by practitioners, or contain archaeological site description or location information. Sensitive cultural resources information shall be excluded from all public documents. Unredacted documents that contain sensitive cultural resources information shall only be accessed by approved personnel or qualified archaeologists as defined by Oregon Revised Statutes (ORS) 390.235(6)(b) and the Secretary of Interior's Professional Qualifications Standards (36 CFR Part 61).
- C) FTA shall require that all work carried out under to this Agreement shall meet the Secretary of the Interior's Standards and Guidelines for Archaeology and Historic Preservation (48 Federal Register 44716) as well as existing standards and guidelines for historic preservation activities established by SHPO. All work carried out under this Agreement shall be conducted by, or under the direct supervision of, a person or persons meeting the Secretary of the Interior's Professional Qualification Standards (36 CFR 61).

- D) FTA shall honor the request of any interested and affected Indian Tribe for direct government-to-government consultation regarding the Undertaking.
- E) Definitions in 36 CFR 800.16 will be used for purposes of this Agreement.
- F) FTA shall provide the signatories and consulting parties at least one opportunity lasting a minimum of thirty (30) calendar days to comment on the completeness of the mitigation materials specified in the stipulations described in Stipulations II through VII of this document before final submission. Comments provided by the signatories and consulting parties shall be taken into consideration within the limits of the Undertaking as described in the stipulations.

## **II) Mitigation for Adverse Effects to Congregation Ahavath Achim Synagogue**

Congregation Ahavath Achim Synagogue is eligible for listing in the NRHP and will be adversely affected by the construction of the Undertaking, which will alter or remove the building and alter its setting. Mitigation measures are the following:

- A) TriMet will complete Historic American Buildings Survey (HABS) documentation with measured drawings, narrative history, and photographs for the Congregation Ahavath Achim Synagogue. The level of the documentation (Level I, II, or III) will be determined by the National Park Service. TriMet will provide the draft HABS documentation to the National Park Service (Pacific West Region) for review and comment. TriMet will transmit the final HABS documentation to the National Park Service for distribution to the Library of Congress and SHPO.
- B) TriMet, in consultation and collaboration with SHPO and the Oregon Jewish Museum and Center for Holocaust Education, will prepare an interpretive display for installation at the lower terminal of the Marquam Hill Connection. The display will provide information about the Ahavath Achim congregation and the Jewish community of South Portland, including the displacement of the congregation's original synagogue by the South Auditorium Urban Renewal project.
- C) TriMet will consult with the Oregon Jewish Museum and Center for Holocaust Education in the development of digital content to support the above materials.
- D) TriMet will publish the documentation and digital content, as described above, on the project website during construction, and will make the digital files available to the Oregon Jewish Museum and Center for Holocaust Education, and to others upon request. The documentation and digital content would be removed from TriMet's project website after project construction is complete.

## **III) Mitigation for Adverse Effects to Terwilliger Parkway**

Terwilliger Parkway is a City of Portland park that is listed in the NRHP and will be adversely affected by the construction of an inclined elevator and associated connections from SW Barbur Boulevard across the parkway to SW Terwilliger Boulevard. TriMet and the City of Portland have agreed to mitigation to address park impacts, which will enhance habitat, viewsheds, and trails in Terwilliger Parkway, will support natural resource management in Terwilliger Parkway, and will be subject to local permits. Mitigation measures to address the impacts to Terwilliger Parkway as a historic property are the following:

- A) TriMet, in consultation with SHPO, will develop an interpretive display at or near the upper terminal of the Marquam Hill Connection. The display will describe the historic attributes and features of Terwilliger Parkway, will provide information on the Olmsted Brothers and their plan for Portland parks, and will provide information on the City Beautiful movement in Portland.
- B) TriMet will install up to three gateway signs for Terwilliger Parkway consistent with the shape, size, color, and materials of the existing gateway signage at the north end of the parkway. TriMet will determine locations in consultation with the Portland Bureau of Transportation (PBOT) and Portland Parks and Recreation and subject to local permits.
- C) TriMet will install street sign toppers for all street signs along the historic parkway that recognize its placement on the NRHP. The toppers would convey a commonality unique to the parkway. The street sign toppers, as infrastructure improvements within the Terwilliger Parkway, will be reviewed and approved by PBOT in consultation with the Historic Landmarks Commission.
- D) During the detailed design of the Marquam Hill Connection, TriMet will employ a collaborative process involving the City of Portland and SHPO to review design concepts, as outlined in Attachment B. This will be done to solicit community feedback and reduce impacts to the parkway's historic characteristics, attributes, and features by minimizing the visual presence of the infrastructure on the parkway. The design of the Marquam Hill Connection will be subject to existing design guidelines and public hearings before the Historic Landmarks Commission.
- E) TriMet will plant vegetation to the immediate north and south of the Marquam Hill Connection to largely obscure infrastructure elements from Terwilliger Parkway users, subject to City of Portland environmental review. A mix of native deciduous and evergreen species will be used to obscure improvements throughout the year and maintain the visual continuity of a forested corridor. TriMet will prepare and implement a monitoring and maintenance plan for five years after planting. The plan will include a requirement for replanting vegetation that fails during the monitoring period.

#### **IV) Avoidance and Mitigation for Adverse Effects to the Jewish Shelter Home**

The Jewish Shelter Home is listed in the NRHP and will be adversely affected by demolition of the isolation hospital addition currently attached to the property. Retaining the isolation hospital addition would require a deviation from City of Portland street design requirements and a subsequent permit approval. Avoidance and mitigation measures are the following:

- A) TriMet, during final design of the Undertaking, will seek a deviation from street design requirements from the City of Portland to avoid the removal of the isolation hospital addition. If the City of Portland permits the deviation, adverse effect to the Jewish Shelter Home will be avoided.
- B) If the City of Portland does not permit the deviation, and demolition of the isolation hospital structure is necessary, TriMet will restore the back side of the Jewish Shelter Home after the isolation hospital is demolished, consistent with the historic character of the property and in accordance with the Secretary of Interior's Standards. This restoration will be subject to a City of Portland Historic Resource Review. TriMet will provide SHPO an opportunity to review and comment on the restoration plan prior to demolition of the isolation hospital addition.

**V) Mitigation for Adverse Effects to Commercial and Residential Buildings along SW Barbur Boulevard**

Rasmussen Village, Capitol Hill Motel, a commercial building at 11125 SW Barbur Boulevard, and a residence at 5350 SW Pasadena Street are eligible for listing in the NRHP and will be adversely affected by light rail construction. Rasmussen Village will be adversely affected by the removal of an entry sign and relocation of an existing driveway, and the other three structures will be demolished. Mitigation measures are the following:

- A) TriMet will complete Oregon State Level Documentation (i.e., documentation done to Oregon SHPO Standards) for each of the following historic properties: Rasmussen Village, Capitol Hill Motel, 11125 SW Barbur Boulevard, and 5350 SW Pasadena Street.
- B) TriMet will compile a historic context detailing SW Barbur Boulevard's construction during the 1930s and its mid-twentieth-century evolution. The historic context will be provided to SHPO and distributed via the project website hosted by TriMet, and information will be shared in a public presentation in Portland. Specific topics to be included will be:
  - 1) The impact of the road's construction on existing buildings (such as the residence at 5350 SW Pasadena Street)
  - 2) Federal aid projects completed along the roadway (such as the SW Newbury Street Viaduct, SW Vermont Street Viaduct, and the Oregon Electric Railway Overcrossing)
  - 3) Automobile-focused businesses and tourism (such as Capitol Hill Motel), and commercial and residential development (such as Rasmussen Village and the commercial/office building at 11125 SW Barbur Boulevard).
- C) TriMet will attempt to preserve the Capitol Hill Motel's two neon signs for relocation. If the owner of the property chooses not to retain ownership of the signs, TriMet will offer the signs to another party in accordance with TriMet's procedures for the disposal of surplus property. In coordination with SHPO, the City of Portland, and FTA, TriMet will develop a process to identify the third party that would receive the signs. This would include a preference for institutions or other parties that would keep the signs in the public realm and have mission statements that would be supported through the acquisition of the signs.

**VD) Mitigation for Adverse Effects to Bridges**

The SW Newbury Street Viaduct, SW Vermont Street Viaduct, and the Oregon Electric Railway Overcrossing are eligible for listing in the NRHP and will be adversely affected by light rail construction. Each bridge will be demolished. Mitigation measures are the following:

- A) TriMet will complete Historic American Engineering Record (HAER) documentation for the SW Newbury Street Viaduct, the SW Vermont Street Viaduct, and the Oregon Electric Railway Overcrossing. The documentation will include measured drawings, narrative history, and photographs. The level of the documentation (Level I, II, or III) will be determined by the National Park Service. TriMet will provide the draft HAER documentation to the National Park Service (Pacific West Region) for review and comment. TriMet will transmit the final HAER documentation to the National Park Service for distribution to the Library of Congress and SHPO. The bridges shall not be altered or removed until SHPO either has received final HAER documentation from the National Park Service, or has received written confirmation from the



National Park Service that draft HAER documentation submitted for comment contains the materials (drawings, narrative, and photographs) required for a complete submission.

- B) TriMet will develop and install a display in the vicinity of the SW Newbury Street Viaduct. The display will include historical information about the design and construction of the SW Newbury Street and SW Vermont Street Viaducts.
- C) TriMet will develop and install a display in the vicinity of the Oregon Electric Railway Overcrossing. The display will include historical information about the design and construction of the bridge.
- D) TriMet, in consultation with SHPO, will incorporate historical markers commemorating the SW Newbury Street Viaduct, the SW Vermont Street Viaduct, and the Oregon Electric Railway Overcrossing into the design of the structures that will replace them.

#### **VII) Mitigation for Adverse Effects to the South Portland Historic District**

The SPHD is listed in the NRHP. Six properties that are contributing elements to the SPHD will be adversely affected. Two of these are primary contributing structures: the Lawton, Philip and Julia, House (3425 SW 1st Avenue) and the Thompson, D.P., House #1 (3522-3524 SW 1st Avenue). Four of these are secondary contributing structures: the Tartarimi, Gaetano and Victoria, House #1 (338 SW Meade Street), the Fiebiger, Victoria, House (3124 SW Barbur Boulevard), the Chehak, Seraphim John, House #4 (105 SW Curry Street), and the Pulvermacher, R., House (230 SW Woods Street). The Undertaking will also result in a change in the SPHD's setting that will adversely affect the SPHD. Mitigation measures are the following:

- A) TriMet will complete HABS Level Documentation for the six contributing structures: the Lawton, Philip and Julia, House (3425 SW 1st Avenue), the Thompson, D.P., House #1 (3522-3524 SW 1st Avenue), the Tartarimi, Gaetano and Victoria, House #1 (338 SW Meade Street), the Fiebiger, Victoria, House (3124 SW Barbur Boulevard), the Chehak, Seraphim John, House #4 (105 SW Curry Street), and the Pulvermacher, R., House (230 SW Woods Street). The level of the documentation (Level I, II, or III) will be determined by the National Park Service. TriMet will provide the draft HABS documentation to the National Park Service (Pacific West Region) for review and comment. TriMet will transmit the final HABS documentation to the National Park Service for distribution to the Library of Congress and SHPO.
- B) For those buildings that are acquired within the SPHD boundary that will be removed to facilitate light rail construction, TriMet will offer each building at no cost to be relocated by a third party, as soon as feasible within the confines of the acquisition process, and no later than the notice of demolition review is submitted to the City of Portland. In consultation with SHPO and in accordance with 36 CFR Part 60.14, TriMet would give preference to relocations within the SPHD boundary. TriMet will complete Oregon State Level Documentation re-evaluating the individual structures for NRHP eligibility in their new settings.
- C) For those contributing buildings that are acquired within the SPHD boundary, are planned for removal, and for which no interested party has been identified for relocation, TriMet will, in accordance with City of Portland residential demolition requirements, deconstruct the building to salvage re-usable building materials which could be retained by deconstruction contractors for re-use or donated to local non-profits who specialize in re-use of building materials.

- D) TriMet will survey the entire SPHD and amend the 1998 NRHP nomination form. The SPHD spans approximately 49 acres and 31 blocks in the City of Portland, and currently consists of 246 resources in the Lair Hill and Corbett neighborhoods. The survey will include sections on common themes and issues affecting historical integrity and recommendations to improve historical integrity of the district in the future. The survey's findings and recommendations will be presented at a public hearing before the City's Historic Landmarks Commission for consideration of the recommendations. Survey data will be collected at the intensive level and reported to SHPO using the Oregon Historic Sites Database. The 1998 NRHP nomination form amendment will outline recommended changes in contributing status of individual resources in the district. TriMet will provide the draft amendment to SHPO and the State Advisory Committee on Historic Preservation for review and comment, then will submit the final amendment to the Keeper of the National Register. This will be completed within five years after the start of project construction.
- E) TriMet will prepare and host one to three workshops for property owners of the SPHD to connect homeowners with appropriate information and resources to improve the historic character and integrity of the district. The content of workshops will be developed based on the findings and recommendations of the district survey in stipulation VII.D and through consultation with City of Portland Historic Landmarks staff, the Architectural Heritage Center and Restore Oregon. Registration information for attending the workshops will be provided by mail to all property owners in the district at least one month in advance and will be advertised by TriMet to other interested parties identified in consultation with the parties listed above. The workshops will be offered free of charge to attendees. Presentation materials, information, and resources will be made available on the project website during project construction and digital content shared with the City of Portland and others upon request.

#### **VIII) Avoidance of Adverse Effects to Other Historic Properties**

FTA identified properties eligible for listing in the NRHP that will be affected by light rail construction, and determined that the Undertaking's effects will be minor and not adverse. These properties are listed in Attachment C, and measures to avoid adverse effects are the following:

- A) Prior to construction of the Undertaking, TriMet will assess the historic properties in the APE where a finding of No Effect or No Adverse Effect as a result of the Undertaking has been made. This pre-construction assessment will establish existing conditions of the properties' character-defining elements as they relate to the Determination of Eligibility for each property. Within six months after the completion of construction, TriMet will review the condition of these historic properties to verify whether construction of the Undertaking resulted in any unforeseen physical damage or other alteration to the properties' character-defining elements. The pre-construction assessment and post-construction review will be completed with input from a Secretary of the Interior qualified Architectural Historian and will be provided to FTA.
- B) If any unforeseen physical damage or other alteration occurs to the character-defining elements of historic properties as a result of the Undertaking, TriMet will provide sufficient information with input from a Secretary of the Interior qualified Architectural Historian for FTA to determine whether restoration action(s) may be necessary. TriMet will also consult with the owners of the affected properties. FTA, in consultation with SHPO, will determine whether restoration plan(s) are needed and if so, will propose measures consistent with the Secretary of the Interior's Standards for Treatment of Historic Properties for the property owner to consider. TriMet will

contract with a qualified contractor(s) to perform the restoration work(s) in accordance with the authorized restoration plan(s), unless consent is not provided by the property owner(s).

If any design changes having the potential to cause effects to historic properties are made to the Undertaking outside the current APE, including additional staging, construction access, wetland or stormwater mitigation sites, FTA, in consultation with TriMet, will conduct a cultural resources assessment as required by 36 CFR 800, to identify the revised APE and evaluate the effects upon historic properties, and will consult to resolve any additional adverse effects.

FTA will ensure that avoidance of adverse effects to historic properties is the preferred treatment during the design phase and will utilize all feasible, prudent and practicable measures to avoid adverse effects. All design changes that may affect historic properties in the project corridor will be subject to review and concurrence by FTA and SHPO. The final mitigation plan for the Undertaking will address potential design modifications and aesthetic treatments foreseen in final design.

#### **IX) Additional Archaeological Survey**

Inventory and evaluation of potential archaeological resources have not been completed for all areas of the Undertaking where ground disturbance may occur. Some areas of expected ground disturbance are on property where access could not be secured prior to acquisition of the property. Some areas of expected ground disturbance are beneath existing infrastructure (buildings, utilities, and other obstructions) that cannot feasibly be removed until construction. Finally, it is possible that design changes could result in the addition of areas of ground disturbance. Measures to identify and evaluate previously unrecorded archaeological sites or objects in areas that could not be investigated prior to the execution of this Agreement are as follows:

- A) TriMet will conduct archaeological investigations at currently inaccessible parcels as soon as is feasible and practical after access has been secured, if they are within areas identified as High Probability Areas (HPAs), which have been developed in coordination with consulting parties. Parcels in areas outside of HPAs will not be surveyed. Archaeological investigations will use methods consistent with prior archaeological work on the Undertaking.
- B) FTA will continue to consult with Tribes regarding the Place of Aromatic Herbs recorded in the Tigard area, and will work with Tribes to determine appropriate means to protect the resource prior to initiating construction in this area if practical. If the impact is unavoidable, TriMet will follow the procedures outlined in Section X.
- C) FTA will determine NRHP-eligibility for any archaeological sites or objects found during additional survey, and will determine the Undertaking's effects on such NRHP-eligible sites or objects. FTA will provide these determinations and supporting documents to SHPO, Tribes, and consulting parties for review and comment as soon as feasible and practical, and before the start of construction in the area of such sites or objects.

#### **X) Archaeological Work During Construction**

TriMet has prepared an Archaeological Construction Monitoring Plan to guide archaeological monitoring of construction in areas that are either inaccessible prior to construction, or that have been identified as requiring monitoring due to other sensitivities. TriMet has also prepared an Inadvertent Discovery Plan to address situations in which archaeological deposits may be found inadvertently during construction.

- A) TriMet will provide training for construction supervisors and project inspectors on archaeological monitoring areas, staff responsibilities, how to recognize when to stop excavations, and procedures for notification.
- B) TriMet will perform on-site monitoring using archaeological monitors whenever construction activities occur within an HPA flagged for monitoring in the Archaeological Construction Monitoring Plan. If and when archaeological materials are observed, TriMet will halt all construction activities that may impact the discovery and initiate notification procedures outlined in the Archaeological Monitoring Protocol Flow Chart found in the plan.
- C) TriMet will halt all work in the vicinity of an inadvertent discovery until a qualified archaeologist can assess whether the deposit is archaeological and NRHP-eligible. If FTA determines an archaeological deposit to be NRHP-eligible in consultation with SHPO and Tribes, then FTA, in consultation with consulting parties, will consider avoidance and then mitigation measures to be implemented by TriMet.

#### **XI) Post-Construction Reporting on Archaeological Work**

TriMet will prepare a final report on work completed to address additional archaeological survey, archaeological monitoring, and inadvertent discoveries. FTA will provide the report to SHPO, Tribes, and consulting parties for review and comment no later than one year following the completion or cancellation of project construction. The report will include the following, as appropriate:

- A) A summary of archaeological survey work completed under Section IX.
- B) A summary of monitoring tasks completed under Section X.
- C) A summary of inadvertent discoveries under Section X.
- D) Appended SHPO forms for archaeological resources documented during the period addressed by this Agreement, as appropriate.

#### **XII) Collection and Curation**

If archaeological resources are retrieved, FTA determines them to be significant and worthy of preservation, and SHPO agrees, any costs associated with such resource retention shall be the responsibility of TriMet. TriMet will ensure that collections are accessioned at a facility meeting the requirements of 36 CFR 79, unless otherwise indicated by state or local law.



### **XIII) Reporting**

Each year by June 1 following the date of the execution of this Agreement until it expires or is terminated, whichever comes first, TriMet will provide FTA, SHPO, and the consulting parties with a summary report detailing the work undertaken throughout the previous year pursuant to the stipulations of this Agreement. The last report will be submitted within three (3) months of completion of construction of the Undertaking or at completion of this Agreement's terms, if later. The summary report will include any tasks undertaken relevant to stipulations within this Agreement, scheduling changes, problems encountered, and any disputes regarding implementation of these stipulated measures.

### **XIV) Duration**

This Agreement will expire when its stipulations have been completed or by December 31, 2030, whichever is first. Prior to such time, FTA may consult with the other signatories to reconsider the terms of the Agreement and amend it in accordance with Stipulation XVI, below. If the project development prior to December 31, 2030, is limited to construction of an interim terminus, this Agreement could be extended by mutual agreement of FTA and SHPO. An extension would allow for a project development period to accommodate the construction of remaining project elements.

### **XV) Dispute Resolution**

Should any signatory to this Agreement object at any time to any actions proposed or the manner in which the terms of this Agreement are implemented, FTA shall consult with such party to resolve the objection. If FTA determines that such objection cannot be resolved, FTA will:

- A) Forward all documentation relevant to the dispute, including FTA's proposed resolution, to the ACHP. The ACHP shall provide FTA with its advice on the resolution of the objection within thirty (30) days of receiving adequate documentation. Prior to reaching a final decision on the dispute, FTA shall prepare a written response that takes into account any timely advice or comments regarding the dispute from the ACHP and signatories, and provide them with a copy of this written response within thirty (30) days of receiving a response from the ACHP. FTA will then proceed according to its final decision.
- B) If the ACHP does not provide its advice regarding the dispute within the thirty-day (30-day) time period, FTA may make a final decision on the dispute and proceed accordingly. Prior to reaching such a final decision, FTA shall prepare a written response that takes into account any timely comments regarding the dispute from the signatories, and provide them and the ACHP with a copy of such written response within thirty (30) days after allowing the ACHP thirty (30) days to provide advice.
- C) FTA will carry out all other actions subject to the terms of this Agreement that are not the subject of the dispute.

#### **XVI) Amendments**

Any signatory may request that this Agreement be amended by submitting such a request to FTA in writing. FTA shall consult with the signatories for up to thirty (30) calendar days of receiving the request for amendment, or another time period agreed to by all signatories in writing, concerning the necessity and appropriateness of the proposed amendment. Any signatory may request the involvement of the ACHP during the amendment process. At the end of the consultation period, FTA shall provide an amended Agreement for signature by the signatories or a written statement describing why the FTA chose not to pursue an amendment to this Agreement. The amendment shall be effective on the date a copy of the Agreement signed by all of the signatories is filed with the ACHP.

#### **XVII) Termination**

- A) If any signatory to this Agreement determines that its terms will not or cannot be carried out, that party shall immediately consult with the other signatories to attempt to develop an amendment per Stipulation XVI, above. If within thirty (30) days an amendment cannot be reached, any signatory may terminate the Agreement upon written notification to the other signatories. Once the Agreement is terminated, and prior to work continuing on the Undertaking, FTA must either:
  - 1) Execute a memorandum of agreement pursuant to 36 CFR § 800.6, or
  - 2) Request comments from the ACHP and then take into account and respond to any comments received from the ACHP, pursuant to 36 CFR § 800.7.
- B) FTA shall notify the signatories as to the course of action it will pursue.

**SIGNATURE PAGE:**  
**MEMORANDUM OF AGREEMENT**  
**BETWEEN THE FEDERAL TRANSIT ADMINISTRATION AND**  
**THE OREGON STATE HISTORIC PRESERVATION OFFICER,**  
**REGARDING THE SOUTHWEST CORRIDOR LIGHT RAIL PROJECT**

**SIGNATORY**

**Federal Transit Administration**

**LINDA M  
GEHRKE**

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LINDA M GEHRKE  
Date: 2021.12.15  
08:16:00 -08'00'

Linda M. Gehrke  
Regional Administrator

Date \_\_\_\_\_

**SIGNATURE PAGE:**  
**MEMORANDUM OF AGREEMENT**  
**BETWEEN THE FEDERAL TRANSIT ADMINISTRATION AND**  
**THE OREGON STATE HISTORIC PRESERVATION OFFICER,**  
**REGARDING THE SOUTHWEST CORRIDOR LIGHT RAIL PROJECT**

**SIGNATORY**

**Oregon State Historic Preservation Officer**



Christine Curran  
Deputy State Historic Preservation Officer

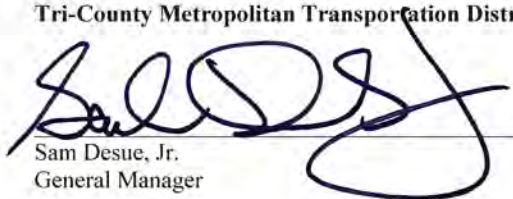
Date 12/09/21



**SIGNATURE PAGE:**  
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**THE OREGON STATE HISTORIC PRESERVATION OFFICER,**  
**REGARDING THE SOUTHWEST CORRIDOR LIGHT RAIL PROJECT**

**INVITED SIGNATORY**

**Tri-County Metropolitan Transportation District of Oregon**

  
\_\_\_\_\_  
Sam Desue, Jr.  
General Manager

Date 12/14/2021

**List of Attachments**

Attachment A: Area of Potential Effect

Attachment B: Marquam Hill Connection Design Objectives and Process

Attachment C: Effects of Light Rail Construction and Ross Island Bridgehead Reconfiguration on  
Individual Historic Properties of the Area of Potential Effect (Buildings and Structures)

**ATTACHMENT A:**  
**AREA OF POTENTIAL EFFECT**



U.S. Department  
of Transportation  
**Federal Transit  
Administration**

REGION X  
Alaska, Idaho, Oregon,  
Washington

915 Second Avenue  
Federal Bldg. Suite 3142  
Seattle, WA 98174-1002  
206-220-7954  
206-220-7959 (fax)

January 7, 2020

Christine Curran  
Deputy State Historic Preservation Officer  
Oregon State Historic Preservation Office  
725 Summer St. NE, Suite C  
Salem, OR 97301

**Subject: Metro and TriMet  
Southwest Corridor Light Rail Project  
National Historic Preservation Act, Section 106  
Revised Area of Potential Effects  
SHPO Case No. 16-1621**

Dear Ms. Curran:

The Federal Transit Administration (FTA), in cooperation with Metro and the Tri-County Metropolitan Transportation District of Oregon (TriMet), is continuing consultation with the Oregon State Historic Preservation Officer (SHPO) under Section 106 of the National Historic Preservation Act, and its implementing regulations at 36 Code of Federal Regulations (CFR) Part 800, for the Southwest Corridor Light Rail Project (Project) in Portland and Tigard, Oregon. This letter provides a brief summary of the Project's National Environmental Policy Act (NEPA) Environmental Impact Statement (EIS) review and Section 106 consultation processes to date, and requests your feedback on the revised Area of Potential Effects (APE) for the Project.

**Project Description**

The Project is an 11-mile-long MAX light rail extension that roughly parallels Oregon Route 99W/SW Barbur Boulevard in Portland and Interstate 5 in Tigard, and extends between the downtown Portland Transit Mall and Bridgeport Village shopping center via downtown Tigard. The Project would provide improved pedestrian and bicycle connections to light rail stations, including adding more substantial infrastructure to the medical complex on Marquam Hill and Portland Community College's Sylvania Campus. The Project also includes supportive pedestrian and bicycle improvements that would complement the light rail project.



January 7, 2020  
Page 2

#### **Revised APE**

Attachment A enclosed with this letter summarizes the NEPA EIS review and Section 106 consultation processes that have occurred to date for the Project. As indicated in Attachment A, a Preferred Alternative was selected for the Project by the Metro Council in November of 2018. To reflect this continuing development of the Project, the APE has been revised, and is enclosed with this letter as Attachment B. On the maps in Attachment B, the revised APE is depicted as the Preferred Alternative APE. These maps also identify new areas that are now within the revised APE as compared to the previous APE, which is depicted as the DEIS APE.

The revised APE (Preferred Alternative APE in Attachment B) generally encompasses areas within 50 feet from the outer edge of the Project design footprint, as well as full-parcel property acquisitions. This 50-foot buffer is intended to account for potential indirect effects on historic resources (such as noise, vibration, and visual and contextual effects). Compared to the previous APE (DEIS APE in Attachment B), it now incorporates specific property acquisitions; additional design information, including temporary construction easements; refinements in design; and additional details such as intersection and street improvements, utility connections, and stormwater facilities.

#### **Next Steps**

FTA, Metro, and TriMet are currently working on the Final EIS analyses. As part of these analyses, historic resources that are within the revised APE, or are on parcels crossed by the revised APE, will be documented and assessed, and archaeological resources within the revised APE will be identified and assessed. The Project team is currently updating the Cultural Resources Survey Report prepared during the Draft EIS, and preparing a more detailed archaeological report and survey plan for the Final EIS efforts covering the potential for resources within the revised APE.

#### **Request for Comment**

Pursuant to 36 CFR Part 800, FTA invites your comments on the revised APE within 30 days of receipt of this letter. If FTA can provide any assistance or additional information which would aid in your prompt reply, please feel free to contact Mark Assam, FTA, at (206) 220-4465 or [mark.assam@dot.gov](mailto:mark.assam@dot.gov).

Thank you for your consultation on the Project.

Sincerely,

**LINDA M** Digitally signed by  
LINDA M GEHRKE  
Date: 2020.01.07  
15:19:10 -08'00'  
**GEHRKE**

Linda M. Gehrke  
Regional Administrator

cc: Jamie French, Archaeologist, Oregon State Historic Preservation Office  
Tracy Schwartz, Historic Preservation Specialist, Oregon State Historic Preservation Office  
Chris Ford, Investment Areas Project Manager, Metro  
Joe Recker, Environmental Permits Coordinator, TriMet

January 7, 2020  
Page 3

Enclosures: Attachment A - Summary of National Environmental Policy Act Environmental  
Impact Statement Review and Section 106 Processes  
Attachment B - Revised Area of Potential Effects Maps

**Attachment A**  
**Summary of National Environmental Policy Act Environmental Impact Statement Review**  
**and Section 106 Consultation Processes**

**Metro and TriMet - Southwest Corridor Light Rail Project**

- **September 2011:** The Federal Transit Administration (FTA) initiated early scoping under the National Environmental Policy Act (NEPA) for the Southwest Corridor Light Rail Project (Project) in cooperation with Metro (the designated Metropolitan Planning Organization for the Portland area) and the Tri-County Metropolitan Transportation District of Oregon (TriMet). FTA, Metro, and TriMet began the process of alternatives analysis, considering many routes and modes for a high-capacity transit connection from downtown Portland to southeastern Washington County.
- **September 2016:** FTA issued a Notice of Intent to prepare an Environmental Impact Statement (EIS).
- **January 2017:** FTA initiated consultation under Section 106 of the National Historic Preservation Act (NHPA) with the Oregon State Historic Preservation Officer (SHPO), interested tribes, and other consulting parties, and defined the Area of Potential Effects (APE) for the Project (which at the time included all alternatives under consideration). FTA, Metro, and TriMet representatives met with SHPO staff to outline the approach and level of effort for cultural resource identification and evaluation for the Project. Subsequently, the draft Archaeological and Cultural Resources section of the Draft EIS and a draft Department of Transportation Act Section 4(f) analysis were sent to SHPO for review.
- **March 2018:** SHPO provided Metro with a letter expressing support for the approach of providing detailed impacts and mitigation after selection of a Preferred Alternative for the Project.
- **June 2018:** The Draft EIS was published for public review. The Draft EIS included a preliminary Cultural Resources Survey Report (the November 2017 *Cultural Resources Survey for the Southwest Corridor Light Rail Project, Multnomah and Washington Counties, Oregon*). This report contained maps and tables of above-ground historic resources and archeological high-probability areas (HPAs) within the Draft EIS study area.
- **November 2018:** Metro Council selected a Preferred Alternative for the Project, taking into account the findings of the Draft EIS, the recommendations of staff and an appointed steering committee, and public comment on the Draft EIS.

As part of three related but separate undertakings, FTA consulted with SHPO and interested tribes on three phases of the Geotechnical Borings for the Southwest Corridor Light Rail Project: Phase 1, dated March 25, 2019; Phase 2, dated July 23, 2019; and Phase 3, dated September 24, 2019. These three geotechnical investigation undertakings support the ongoing design of the Project.

**Attachment B**  
**Revised Area of Potential Effects Maps**

**Metro and TriMet - Southwest Corridor Light Rail Project**

The revised Area of Potential Effects (APE) is depicted on the following maps as the Preferred Alternative APE. These maps also identify new areas that are now within the revised APE as compared to the previous APE, which is depicted as the DEIS APE.

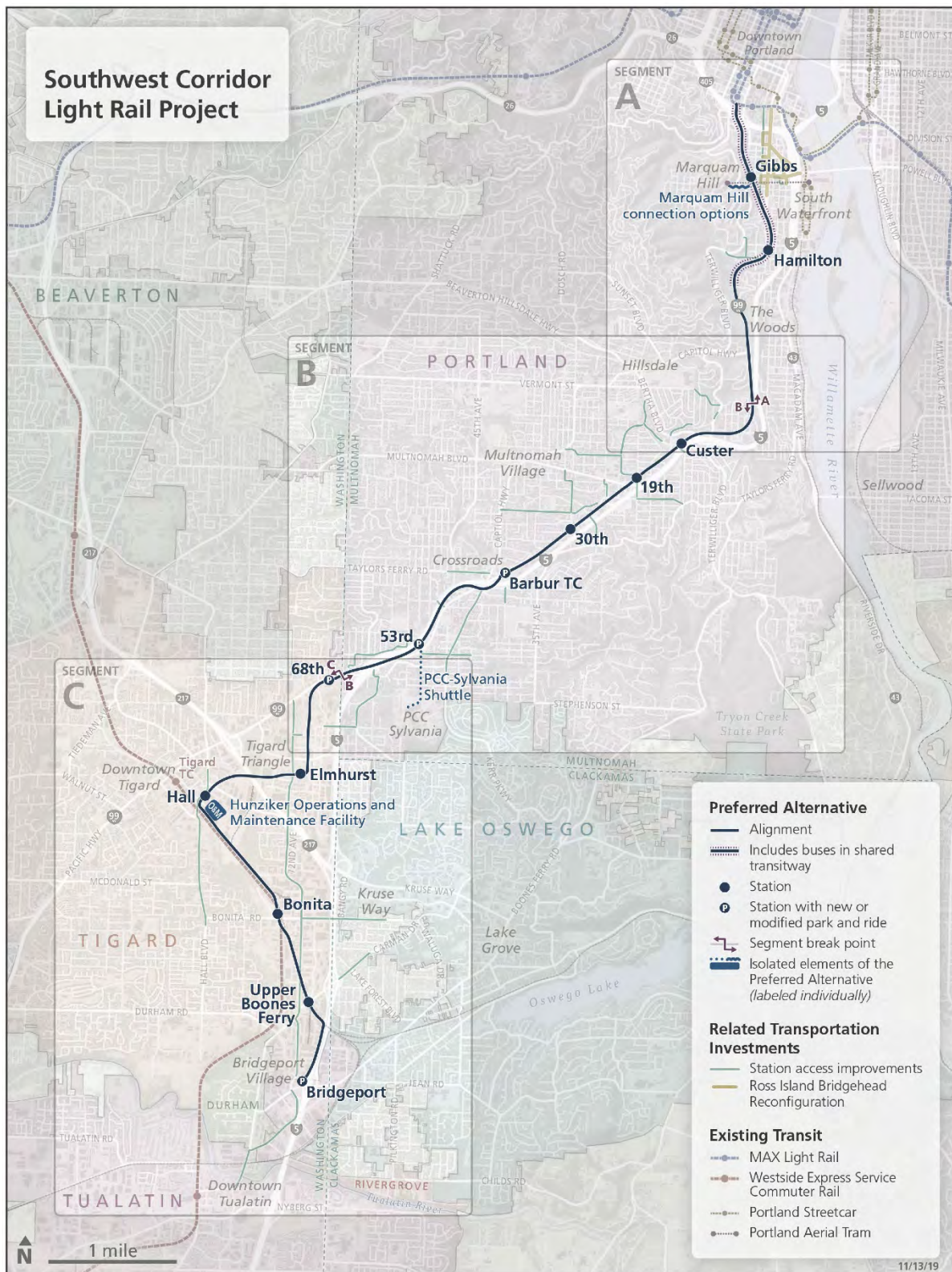
The revised APE (Preferred Alternative APE) generally encompasses areas within 50 feet from the outer edge of the Project design footprint, as well as full-parcel property acquisitions. This 50-foot buffer is intended to account for potential indirect effects on historic resources (such as noise, vibration, and visual and contextual effects). Compared to the previous APE (DEIS APE), it now incorporates specific property acquisitions; additional design information, including temporary construction easements; refinements in design; and additional details such as intersection and street improvements, utility connections, and stormwater facilities. Based on the Draft Environmental Impact Statement (EIS) findings, and preliminary results for the Final EIS, it does not appear that significant noise, vibration, visual, or other impacts extend outside the 50-foot buffer. However, if subsequent Final EIS analyses indicate areas outside the revised APE would be impacted, those areas would be added to the Project APE as appropriate.

Additional considerations for review of the revised APE maps include the following:

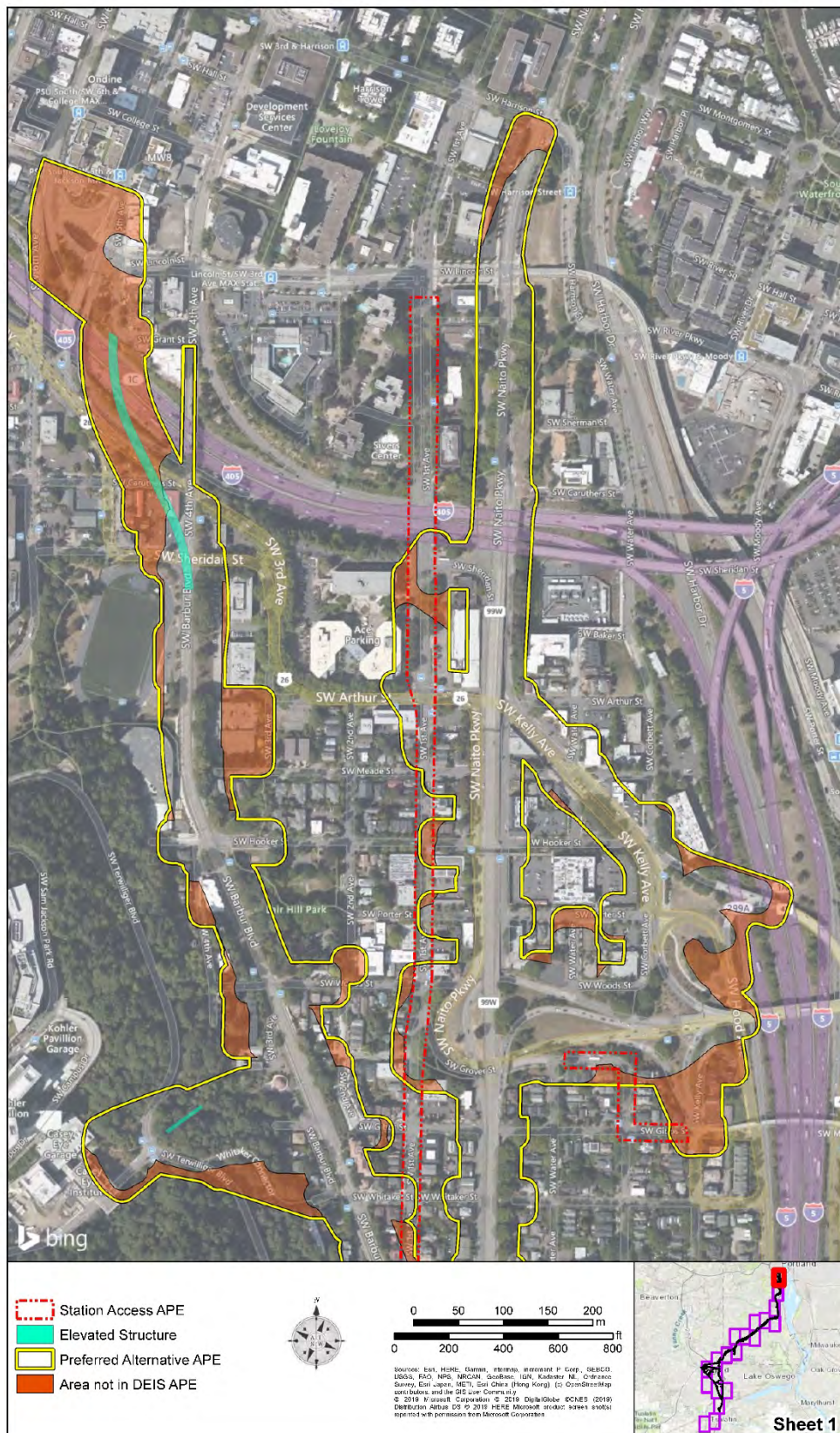
- The maps highlight areas that had not been included in the previous APE used for the Draft EIS. This includes several locations where the alignment has shifted, as well as locations where full-parcel acquisitions have now been defined.
- The maps note the locations of above-grade structures and the elevated Marquam Hill Connector. In most of these locations, the light rail structures cross freeways or roadways that are depressed, or they cross steep ravines and are generally at the prevailing grade for the surrounding area. Based on this and the Draft EIS findings, the APE in these locations has been widened enough to account for potential indirect effects on historic resources, such as noise, vibration, or visual impacts. However, as noted previously, these areas would be extended if the Final EIS indicates other environmental impacts extend beyond the APE.
- The maps identify the locations of supportive pedestrian and bicycle improvements, labeled as the “Station Access APE.” These facilities are expected to remain within public rights-of-way, would not remove existing structures or add new structures above the grade, and do not require deep excavation or other more intensive construction activities. Therefore, the APE for these improvements is limited to the footprint of the improvements.



# Southwest Corridor Light Rail Project



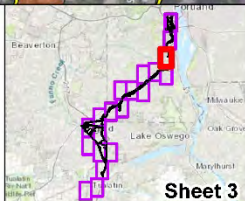




























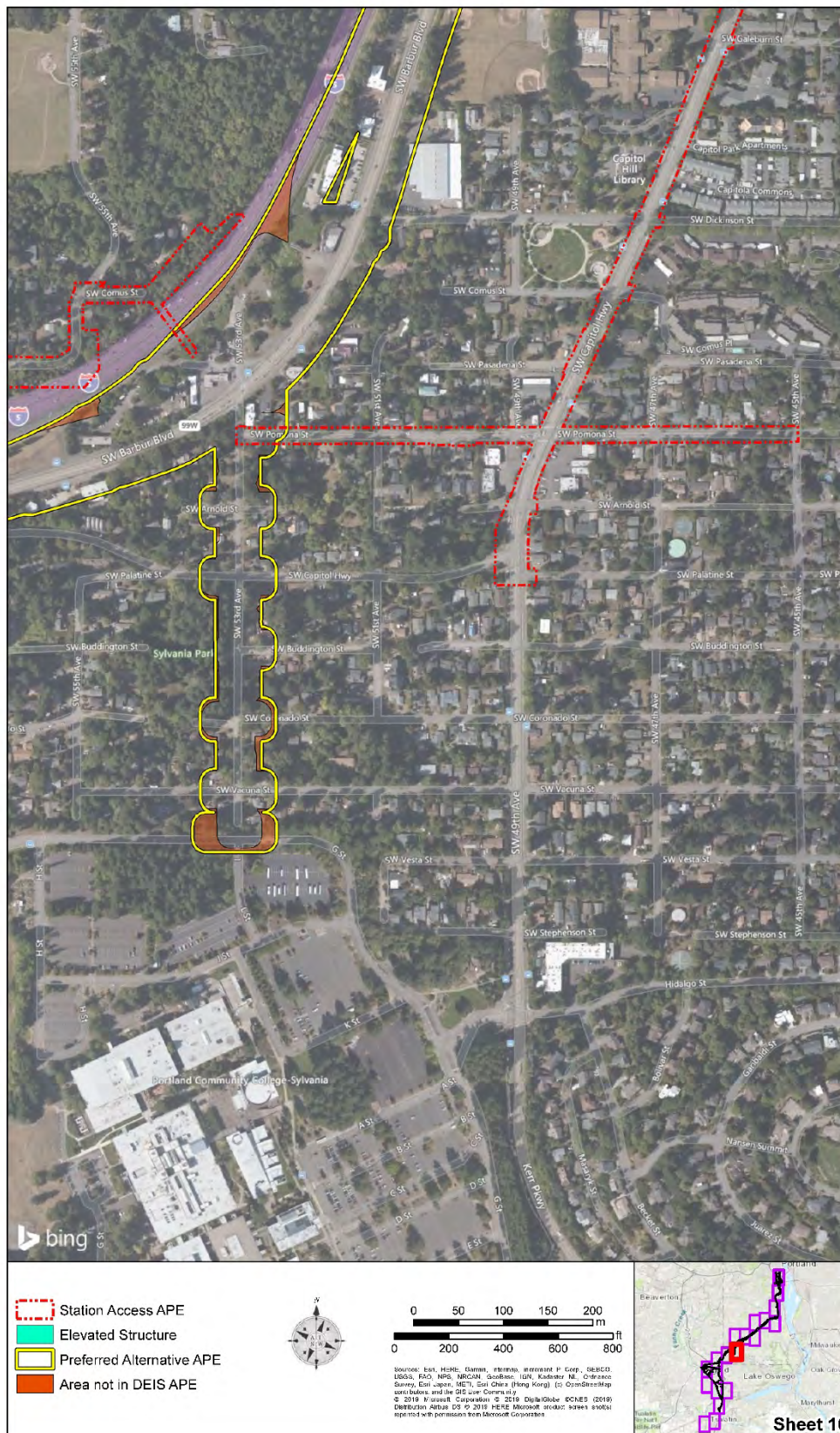




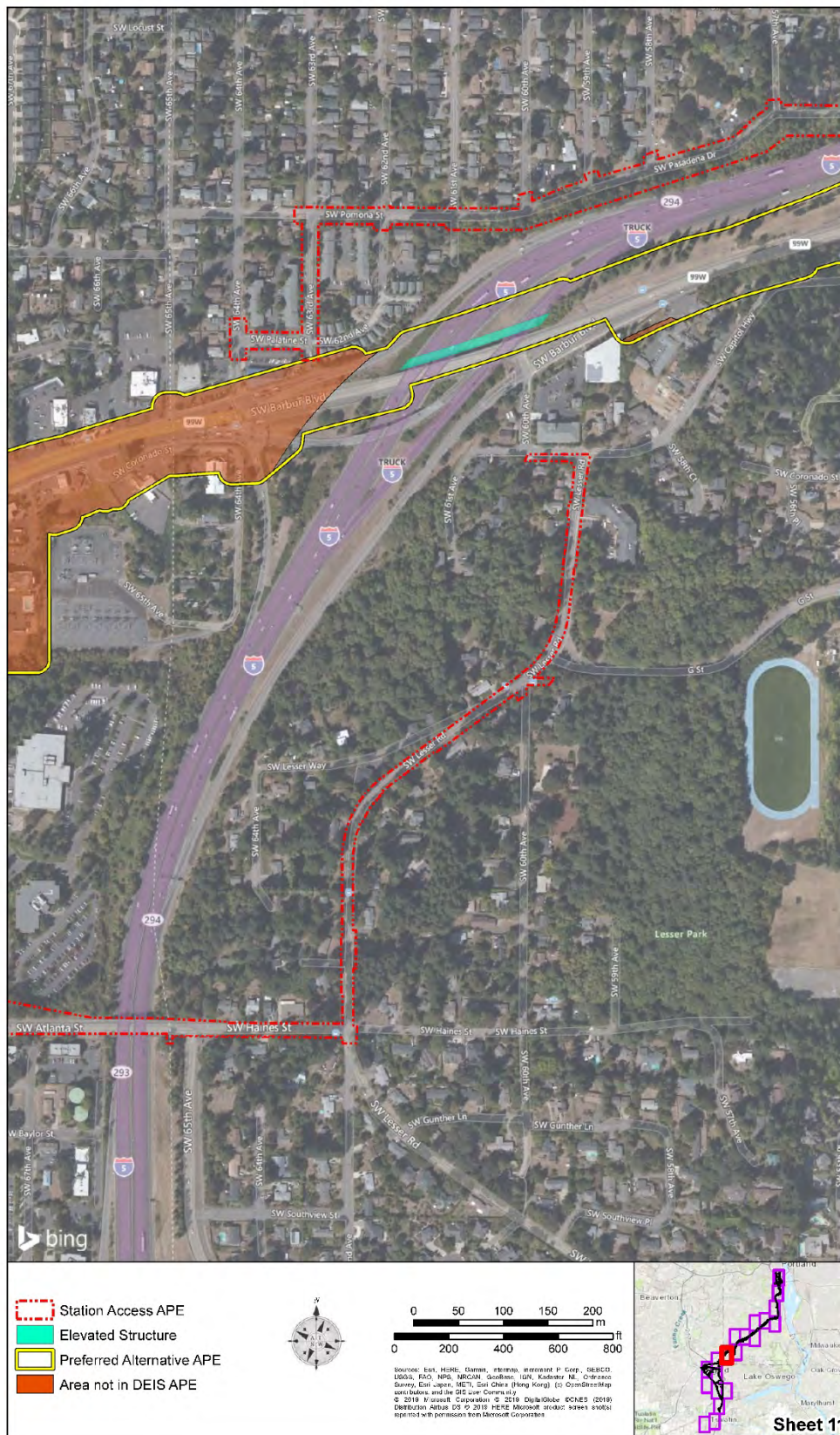




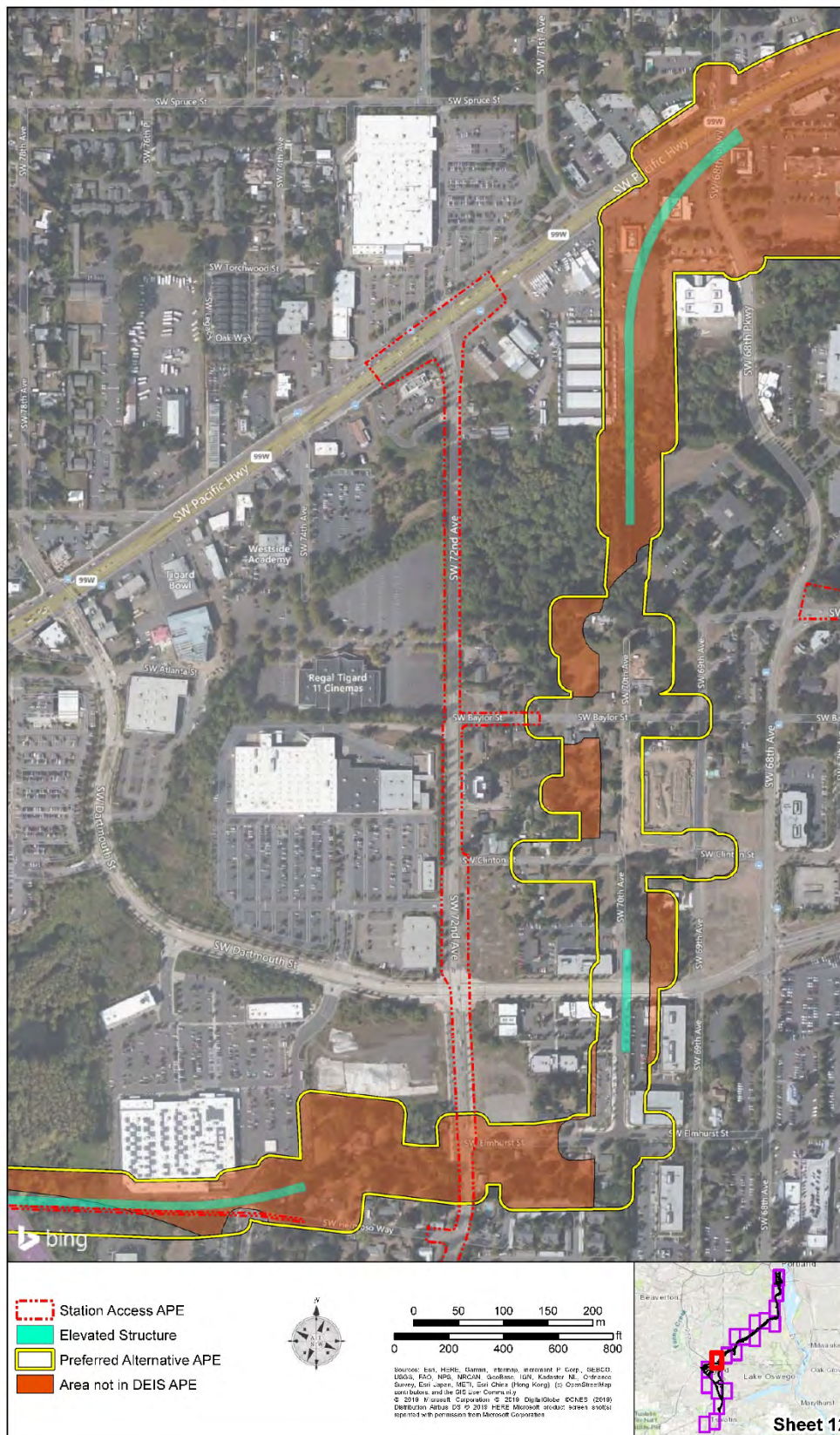














































Oregon

Kate Brown, Governor

**Parks and Recreation Department**

State Historic Preservation Office

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Salem, OR 97301-1266

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February 3, 2020

Mr. Mark Assam  
FTA, Region X  
915 2nd Ave, Ste 3142  
Seattle, WA 98174-1002

RE: SHPO Case No. 16-1621

FTA, Metro, TriMet Portland Southwest Corridor Light Rail Transit Project (SWC LRT)  
Install light rail system  
, Portland to Tigard, Multnomah Washington County

Dear Mr. Assam:

Our office recently received a letter from your agency requesting concurrence regarding the revised proposed Area of Potential Effect (APE) for the Southwest Corridor Light Rail Project, as referenced above. Thank you for your submittal and continued consultation on the undertaking.

In a meeting with FTA, Metro, TriMet, and our office on January 28, 2020, we mentioned that the APE should include areas that might be visually impacted by the project (primarily by the introduction of elevated structures). We also requested that the APE include areas where the project construction and operation may be felt (vibrations) or the heard. Upon review of your letter and documentation, and based on conversations during the meeting that these effects were considered, we concur with the project's proposed APE based on the current design. As design is continually refined and other impacts (wetland banking, access, Bridgehead improvements) are determined, a revised APE may be needed.

We recommend that FTA invite consulting parties – including tribes, Restore Oregon, Portland Historic Landmark Commission, Clackamas County Certified Local Government, local historical societies and museums (including the Oregon Jewish Museum), friend groups (such as Friends of Terwilliger), neighborhood associations, and other parties with an interest in the undertaking or affected properties- to participate in Section 106 consultation. We recognize and appreciate that FTA has already been consulting with many of these parties.

We look forward to continued consultation regarding the identification of historic properties, assessment of effects, and preparing a Memorandum of Agreement, if needed, to address adverse effects and phased identification during construction.

For questions regarding archaeological resources please contact Jamie French, GIS Archaeologist (503.986.0729, [Jamie.French@oregon.gov](mailto:Jamie.French@oregon.gov)), and for questions about built environment resources please contact Tracy Schwartz, Architectural Historian (503.986.0677, [Tracy.Schwartz@oregon.gov](mailto:Tracy.Schwartz@oregon.gov)).

Sincerely,

Tracy Schwartz  
Historic Preservation Specialist

(503) 986-0677

tracy.schwartz@oregon.gov

cc: Chris Ford, Metro

**ATTACHMENT B:**  
MARQUAM HILL CONNECTION DESIGN OBJECTIVES AND PROCESS



### **Marquam Hill Connection Design Objectives and Process**

TriMet will employ a collaborative design process with the City of Portland, the Oregon State Historic Preservation Office (SHPO), interest groups and the public to design the Marquam Hill Connection (MHC) with the following objectives:

1. Provide a safe and efficient travel option for persons traveling between SW Barbur Boulevard and Terwilliger Parkway, Oregon Health & Science University (OHSU) and other destinations on Marquam Hill.
2. Provide a context-sensitive design that embodies the goals and objectives of the adopted *Terwilliger Parkway Design Guidelines*.
3. Minimize traffic signage and improvements to those considered necessary and reasonable to ensure safety of the traveling public.
4. Maintain visual continuity for persons traveling along Terwilliger Parkway within the area of Marquam Hill Connection improvements.
5. To the extent practical, avoid or minimize adverse effects to the characteristics that qualify Terwilliger Parkway for listing on the National Register of Historic Places.

TriMet will provide meaningful opportunities for the public, City of Portland, and SHPO to review and comment, in addition to local regulatory process, throughout the MHC design development. The following summary provides the minimum level of public and agency engagement that TriMet will provide during the development of the MHC design. Additional opportunities may be provided, as appropriate, should the nature and extent of design revisions warrant them.

1. At roughly the 30 percent design progress milestone, TriMet will provide renderings, plans and elevations to reflect the design requirements of the MHC, including type, size, and location of improvements needed to support movement of people between the SW Barbur Boulevard transit station and the Marquam Hill area. Materials will be posted online and notification will be made to the project mailing list, adjacent properties owners, and interest groups. SHPO will also be notified through GoDigital of an opportunity to review and comment on the design. To the extent practical, TriMet will also make use of the City of Portland's design advice process before members of the Historic Landmarks Commission and Design Commission.
2. At or prior to the 60 percent design progress milestone, TriMet will initiate a second round of public and agency reviews of the design progress. At this point, TriMet will summarize the public and agency comments received to date along with a summary of design refinements in response to comments. This summary of public comments and responses, along with renderings, plans and elevations of improvements will be posted online and public notification process identified in step one will be used again. These materials will also be submitted to SHPO through GoDigital for at least 30 days of review and comment. SHPO's comments will indicate whether the MHC design, as presented, meets the objectives set forth in this attachment.
3. TriMet will submit necessary plans, elevations, material samples, and the like to the City of Portland for a formal land use review of the proposed improvements. This process is statutorily limited to 120 days, but may take longer, to satisfy City of Portland formal review requirements. There will be at least one public hearing and notification prior to a decision rendered by the Design Review Commission. An appeal of the Design Review Commission would be heard before the City Council, if applicable. TriMet will provide the City's final decision to SHPO through GoDigital for review and consideration that Stipulation III.D of the Memorandum of Agreement has been satisfied.
4. If subsequent design changes are needed or proposed, TriMet will repeat the prior step.

**ATTACHMENT C:**

**EFFECTS OF LIGHT RAIL CONSTRUCTION AND ROSS ISLAND BRIDGEHEAD  
RECONFIGURATION ON INDIVIDUAL HISTORIC PROPERTIES OF THE AREA  
OF POTENTIAL EFFECT (BUILDINGS AND STRUCTURES)**

**ATTACHMENT C:  
EFFECTS OF LIGHT RAIL CONSTRUCTION AND  
ROSS ISLAND BRIDGEHEAD RECONFIGURATION ON  
INDIVIDUAL HISTORIC PROPERTIES OF THE APE**

| Survey No.                       | Property Name and Address  | NRHP Determination                    | Finding of Effect | Proposed Acquisition/ Easement |           |
|----------------------------------|--|---------------------------------------|-------------------|--------------------------------|-----------|
|                                  |  |                                       |                   | Permanent                      | Temporary |
| Preferred Alternative- Segment A |  |                                       |                   |                                |           |
| 1                                | Duniway Plaza<br>2400 SW 4th Avenue, Portland                              | Eligible under Criteria A and C       | No Adverse Effect | Partial                        | X         |
| 2                                | 2000 SW 5 <sup>th</sup> Avenue, Portland                                   | Eligible/Contributing (PSU RLS 2020)  | No Effect         |                                |           |
| 9                                | Marquam Plaza<br>2525 SW 3rd Avenue, Portland                              | Eligible under Criteria A and C       | No Adverse Effect | Partial                        | X         |
| 14                               | Congregation Ahavath Achim Synagogue<br>3225 SW Barbur Boulevard, Portland | Eligible under Criteria A and C       | Adverse Effect    | Full                           |           |
| 22                               | 4019 SW Corbett Avenue, Portland   | Eligible under Criterion C            | No Adverse Effect | -                              | X         |
| 27                               | 3926 SW Water Avenue, Portland   | Eligible under Criterion C            | No Adverse Effect | Partial                        | X         |
| 38                               | 3811 SW Barbur Boulevard, Portland   | Eligible under Criteria A and C       | No Adverse Effect |                                | X         |
| 40                               | 3635 SW Condor Avenue, Portland  | Eligible under Criterion C            | No Adverse Effect |                                |           |
| 41                               | Holt-Saylor-Liberto<br>3625 SW Condor Avenue, Portland                     | Listed in NRHP under Criteria B and C | No Adverse Effect |                                |           |
| 43                               | 3605 SW Condor Avenue, Portland  | Eligible under Criterion C            | No Adverse Effect | Partial                        | X         |
| 44                               | 022 SW Lowell Street, Portland   | Eligible under Criterion C            | No Adverse Effect | -                              | X         |
| 55                               | 4315 SW View Point Terrace, Portland                                       | Eligible under Criterion C            | No Adverse Effect |                                |           |
| 58                               | 018 SW Hamilton Street, Portland   | Eligible under Criterion C            | No Adverse Effect |                                |           |

Note: bolded resources will be adversely affected by the Project.

**EFFECTS OF LIGHT RAIL CONSTRUCTION AND  
ROSS ISLAND BRIDGEHEAD RECONFIGURATION ON  
INDIVIDUAL HISTORIC PROPERTIES OF THE APE, continued**

| Survey No.                       | Property Name and Address   | NRHP Determination   | Finding of Effect     | Proposed Acquisition/ Easement |           |
|----------------------------------|---|--|-----------------------|--------------------------------|-----------|
|                                  |   |  |                       | Permanent                      | Temporary |
| Preferred Alternative- Segment A |   |  |                       |                                |           |
| 59                               | 04 SW Hamilton Street, Portland                                       | Eligible under Criterion C                                       | No Adverse Effect     |                                |           |
| 62                               | 218-220 SW Hamilton Street, Portland                                  | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 63                               | 127 SW Hamilton Street, Portland                                      | Eligible under Criterion C                                       | No Adverse Effect     |                                |           |
| 67                               | 304 SW Hamilton Street, Portland                                      | Eligible under Criterion C                                       | No Adverse Effect     |                                |           |
| 71                               | <b>Jewish Shelter Home</b><br><b>4133 SW Corbett Avenue, Portland</b> | <b>Listed under Criteria A and B, Eligible under Criterion C</b> | <b>Adverse Effect</b> | <b>Partial</b>                 | <b>X</b>  |
| 72                               | 4145 SW Corbett Avenue, Portland                                      | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 73                               | 4205 SW Corbett Avenue, Portland                                      | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 74                               | 4215-4217 SW Corbett Avenue, Portland                                 | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 76                               | 4231-4237 SW Corbett Avenue, Portland                                 | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 83                               | Tabernacle Seventh-day Adventist Church<br>26 SW Condor Way, Portland | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 85                               | 4619 SW Condor Avenue, Portland                                       | Eligible under Criterion C                                       | No Adverse Effect     |                                |           |
| 89                               | 4820 SW Barbur Boulevard, Portland                                    | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |
| 90                               | <b>Rasmussen Village</b><br><b>4950 SW Barbur Boulevard, Portland</b> | <b>Eligible under Criterion C</b>                                | <b>Adverse Effect</b> | <b>Partial</b>                 | <b>X</b>  |
| 95                               | 5910 SW Ralston Drive, Portland                                       | Eligible under Criterion C                                       | No Adverse Effect     | Partial                        | X         |



**EFFECTS OF LIGHT RAIL CONSTRUCTION AND  
ROSS ISLAND BRIDGEHEAD RECONFIGURATION ON  
INDIVIDUAL HISTORIC PROPERTIES OF THE APE, continued**

| Survey No.                       | Property Name and Address                                      | NRHP Determination  | Finding of Effect | Proposed Acquisition/ Easement |           |
|----------------------------------|--|---|-------------------|--------------------------------|-----------|
|                                  |  |   |                   | Permanent                      | Temporary |
| Preferred Alternative- Segment A |  |   |                   |                                |           |
| 100                              | SW Newbury Street Viaduct, Bridge #01983                       | Eligible under Criteria A and C   | Adverse Effect    |                                |           |
| 101                              | SW Vermont Street Viaduct, Bridge #01984                       | Eligible under Criteria A and C   | Adverse Effect    |                                |           |
| 102                              | Duniway Park<br>SW 6th Avenue and SW Sheridan Street, Portland | Eligible under Criterion A  | No Adverse Effect | Partial                        | X         |
| 103                              | George Himes Park<br>6400 SW Terwilliger Blvd, Portland        | Eligible under Criterion A  | No Adverse Effect | -                              | X         |
| 110                              | South Portland Historic District                               | Listed in NRHP under Criteria A and C   | Adverse Effect    |                                |           |
| 114                              | Lair Hill Park<br>3037 SW 2nd Avenue, Portland                 | Eligible under Criteria A and C; Multnomah County Hospital Nurses' Quarters and South Portland Library contribute to the South Portland Historic District | No Adverse Effect | Partial                        | X         |
| 410                              | Hudson, Harvey S., House<br>16 SW Abernethy Street, Portland   | Eligible under Criterion C  | No Adverse Effect |                                |           |
| 418                              | 0219-0221 SW Hamilton Street, Portland                         | Eligible under Criterion C  | No Adverse Effect |                                |           |
| 421                              | 4515 SW Corbett Avenue, Portland                               | Eligible under Criterion C  | No Adverse Effect |                                | X         |
| 422                              | 0112 SW Hamilton Street, Portland                              | Eligible under Criterion C  | No Adverse Effect |                                |           |
| 425                              | 4606 SW Corbett Avenue, Portland                               | Eligible under Criterion C  | No Adverse Effect |                                |           |
| 426                              | 374 SW Hamilton Court, Portland                                | Eligible under Criterion C  | No Adverse Effect |                                |           |
| 505                              | Neighborhood House<br>3030 SW 2nd Avenue, Portland             | Listed in NRHP (Criterion Not Specified)  | No Adverse Effect |                                |           |
| 506                              | Marquam II<br>2611 SW 3rd Avenue, Portland                     | Eligible under Criteria A and C   | No Adverse Effect | Partial                        | X         |

**EFFECTS OF LIGHT RAIL CONSTRUCTION AND  
ROSS ISLAND BRIDGEHEAD RECONFIGURATION ON  
INDIVIDUAL HISTORIC PROPERTIES OF THE APE, continued**

| Survey No.                                      | Property Name and Address  | NRHP Determination              | Finding of Effect | Proposed Acquisition/ Easement |           |
|---|--|---------------------------------|-------------------|--------------------------------|-----------|
|   |  |                                 |                   | Permanent                      | Temporary |
| Preferred Alternative - Marquam Hill Connection |  |                                 |                   |                                |           |
| 8   | Terwilliger Parkway  | Eligible under Criteria A and C | Adverse Effect    | Partial                        | X         |
| Preferred Alternative - Segment B               |  |                                 |                   |                                |           |
| 167   | 7225 SW 4th Avenue, Portland   | Eligible under Criterion C      | No Adverse Effect |                                |           |
| 201   | 1801 SW Evans Street, Portland   | Eligible under Criterion C      | No Adverse Effect |                                | X         |
| 228   | Original Pancake House<br>8601 SW 24th Avenue, Portland  | Eligible under Criterion A      | No Adverse Effect | Partial                        | X         |
| 229   | 7114 SW Brier Place, Portland  | Eligible under Criterion C      | No Adverse Effect |                                |           |
| 246   | 7037 SW 2nd Avenue, Portland   | Eligible under Criterion C      | No Adverse Effect |                                |           |
| 247   | 7115 SW Brier Place, Portland  | Eligible under Criterion C      | No Adverse Effect |                                |           |
| 269   | Good Shepherd Lutheran Church and Little Lambs Preschool/Daycare<br>3405 SW Alice Street, Portland | Eligible under Criterion C      | No Adverse Effect |                                | X         |
| 271   | Capitol Hill Motel<br>9110 SW Barbur Boulevard, Portland   | Eligible under Criteria A and C | Adverse Effect    | Full                           |           |
| 278   | Master Wrench<br>9803 SW Barbur Boulevard, Portland  | Eligible under Criteria A and C | No Adverse Effect | Partial                        | X         |
| 290   | Edwin Markham Elementary School<br>10531 SW Capitol Highway, Portland                              | Eligible under Criteria A and C | No Adverse Effect |                                |           |
| 300   | 5350 SW Pasadena Street, Portland  | Eligible under Criterion C      | Adverse Effect    | Full                           |           |
| 302   | 11125 SW Barbur Boulevard, Portland  | Eligible under Criterion C      | Adverse Effect    | Full                           |           |
| 328   | Oregon Electric Railway Overcrossing, Bridge #02010  | Eligible under Criterion A      | Adverse Effect    |                                |           |

**EFFECTS OF LIGHT RAIL CONSTRUCTION AND  
ROSS ISLAND BRIDGEHEAD RECONFIGURATION ON  
INDIVIDUAL HISTORIC PROPERTIES OF THE APE, continued**

| Survey No.                        | Property Name and Address   | NRHP Determination                 | Finding of Effect | Proposed Acquisition/ Easement |           |
|-----------------------------------|---|------------------------------------|-------------------|--------------------------------|-----------|
|                                   |   |                                    |                   | Permanent                      | Temporary |
| Preferred Alternative - Segment B |   |                                    |                   |                                |           |
| 329                               | Fulton Park<br>68 SW Miles Street,<br>Portland                              | Eligible under<br>Criteria A and C | No Adverse Effect | Partial                        | X         |
| 330                               | Burlingame Fred Meyer<br>Sign<br>7529-7601 SW Barbur<br>Boulevard, Portland | Eligible under<br>Criteria A and C | No Adverse Effect |                                | X         |
| 337                               | 7147 SW 4th Avenue,<br>Portland   | Eligible under Criterion C         | No Adverse Effect |                                |           |
| 439                               | 7211 SW Brier Place,<br>Portland  | Eligible under Criterion C         | No Adverse Effect |                                |           |
| 440                               | 7221 SW Brier Place,<br>Portland  | Eligible under Criterion C         | No Adverse Effect |                                |           |
| 495                               | 7301 SW Brier Place,<br>Portland  | Eligible under Criterion C         | No Adverse Effect |                                |           |
| 497                               | 3211 SW Primrose Street,<br>Portland  | Eligible under Criterion C         | No Adverse Effect |                                |           |
| 498                               | 3220 SW Primrose Street,<br>Portland  | Eligible under Criterion C         | No Adverse Effect |                                |           |
| Preferred Alternative - Segment C |   |                                    |                   |                                |           |
| 390                               | Fought & Company<br>14255 SW 72nd Avenue,<br>Tigard                         | Eligible under Criterion A         | No Adverse Effect |                                | X         |
| 394                               | Southern Pacific Railroad,<br>Tigard Branch<br>Tigard                       | Eligible under Criterion A         | No Adverse Effect |                                |           |
| 460                               | 11530 SW 72nd Avenue,<br>Tigard   | Eligible under Criterion C         | No Adverse Effect |                                |           |
| 461                               | Oregon Education<br>Association<br>6900 SW Atlanta Street,<br>Tigard        | Eligible under Criterion C         | No Adverse Effect | Partial                        | X         |



**EFFECTS OF LIGHT RAIL CONSTRUCTION AND  
ROSS ISLAND BRIDGEHEAD RECONFIGURATION ON  
INDIVIDUAL HISTORIC PROPERTIES OF THE APE, continued**

| Survey No.                                    | Property Name and Address   | NRHP Determination  | Finding of Effect | Proposed Acquisition/ Easement |           |
|---|---|---|-------------------|--------------------------------|-----------|
|   |   |   |                   | Permanent                      | Temporary |
| Ross Island Bridgehead Reconfiguration Option |   |   |                   |                                |           |
| B518  | IBM Building<br>2000 SW 1 <sup>st</sup> Avenue,<br>Portland   | Eligible under<br>Criteria A and C  | No Adverse Effect | Partial                        | X         |
| B519  | Pitney-Bowes Building<br>2112 SW 1 <sup>st</sup> Avenue,<br>Portland                                | Eligible under<br>Criteria A and C  | No Adverse Effect | Partial                        | X         |
| B522  | 036-038 SW Porter Street,<br>Portland   | Eligible under Criterion C  | No Effect         |                                |           |
| B524  | Josiah Failing School<br>049 SW Porter Street,<br>Portland  | Eligible under<br>Criteria A and C  | No Effect         |                                |           |
| B535  | Addressograph-<br>Multigraph Building<br>2510 SW 1 <sup>st</sup> Avenue,<br>Portland                | Eligible under<br>Criteria A and C  | No Effect         |                                |           |
| B536  | Marquam Building<br>2501 SW 1 <sup>st</sup> Avenue,<br>Portland                                     | Eligible under<br>Criteria A and C  | No Effect         |                                |           |
| B542  | Helen Kelly Manley<br>Community Center<br>2828 SW Naito Parkway,<br>Portland                        | Eligible under<br>Criteria A and C  | No Effect         |                                |           |
| B547  | Taylor, Peter & Haehlen,<br>John & Gottlieb House #1<br>2806 SW 1 <sup>st</sup> Avenue,<br>Portland | Listed in NRHP under<br>Criteria B and C;<br>Contributes to South<br>Portland Historic District | No Effect         |                                |           |
| B551  | 018 SW Porter Street,<br>Portland   | Eligible under Criterion C  | No Effect         |                                |           |
| B561  | Wolfman, A., Building<br>11 SW Gibbs Street,<br>Portland  | Eligible under Criterion C;<br>Noncontributing, South<br>Portland Historic District             | No Adverse Effect | Partial                        | X         |
| B595  | Ross Island Bridge  | Eligible under<br>Criteria A and C  | No Adverse Effect |                                |           |
| B619  | Halprin Open Space<br>Sequence Historic District  | Listed in NRHP under<br>Criteria A and C  | No Effect         |                                |           |