



# Acquisitions and Displacements Supplemental Memorandum

Multnomah County | Earthquake Ready  
Burnside Bridge Project

*Portland, OR*

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# Earthquake Ready Burnside Bridge Acquisitions and Displacements Supplemental Memorandum

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## Acronyms, Initialisms, and Abbreviations

|      |                                                 |
|------|-------------------------------------------------|
| ac   | acre                                            |
| AMR  | American Medical Response                       |
| API  | Area of Potential Impact                        |
| CFR  | Code of Federal Regulations                     |
| EIS  | Environmental Impact Statement                  |
| EQRB | Earthquake Ready Burnside Bridge                |
| FHWA | Federal Highway Administration                  |
| I-5  | Interstate 5                                    |
| I-84 | Interstate 84                                   |
| NEPA | National Environmental Policy Act               |
| ODOT | Oregon Department of Transportation             |
| RLIS | Portland Metro Regional Land Information System |
| TCE  | Temporary Construction Easement                 |
| UPRR | Union Pacific Railroad                          |

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# Executive Summary

Impacts to Acquisitions and Displacements from the Refined Long-span Alternative are similar to those evaluated in the Draft EIS for the Long-span Alternative. The biggest difference is that the Refined Long-span Alternative requires more permanent easements but no full or partial acquisitions, per County direction. The Refined Long-span Alternative cable-stayed and tied-arch options would require the fewest acquisition files, and the cable-stayed option is estimated to have the lowest right-of-way costs of the long-span options. Temporary construction impacts of the Refined Long-span Alternative would impact one more property than analyzed in the Draft EIS Long-span alternative. The Refined Long-span Alternatives (cable-stayed and tied-arch) and the Draft EIS Long-span alternative would require the same amount of relocations, but the Refined Long-span Alternatives would pose less severe impacts to non-residential relocations.

## 1 Introduction

In support of the Supplemental Draft Environmental Impact Statement (SDEIS) for the Earthquake Ready Burnside Bridge (EQRB) Project, this supplemental technical memorandum has been prepared to evaluate the impacts of potential design refinements to the Preferred Alternative to acquisitions and displacements within the project's Area of Potential Impact (API). The intent of the design modifications is to reduce the overall cost and improve the affordability of the EQRB Project. This technical memorandum is a supplement to the Draft EIS technical reports and as such does not repeat all of the information in those reports, but instead focuses on the impacts of the design modification options, how they compare to each other, and how they compare to the version of the Preferred Alternative that was evaluated in the *EQRB Draft Environmental Impact Statement* (Multnomah County 2021c).

Much of the information included in the Draft EIS and Draft EIS technical reports, including project purpose, relevant regulations, analysis methodology and affected environment, is incorporated by reference because it has not changed, except where noted in this technical memorandum.

### 1.1 Project Location

The Project Area is located within the central city of Portland. The Burnside Bridge crosses the Willamette River connecting the west and east sides of the city. The Project Area encompasses a one-block radius around the existing Burnside Bridge and W/E Burnside Street, from NW/SW 3rd Avenue on the west side of the river and NE/SE Grand Avenue on the east side. Several neighborhoods surround the area including Old Town/Chinatown, Downtown, Kerns, and Buckman. Figure 1 shows the Project Area.

Figure 1. Project Area



## 1.2 Project Purpose

The primary purpose of the Project is to build a seismically resilient Burnside Street lifeline crossing over the Willamette River that will remain fully operational and accessible for vehicles and other modes of transportation following a major Cascadia Subduction Zone earthquake. The Burnside Bridge will provide a reliable crossing for emergency response, evacuation, and economic recovery after an earthquake. Additionally, the bridge will provide a long-term safe crossing with low-maintenance needs.

## 2 Project Alternatives

This technical memorandum evaluates potential design refinements to the Draft EIS Preferred Alternative. All of the Project Alternatives evaluated in the Draft EIS are summarized in Chapter 2 of the Draft EIS and described in detail in the *EQRB Description of Alternatives Report* (Multnomah County 2021b). Briefly, the Draft EIS evaluated a No-Build Alternative and four Build Alternatives. One of the Build Alternatives, the Long-span Alternative, was identified as the Preferred Alternative. The potential refinements evaluated in this technical memorandum are collectively referred to as the Refined Long-span Alternative (Four-lane Version) or the Refined Long-span. The Refined Long-span includes project elements that were studied in the Draft EIS but have been modified as well as new options that were not studied in the Draft EIS. These potential refinements and new options are intended to provide lower cost and, in some cases, lower impact designs and ideas that could be adopted to reduce the cost of the Draft EIS Preferred Alternative while still achieving seismic resiliency. The potential design refinements, and how they differ from the Draft EIS Long span Alternative, are described below.

- Bridge width – The total width of the bridge over the river would be approximately 82 to 93 feet (the range varies depending on the bridge type and segment). For comparison, the Draft EIS Replacement Alternatives were approximately 110 to 120 feet wide over the river. The refined bridge width would accommodate approximately 78 feet for vehicle lanes, bike lanes, and pedestrians, which is comparable to the existing bridge.
  - o The refined bridge design would accommodate four vehicle lanes (rather than five as evaluated in the Draft EIS). The following lane configuration options are being evaluated:
    - Lane Option 1 (Balanced) – Two westbound lanes (general-purpose) plus two eastbound lanes (one general-purpose and one bus-only lane)
    - Lane Option 2 (Eastbound Focus) – One westbound lane (general-purpose) plus three eastbound lanes (two general purpose and one bus only)
    - Lane Option 3 (Reversible Lane) – One westbound lane (general-purpose) plus two eastbound lanes (one general-purpose and one bus-only) plus one reversible lane (westbound AM peak and eastbound PM peak)

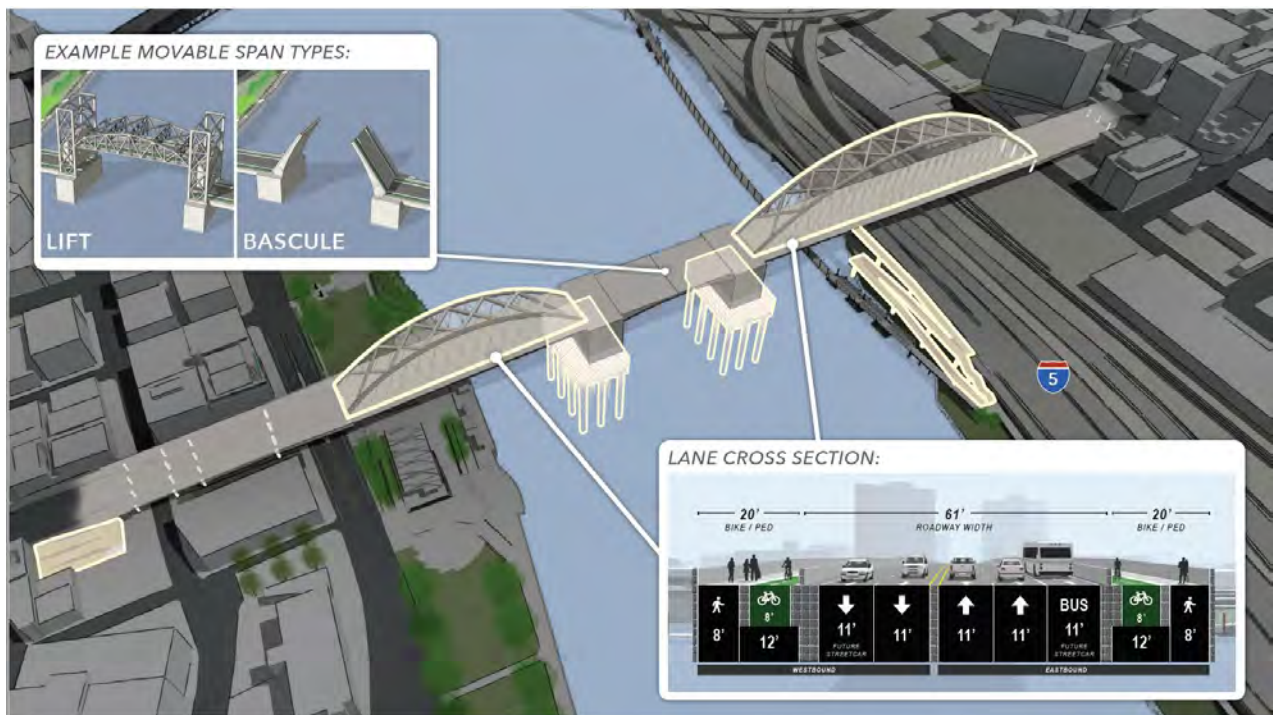
- Lane Option 4 (General Purpose with Bus Priority) – Two westbound general-purpose lanes plus two eastbound general-purpose lanes, plus bus priority access (e.g., queue bypass) at each end of the bridge.
- o The width of the vehicle lanes would be, at minimum, 10 feet and could vary depending on how the total bridge width is allocated between the different modes.
- o The total width of the bicycle lanes and pedestrian sidewalks would be approximately 28 to 34 feet. This is wider than the existing bridge but narrower than what was described in the Draft EIS for the Replacement Alternatives. Physical barriers between vehicle lanes and the bicycle lanes would be in addition to the above dimensions.
- o The refined bridge would allow narrower in-water piers, due to less weight needing to be transferred to the in-water supports.
- Other design refinements being evaluated:
  - o West approach – This memo evaluates a refined girder bridge type for the approach over the west channel of the river, Waterfront Park, and Naito Parkway. Compared to the cable-stayed and tied-arch options evaluated in the Draft EIS, this option would not only reduce costs but also avoid an adverse effect to the Skidmore/Old Town National Historic Landmark District. It would have two sets of columns in Waterfront Park compared to just one with the Draft EIS tied-arch option and five with the existing bridge.
  - o East approach – This memo evaluates a potential span length change for the east approach tied-arch option that would minimize the risks and reduce costs associated with placing a pier and foundation in the geologic hazard zone that extends from the river to about E 2nd Avenue. The refined tied-arch option would be about 720 to 820 feet long and approximately 150 feet tall (the Draft EIS Long-span Alternative was the same height and 740 feet long). The refined alternative would place the eastern pier of the tied-arch span either on the east side of 2nd Avenue (Option 1) or just west of 2nd Avenue (Option 2). Increasing the length of the tied-arch span would also reduce the length and depth of the subsequent girder span to the east.
  - o Americans with Disabilities Act (ADA) access – This memo evaluates a refined approach for providing direct ADA access between the bridge and the Vera Katz Eastbank Esplanade, as well as between the bridge and W 1st Avenue and the Skidmore Fountain MAX station. The Draft EIS evaluated multiple ramp, stair, and elevator options for these locations. This SDEIS memo evaluates a refined option that would provide enhanced ADA access at both locations using both elevators and stairs. These facilities would also provide pedestrian and potentially bicycle access. For the west end, there is also the potential for replacing the existing stairs with improved sidewalk access from the west end of the bridge to 1st Avenue.

Figure 3 highlights the elements of the Draft EIS Long-span Alternative that have been modified to create the Refined Long-span Alternative, as described above. Figure 2



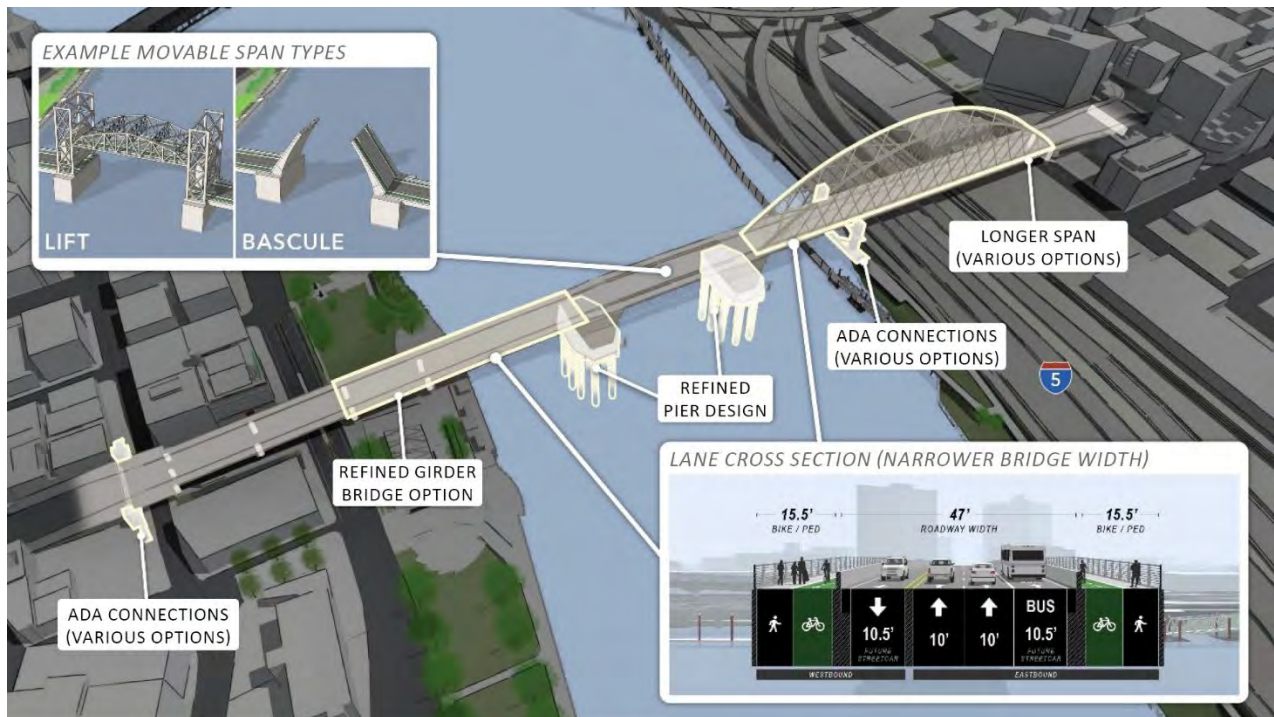
shows the Draft EIS Long-span Alternative and Figure 3 shows the Refined Long-span Alternative. Both figures include the tied-arch option for the east approach and the bascule option for the center movable span, but the east span could also be a cable-stayed bridge and the movable span could be a vertical lift bridge. For the west approach, the Draft EIS Long-span Alternative shows the tied-arch option while the Refined Long-span shows the refined girder bridge. The Refined Long-span Alternative image shows just one of the four possible lane configuration options being studied. All four configuration options, as well as many more graphics of the Refined Long-span Alternative, and how it compares to the Draft EIS Long-span Alternative, can be found in Chapter 2 of the *EQRB Supplemental Draft Environmental Impact Statement* (Multnomah County 2022). Figure 3 also shows just one of the possible ways to allocate the bridge width between vehicle lanes, bicycle lanes and sidewalks; the total width of the bicycle and pedestrian facilities could range from approximately 28 to 34 feet.

**Figure 2. Draft EIS Long-Span Alternative**



Note: The Draft EIS Long-span Alternative included multiple bridge types for both the east and west approaches. This figure shows only the tied arch option.

Figure 3. Refined Long-Span Alternative



Notes: The Refined Long-span Alternative evaluated in this SDEIS includes both cable-stayed and tied-arch options for the east span. This figure shows only the tied-arch option. The Draft EIS studied, and SDEIS further studies, a bascule option and vertical lift option for the center movable span. The inset shows both options but the main figure shows the bascule option. This figure also shows just one of the lane configuration options considered in the SDEIS.

- Construction assumptions:
  - o Construction duration – The expected duration of project construction is 4.5 to 5.5 years, dependent upon the design option. See Table 1 for more information regarding construction impact extent and closure timeframes.
  - o Construction area – Compared to the Draft EIS Long-span Alternative, the main refinement is that the construction area would be smaller for the west approach south of the bridge, including a smaller area within Waterfront Park south of the bridge,
  - o Construction access and staging – The construction access and staging is expected to be the same as that described in the Draft EIS.
  - o Vegetation – The Refined Long-span would remove slightly fewer trees and vegetation impacts than the Draft EIS Long-span, primarily within Waterfront Park south of the bridge.
  - o In-water work activity – The in-water work would be similar to that described in the Draft EIS, except that the replacement bridge in-water foundations would consist of a perched footing cap and a group of drilled shafts. Whereas the Draft EIS discusses the use of cofferdams to isolate in water work, the Refined Long-span Alternative would use a temporary caisson lowered to an elevation about mid height of the water column to construct footing caps, avoiding additional disturbance of the riverbed that would be needed for a cofferdam.

Additionally, the existing Pier 4 would be fully removed, Pier 1 would be partially removed below the mudline, and Piers 2 and 3 would be removed to below the mudline. Existing in water piles would be removed, subject to the design option advanced.

- o Temporary freeway, rail, street, and trail closures – Temporary closures are expected to be the same as those described in the Draft EIS.
- o Access for pedestrians and vehicles to businesses, residences, and public services – Access is expected to be the same as that described in the Draft EIS.
- o On-street parking impacts – On-street parking impacts are expected to be the same as those described in the Draft EIS.
- o Property acquisitions and relocations – Property acquisitions and relocations are similar to those listed in the Draft EIS, except that they have been modified to reflect a narrower set of bridge design options.
- o Temporary use of Governor Tom McCall Waterfront Park – The park area that would be temporarily closed for construction has changed since the Draft EIS. On the north side of the bridge, the closure area has been reduced to avoid removing 10 cherry trees and a berm that are part of the Japanese American Historical Plaza; this change would apply to all of the build alternatives. On the south side of the bridge, the park closure area has also been reduced to include only the area north of the Tom McCall Waterfront Park trellis; this revision applies only to the Refined Long-span Alternative.

**Table 1. Construction Impacts, Closure Extents, and Timeframes by Build Alternative**

| Facility Impacted                  | Draft EIS Long-Span Alternative                                                                                                                                                                  | Refined Long-Span Alternative                                       |
|------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------|
| Gov. Tom McCall Waterfront Park    | 4.5-year closure within boundary of potential construction impacts                                                                                                                               | Same; Smaller closure area south of the bridge                      |
| Willamette River Greenway Trail    | Portion of trail within Waterfront Park closed for same duration as park; detours in place for construction duration                                                                             | Same                                                                |
| Japanese American Historical Plaza | Southern portion of plaza would be closed for same duration as Waterfront Park                                                                                                                   | Same                                                                |
| Ankeny Plaza Structure             | Closure for duration of construction but no impacts to Ankeny Plaza structure                                                                                                                    | Plaza Structure would not be closed during construction or impacted |
| Bill Naito Legacy Fountain         | No closure of fountain and associated hardscape                                                                                                                                                  | Same                                                                |
| Vera Katz Eastbank Esplanade       | 18 months (this could extend to 2 to 3 years if the Project builds ramps rather than elevators and stairs for the ADA/bicycle/pedestrian connection); detours in place for construction duration | Same                                                                |
| Burnside Skatepark                 | 4-month full closure                                                                                                                                                                             | Same                                                                |
| River Crossing on Burnside Street  | 4- to 5-year closure                                                                                                                                                                             | Same                                                                |

| Facility Impacted                               | Draft EIS Long-Span Alternative                                     | Refined Long-Span Alternative |
|-------------------------------------------------|---------------------------------------------------------------------|-------------------------------|
| Saturday Market Location                        | 4.5-year closure or use of alternative location                     | Same                          |
| Skidmore Fountain MAX Station                   | Approximately 5 weeks                                               | Same                          |
| Navigation Channel/Willamette River Water Trail | Intermittent closures; 2 to 10 closures; each closure up to 3 weeks | Same                          |
| <b>Overall Construction Duration</b>            | <b>4.5 to 5.5 years</b>                                             | <b>Same</b>                   |

### 3 Definitions

The following terminology is used when discussing geographic areas in the EIS:

- Project Area** – The area within which improvements associated with the Project Alternatives would occur and the area needed to construct these improvements. The Project Area includes the area needed to construct all permanent infrastructure, including adjacent parcels where modifications are required for associated work such as utility realignments or upgrades. For the EQRB Project, the Project Area includes approximately a one-block radius around the existing Burnside Bridge and W/E Burnside Street, from NW/SW 3rd Avenue on the west side of the river and NE/SE Grand Avenue on the east side.
- Area of Potential Impact (API)** – This is the geographic boundary within which physical impacts to the environment could occur with the Project Alternatives. The API is resource-specific and differs depending on the environmental topic being addressed. For all topics, the API will encompass the Project Area, and for some topics, the geographic extent of the API will be the same as that for the Project Area; for other topics (such as for transportation effects) the API will be substantially larger to account for impacts that could occur outside of the Project Area. The API for acquisitions and displacements is defined in Section 5.1 of the *EQRB Acquisitions and Displacements Technical Report* (Multnomah County 2021a).
- Project vicinity** – The environs surrounding the Project Area. The project vicinity does not have a distinct geographic boundary but is used in general discussion to denote the larger area, inclusive of the Old Town/Chinatown, Downtown, Kerns, and Buckman neighborhoods.
- Displacements** – Residential and non-residential occupants of properties or those permitted/authorized to be operating within public right-of-way that would need to be temporarily or permanently relocated as part of the Project. Non-residential occupants include businesses and non-profit organizations. For purposes of reporting displacements, non-profit organizations will be combined with private, for-profit businesses. Displacements are summarized in this report by property, as well as by numbers of dwelling units for residential properties and numbers of businesses for commercial properties. The displacement of groups such as houseless people, without specific known locations or counts, are described qualitatively.



- **Temporary construction easement** – A temporary construction easement (TCE), is a temporary impact on a portion of a property for the purposes of access, staging, monitoring, or constructing the Project. TCEs are summarized at the property level for all uses.
- **Permanent easement** – A permanent easement is a permanent property right allowing the agency to use a portion of the grantor's property for a specific purpose (e.g., bridge facilities, slopes, subsurface soil stabilization, and public utilities). Permanent easements are summarized for each use on a property as well as at the property level as described in the displacements definition above.
- **Partial acquisition** – The purchase of a portion of a property required for right-of-way, maintenance, or to address access impacts resulting from the Project. Partial acquisitions are summarized for each use on a property and at the property level as described in the displacements definition above.
- **Full acquisition** – The purchase of an entire property required for right-of-way, maintenance, or to address access impacts resulting from the Project. Full acquisitions are summarized at the residential and non-residential level, as well as at the property level as described in the displacements definition above.

## 4 Relevant Regulations

See the *EQRB Acquisitions and Displacements Technical Report* (Multnomah County 2021a).

## 5 Analysis Methodology

See the *EQRB Acquisitions and Displacements Technical Report*.

## 6 Affected Environment

See the *EQRB Acquisitions and Displacements Technical Report*.

## 7 Impacts from the Design Modifications and Comparison to Draft EIS Alternatives

### 7.1 Introduction

Acquisition and displacement impacts are the same across all of the Refined Long-span Alternative options. As such, this memo compares the Refined Long-span Alternative options as a group with the Draft EIS Long-span Alternative only.

## 7.2 Long-Term Acquisition Impacts

The Draft EIS Long-span Alternative includes several fee acquisition areas. All permanent rights are now proposed to be acquired as permanent easements for bridge improvements per County direction. Table 2 summarizes right-of-way acquisitions for the Draft EIS Long-span Alternative and the Refined Long-span Alternative options. Acquisitions for both the tied-arch and cable-stayed Refined Long-span Alternatives are identical and have been combined in Table 2 and Table 3.

**Table 2. Right-of-Way Acquisition Summary**

| Alternative         | Fee Full and Partial Acquisitions | Easements | TCEs | Business Displaced Permanent (Temporary) |
|---------------------|-----------------------------------|-----------|------|------------------------------------------|
| Draft EIS Long-Span | 8                                 | 1         | 17   | 6 (0)                                    |
| Refined Long-Span   | 0                                 | 12        | 18   | 5 (1)                                    |

Following is a list of all impacted properties associated with the Draft EIS Long-span Alternative and the Refined Long-span Alternative for comparison.

**Table 3. Impacted Properties**

| ID | TLID           | Property Name                                                                  | Draft EIS Long-Span (bus. displ.) | Refined Long-Span (bus. displ.) |
|----|----------------|--------------------------------------------------------------------------------|-----------------------------------|---------------------------------|
| 1  | 1N1E34CA-09200 | Central City Concern (Shoreline Building)                                      | TCE Access                        | -                               |
| 2  | 1N1E34DB-00900 | Portland Rescue Mission                                                        | TCE access                        | Easement & TCE                  |
| 3  | 1N1E34DB-01500 | Portland Saturday Market Storage (City of Portland)                            | Easement**(1)                     | Easement**(1)                   |
| 4  | 1N1E34DB-01400 | University of Oregon Classroom (City of Portland)                              | Full* (1)                         | Easement* (1)                   |
| 5  | 1N1E34DC-00800 | Portland Saturday Market Administration Offices (Skidmore Fountain Plaza, LLC) | Full** (1)                        | Easement & TCE** (1)            |
| 6  | 1N1E34CD-00300 | Salvation Army                                                                 | TCE Access                        | -                               |
| 7  | 1N1E34CD-00100 | Vacant Lot (Skidmore Fountain Plaza, LLC)                                      | Full                              | TCE                             |
| 8  | 1N1E34DC-00900 | Diamond Parking Services (Skidmore Fountain Plaza, LLC)                        | Full*** (1)                       | TCE*** (1)                      |
| 9  | 1N1E34DC-01000 | Diamond Parking Services (Skidmore Fountain Plaza, LLC)                        | Full                              | TCE                             |

| ID | TLID           | Property Name                                                          | Draft EIS Long-Span (bus. displ.) | Refined Long-Span (bus. displ.) |
|----|----------------|------------------------------------------------------------------------|-----------------------------------|---------------------------------|
| 10 | 1N1E34DB-00600 | University of Oregon (White Stag Building)                             | TCE Access                        | TCE Access                      |
| 11 | 1N1E34DC-90000 | Mercy Corps                                                            | TCE                               | Easement & TCE                  |
| 12 | 1N1E34DB-01300 | Japanese American Plaza (City of Portland)                             | TCE                               | TCE                             |
| 13 | 1N1E34DC-03600 | Ankeny Plaza Structure (City of Portland)                              | TCE**                             | TCE**                           |
| 14 | 1N1E34DC-00100 | BES Pump Station (City of Portland)                                    | TCE                               | TCE                             |
| 15 | 1N1E34DC-03700 | Bill Naito Legacy Fountain (City of Portland)                          | -                                 | -                               |
| 16 | 1N1E34DA-01500 | Pacific Coast Fruit Company                                            | TCE****(1)                        | -                               |
| 17 | 1N1E34DA-01900 | Rose City Transportation (David Nemarnik)                              | Full (1)                          | Easement & TCE**** (1)          |
| 18 | 1N1E34DD-01000 | American Medical Response (Produce Row LLC)                            | Partial (1)                       | Easement & TCE (1)              |
| 19 | 1N1E34DA-02800 | Eastside Exchange Building (Bridgehead Development LLC)                | -                                 | -                               |
| 20 | 1N1E34DA-02602 | The Yard – Pedestrian / Bike Right-of-Way (Bridgehead Development LLC) | -                                 | -                               |
| 21 | 1N1E34DA-02001 | The Yard (Yard Residences LLC)                                         | TCE                               | Easement                        |
| 22 | 1N1E34DD-00900 | Nemarnik Family Properties Parking Lot                                 | -                                 | TCE (1)                         |
| 23 | 1N1E34DD-00700 | 230 E Burnside Building (Templeton Office Investments LLC)             | TCE Access                        | TCE Access                      |
| 24 | 1N1E34DA-03100 | Union Arms Apartments                                                  | -                                 | -                               |
| 25 | 1N1E34DA-02900 | The Slate (Block 75)                                                   | -                                 | -                               |
| 26 | 1N1E34DA-03300 | Block 76                                                               | Partial                           | Easement & TCE                  |
| 27 | 1N1E34DA-3500  | Fair-Haired Dumbbell                                                   | TCE Access                        | -                               |
| 28 | 1N1E34DD-00100 | 5 MLK (Under Construction)                                             | TCE Access                        | -                               |
| A  | NA             | Willamette River (Dept. of State Lands)                                | TCE                               | Easement & TCE                  |
| B  | NA             | Vera Katz Eastbank Esplanade (City of Portland)                        | TCE                               | -                               |
| C  | NA             | I-5 & I-84 (ODOT)                                                      | TCE                               | Easement & TCE                  |

| ID | TLID | Property Name          | Draft EIS Long-Span (bus. displ.) | Refined Long-Span (bus. displ.) |
|----|------|------------------------|-----------------------------------|---------------------------------|
| D  | NA   | Union Pacific Railroad | TCE                               | Easement & TCE                  |

bus. displ. = business displacements | Easement = Permanent Easement | Full = Full Acquisition | Partial = Partial Acquisition | TCE = Temporary Construction Easement | TCE Access = Temporary Construction Easement for access closures only | TLID = Tax lot ID

\*The University of Oregon uses this space and this is identified as a displacement of personal property.

\*\*Portland Saturday Market would be permanently displaced from their administration offices and temporarily displaced from the storage and market space under the bridge.

\*\*\*Diamond Parking Services would be displaced from Map IDs 8 and 9 but are only counted as one business displacement.

\*\*\*\*The Draft EIS Long-span Alternative could potentially displace the Pacific Coast Fruit Company business due to impacts to the Rose City Transportation building next door which shares a wall.

### 7.2.1 No-Build Alternative

No change. See the *EQRB Acquisitions and Displacements Technical Report* (Multnomah County 2021a).

### 7.2.2 Enhanced Retrofit Alternative

No change. See the *EQRB Acquisitions and Displacements Technical Report*.

### 7.2.3 Replacement, Short-Span and Long-Span

The Refined Long-span Alternative options would require four more permanent acquisitions than the Draft EIS Long-span Alternative. The tied-arch and cable-stayed options include the same types of acquisitions from each property, varying by size.

Impacts for the Draft EIS Long-span Alternative are shown in Figure 4 and Figure 5 at the west and east bridgeheads, respectively. Impacts for the Refined Long-span Alternative options are shown in Figure 6 and Figure 7.

Impacts to public and private right-of-way would remain the same for the Refined Long-span Alternative.

#### *Long-Term Impacts Summary*

- Draft EIS Long-span Alternative
  - o One permanent easement
  - o Six (potential) full acquisitions
  - o Two (potential) partial acquisitions
- Refined Long-span Alternative
  - o 12 permanent easements
  - o No full or partial acquisitions

- o Additional permanent impacts with the Refined Long-span Alternative
  - Portland Rescue Mission (Map ID 2) – A permanent easement would be required at the southeast corner of the property, also adjacent to W Burnside Street. This easement would not impact the existing building. The Draft EIS Long-span Alternative would only require a temporary construction easement for access.
  - Mercy Corp (Map ID 11) – A 132-square-foot permanent easement would be required at the northwest corner of the parking lot, adjacent to the existing bridge. This easement would not affect the existing building.
  - The Yard (Map ID 21) – A 1,208-square-foot permanent easement would be required along the southern edge of the property, adjacent to the existing bridge. This easement would not impact the existing building.
- o Reduced permanent impacts with the Refined Long-span Alternative
  - University of Oregon Classroom (Map ID 4) – At the direction of the County, this property would require a permanent easement rather than a full acquisition, but it would still result in a displacement.
  - The Portland Saturday Market Administrative Office (Map ID 5) – At the direction of the County, this property would require a permanent easement rather than a full acquisition, but it would still result in the existing building being removed and a displacement.
  - The Vacant Lot Owned by Skidmore Fountain Plaza, LLC. (Map ID 7) – A temporary construction easement for the entire property would be required rather than the full acquisition required with the Draft EIS Long-span Alternative.
  - Diamond Parking Service Lots (Map IDs 8 and 9) – Temporary construction easements for the entirety of both properties would replace the full acquisitions required with the Draft EIS Long-span Alternative. The existing restroom would still be removed, and a displacement would be required.
  - Rose City Transportation (Map ID 17) – At the direction of the County, this property would require a permanent easement rather than a full acquisition, but it would still result in a displacement.
  - American Medical Response (Map ID 18) – At the direction of the County, this property would require a permanent easement rather than a full acquisition, but it would still result in a displacement.
  - Block 76 (Map ID 26) – At the direction of the County, this property would require a permanent easement rather than a partial acquisition. A displacement would not be required for either the Draft EIS Long-span Alternative or the Refined Long-span Alternative.

#### 7.2.4 Replacement with Couch Extension

No change. See the *EQRB Acquisitions and Displacements Technical Report* (Multnomah County 2021a).



Figure 4. Property Impacts – Draft EIS Long-Span Alternative West Bridgehead

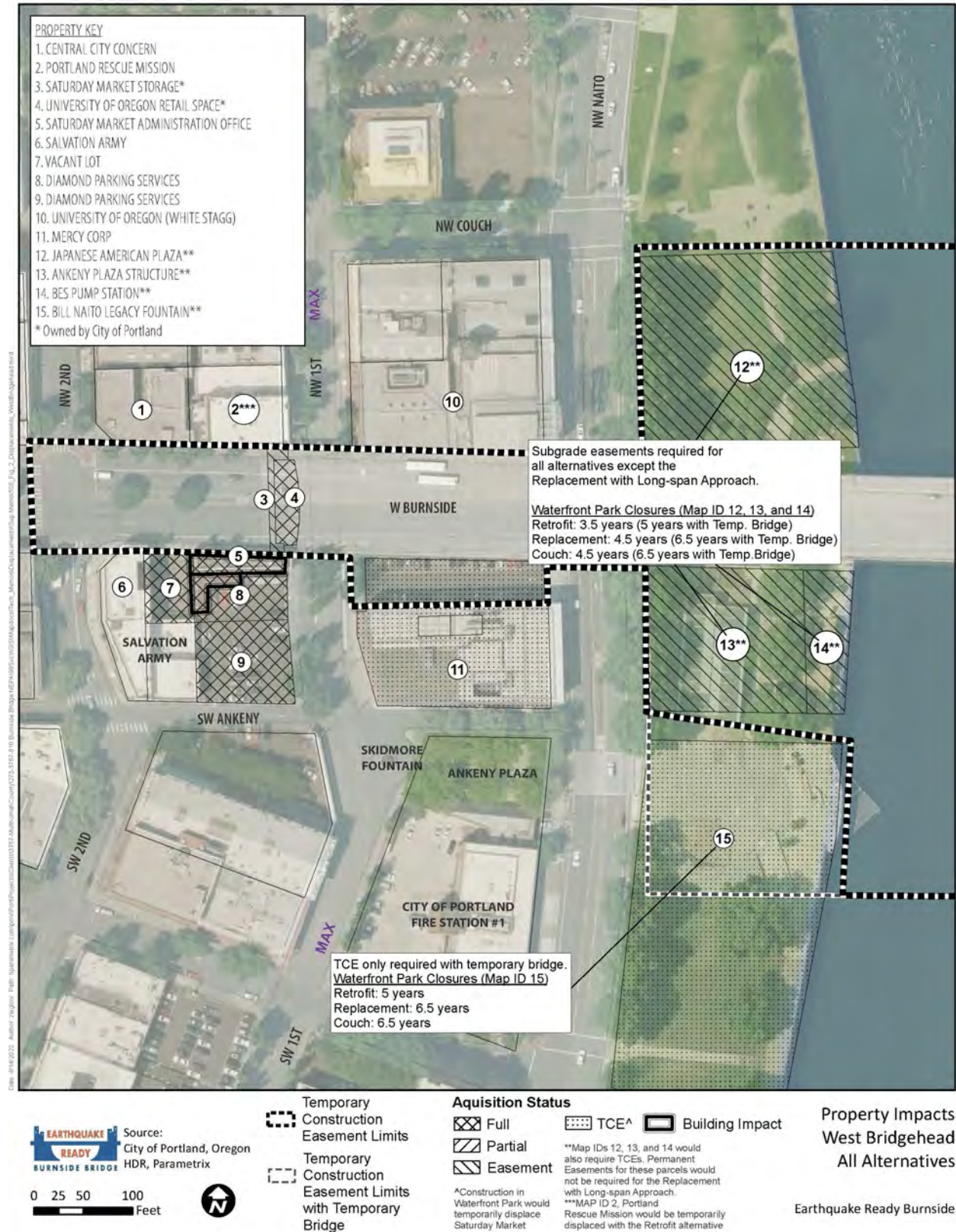




Figure 5. Property Impacts – Draft EIS Long-Span Alternative East Bridgehead

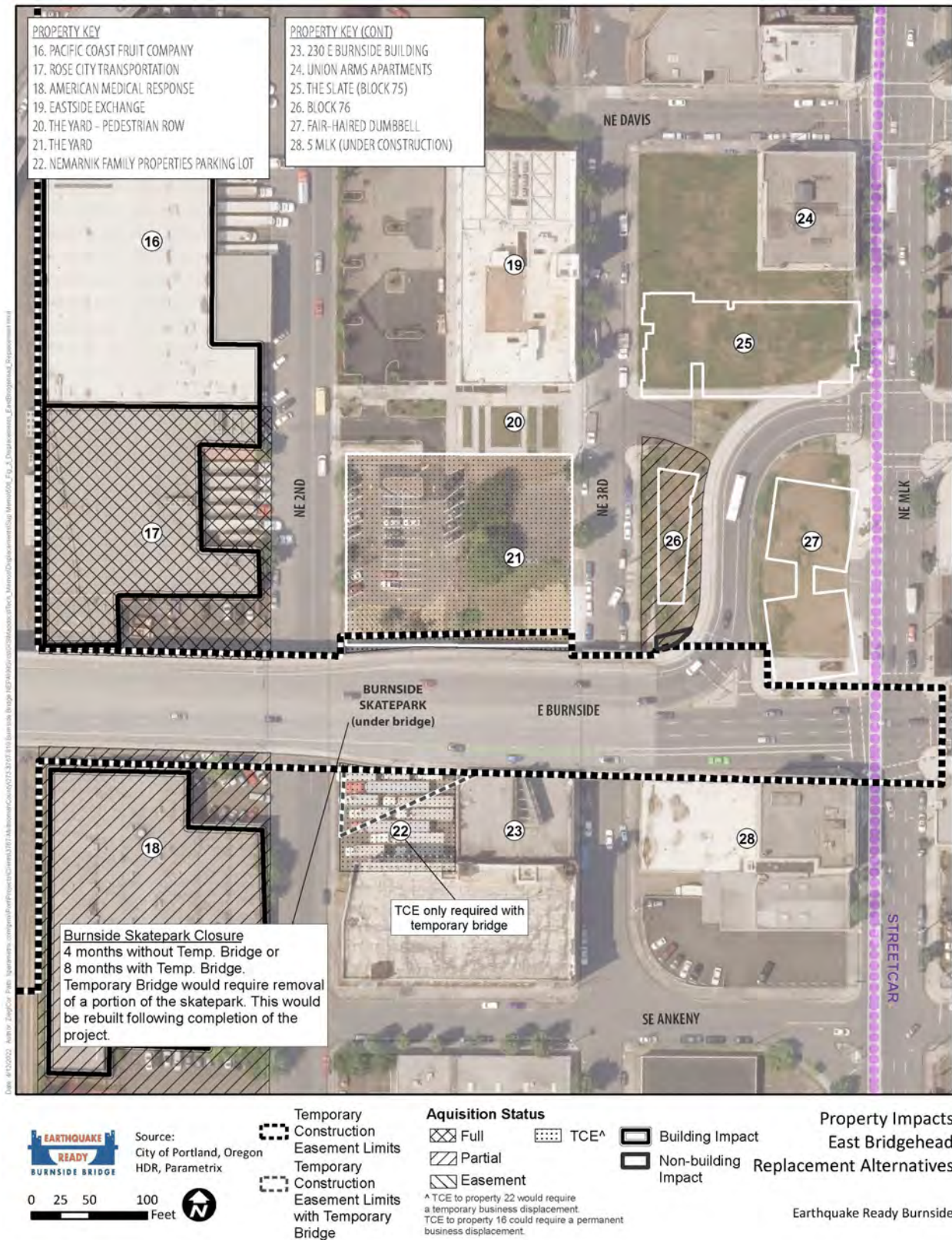




Figure 6. Property Impacts – Refined Long-Span Alternative West Bridgehead

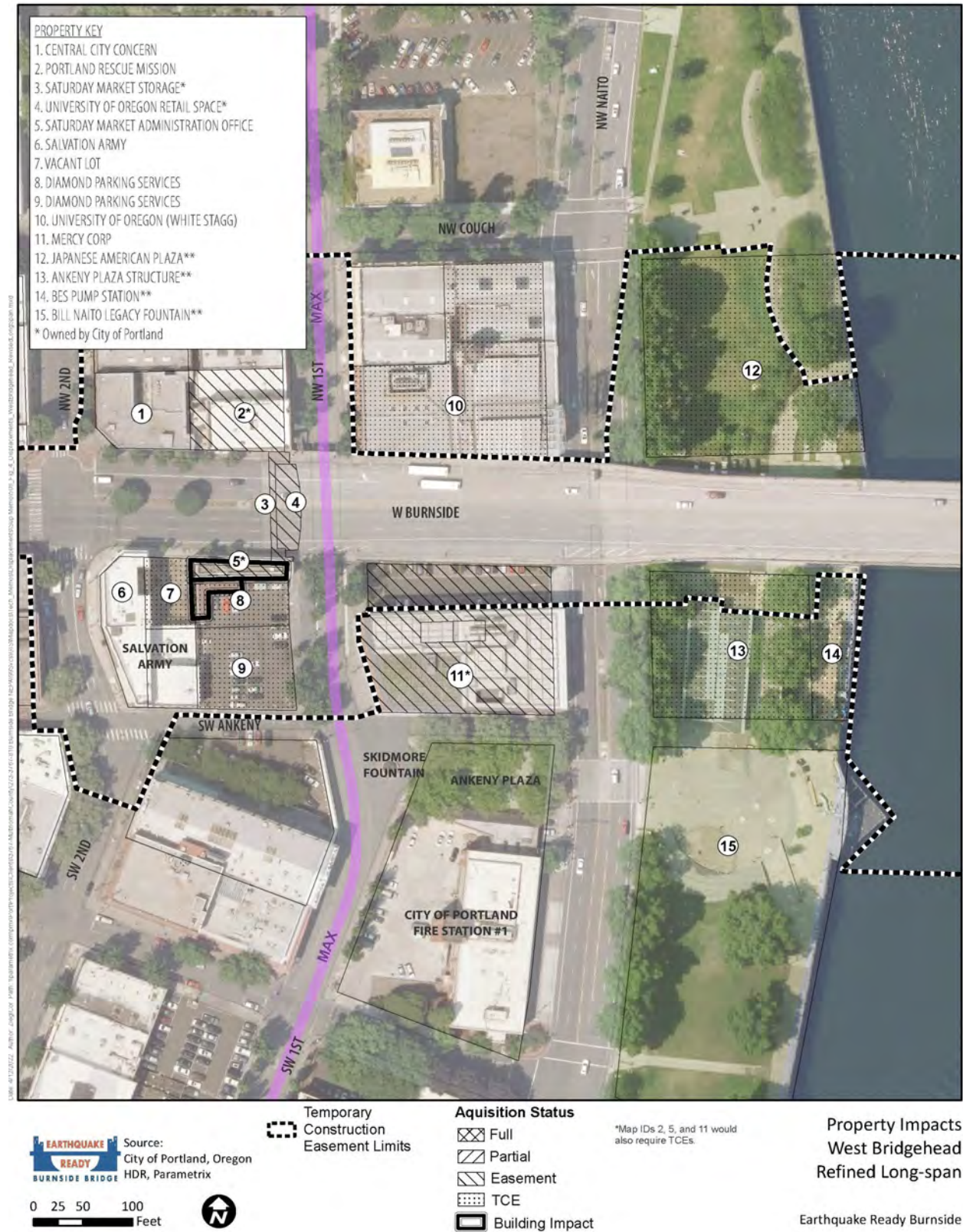
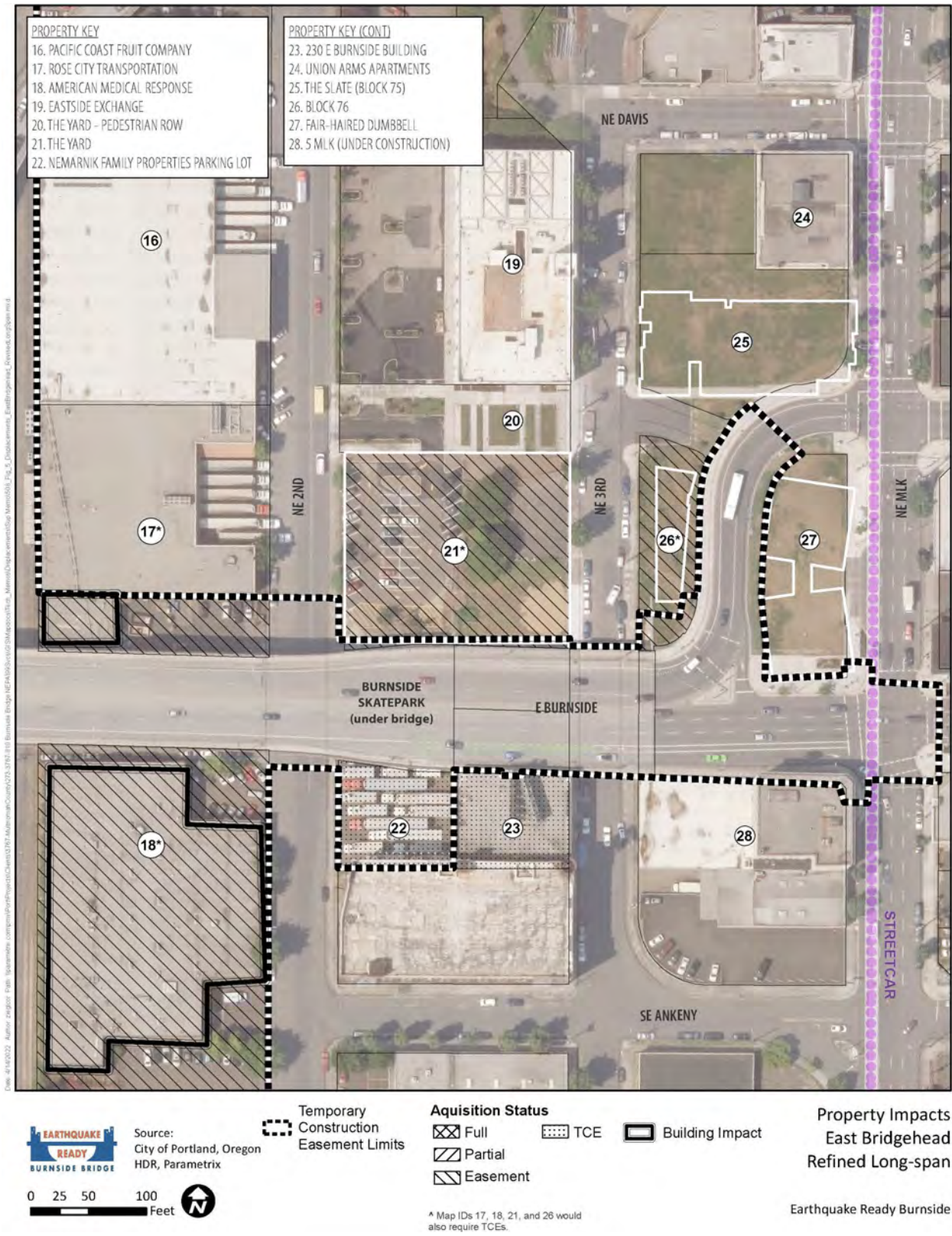




Figure 7. Property Impacts – Refined Long-Span Alternative East Bridgehead



## 7.3 Short-Term Acquisition Impacts

### 7.3.1 Refined Long-Span Options

Temporary construction impacts associated with the Refined Long-span Alternative options would impact 18 properties, one more than with the Draft EIS Long-span Alternative. Some fee acquisition areas that were assumed for the Draft EIS Long-span have been converted to TCE areas for the Refined Long-span Alternative options, as the County will not be needing the majority of those areas permanently, see Table 4.

During construction of all Draft EIS and Refined Long-span options, the same 51 doorways and garage/parking lot entrances would be temporarily affected. These access closures would require three additional TCEs to allow the County to compensate property owners for building modifications that would be necessary to provide alternate access for businesses during construction.

It is now assumed that access accommodations would be made for sidewalk construction and other short-term access impacts; therefore, a number of temporary easements for access closures that were assumed for the Draft EIS Long-span Alternative would no longer be needed. See Figure 8 and Figure 9 and Table 4 for updated access and parking impacts

Off-site construction staging would impact the same properties for both the Draft EIS Long-span and Refined Long-span Alternatives.

See the *EQRB Right-of-Way Technical Report* (Multnomah County 2021d) for other short-term acquisition impacts.

#### *Short-Term Construction Impacts Summary*

- Draft EIS Long-span Alternative
  - o 10 properties affected by TCEs
  - o 7 additional properties affected by TCEs for access only
  - o 51 building and parking lot entrances would be temporarily closed
- Refined Long-span Alternative Options
  - o 15 properties affected by TCEs
  - o 3 additional properties affected by TCEs for access only
  - o 51 building and parking lot entrances would be temporarily closed
  - o Additional temporary impacts – Portland Rescue Mission (Map ID 2), Portland Saturday Market Administration Offices (Map ID 5), the vacant lot owned by Skidmore Fountain Plaza, LLC (Map ID 7), Diamond Parking Service Lots (Map IDs 8 and 9), Rose City Transportation (Map ID 17), American Medical Response (Map ID 18), the Nemarnik Family Properties parking lot (Map ID 23) and Block 76 (Map ID 26)
  - o Reduced temporary impacts – Pacific Coast Fruit Company (Map ID 16) and the Yard (Map ID 21)

**Table 4. Access Impacts**

| Door # | TLID             | Property Name                                        | Door Type                   | Draft EIS Long-Span  | Refined Long-Span    |
|--------|------------------|------------------------------------------------------|-----------------------------|----------------------|----------------------|
| 3      | 1N1E34CA - 09200 | Central City Concern (Shoreline Building)            | Pedestrian                  | Temporary Short-term | Temporary Short-term |
| 4      | 1N1E34CA - 09200 | Central City Concern (Shoreline Building)            | Pedestrian                  | Temporary Short-term | Temporary Short-term |
| 5      | 1N1E34CA - 09200 | Central City Concern (Shoreline Building)            | Pedestrian                  | Temporary Short-term | Temporary Short-term |
| 6      | 1N1E34DB - 00900 | Portland Rescue Mission                              | Garbage / Recycling         | Temporary Short-term | Temporary Short-term |
| 7      | 1N1E34DB - 00900 | Portland Rescue Mission                              | Pedestrian                  | Temporary Short-term | Temporary Short-term |
| 8      | 1N1E34DB - 00900 | Portland Rescue Mission                              | Pedestrian (onto bridge)    | Temporary Short-term | Temporary Short-term |
| 9      | 1N1E34DB - 00900 | Portland Rescue Mission                              | Pedestrian (onto bridge)    | Temporary Short-term | Temporary Short-term |
| 10     | 1N1E34DB - 00900 | Portland Rescue Mission                              | Pedestrian                  | Temporary Long-term  | Temporary Long-term  |
| 11     | 1N1E34DB - 00900 | Portland Rescue Mission                              | Pedestrian                  | Temporary Long-term  | Temporary Long-term  |
| 12     | 1N1E34DB - 00900 | Portland Rescue Mission                              | Garage                      | Temporary Long-term  | Temporary Long-term  |
| 13     | 1N1E34DB - 01400 | University of Oregon Retail Space (City of Portland) | Garage                      | Permanent Closure    | Permanent Closure    |
| 14     | 1N1E34DB - 01400 | University of Oregon Retail Space (City of Portland) | Pedestrian                  | Permanent Closure    | Permanent Closure    |
| 15     | 1N1E34DB - 01400 | University of Oregon Retail Space (City of Portland) | Pedestrian                  | Permanent Closure    | Permanent Closure    |
| 16     | 1N1E34DB - 01400 | University of Oregon Retail Space (City of Portland) | Pedestrian                  | Permanent Closure    | Permanent Closure    |
| 17     | 1N1E34DB - 01400 | University of Oregon Retail Space (City of Portland) | Pedestrian                  | Permanent Closure    | Permanent Closure    |
| 18     | 1N1E34CD - 00300 | Salvation Army                                       | Pedestrian                  | Temporary Short-term | Temporary Short-term |
| 19     | 1N1E34DB - 00600 | University of Oregon (White Stag)                    | Pedestrian (onto bridge)    | Permanent Closure    | Permanent Closure    |
| 19a    | 1N1E34DB - 00600 | University of Oregon (White Stag)                    | Pedestrian (under bridge)   | Temporary Long-term  | Temporary Long-term  |
| 20     | 1N1E34DB - 00600 | University of Oregon (White Stag)                    | Loading Dock (under bridge) | Temporary Short-term | Temporary Short-term |



| Door # | TLID             | Property Name                                              | Door Type  | Draft EIS Long-Span  | Refined Long-Span    |
|--------|------------------|------------------------------------------------------------|------------|----------------------|----------------------|
| 21     | 1N1E34DC - 90000 | Mercy Corp                                                 | Pedestrian | Temporary Long-term  | Temporary Long-term  |
| 30     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Pedestrian | -                    | -                    |
| 31     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Pedestrian | -                    | -                    |
| 32     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Pedestrian | -                    | -                    |
| 33     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Pedestrian | -                    | -                    |
| 35     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Garage     | -                    | -                    |
| 36     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Pedestrian | -                    | -                    |
| 37     | 1N1E34DA - 02800 | Eastside Exchange Building (Bridgehead Development LLC)    | Pedestrian | -                    | -                    |
| 38     | 1N1E34DA - 02001 | The Yard (The Yard Residences LLC)                         | Pedestrian | -                    | -                    |
| 39     | 1N1E34DA - 02001 | The Yard (The Yard Residences LLC)                         | Pedestrian | -                    | -                    |
| 40     | 1N1E34DA - 02001 | The Yard (The Yard Residences LLC)                         | Pedestrian | -                    | -                    |
| 41     | 1N1E34DA - 02001 | The Yard (The Yard Residences LLC)                         | Pedestrian | -                    | -                    |
| 44     | 1N1E34DD - 00700 | 230 E Burnside Building (Templeton Office Investments LLC) | Pedestrian | Temporary Long-term  | Temporary Long-term  |
| 45     | 1N1E34DD - 00700 | 230 E Burnside Building (Templeton Office Investments LLC) | Pedestrian | Temporary Short-term | Temporary Short-term |



| Door # | TLID             | Property Name            | Door Type  | Draft EIS Long-Span  | Refined Long-Span    |
|--------|------------------|--------------------------|------------|----------------------|----------------------|
| 48     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 49     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 50     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 51     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 52     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 53     | 1N1E34DA - 03300 | Block 76                 | Pedestrian | -                    | -                    |
| 54     | 1N1E34DA - 03300 | Block 76                 | Pedestrian | -                    | -                    |
| 59     | 1N1E34DD - 00100 | 5 MLK                    | Garage     | Temporary Short-term | Temporary Short-term |
| 60     | 1N1E34DA - 03100 | Union Arms Apartments    | Pedestrian | -                    | -                    |
| 61     | 1N1E34DA - 03100 | Union Arms Apartments    | Pedestrian | -                    | -                    |
| 62     | 1N1E34DA - 03100 | Union Arms Apartments    | Pedestrian | -                    | -                    |
| 63     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 64     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 65     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 66     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 67     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 68     | 1N1E34DA - 02900 | The Slate (Block 75)     | Pedestrian | -                    | -                    |
| 76     | 1N1E34DA - 03500 | The Fair-Haired Dumbbell | Pedestrian | Temporary Short-term | Temporary Short-term |
| 77     | 1N1E34DD - 00100 | 5 MLK                    | Pedestrian | Temporary Short-term | Temporary Short-term |

**Figure 8. Access Reference – West Bridgehead**

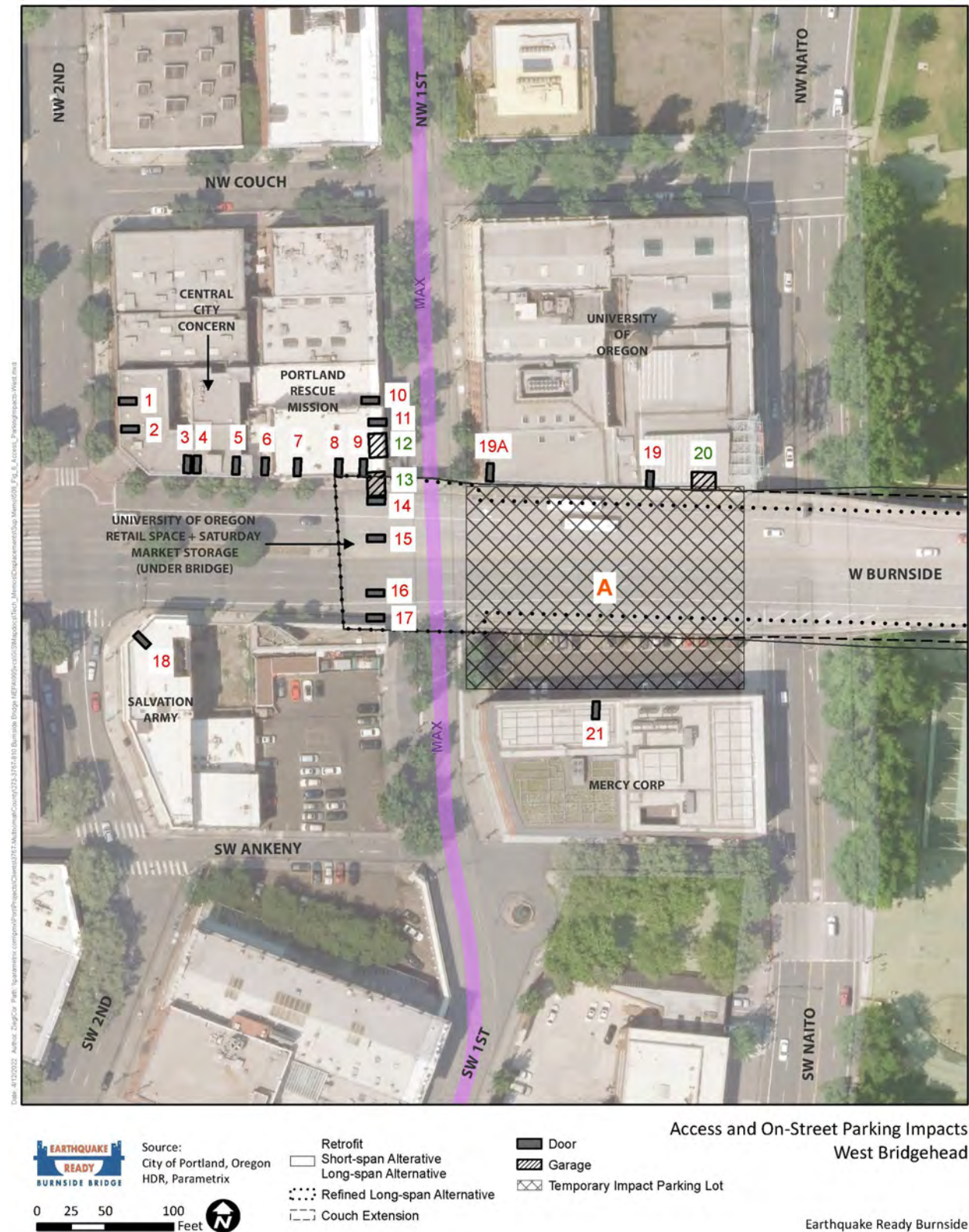
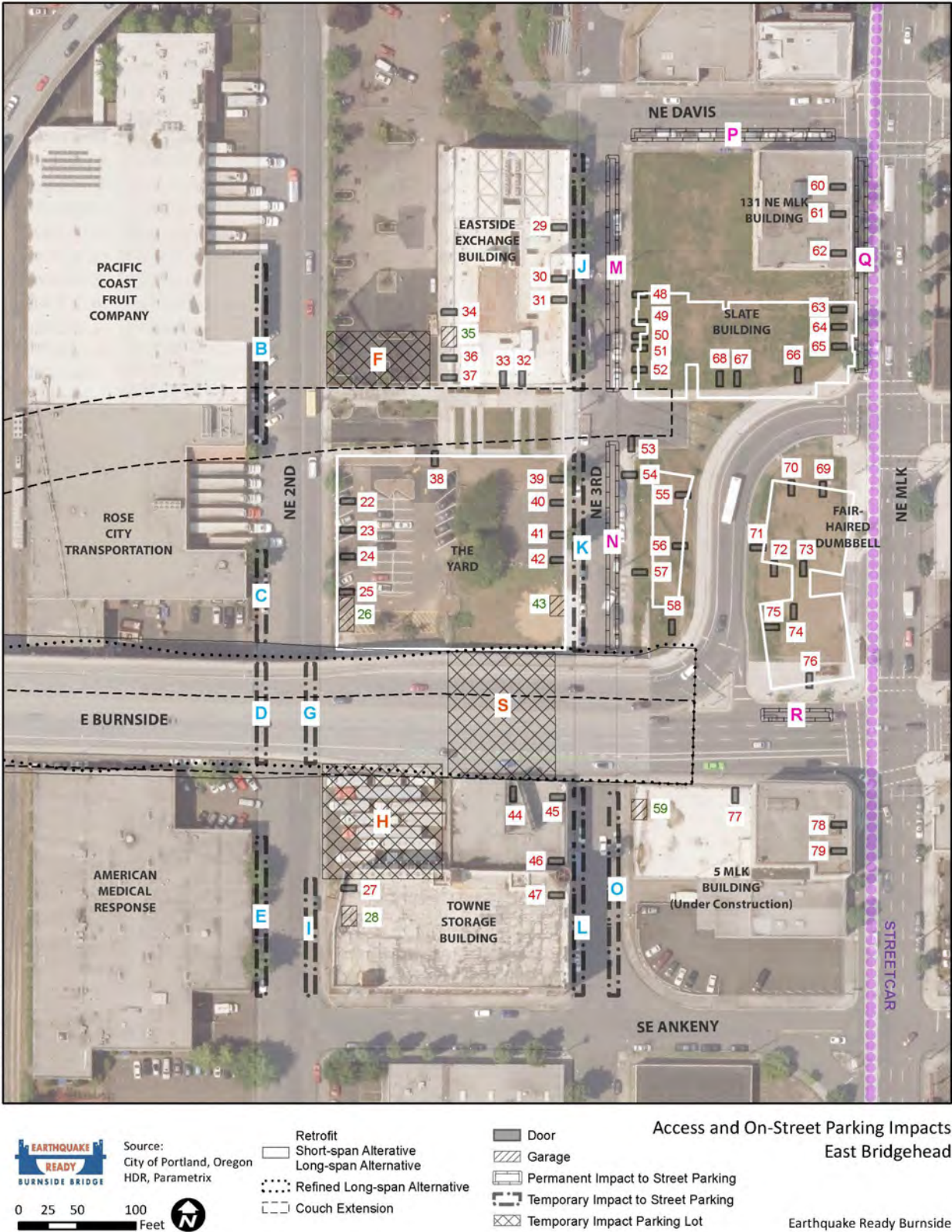




Figure 9. Access Reference – East Bridgehead



## 7.4 Relocations

Table 5 presents anticipated relocations for the Draft EIS Long-span and the Refined Long-span Alternatives.

**Table 5. Displacements/Relocations by Alternative**

| Alternative         | Residential | Non-Residential |
|---------------------|-------------|-----------------|
| Draft EIS Long-Span | 0           | 6               |
| Refined Long-Span   | 0           | 6               |

### 7.4.1 Residential Relocation

There are no residential relocations anticipated with any long-span options.

### 7.4.2 Non-Residential Relocation

Both the Draft EIS Long-span Alternative and the Refined Long-span Alternative anticipate six non-residential displacements/relocations. Following are the differences in non-residential displacements across the long-span options.

- Pacific Coast Fruit Company (PCFC) (east, Map ID 16) – The Draft EIS Long-span Alternative, though not directly affecting the PCFC parcel, would require relocation of the business due to an important portion of their operations being located within the Rose City Transportation building (Map ID 17) which would be 100 percent affected by the Draft EIS Long-span Alternative. The Refined Long-span Alternative options reduce impacts to a small section of the Rose City Transportation building, which would require some reconfiguration of PCFC’s operations, some personal property relocation, and re-routing of PCFC’s rooftop conveyor system, but would no longer require a full business relocation. This could change depending on analysis of the building impact conducted by a professional architect, but for the purpose of this memo, it is anticipated that the interior of the building could be reconfigured and that the business would not be displaced. PCFC is also leasing the Nemarnik Family commercial parking lot (east, Map ID 22) for its freight trucks. The parking lot would need to be temporarily closed for the duration of the Project. It is assumed that a portion of the Produce Row property (east, Map ID 18) that is being acquired and cleared for the Project could be used to mitigate the impact to PCFC truck parking during construction.
- Rose City Transportation freight business (east, Map ID 17) – As mentioned above, impacts to the Rose City Transportation building are smaller with the Refined Long-span Alternative options. The portion of the building that would need to be removed for construction is currently being used by PCFC, so no impacts to Rose City Transportation are anticipated due to the building impact. Rose City Transportation also leases the Nemarnik Family commercial parking lot (east, Map ID 22) which would be considered a temporary personal property relocation per above.

See the *EQRB Acquisitions and Displacements Technical Report* (Multnomah County 2021a) for descriptions of the other displacements that are anticipated with the Draft EIS

Long-span Alternative and which remain unchanged with the Refined Long-span Alternative.

### 7.4.3 Personal Property Relocation

Per above, PCFC and Rose City Transportation would be considered personal property relocations with the Refined Long-span Alternative options.

## 7.5 Additional Long-Term Right-of-Way Considerations

- The Draft EIS Long-span Alternative requires a temporary easement from Union Pacific Railroad (UPRR) at the east bridgehead.
- The Refined Long-span Alternative would require a temporary easement and a permanent easement for bridge facilities over UPRR property.
- Negotiations with UPRR have historically taken a minimum of 12 months, which will need to be accounted for in the project schedule, and permanent rights are likely to take longer to acquire from the railroad than temporary rights.

## 7.6 Post-Earthquake Impacts

The post-earthquake impacts from the Refined Long-span Alternative are the same as the Draft EIS Long-span Alternative.

# 8 Conclusion

All Draft EIS and Refined Long-span options would require the acquisition of right-of-way and potential non-residential and personal property only relocations. The Refined Long-span Alternative cable-stayed and tied-arch options would require the fewest acquisition files, and the cable-stayed option is estimated to have the lowest right-of-way costs of the long-span options. All three options would require the same number of relocations, but two of them would be smaller and/or temporary with the Refined Long-span Alternative cable-stayed and tied-arch options.

## 8.1 Acquisition and Displacement Impact Summary

- The Refined Long-span Alternative options require the fewest right-of-way acquisitions (22 total).
- The following businesses are potentially displaced by all options: Portland Saturday Market, Diamond Parking Services, University of Oregon classroom, Rose City Transportation, American Medical Response, and Pacific Coast Fruit Company.

# 9 Potential Mitigation

See the *EQRB Acquisitions and Displacements Technical Report* (Multnomah County 2021a).



## 10 Preparers

| Name            | Professional Affiliation | Education                             | Years of Experience |
|-----------------|--------------------------|---------------------------------------|---------------------|
| Josh Ahmann     | Parametrix               | Master of Urban and Regional Planning | 15                  |
| Hannah Halpenny | HDR, Inc.                | Bachelor of Art in Economics, SR/WA   | 8                   |
| Pat Thayer      | HDR, Inc.                | SR/WA                                 | 41                  |

# 11 References

Multnomah County.

- 2021a. EQRB Acquisitions and Displacements Technical Report. [Project Library | Multnomah County \(multco.us\)](#)
- 2021b. EQRB Description of Alternatives. [Project Library | Multnomah County \(multco.us\)](#)
- 2021c. EQRB Draft Environmental Impact Statement. [Project Library | Multnomah County \(multco.us\)](#).
- 2021d. EQRB Right-of-Way Technical Report. [Project Library | Multnomah County \(multco.us\)](#).
- 2022. EQRB Supplemental Draft Environmental Impact Statement. [Project Library | Multnomah County \(multco.us\)](#).