



**Austin Transit  
Partnership**

# **Austin Transit Partnership**

Austin Light Rail Phase 1 Project

*Visuals and Aesthetics Technical Report*

*Austin, TX*

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## Acronyms and Abbreviations

<b>Term/Acronym</b>	<b>Definition</b>
<b>ATP</b>	Austin Transit Partnership
<b>AVE</b>	area of visual effect
<b>CapMetro</b>	Capital Metropolitan Transportation Authority
<b>City</b>	City of Austin
<b>FTA</b>	Federal Transit Authority
<b>I-35</b>	Interstate 35
<b>MLK</b>	Martin Luther King Jr. Boulevard
<b>Project</b>	Austin Light Rail Phase 1 Project
<b>OMF</b>	operations and maintenance facility
<b>ROW</b>	right-of-way
<b>SH 71</b>	State Highway 71
<b>SoCo</b>	South Congress
<b>TPSS</b>	traction power substations
<b>US 183</b>	United States Highway 183
<b>UT</b>	University of Texas at Austin

# 1 Introduction

The Federal Transit Administration (FTA) and Austin Transit Partnership (ATP) are completing an environmental review of the Austin Light Rail Phase 1 Project (the Project) in Austin, Texas. This visuals and aesthetics technical report was prepared to support the Project's Draft Environmental Impact Statement in accordance with the National Environmental Policy Act and related laws and regulations. FTA and ATP are the Lead Agencies in the National Environmental Policy Act process.

This report considers the changes to visual quality and the effects that would result from construction and operation of the Project. Visual and aesthetic environments are the landscape's visible natural and cultural features that contribute to the public's appreciation and enjoyment of their surroundings. The visual environment includes both the built and natural environments, whether solitary landmarks (such as buildings, trees, and bodies of water) or entire landscapes, or views.

Effects are assessed in terms of the extent to which the Project's presence would change the visual character and quality of the environment and the sensitivity of the affected population to that change.

This report:

- describes the visual resources found in the Area of Visual Effect (AVE) and identifies the key viewpoints of affected populations;
- characterizes the existing visual quality of the AVE;
- assesses the compatibility, sensitivity, and degree of Project effect (defined as beneficial, adverse, or neutral change to visual quality) based on viewer exposure and awareness; and
- identifies measures that would avoid or minimize adverse effects and Project enhancements that would improve visual quality in the AVE.

## 2 Regulatory Setting

### 2.1 Federal

There are federal regulations that govern the assessment and consideration of visual quality and aesthetic character. These regulations consider the protection and enhancement of existing resources and aesthetic character, as well as the incorporation of design considerations in the development and construction of projects. The following federal regulations and policies apply to the evaluation of visual effects for the Build Alternative:

- National Environmental Policy Act (42 United States Code Section 4231) puts regulatory responsibility on the federal government to "use all practicable means" to "assure for all

Americans safe, healthful, productive, and aesthetically and culturally pleasing surroundings.”

- FTA Circular 9400.1A, Design and Art in Transit Projects, encourages the use of design and artistic considerations in transit projects. The FTA recognizes that specific types of transit projects require an assessment of visual effects. The circular provides guidance on opportunities for incorporating art and design into transit projects (FTA 2015).
- U.S. Department of Transportation Act, Section 4(f), applies to agencies within the U.S. Department of Transportation and is referred to as 49 United States Code 303. Section 4(f) focuses on the preservation of public parks and recreation lands, wildlife and waterfowl refuges, and historic sites, and includes the preservation of their aesthetic integrity.

## 2.2 State and Local

### 2.2.1 Capitol View Corridors

Capitol View Corridors impose height restrictions on structures throughout Austin that may have a direct sightline to the dome of the Texas State Capitol. Texas Government Code Chapter 3151, titled "Preservation of View of State Capitol," defines state-protected viewing corridors and prohibits any construction that would intersect a Capitol View Corridor. In 1985, the City of Austin (City) adopted a corresponding Capitol View Protection Ordinance, so that most of the corridors are protected under the Austin Code of Ordinances Chapter 25-2 Appendix A, entitled "Boundaries of the Capitol View Corridors," as well as under state law. The Capitol View Corridors begin at the dome of the Texas State Capitol building and extend outward to variable extents. There are 30 Capitol View Corridors. As stated in Austin Zoning regulations, structure height is limited within these corridors.

## 3 Methodology

National Environmental Policy Act regulations require consideration of the direct effects of a proposed action, as well as the significance of those effects. The term “effects” is defined to include the aesthetic effects of an action (40 Code of Federal Regulations 1502.16; 1508.8). Potential visual and aesthetic effects of the Project are a key public issue. Since FTA does not have visual assessment guidelines, ATP prepared this assessment in accordance with the Federal Highway Administration’s *Guidelines for the Visual Impact Assessment of Highway Projects* (2015), which represents current best practices for conducting a thorough evaluation of visual effects caused by a linear transportation project.

### 3.1 Area of Visual Effect

The Study Area for this analysis is the AVE, defined by the physical constraints of the environment and the physiological limits of human sight. According to Federal Highway Administration guidelines, it is “the area in which views of the proposed project would be visible as influenced by the presence or absence of intervening topography, vegetation and structures”

(2015). ATP considered visual resources to be components of the natural and constructed environment that are capable of being seen.

The AVE is divided into landscape sections which are commonly used to divide long, linear projects like this one, into logical geographic areas for visual effect assessment purposes. Landscape sections are made up of areas with similar visual characteristics, although smaller locations within each landscape section might differ from the overall section's character. Visual resources are then identified within each landscape section, denoting where the environment and the limits of human sight combine to allow for views of the Project. For the purposes of this visual quality analysis, the AVE is divided into four landscape sections: (1) North Section: 38th Street to Martin Luther King Jr. (MLK) Boulevard; (2) Downtown Section: MLK Boulevard to Lady Bird Lake; (3) South Section: Lady Bird Lake to Oltorf Street and South Congress Avenue to Interstate 35 (I-35); and (4) East Section: I-35 to Yellow Jacket Station (including the operations and maintenance facility [OMF] and maintenance of way shops). To document the visual resources in the AVE, ATP conducted field observations, used geographic information system data and aerial imagery, and analyzed different key viewpoints using Google Earth Pro (2021). Key viewpoints are those that encompass views of and from the project area that capture the existing visual character and visual quality of the landscape section that would be altered by the proposed project. A key viewpoint could be especially sensitive or could be generally representative of the landscape section. These are defined and discussed below in Section 5, Environmental Consequences.

### 3.2 Visual Character (Affected Environment)

Visual character is the physical appearance of the landscape, including the natural, physical, and architectural/cultural features, or visual resources, that give it an identity and sense of place. The Visual Character of the Project is described by landscape section below in Section 4, Affected Environment. It includes an assessment of visual quality and viewers—the population affected by a project. Viewers are defined as neighbors who can see elements of the Project and travelers who would use the transit facility. Visual quality is defined as what viewers like and dislike about the visual features that compose a particular scene. Visual quality is inherently subjective—different viewers may evaluate visual features differently. In general, people respond favorably to scenes that create a sense of perceived harmony, order, and coherence.

Visual quality for the landscape sections in the AVE was rated as follows:

- **High.** Section, or portions thereof, is of important visual quality to the primary viewers. These areas may be memorable, distinctive, unique (in a positive way), intact natural or park-like areas, or urban areas with strong and consistent architectural and urban design features.
- **Moderate.** Section is of average visual quality to the primary viewers, meaning that the area can be generally pleasant appearing but may lack distinctiveness, memorability, and compositional harmony, or may simply be common and ordinary landscapes.
- **Low.** Section is of low visual quality to the primary viewers meaning that there may be features in the area that seem visually out of place, lack visual coherence, do not have compositional harmony, and contain eyesores.

### 3.3 Visual Effect Analysis

The effect assessment was based on the evaluation of visual contrast, comparing photos of existing conditions and Google Earth images to renderings of the Project. The Project's visual and aesthetic effects are assessed by analyzing the compatibility and contrast, sensitivity, and degree of effect—defined as a beneficial, adverse, or neutral change to visual quality—based on viewer exposure and awareness. Project elements were considered in relation to Capitol View Corridors regulations as discussed in Section 2. The Project does not intersect any of these height-restricted zones.

#### 3.3.1 Compatibility and Contrast

Four contrast levels were established for the elements of the Build Alternative and Design Options that would be visible to viewer groups:

- **Not Noticeable.** Changes in the landscape scenery or views that would not be evident unless pointed out due to such factors as previous disturbance, distance, terrain and vegetation screening, dominance of adjacent landscape features, and background terrain.
- **Noticeable.** Changes in the landscape scenery or views that would be evident, but visually subordinate to the setting due to the factors described above. These changes may attract slight attention, but do not compete with adjacent landscape scenery or views.
- **Co-dominant.** Changes in the landscape scenery or views that attract attention and begin to compete with adjacent landscape scenery or views. Changes are typically viewed in the middle ground and are unobstructed or partially screened in the foreground.
- **Dominant.** Changes in the landscape scenery or views that become the focal point or most important (dominant) feature in the setting. Changes are typically viewed in the foreground and are unobstructed. In extreme cases, they may be partially screened. Such changes often have a lasting effect.

Design elements of the Build Alternative and its Design Options (i.e., materials, brands of vehicles, colors) have yet to be determined; therefore, the assessment is based on typical design features.

#### 3.3.2 Viewer Sensitivity

Viewer sensitivity is composed of two elements: viewer awareness and viewer exposure. These elements combine to form a method of predicting how a viewer might react to visual changes brought about by a project. Viewer awareness is defined both as the viewers' attention to a scene, focus on details, and any restrictions that may be placed on a scene/view to provide protection from the community. Viewer exposure is typically assessed by measuring the number of viewers exposed to the resource change, type of viewer activity, duration of the view, speed at which the viewer moves, and position of the viewer. Low viewer exposure results when few viewers experience a defined view, or when they may be less focused on the view, such as a freeway



commuter on the freeway. Low viewer awareness is also related to viewer expectations resulting from what viewers are used to seeing along the Project alignment. High viewer exposure results when many viewers have a view of frequent or long duration. High viewer awareness is also related to familiarity with a view, such as when viewing a resource from a residence, recreational site, or commuter route. For example, recreational and residential viewers tend to have extended viewing periods and may be more concerned about changes in views.

Viewer sensitivity is a relative measure of the degree of concern viewers have to changes in the visual character. It is determined by evaluating viewer exposure and duration, viewer awareness, type of use, and influence of adjacent land uses. Different viewer types would have different sensitivity. Typically, residents would be more sensitive to visible changes in the landscape. Sensitivity was rated as follows:

- **High.** Introduction of new elements could substantially affect the aesthetic quality of the section as observed by the primary viewers.
- **Moderate.** Introduction of new elements may affect the aesthetic quality of the section or a portion thereof as observed by the primary viewers.
- **Low.** Introduction of new elements is not likely to have an effect on the aesthetic quality of the section as observed by the primary viewers.

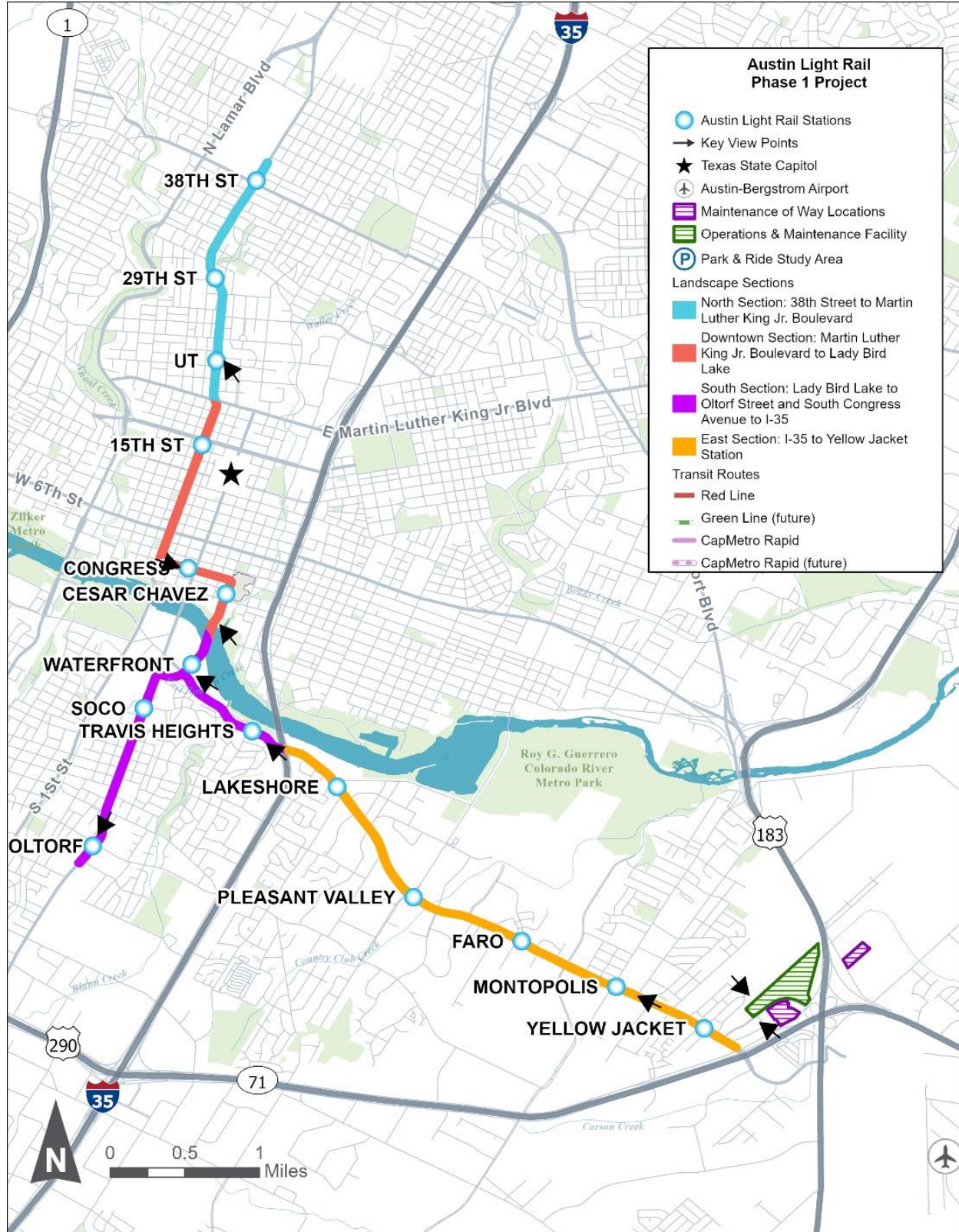
### 3.3.3 Degree of Effect / Change in Visual Quality

A proposed project may benefit visual quality by either enhancing visual resources or by creating better views of those resources and improving a viewer's experience. Similarly, it may adversely affect visual quality by degrading visual resources or obstructing or altering desired views. A neutral effect is one that does neither of these. Each key viewpoint was analyzed under these parameters and assigned a value, as discussed in Section 5 and summarized in Section 5.2.1.5, **Table 2**.

## 4 Affected Environment

The AVE includes some of the more highly visible and recognizable downtown features, including historic buildings, architecturally unique buildings, parks, and public spaces. The AVE is highly urbanized and is characterized by dense development north of Lady Bird Lake, and medium to high density land development south of the lake and east toward the airport. Much of the AVE is currently dedicated to transportation corridors and right-of-way (ROW). Surface parking areas and existing overhead electrical lines on utility poles are visible from most locations, particularly along East Riverside Drive. The Capital Metropolitan Transportation Authority (CapMetro) provides access to transit by bus routes, which run along or cross East Riverside Drive, and the existing Red Line commuter rail, which has its southern terminus on 4th Street in Downtown Austin. Several visual resources are located in the AVE, including Lady Bird Lake and Waller Beach at Town Lake Metro Park. Views of the Downtown Austin skyline are also accessible at locations along Lady Bird Lake and from Town Lake Metro Park. **Figure 1** shows the key viewpoints on a map, followed by descriptions of each landscape section.

Figure 1: Key Viewpoints



## 4.1 North Section: 38th Street to MLK Boulevard

This landscape section largely comprises the University of Texas at Austin (UT) campus and various commercial and retail developments along Guadalupe Street. Near 38th Street, one- and two-story commercial buildings and low-rise multifamily buildings run along Guadalupe Street. Central Park, a local neighborhood park, is located on the northwest corner of 38th and Guadalupe Streets, with views of the roadway. Further south, between 33rd and 31st Streets, is the entry to Aldridge Place, an Austin neighborhood eligible for listing in the National Register of Historic Places, with contributing components that are within the alignment. The UT campus abuts the east side of Guadalupe Street beginning roughly at 27th Street. From this point southward, Guadalupe Street, also known as “The Drag” through campus, has wide sidewalks and a thin tree line as a buffer to the roadway. Known for its incredibly high pedestrian activity, this area boasts many historic and popular cultural sites, restaurants, and bars, along with a prominence of building murals and public art.

Several UT buildings in this area are designed in the Spanish Renaissance style with distinctive tile roofs. Urban commercial low-rise development continues along the west side of Guadalupe Street, with separated bicycle lanes, bus stops, and wide sidewalks. High-rise buildings in the Downtown Austin area can be seen from the Drag. The surrounding area off campus, and outside the AVE, is predominantly made up of single-family and multifamily residential neighborhoods, including portions of Hyde Park, North University, and West Campus.

## 4.2 Downtown Section: MLK Boulevard to Lady Bird Lake

Much of this landscape section is located within the dense urban setting of Downtown Austin, consisting mostly of mid- and high-rise office buildings, multifamily and single-family residences, urban parks and plazas, street signs, trees, and miscellaneous furnishings typical of an urban core. North of 8th Street, along Guadalupe Street, there are more low-rise buildings and residences due to the Capitol View Corridors regulations, while south of 8th Street, the section becomes denser with more high-rise buildings. Open spaces along the corridor include both Republic Square and Wooldridge Square, two of the three remaining downtown public squares that were part of the original city plan developed in 1839 by Edwin Waller.

The street system generally follows a grid pattern, and mature shade trees line many of the arterial roads and adjoining streets. Pedestrian sidewalks and conventional steel tubular streetlights line the streets. Two historic Moonlight Towers are also in this landscape section, one at 15th and San Antonio Streets, and the other at West 9th and Guadalupe Street. Utility poles and wires are underground for much of the corridor, providing an uncluttered appearance drawing sight lines to the architectural design of neighboring buildings as well as the numerous bars, restaurants, offices, and commercial retail frontage throughout the urban core.

In this section, the alignment along 3rd Street would cross the Congress Avenue National Register Historic District, also known as “Austin’s Main Street,” which leads to the Texas State Capitol and lawn. As the alignment heads south on Trinity Street, the section includes Lady Bird Lake and the surrounding Town Lake Metropolitan Park. Visual resources in this section include landside views of Lady Bird Lake, Waller Beach at Town Lake Metro Park, the Ann and Roy Butler Hike and Bike Trail along the banks of Lady Bird Lake, and the Congress Avenue Bridge.

### 4.3 South Section: Lady Bird Lake to Oltorf Street and South Congress Avenue to I-35

In this landscape section, on the south shore of Lady Bird Lake, the alignment would split into two branches. The southern branch would cross East Bouldin Creek and extend south along South Congress Avenue with a terminus at the intersection of South Congress Avenue and Oltorf Street. The eastern branch would extend along East Riverside Drive from South Congress Avenue to I-35. South Congress Avenue is a heavily trafficked street with a historic commercial strip, including retail, restaurants, bars, and hotels.

The South Congress (SoCo) area comprises urban residential development, both single and multifamily, in a grid pattern, and commercial development with on-street parking and sidewalks. There is a mix of modern and classic architecture in this area, with many new developments containing hotels, restaurants, apartments, and retail lining the east side of the South Congress Avenue and many historic buildings on the west side. The historic strip draws visitors to its eclectic assortment of businesses and includes Austin institutions such as Guero's Taco Bar, Jo's Coffee, Allen's Boots, and The Continental Club. At the southern end of the section, just before Oltorf Street, land use includes a pocket park at the corner of Live Oak Street and South Congress Avenue, and larger retail stores, like the H-E-B grocery store, with more gaps between businesses and less shade overall.

The eastern portion of this section, along East Riverside Drive, largely comprises commercial and parking uses near South Congress Avenue and then single- and multifamily residences beginning near Newning Avenue to I-35. The Ann and Roy Butler Hike and Bike Trail and Boardwalk at Town Lake extend throughout this section along the southern bank of Lady Bird Lake. A grass median with mature street trees extends along the roadway and the downtown skyline is also visible from the roadway. Beginning at Newning Avenue, East Riverside Drive serves as the northern border to the Travis Heights neighborhood, which was established in the 1920s and is characterized by small to medium sized single-family homes. Much of this area is heavily wooded, and trees block views from the single-family residences. Near Newning Avenue, there are exposed limestone bluffs which form a grade difference between the roadway and the homes in Travis Heights ranging from 3 to 15 feet; retaining walls have been constructed in those areas. This section features substantial green space at Norwood Park, which includes the historic Norwood House and a popular dog park, at the corner of East Riverside Drive and I-35, and the Ann and Roy Butler Hike and Bike Trail, which surrounds Lady Bird Lake. Areas along the park and trail are densely wooded with understory vegetation that blocks the view from the surrounding properties. Several bus stops and overhead utility lines and poles are also located along the corridor.

### 4.4 East Section: I-35 to Yellow Jacket Station

This landscape section continues along East Riverside Drive, from I-35 to Yellow Jacket Station and includes the OMF and maintenance of way shops. Between I-35 and Pleasant Valley Road, land use mostly consists of retail and restaurants in strip malls, along with entertainment venues. After Pleasant Valley Road, there is a mix of multifamily and single-family housing with fenced yard areas, tree-lined sidewalks, and grass planting strips to Yellow Jacket Lane. Multifamily developments are located between Parker Lane and Faro Drive. Office buildings and

various commercial uses such as retail and restaurant establishments are located within this section, with retail and restaurants particularly concentrated along the section of East Riverside Drive between Parker Lane and South Pleasant Valley Road. An H-E-B grocery store is located at the corner of South Pleasant Valley Road and East Riverside Drive.

The South Shore District and Lakeshore District developments, which contain multifamily residences and commercial uses, are near this stretch of East Riverside Drive on the north side. Country Club Creek crosses the roadway here, and the City is currently planning to expand a trail to this crossing. There are also community facilities in this section of the AVE, including schools (e.g., Baty Elementary School), libraries, and public services. Warehouses and light industrial uses are prominent particularly in the area east of Faro Drive (e.g., Austin Energy System Control Center and Tokyo Electron Headquarters). The Tokyo Electron Headquarters property was recently approved for purchase by the City for redevelopment as a mixed use space.

An OMF is proposed on the northwest corner of the U.S. Highway 183 (US 183) / State Highway 71 (SH 71) interchange near Airport Commerce Drive in the current Airport Commerce Business Park, a light-industrial use area occupied by active businesses, which abuts a large green space. The surroundings are dominated by ground and air transportation uses, including the Austin-Bergstrom International Airport, elevated highway structures, and other modern urban elements, such as low- to mid-rise buildings, garages, and surface parking lots. The Esperanza Community, which offers services for people experiencing chronic homelessness, is due north of the proposed OMF and consists of four neighborhoods, each on 7 acres. The Riverside Meadows neighborhood borders the OMF site to the northwest.

## 4.5 Evaluation Parameters and Visual Assessment Ratings

**Table 1** lists the evaluation parameters and visual assessment ratings for each section.

**Table 1: Visual Assessment Ratings**

Landscape Section	Primary Viewers*	Visual Quality	Visual Resources	Key Viewpoint
<b>North Section:</b> 38th Street to MLK Boulevard	A, B, C, D, E, G	High	<ul style="list-style-type: none"> <li>Central Park</li> <li>Aldridge Place</li> <li>UT Campus</li> <li>The Drag (Guadalupe Street through UT Campus)</li> </ul>	<ul style="list-style-type: none"> <li>UT Station</li> </ul>
<b>Downtown Section:</b> MLK Boulevard to Lady Bird Lake	A, C, D, E, G	High	<ul style="list-style-type: none"> <li>State Capitol</li> <li>Republic Square</li> <li>Wooldridge Square</li> <li>Congress Avenue Bridge</li> <li>Waller Beach at Town Lake Metro Park</li> <li>Ann and Roy Butler Hike and Bike Trail</li> <li>Lady Bird Lake</li> </ul>	<ul style="list-style-type: none"> <li>Congress Avenue Station</li> <li>Proposed Bridge over Lady Bird Lake</li> </ul>
<b>South Section:</b> Lady Bird Lake to Oltorf Street and South Congress Avenue to I-35	A, B, C, D, E, G	Moderate to High	<ul style="list-style-type: none"> <li>Lady Bird Lake</li> <li>Ann and Roy Butler Hike and Bike Trail</li> <li>South Congress Avenue – SoCo District</li> <li>East Bouldin Creek</li> <li>Austin Boardwalk</li> <li>Travis Heights Historic District/ Neighborhood</li> <li>Norwood Tract at Town Lake Metro Park</li> </ul>	<ul style="list-style-type: none"> <li>Waterfront Station</li> <li>Oltorf Station</li> <li>Travis Heights Station</li> </ul>
<b>East Section:</b> I-35 to Yellow Jacket Station (including OMF and maintenance of way facility)	A, B, C, D, E, F, G	Moderate to Low	<ul style="list-style-type: none"> <li>Country Club Creek Trail</li> <li>Riverside Meadows Neighborhood</li> </ul>	<ul style="list-style-type: none"> <li>Montopolis Station</li> <li>OMF</li> </ul>

\*Primary Viewers:

A = Motorist

B = Single-Family Resident

C = Multifamily Resident

D = Recreational User

E = Commercial/Office Tenant

F = Industrial Tenants

G = Pedestrians

## 5 Environmental Consequences

### 5.1 No Build Alternative

Proposed No Build Alternative projects such as planned bus enhancements, and sidewalk and trail improvements would introduce minimal facility elements (bus routing and pedestrian infrastructure) and would unlikely substantially change visual quality in the AVE.

### 5.2 Build Alternative and Design Options

#### 5.2.1 Operational (Long-Term) Effects

The Project would introduce new visual elements within the AVE. These new elements could affect visually sensitive resources by altering the view to and/or from the resource, or by adding an element that would be out of scale or character of the existing visual context. These new visual elements would include the light rail vehicles and trackway, including at-grade and elevated guideway and supporting structures; station platforms and bus shelters; traction power substations (TPSS), catenary poles, overhead wiring, communications cabinets, bungalows, signal houses, and crossing cases; safety features at crossings, including gates, signals, barriers, and warning devices; light standards; existing ROW modifications or displacements; new or modified sidewalks and shared use paths; bridges and retaining walls; park-and-ride lots or garages; and the OMF.

The light rail would become a prominent visual component of Austin, much like the existing CapMetro buses and stops and the existing Red Line Commuter Rail, which terminates at the Downtown Station near the Austin Convention Center and the Hilton Hotel. ATP anticipates that effects from the Build Alternative and Design Options would be similar to those of the existing Red Line Corridor: Visual and aesthetic effects from the Red Line Corridor were minimal in the downtown area or have since been mitigated and were primarily related to the station elements located along 4th Street. Likewise, this Project would integrate new elements within the existing urban character and streetscape and would be designed so as not to obstruct any important views, and to be compatible with the surrounding urban and transportation elements. With respect to Capitol View Corridors regulations, new elements would be below the height restrictions of all intersecting Capitol View Corridors.

For visible Project elements, ATP would incorporate design features that are compatible with the surrounding area. Features of stations and new bridges would be designed under an architecture and design program that would solicit community input. ATP would work collaboratively to develop architectural treatments, visual screening, landscape, and other features designed to enhance the visual and aesthetic effects within the urban realm. ATP would also attempt to preserve existing protected and heritage trees within the Project, would transplant appropriate candidates as is feasible, and would plant replacement trees for those that could not be preserved due to construction. Based on these measures, the light rail guideway, catenary poles, stations, and associated infrastructure would have a **Neutral** effect in all landscape sections (see **Table 2** in Section 5.2.1.5). Additional elements that are specific to individual landscape sections are discussed, by section, below.

### 5.2.1.1 North Section: 38th Street to MLK Boulevard

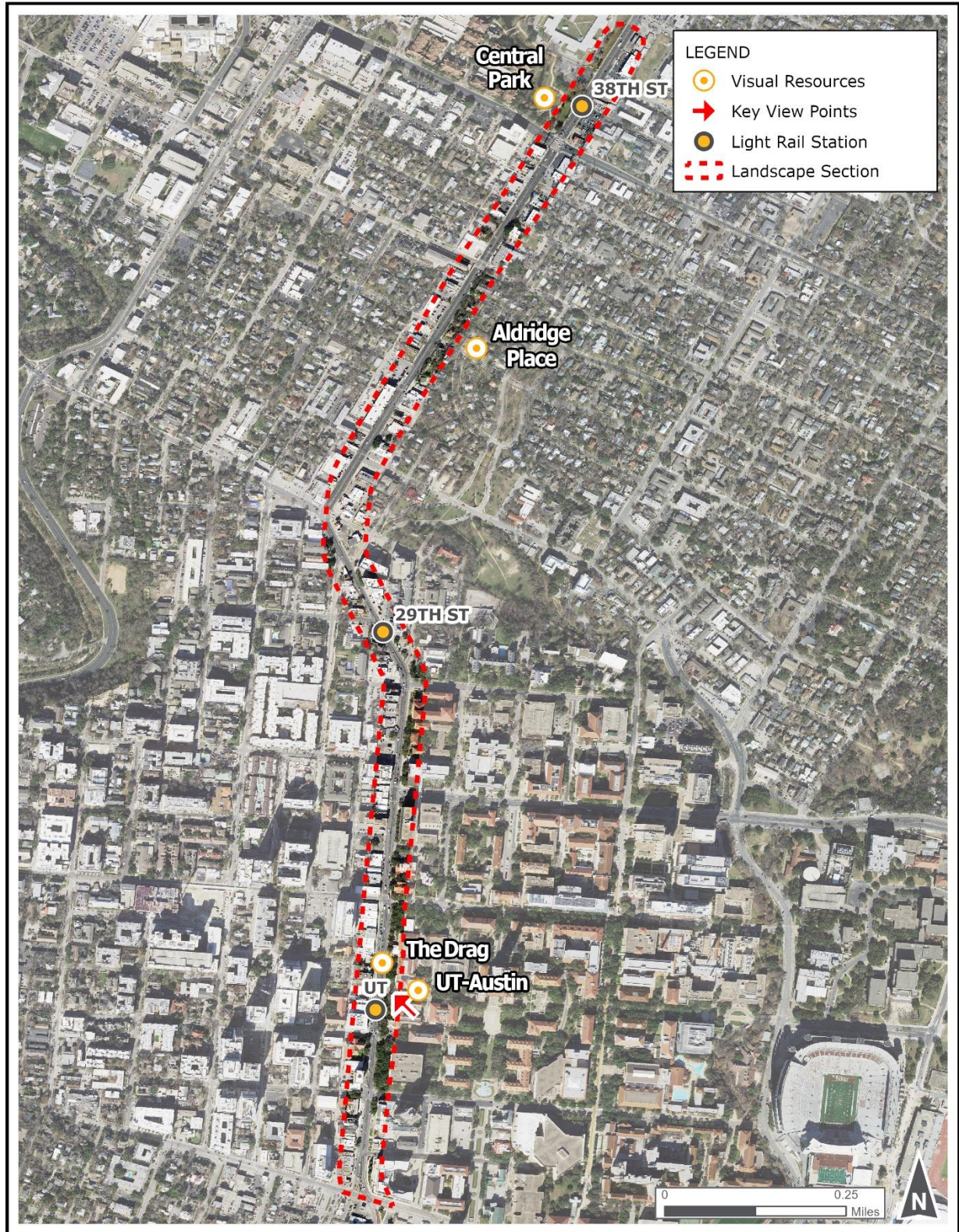
In the North Section, the alignment would be center-running and at-grade. Three at-grade stations and a multistory park-and-ride garage are proposed:

- **Park-and-ride garage.** This site would incorporate three adjacent parcels at 3809 Guadalupe, 504 W 38th, and 558 W 38th Streets. Currently, these properties serve as a car maintenance facility and offices. The total acreage of these sites is 0.88 acre, which could accommodate approximately 45 vehicles on a surface lot. Given the automobile parking demand at this site, a multi-level parking structure is recommended.
- **38th Street Station.** The end-of-the-line station would be located on Guadalupe Street between West 38th Street and West 39th Street. The center platform station would be 20 feet wide and 400 feet long.
- **29th Street Station.** This station would be located on Guadalupe Street between West 27th Street and Fruth Street. The side platform station would have a platform on each side of the street, approximately 12 feet wide and 245 feet long that may be extended up to 350 feet long in the future. The station location is proposed in a transit plaza.
- **UT Station.** The UT Station would be located on Guadalupe Street between West 22nd Street and West 23rd Street at the West Mall entrance to the UT campus. The center platform would be 20 feet wide and 245 feet long with additional passenger queuing area at the street level adjacent to the platform to accommodate pedestrian volumes and room for platform extension in the future.

**Figure 2** shows the locations of visual resources and key viewpoints in the North Section on an aerial map.



Figure 2: North Section



Visual quality in this section is high with a historic neighborhood, a renowned commercial strip (the Drag), and the UT campus all abutting the ROW. Primary viewers in this area are sensitive to changes in views; however, because of the densely populous and transient nature of this corridor, viewers in this section are also accustomed to transportation and other urban infrastructure. Throughout the section, the Project would generally be compatible with the existing transportation network (vehicular, transit, and pedestrian) and the urban environment. Visual elements including catenary poles and wires, light standards, signal houses, retaining walls, new at-grade stations, and TPSS would be integrated with the existing urban character and streetscape and designed so as not to obstruct any important views, and to be compatible with the surrounding urban and transportation elements. The Project would also include the removal of approximately 12 commercial buildings under the Build Alternative, to accommodate for the park-and-ride, TPSS stations, and widened ROW. These elements are anticipated to be **Noticeable**. However, because the new Project elements would be compatible with the surrounding area, their visual effect has been categorized as **Neutral** for the Build Alternative and all Design Options.

The multistory parking garage proposed at 38th Street is anticipated to be **Co-dominant** because there is only one other building within the AVE near 38th Street that is higher than two stories – the three-story Sunflower Bank Building further west on 38th Street. This change would attract attention and could compete with adjacent landscape scenery or views because of the height of the proposed garage and its proximity to Central Park—a large green space across Guadalupe Street. However, because viewers in this area are primarily office workers, retail workers, or student renters who are transient and have low sensitivity to change, the effect is categorized as **Neutral**.

There would be no difference in visual effects among the Build Alternative and Design Options for this section. **Figure 3** and **Figure 4** show existing and proposed conditions, respectively, at the key viewpoint – the proposed UT Station.

Figure 3: Existing Conditions at UT West Mall (Guadalupe and 22nd Streets), Facing Northeast



Figure 4: Proposed UT Station Center Platform at West Mall, Facing Northwest



Note: Artist representation, subject to change.

#### 5.2.1.2 Downtown Section: MLK Boulevard to Lady Bird Lake

In the Downtown Section, the alignment would be center-running and at-grade to the north shore of Lady Bird Lake, where a new bridge would be constructed to cross the lake. Under the Build Alternative, three at-grade stations would be located in this section:

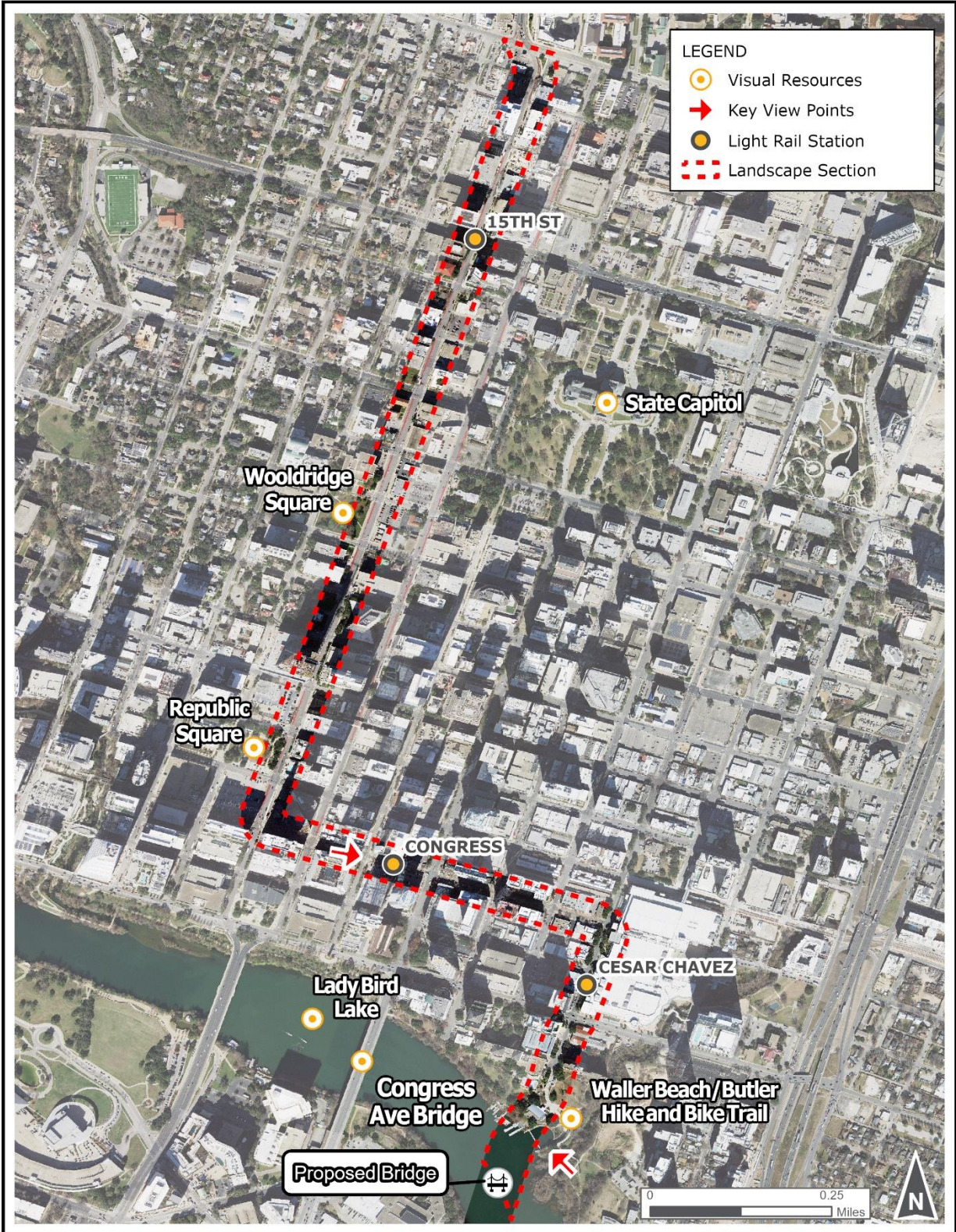
- **15th Street Station.** This station would be located on Guadalupe Street between West 14th Street and West 16th Street. Each of the split center platforms would be 12 feet wide and 245 feet long, with an expansion area to accommodate up to a 350-foot-long platform in future phases.
- **Congress Station.** Congress Station would be located on 3rd Street between Colorado Street and Congress Avenue. The side platform station would have a platform on each side of the street approximately 12 feet wide and 245 feet long, with an expansion area to accommodate up to a 350-foot-long platform in future phases. The station location is proposed in a transit plaza.
- **Cesar Chavez Station.** This station would be located on Trinity Street between Cesar Chavez Street and 2nd Street. The side platform station would have a platform on each side of the street approximately 12 feet wide and 245 feet long with a 105-foot-long expansion area for future phases.

Within this section, two Design Options are proposed:

- **Wooldridge Square Station Design Option** would include a center platform station along Guadalupe Street, near Wooldridge Square Park, a historic park amidst several civic buildings in Downtown Austin. This Design Option would require a small retaining wall (approximately 2 to 4 feet in height) within the transportation ROW to accommodate a profile change needed to make the station area level.
- **Cesar Chavez Station Design Option** would introduce an off-street station on a diagonal through the corner lot at Trinity Street and 3rd Street and would be designed as part of the transit-oriented development that is planned for that site.

**Figure 5** shows the locations of visual resources and key viewpoints in the Downtown Section on an aerial map.

Figure 5: Downtown Section



Visual quality in this section is considered high due to the downtown skyline, Lady Bird Lake, Town Lake Metro Park, Ann and Roy Butler Hike and Bike Trail, and hundreds of historical markers and buildings. Primary viewers in this area are sensitive to changes in views; however, because of the densely populous and transient nature of this corridor, viewers in this section are also accustomed to transportation and other urban infrastructure. In the segments where the track would be center-running, areas of new ROW would be replaced with sidewalks and/or shared-use path in most cases. The Project would also include the removal of approximately two commercial buildings to accommodate wider ROW and TPSS facilities under the Build Alternative. These elements are anticipated to be **Noticeable**; however, because Project elements would be integrated with the existing urban character and streetscape and designed so as not to obstruct any important views, and to be compatible with the surrounding urban and transportation environment, their visual effect has been categorized as **Neutral** in this section.

The proposed Lady Bird Lake Bridge under the Build Alternative and all Design Options would not interfere with important viewsheds from residential properties or any location with highly sensitive viewer groups. It would be a **Dominant** visual element for visitors of Waller Beach at Town Lake Metro Park, and other transient viewer groups (e.g., boaters on the Lake and users of the Ann and Roy Butler Hike and Bike Trail as they approach and pass beneath the bridge). The height of the bridge would be similar to that of the nearby bridges and its scale contextual with the high-rise buildings and other elements of the urban environment seen from Waller Beach and immediately adjacent areas. Viewsheds of natural areas from observation points on Lady Bird Lake are already interrupted by the existing bridge structures that flank the proposed alignment (i.e., the Congress Avenue and I-35 bridges). The proposed bridge would not create noticeable interruption to the existing viewsheds seen from these observation points or for the motorists on the nearby bridges. The visual effect has been characterized as **Neutral** given the context of the surrounding environment, the limited number and sensitivity of viewer groups affected, and ATP's intent to design and build an aesthetically pleasing bridge.

The Wooldridge Square Station Design Option would introduce visual elements of a new at-grade station to Downtown Austin, including a small retaining wall (approximately 2 to 4 feet in height) within the transportation ROW, to accommodate a profile change needed to make the station area level. These elements are anticipated to be **Noticeable**; however, because the Project elements would be compatible with the surrounding area, and the station would be center-running, leaving the urban park intact, their visual effect has been categorized as **Neutral** in this section.

The Cesar Chavez Station Design Option would introduce an off-street station on a diagonal through the corner lot at Trinity Street and 3rd Street; however, this would not be appreciably different from the Build Alternative, where the station would be built center-running along Trinity Street, and therefore was categorized as **Noticeable** and **Neutral**.

**Figure 6** shows the proposed bridge over Lady Bird Lake and integration with the existing trail and park system.

Figure 6: Proposed Bridge over Lady Bird Lake at Waller Beach, Facing West



Note: Artist representation, subject to change.

#### 5.2.1.3 South Section: Lady Bird Lake to Oltorf Street and South Congress Avenue to I-35

In the South Section, on the south shore of Lady Bird Lake, the alignment would split into two branches. The southern branch of the split would cross East Bouldin Creek and extend south along South Congress Avenue with a terminus at Oltorf Street. The alignment after crossing East Bouldin Creek would be center-running and at-grade along South Congress Avenue and would terminate at Oltorf Street with a park-and-ride facility proposed on the southeast corner. The eastern branch would extend along East Riverside Drive from South Congress Avenue to I-35. The alignment would be center-running and at-grade. The southern branch would include two at-grade stations and a park-and-ride, and the eastern branch would include one at-grade station at Travis Heights Boulevard:

- **South Congress Station.** This station would be located on South Congress Avenue between Academy Drive and James Street. The center station platform would be 20 feet wide and 245 feet long with a 105-foot-long expansion area for future phases.
- **Oltorf Station.** This station would be located on South Congress Avenue between Oltorf Street and Long Bow Lane. The center station platform would be 20 feet wide and 400 feet long.
- **Park-and-ride.** The at-grade park-and-ride lot would be located at 200 and 400 Long Bow Lane, east of South Congress, and one block south of Oltorf. The site currently serves as a parking facility for a bank. The site is approximately 2.2 acres and able to accommodate approximately 150 automobiles.



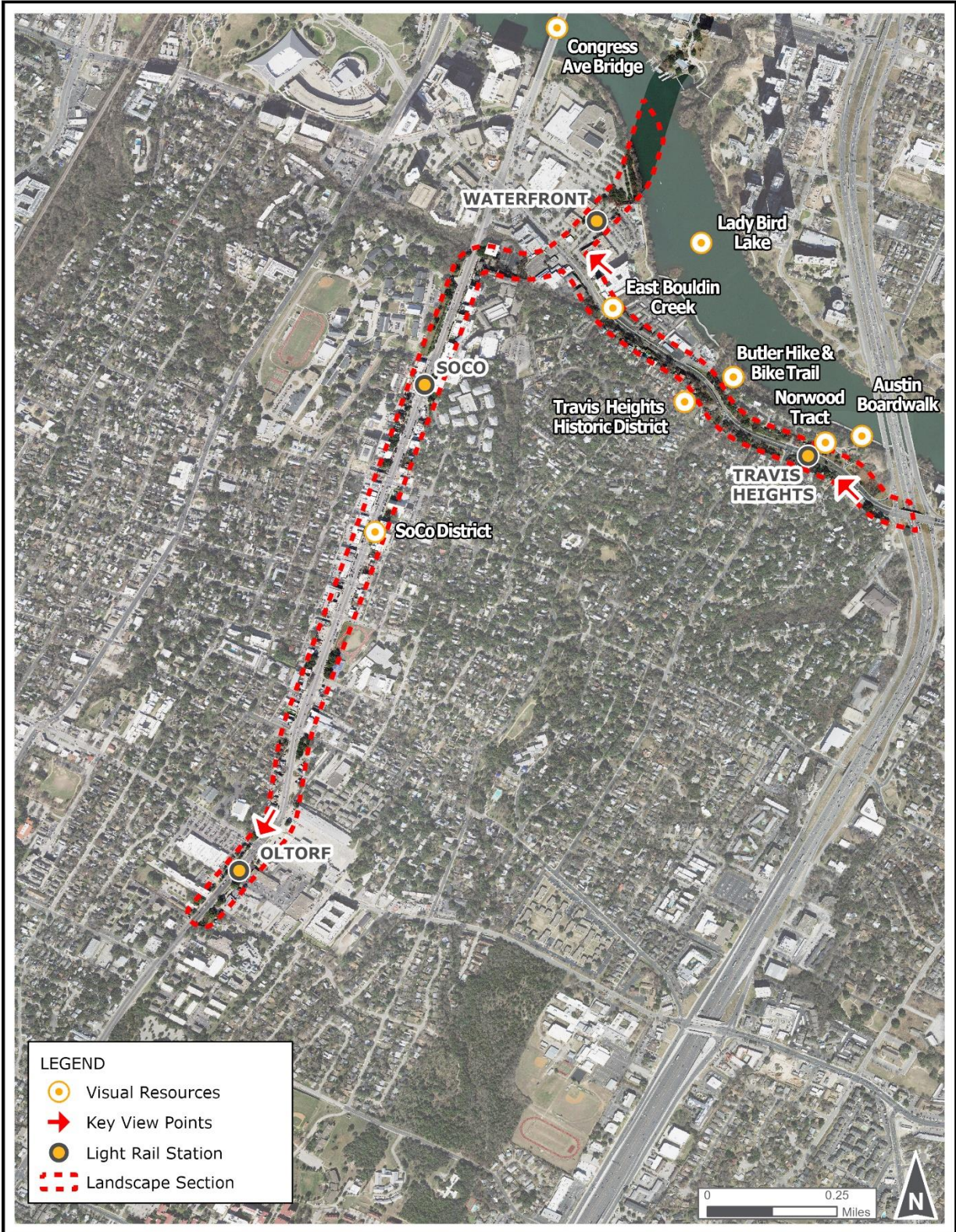
- **Travis Heights Station.** This station would be located on East Riverside Drive east of Travis Heights Boulevard. The center platform station would be approximately 20 feet wide and 245 feet long with a 105-foot-long expansion area for future phases. The station would be accessed by crosswalk at the Travis Heights Boulevard intersection. It would require retaining walls.

Within this section, two Design Options are proposed:

- **Lady Bird Lake Bridge Extension.** The bridge extension along East Riverside Drive would continue elevation from Lady Bird Lake for approximately 0.9 mile to Travis Heights Boulevard. Under this Design Option, the elevated Waterfront Station would be located on East Riverside Drive between East Riverside Drive and the Barton Springs Road extension. The side platform station would have a platform on each side of the street approximately 15 feet wide and 245 feet long with a 105-foot-long expansion area for future phases.
- **Travis Heights Station.** ATP is evaluating the Project without a Travis Heights Station due to the identification of potential ROW effects on surrounding parkland and adjacent infrastructure projects as well as low projected ridership estimates at this station.

**Figure 7** shows the locations of visual resources and key viewpoints in the South Section on an aerial map.

Figure 7: South Section



Visual quality in this section is considered to range from moderate to high. Along the south branch, there is high pedestrian activity on South Congress Avenue, a renowned commercial strip, and dense commercial and retail land uses. The Capitol building can be seen at the intersection of Riverside Drive and Congress Avenue, but the Project would not intersect the Capitol View Corridors height zones. Viewers here are considered highly sensitive and have a high visual awareness because they are on “Austin’s Main Street.” The alignment and stations in this section would be designed to integrate with the surrounding area. The introduction of a center-running guideway and two at-grade stations as well as a park-and-ride would be **Noticeable** but would not compete with adjacent landscape scenery or views. The Project would also involve the removal of approximately 7 buildings in this section under the Build Alternative. Because the Project elements introduced in this section would be compatible with the surrounding area, this visual effect has been categorized as **Neutral**.

The segment along East Riverside Drive is characterized as having moderate visual quality. It is close to Lady Bird Lake, Norwood Tract at Town Lake Metro Park, and the Ann and Roy Butler Hike and Bike Trail, but these resources are not typically visible from the roadway. There are mature trees along the sidewalks and medians of East Riverside Drive, several bus stops, and overhead utility lines and poles along the segment. The Build Alternative would remove trees and the landscaped median along East Riverside Drive and introduce new visual elements for pedestrians, motorists, and nearby residents, including light standards, signal retaining walls, and new at-grade stations. The alignment and station in this section would be designed to integrate with the surrounding area, and replacement trees would be planted where possible within this section.

Under the Build Alternative, a continuous shared-use path would be constructed on both sides of the roadway along this section, and two new bus stops and a retaining wall would be installed between Travis Heights Boulevard and Alameda Drive. The retaining wall would result in an encroachment on Norwood Tract within the Town Lake Metro Park and would be visible to residents on the south side of East Riverside Drive opposite the fenced in off-leash Dog Area. Viewers have a moderate sensitivity to visual changes here due to the area’s existing visual quality and urban location with major transportation corridors and elements already present. While the retaining wall would be considered a **Co-dominant** visual element due to its height, a small number of viewers would be subject to this change, and therefore this effect has been characterized as **Neutral**. The Travis Heights Station Design Option would not build the station or retaining wall, and therefore would not introduce any additional Co-dominant Project elements in this section.

Under the Lady Bird Lake Bridge Extension Design Option, the elevated station and bridge extension would introduce a **Dominant** visual element to park users as well as a number of residents on East Riverside Drive. Residences include a seven-story apartment building, a condominium complex adjacent to Bouldin Creek, and single-family residences in the Travis Heights Historic District neighborhood. The limits of the elevated light rail would be from east of the Waterfront Station to before Travis Heights Boulevard along East Riverside Drive. Current views from residences along East Riverside Drive include Downtown Austin (in the distance) that would be obstructed by the new bridge extension structure. For this reason, the change in visual quality from this Design Option has been characterized as **Adverse**.

**Figure 8** shows existing conditions at the area proposed for the Waterfront Station. **Figure 9** shows the proposed conditions under the Build Alternative and the Design Option. **Figure 10** illustrates the elevated concept on East Riverside Drive near the Waterfront Station. **Figure 10** is intended to depict the scale of the light rail arterial structure relative to its surroundings. **Figure 11** and **Figure 12** show existing and proposed conditions at the key viewpoint for the Oltorf Station.

**Figure 8: Existing Conditions of Area of Proposed Waterfront Station on East Riverside Drive Extension, Facing Northwest**



Figure 9: Design Option with Elevated Waterfront Station and Elevated Bridge Extension on East Riverside Drive, Facing Northwest



Note: Artist representation, subject to change.

Figure 10: Representation of Elevated Light Rail along East Riverside Drive

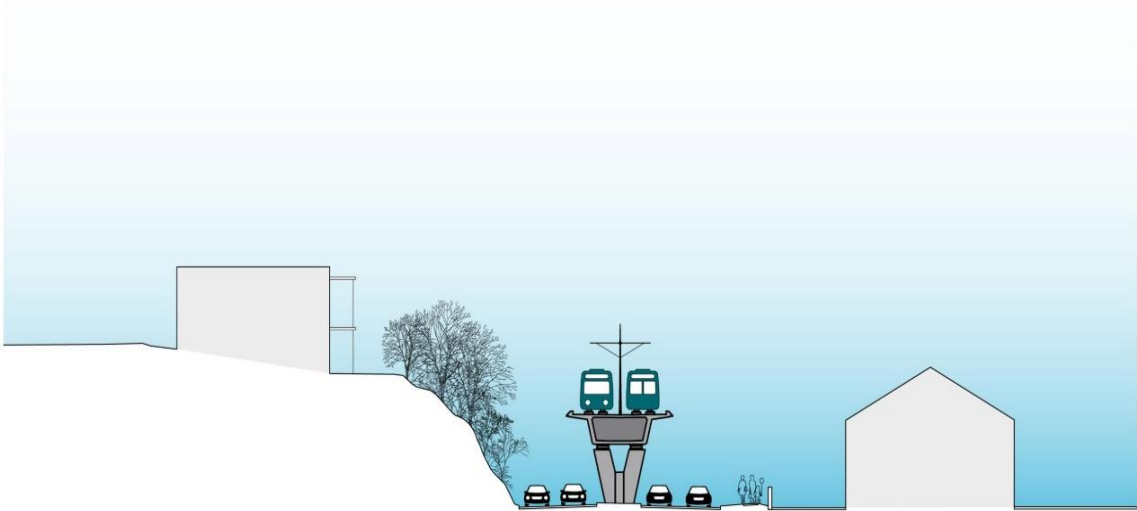


Figure 11: Existing Conditions at South Congress Avenue and Oltorf Street, Facing South



Figure 12: Proposed Oltorf Station Center Platform at South Congress Avenue, Facing Southwest



Note: Artist representation, subject to change.

#### 5.2.1.4 East Section: I-35 to Yellow Jacket Station (including OMF and Maintenance of Way)

In the East Section, the alignment would continue southeast along East Riverside Drive with a terminus just west of SH-71 at the Yellow Jacket Station, and would be center-running and at-grade. The Build Alternative would include the construction of six at-grade stations and a park-and-ride on the south side of East Riverside Drive, between Yellow Jacket Lane and Uphill Lane, as well as the proposed OMF:

- **Lakeshore Station.** The Lakeshore Station would be located on East Riverside Drive between South Lakeshore Boulevard and Shore District Drive. The center platform station would be approximately 20 feet wide and 245 feet long with a 105-foot-long expansion area for future phases.
- **Pleasant Valley Station.** This station would be located on East Riverside Drive north of South Pleasant Valley Road. The side platform station would have a platform on each side of the light rail guideway approximately 12 feet wide and 245 feet long with a 105-foot-long expansion area for the future.
- **Faro Station.** The Faro Station would be located on East Riverside Drive between Faro Drive and Penick Drive. The center platform station would be approximately 20 feet wide and 245 feet long with a 105-foot-long expansion area for future phases.

- **Montopolis Station.** The Montopolis Station, located on East Riverside Drive between Montopolis Drive and Vargas Road, would be a center platform approximately 20 feet wide and 245 feet long with a 105-foot-long expansion area for future phases.
- **Yellow Jacket Station.** The Yellow Jacket Station, located on East Riverside Drive between Yellow Jacket Lane and Coriander Drive, would be a center platform approximately 20 feet wide and 400 feet long.
- **Park-and-ride.** The site is 2 acres and comprises the northwest corner of a large parcel on the south side of East Riverside west of Uphill Lane. This site is large enough to provide 150 parking spaces on an at-grade lot.
- **OMF.** The OMF location is proposed in the vicinity of the US 183/SH 71 interchange along Airport Commerce Drive in a light-industrial/commercial use area occupied by active businesses. The proposed site would include space for staff, a light rail control center, and light rail vehicle maintenance. The OMF would also serve as a light rail vehicle storage yard with the capacity to support both light rail vehicle operations and fleet storage. The OMF would include maintenance of way shops and associated light rail equipment storage functions. The maintenance of way shops would be located adjacent to the main OMF site.

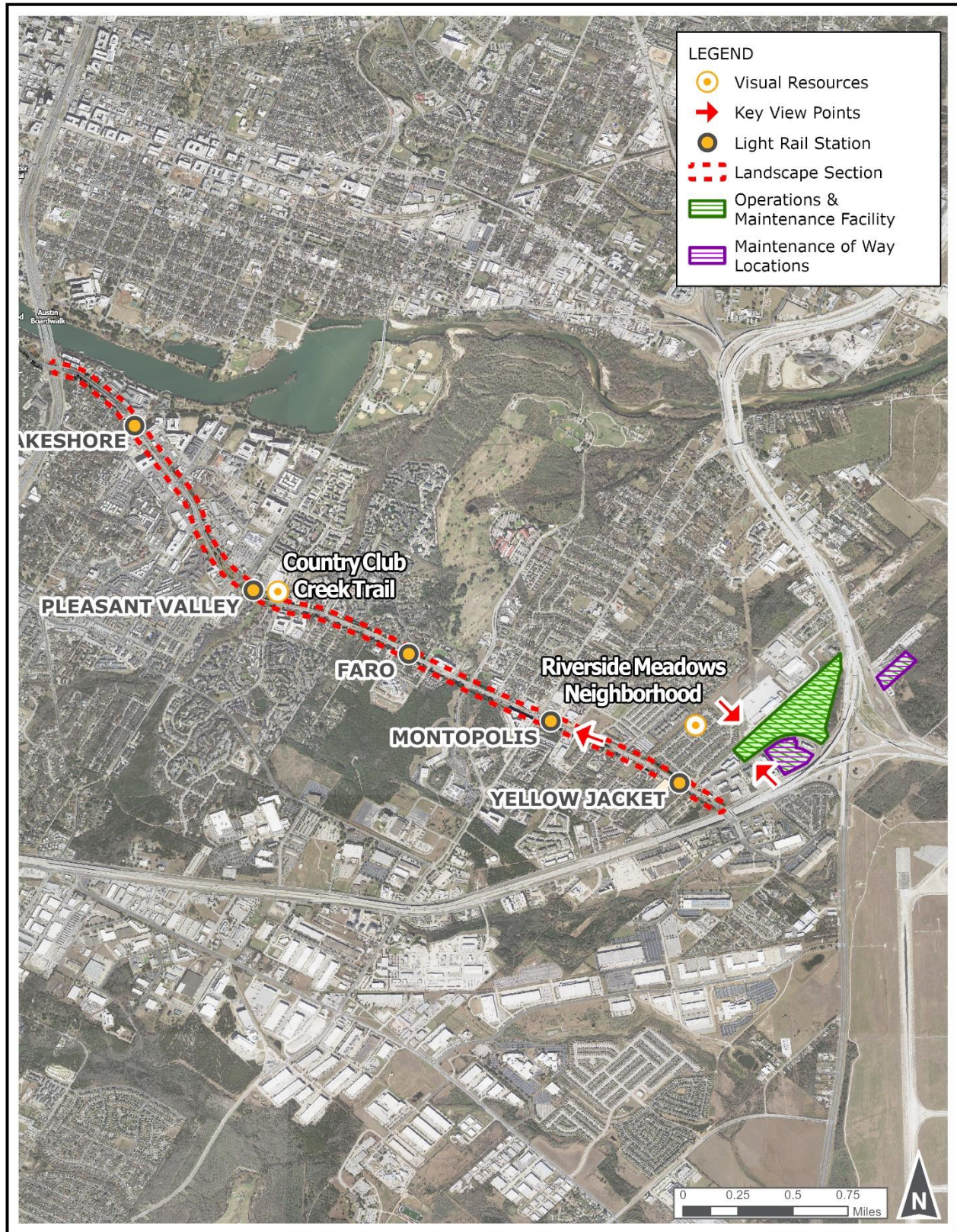
There are two Design Options being considered in this section:

- **Center-Running Bike/Ped. and Shade Tree Facilities on East Riverside.** This Design Option would include center-running bike and pedestrian lanes next to the light rail east of I-35 on Riverside Drive. ATP recognizes unique characteristics in this segment that include wider ROW along with limited parallel transportation facilities that create an opportunity to optimize first/last mile connections to the light rail systems along with improving mobility options and user experience across all modes of travel in the corridor.
- **Grove Station.** ATP is studying a Design Option to combine the Montopolis and Faro Stations into a single station at Grove Boulevard. This Design Option would reduce ROW effects at Montopolis Street and reduce the number of stations in this section.

**Figure 13** shows the locations of visual resources and key viewpoints in the East Section on an aerial map.



Figure 13: East Section



This section is characterized as an area of moderate to low visual quality. Modern urban elements such as tree-lined sidewalks, low- and mid-rise commercial buildings, residences, hotels, drive-through restaurants, warehouses, and surface parking lots can be seen throughout much of this section. There are views from westbound Riverside, between Burton and Lakeshore, which have views of downtown.

Overhead power lines are also visible for the length of East Riverside Drive. The OMF location is proposed in the vicinity of the US 183/SH 71 interchange along Airport Commerce Drive in a light-industrial/commercial use area occupied by active businesses.

New visual light rail elements include trains and operations equipment, at-grade stations, a park-and-ride lot, and the OMF. The Project would also involve the removal of approximately 15 buildings in this section under the Build Alternative, approximately 8 of which are for the OMF and maintenance of way shops. Effects from the Build Alternative are anticipated to be largely **Beneficial** because the alignment and stations would provide an opportunity to include bicycle lanes and sidewalks in an area that lacks active transportation infrastructure. ATP would also replace trees and provide other landscaping, where possible, within this section. ATP anticipates that primary viewers would have a moderate sensitivity to visual changes that would occur as a result of the Build Alternative; therefore, the Build Alternative and Design Options are anticipated to be **Noticeable** in the East Section. Because the Project elements introduced in the East Section would be compatible with the surrounding area, this visual effect has been categorized as **Neutral**.

Additionally, an elevated structure is proposed over Country Club Creek Trail in a perpendicular orientation. The project would include a retaining wall at the crossing of East Riverside Drive and replace the existing sidewalk with a wider shared use path in this area. Primary viewers are anticipated to have a moderate sensitivity to visual changes that would occur as a result of the Build Alternative; therefore, the Build Alternative is anticipated to be **Noticeable** in this section. Because the Project elements introduced in this section would be compatible with the surrounding area, this visual effect has been categorized as **Neutral**.

The proposed OMF and maintenance of way sites at the US 183/SH 71 interchange are in an area of low visual quality. Under the Build Alternative and all Design Options, the OMF would be a **Noticeable** change to some residents in the Riverside Meadows neighborhood who reside along the western border of the proposed OMF site and to the Esparanza Community to the north. However, the buildings that comprise the OMF would be similar in appearance to the industrial buildings currently on the site in terms of both height and mass. The design of the facility would include landscaping and architectural elements to minimize potential visual and aesthetic effects on residents in the adjacent neighborhood. For this reason, the change in visual quality has been characterized as **Neutral**.

The Center-Running Bike/Pedestrian and Shade Tree Facilities on East Riverside Design Option would include wider ROW along the alignment and would result in more building and tree removal, and therefore is categorized as **Noticeable**. However, because of the moderate visual quality and viewer sensitivity in this section, and because Project elements would be designed to be compatible with the surrounding area, this visual effect has been categorized as **Neutral**.

**Figure 14** and **Figure 15** show existing and proposed conditions at the proposed OMF.

**Figure 14: View of Existing Conditions from Riverside Meadows Neighborhood behind Proposed OMF, Facing East**



**Figure 15: Proposed OMF from Riverside Meadows Neighborhood, Facing East**



#### 5.2.1.5 Summary of Operational (Long-Term) Effects

The long-term visual effects are summarized in **Table 2**.

**Table 2: Potential Visual Effects by Landscape Section**

Landscape Section	Visual Quality	Visual Resources	Key Viewpoints	Project Features / Elements	Compatibility	Potential Visual Effect
North Section: 38th Street to MLK Boulevard	High	<ul style="list-style-type: none"> <li>• Central Park</li> <li>• Aldridge Place</li> <li>• UT Campus</li> <li>• “The Drag” (Guadalupe Street through Campus)</li> </ul>	<ul style="list-style-type: none"> <li>• UT Station</li> </ul>	Light Rail System: Catenary poles and overhead wiring, light standards, signal house, retaining walls, new at-grade stations and safety features at crossings, TPSS, train control and communications bungalows and cabinets, removal of approximately 12 commercial buildings, and removal of trees as needed	<b>Noticeable</b>	<b>Neutral</b> Effect – Project elements would be designed to be compatible with the surrounding area.
				Multistory park-and-ride	<b>Co-dominant</b>	<b>Neutral</b> Effect – Viewers are primarily transient office and retail workers who have low sensitivity.
Downtown Section: MLK Boulevard to Lady Bird Lake	High	<ul style="list-style-type: none"> <li>• State Capitol</li> <li>• Republic Square</li> <li>• Wooldridge Square</li> <li>• Congress Avenue Bridge</li> <li>• Waller Beach at Town Lake Metro Park</li> </ul>	<ul style="list-style-type: none"> <li>• Congress Avenue Station</li> <li>• Proposed Bridge over Lady Bird Lake</li> </ul>	Light Rail System: Catenary poles and overhead wiring, light standards, signal house, retaining walls, new at-grade stations and safety features at crossings, TPSS, train control and communications bungalows and cabinets, retaining wall, removal of approximately 2 commercial buildings, and removal of trees as needed	<b>Noticeable</b>	<b>Neutral</b> Effect – Project elements would be designed to be compatible with the surrounding area. No difference among Build Alternative and all Design Options.

Landscape Section	Visual Quality	Visual Resources	Key Viewpoints	Project Features / Elements	Compatibility	Potential Visual Effect
		<ul style="list-style-type: none"> <li>• Ann and Roy Butler Hike and Bike Trail</li> <li>• Lady Bird Lake</li> </ul>		Bridge over Lady Bird Lake	<p><b>Dominant</b> (transient viewer groups)</p> <p><b>Noticeable</b> (high-sensitivity viewer groups)</p>	<p><b>Neutral</b> Effect – The scale of the new bridge would be compatible with surrounding urban environment and similar in height to the adjacent bridges under the Build Alternative and all Design Options. ATP is designing the bridge with a focus on aesthetics and the objective of creating a new visual resource for Austin.</p>
				Wooldridge Square Station Design Option only – retaining wall	<b>Noticeable</b>	<p><b>Neutral</b> Effect – Small retaining wall (approximately 2 to 4 feet in height) within the transportation ROW to accommodate a profile change needed to make the station area level.</p>
				Cesar Chavez Station Design Option only -- off-street station on a diagonal	<b>Noticeable</b>	<p><b>Neutral</b> Effect – Would not be appreciably different from the Build Alternative, where the station would be built center-running along Trinity Street.</p>

Landscape Section	Visual Quality	Visual Resources	Key Viewpoints	Project Features / Elements	Compatibility	Potential Visual Effect
South Section: Lady Bird Lake to Oltorf Street and South Congress Avenue to I-35	Moderate to High	<ul style="list-style-type: none"> <li>• Lady Bird Lake</li> <li>• Ann and Roy Butler Hike and Bike Trail</li> <li>• South Congress Avenue - SoCo District</li> <li>• East Bouldin Creek</li> <li>• Austin Boardwalk</li> <li>• Travis Heights Historic District/ Neighborhood</li> <li>• Norwood Tract at Town Lake Metro Park</li> </ul>	<ul style="list-style-type: none"> <li>• Waterfront Station</li> <li>• Oltorf Station</li> <li>• Travis Heights Station</li> </ul>	Light Rail System: Catenary poles and overhead wiring, light standards, signal house, retaining walls, new at-grade stations and safety features at crossings, TPSS, train control and communications bungalows	<b>Noticeable</b>	<b>Neutral</b> Effect – Project elements would be designed to be compatible with the surrounding area. No difference among Build Alternative and Design Options.
				Retaining walls and roadway realignment proposed at Travis Heights Station (for Build Alternative)	<b>Co-dominant</b>	<b>Neutral</b> Effect – Retaining wall would be visible to only a small number of residents on the south side of East Riverside Drive, and the roadway realignment would be minimally visible. <i>Note: Travis Heights Station Design Option would eliminate the need for a retaining wall.</i>

Landscape Section	Visual Quality	Visual Resources	Key Viewpoints	Project Features / Elements	Compatibility	Potential Visual Effect
				Lady Bird Lake Bridge Extension Design Option only - bridge extension along East Riverside Drive and elevated Waterfront Station	<b>Dominant</b>	<b>Adverse</b> Effect -- Bridge extension would be visible to several residents on East Riverside Drive and park users. Views from residences of Downtown Austin would also be obstructed. This Design Option affects more views and viewers of high sensitivity.
East Section: I-35 to Yellow Jacket Station (including OMF and maintenance of way)	Moderate to Low	<ul style="list-style-type: none"> <li>Country Club Creek Trail</li> <li>Riverside Meadows Neighborhood</li> </ul>	<ul style="list-style-type: none"> <li>Montopolis</li> <li>OMF</li> </ul>	Light Rail System: Catenary poles, and overhead wiring, light standards, signal house, retaining walls, new at-grade stations and safety features at crossings, TPSS, train control and communications bungalows and cabinets, removal of approximately 8 buildings, removal of trees as needed, a park-and-ride and an elevated structure over Country Club Creek Trail in a perpendicular orientation with a retaining wall at the crossing of East Riverside Drive.	<b>Noticeable</b>	<b>Neutral</b> Effect – Project elements would be designed to be compatible with the surrounding area. Primary viewers are anticipated to have moderate sensitivity. No difference among Build Alternative and Design Options.



Landscape Section	Visual Quality	Visual Resources	Key Viewpoints	Project Features / Elements	Compatibility	Potential Visual Effect
				At OMF – Buildings for administration, operations and maintenance staff, a light rail control center, lighting effects from 24-hour operations, light rail vehicle maintenance area and storage yard, maintenance of way shops, and associated light rail equipment storage functions.	<b>Noticeable</b>	<b>Neutral</b> Effect – OMF facility would be noticeable to some nearby residents, but the buildings that comprise the OMF would be similar in appearance to the industrial buildings currently on the site, in terms of both height and mass. No difference among Build Alternative and Design Options.
				Center-Running Bike/Ped. and Shade Tree Facilities on East Riverside Design Option only - wider ROW along the alignment resulting in more building removal	<b>Noticeable</b>	<b>Neutral</b> Effect - Due to moderate visual quality and viewer sensitivity in this section, and because Project elements would be designed to be compatible with the surrounding area.

### 5.2.2 Construction-Related (Short-Term) Effects

Construction effects would include temporary changes in views of and from the construction area. Construction activities at stations along the alignment and staging areas are expected to introduce heavy equipment such as cranes and associated vehicles, including bulldozers, backhoes, graders, scrapers, and trucks, into the view corridor of public streets, sidewalks, and surrounding properties. These pieces of equipment, along with stockpiled construction materials such as concrete, steel, and rail components would create visual disruption. Mature vegetation, including trees, would be removed from some areas further affecting the visual character of the area. Views of the construction staging activities may be possible from residential land uses on some of the adjacent parcels, either directly through fencing, through entrance gates, or over fencing from second story and higher windows. The construction staging activities could temporarily affect adjacent viewers. Lighting of the construction staging areas at night could also affect viewers. In addition, the need for nighttime construction in staging areas and along the alignment could also affect viewers, including nearby residential properties.

## 6 Mitigation

As an integral component of the Project, ATP would incorporate design features at stations, new bridges, elevated structures, and other light rail structures in a manner that would be compatible with the surrounding area (see **Table 3**). Stations and new bridges would be designed under a program that would solicit community input. ATP would specifically work with the City and affected building owners to develop architectural treatments, visual screening, landscaping, and other features designed to minimize visual and aesthetic effects. ATP would coordinate sidewalks and shared use paths along the alignment with the City and area stakeholders. ATP would also attempt to preserve existing protected and heritage trees within the Project, would transplant appropriate candidates as is feasible, and would plant replacement trees for those that could not be preserved due to construction.

Also as an integral part of the Project, all lighting (for construction and operation) would be in accordance with the Texas Health and Safety Code Title 5, Section 425.002 regarding light pollution and in accordance with City lighting code ordinances. Lighting would also be addressed in ATP's Architectural and Urban Design Guidelines, and the Sustainability Guidelines. To the extent practicable, outdoor lighting fixtures would be installed and operated only if the purpose of the lighting cannot be achieved by installing reflective road markers, lines, warning or informational signs, or other effective passive methods. Full consideration would be given to conserving energy, reducing glare, minimizing light pollution, and preserving the natural light environment. An example of commonly used lighting meeting these considerations is the use of high-pressure sodium lamps equipped with glare shields.

**Table 3: Mitigation for Visual Effects**

Landscape Section	Potential Effect	Proposed Mitigation
North Section: 38th Street to MLK Boulevard	Potential visual effects associated with removal of buildings and placement of stations along Guadalupe St. Project elements such as station platforms, catenary poles, TPSS, and a park-and-ride garage would be introduced to the area.	Alignment and stations in this section would be designed to integrate with the surrounding area. Potential mitigation measures may include landscaping treatments to enhance the visual character of the visible Project elements.
Downtown Section: MLK Boulevard to Lady Bird Lake	Potential visual effects associated with removal of buildings, placement of stations along Guadalupe Street and 3rd Street, and a new bridge over Lady Bird Lake.	Alignment and stations in this section would be designed to integrate with the surrounding area. Potential mitigation measures may also include landscaping treatments to enhance the visual character of the visible Project elements. The bridge would be designed to minimize bulk and shadows and blend into the existing natural environment following the Texas Department of Transportation's Bridge Design Guide (2023).
South Section: South Congress Avenue to Oltorf Street and South Congress Avenue to I-35	Potential visual effects associated with removal of buildings and placement of stations along South Congress Avenue. Project elements such as station platforms, catenary poles, TPSS, and a park-and-ride lot and a potential elevated extension along East Riverside Drive and elevated station south of Lady Bird Lake would be introduced to the area.	Alignment and stations in this section would be designed to integrate with the surrounding area. Potential mitigation measures may include landscaping treatments to enhance the visual character of the visible Project elements.
East Section: I-35 to Yellow Jacket Station (including OMF and maintenance of way)	<p>Potential visual effects associated with the removal of trees and the landscaped median along East Riverside Drive and introduction of new visual elements for pedestrians, motorists, and nearby residents, including light standards, signal retaining walls, new at-grade stations, and a park-and-ride lot.</p> <p>Buildings for administration, operations and maintenance staff, a light rail control center, light rail vehicle maintenance area and storage yard, maintenance of way shops, and associated light rail equipment storage functions</p>	<p>Alignment and stations would be designed to integrate with the surrounding area. Trees would be replaced, where possible, within this section, and ATP would also coordinate the location of sidewalks and shared used paths along the alignment with the City and area stakeholders. Potential mitigation measures may also include landscaping treatments to enhance the visual character of the Project elements.</p> <p>Sidewalks and shared use paths along the alignment would be coordinated with City and area stakeholders. Trees and other landscaping would be replaced, where possible, within this section.</p> <p>Visible Project elements would be integrated with the existing urban character and landscaping designed to shield residential views to the facility. Lighting will be designed to reduce light pollution.</p>

As part of the Preferred Alternative, visual impacts of the Lady Bird Lake Bridge on park and trail users and adverse visual effects from the proposed bridge extension along East Riverside Drive would be mitigated by using designs to minimize bulk, and the aesthetics of the bridge columns and elevated structure would be improved through architectural design. The bridge would be designed to minimize shadows and blend into the existing natural environment following the Texas Department of Transportation Bridge Design Guide (2023).

Additional potential mitigation measures would include landscape treatments to enhance the visual character of the Build Alternative, including along the transportation corridor, as appropriate, to diversify the visual landscape. Other incorporated elements may include wall treatments, a variety of architectural finishes, and lighting treatments. These measures would enhance the local character, improve aesthetics, and reduce the visual scale of the Build Alternative. Project designers and contractors would meet code requirements of the City. Context sensitive design elements will be addressed directly in the Architecture and Urban Design Guidelines. The ALR Sustainability Criteria and Guidelines are in development.

## 7 References

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