Appendix G

Inventory and Evaluation of Historic Resources
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Environmental Assessment
Inventory and Evaluation of Historic Resources

TEMPE STREETCAR
July 2015
EXECUTIVE SUMMARY

Background

The Tempe Streetcar project was initially proposed several years ago to include the current project’s downtown loop on Mill Avenue, Rio Salado Parkway, Ash Avenue, and University Drive as well as a continuation of the route south on Mill Avenue where it would have terminated at Southern Avenue. On behalf of the Federal Transit Administration (FTA), Valley Metro initiated consultation on the initial proposal in 2008 with the State Historic Preservation Office (SHPO), the City of Tempe Historic Preservation Office, and Arizona State University (ASU). SHPO concurred on the determinations of eligibility and findings of no adverse effect for both archaeological and historic resources for that project on May 14, 2012. Subsequent to SHPO concurrence, Valley Metro and the City of Tempe decided not to move forward with the project as then defined. In 2014, the streetcar route was modified to include the same downtown loop and portion of Mill Avenue south of University Drive to approximately 11th Street. However, the current project also includes a new segment on Rio Salado Parkway between Mill Avenue and Marina Heights (near Packard Drive) connecting the emerging commercial district of Rio Salado Parkway along the Tempe Town Lake front with the traditional downtown core of Tempe and the Mill Avenue District. Another segment traversing the Gammage Curve between Mill Avenue and Apache Boulevard was also added which will extend east on Apache Boulevard terminating near the current Dorsey/Apache Blvd Light Rail Station. This alignment provides a direct linkage between Tempe Town Lake, the region’s light rail system, downtown Tempe, several destinations within ASU’s campus including Gammage Auditorium, and future employment and activity destinations including Marina Heights. Therefore, consultation was continued in 2014 with SHPO, City of Tempe, and ASU and other interested parties, including Native American tribes, to provide an opportunity to review the historic and archaeological properties and potential effects of these new portions of the project.

In total, the Build Alternative consists of a 3.0-mile modern streetcar line. The project intends to use modern streetcar vehicles, powered by an overhead catenary system. Although a specific vehicle has not been selected, streetcar vehicle lengths typically range from 66 to 82 feet, with passenger capacities of 125 to 150 persons. The streetcar is anticipated to have a minimum of two articulations (movable joints) to maneuver tight turns required for in-street operations.

The Tempe Streetcar project is being funded by the FTA through Valley Metro and is, therefore, a federal undertaking. As a federal undertaking, a cultural resource study was required to determine potential impacts to historic properties as per Section 106 of the National Historic Preservation Act (NHPA) of 1966, as amended; Section 4(f) of the Department of Transportation Act; and the National Environmental Policy Act (NEPA). HDR, Inc., a prime contractor to Valley Metro, subcontracted with Archaeological
Consulting Services, Ltd. (ACS) to conduct a historic building inventory, a National Register of Historic Places (National Register) eligibility assessment of properties dating prior to 1968, and an impact assessment—including potential visual and physical impacts—of the proposed undertaking on any identified historic properties within the current area of potential effects (APE).

Identification of Eligible and Listed Properties

In 2012 Ryden Architects, Inc. conducted a historic building inventory and effects analysis of the original Tempe Streetcar alignment, a portion of which falls within the current Build Alternative APE (Ryden Architects Inc. 2012). That study documented 76 historic properties and nine historic districts, of which 43 individual historic properties and three historic districts fall within the current project’s APE for the proposed Build Alternative. Of those historic properties and districts within the current APE, 13 individual properties and one historic district are currently listed in the National Register (Tables 1 and 2). SHPO concurred with the report and a finding of “no adverse effect” to historic properties and eligibility of individual properties and districts (Limmer [FTA] to Garrison [SHPO], May 4, 2012; SHPO concurrence May 14, 2012). A copy of this concurrence letter, as well as additional project correspondence, is provided in Appendix A of this report. A map comparing the previously studied APE and the current APE is located in Appendix C.

Previously documented properties were not revisited during the current study of the revised APE, but reference to these properties is included in the list of eligible properties and the effects assessment for the current Tempe Streetcar Build Alternative. The revised anticipated date of completion for the Tempe Streetcar project is 2018, which would make 1968 the 50-year historic age cutoff normally considered in the evaluation of eligibility. The current study identified four new properties that are recommended eligible for listing in the National Register, including three dormitories located on the Arizona State University campus (Charles Hayden Hall, Best Hall, and Irish Hall) and Sun Devil Stadium (Table 3). In total, the inventory and research from both studies identified 47 buildings and three historic districts (University Park, Park Tract, and Gage Addition) within the current APE, including 13 individual properties and one historic district (University Park) previously listed in the National Register.
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<th>Property Name 2</th>
<th>Address</th>
<th>Year Built</th>
<th>Status and Criteria 3</th>
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<td>1.1</td>
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<td>Ash Avenue at 1st Street</td>
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<td>Hayden House (adobe) (Monti’s La Casa Vieja)</td>
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<td>1.8</td>
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<td>415 S Mill Avenue</td>
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<td>1.13</td>
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<td>526 S Mill Avenue</td>
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<td>Gage House (Mrs. Rita's)</td>
<td>115 W University Drive</td>
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<td>Status and Criteria(^3)</td>
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<td>2.7</td>
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<td>1020 S Mill Avenue</td>
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<td>2.9</td>
<td>Minson House (Church)</td>
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<td>2.11</td>
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<td>2.20</td>
<td>Butler (Gray) House</td>
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<td>1939</td>
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<td>2.21</td>
<td>Tempe Women’s Club</td>
<td>1290 S Mill Avenue</td>
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<td>1319 S Mill Avenue</td>
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<td>3.3</td>
<td>Residence</td>
<td>1421 S Mill Avenue</td>
<td>1952</td>
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A table showing historic districts listed and eligible:

<table>
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<tr>
<th>Property Number</th>
<th>Property Name</th>
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<th>Year Built</th>
<th>Status and Criteria</th>
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<td>TSC-HD1</td>
<td>Gage Addition Historic District</td>
<td>NWC 10th St &amp; Mill</td>
<td>1919-1954</td>
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<td>TSC-HD2</td>
<td>Park Tract Historic District</td>
<td>SWC 10th St &amp; Mill</td>
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<td>TSC-HD4</td>
<td>University Park Historic District</td>
<td>SEC Apache Blvd &amp; Mill</td>
<td>1946-1956</td>
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</table>

1 This table includes historic districts previously evaluated by Ryden Architects, Inc. (Ryden Architects Inc. 2012). The report received SHPO concurrence on May 12, 2012. Locations of these historic districts are provided in Appendix C.  
2 HD=Historic District. There is no TSC-HD3 (College View Historic District) within the APE. The eligible historic district assigned this number has been removed from the APE because no portion of the district is adjacent to the current project.

A table showing property eligibility recommendations:

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name</th>
<th>Location</th>
<th>Year Built</th>
<th>Status and Criteria</th>
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<tbody>
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<td>ACS-9</td>
<td>Sun Devil Stadium</td>
<td>500 E Veteran’s Way</td>
<td>1958</td>
<td>Recommended Eligible – Criterion A</td>
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<tr>
<td>ACS-6</td>
<td>Charles Hayden Hall</td>
<td>250 E Apache Blvd</td>
<td>1951</td>
<td>Recommended Eligible – Criterion A and C</td>
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<tr>
<td>ACS-7</td>
<td>Best Hall</td>
<td>1215 S Forest Ave</td>
<td>1956</td>
<td>Recommended Eligible – Criterion A and C</td>
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<tr>
<td>RYDEN T-438</td>
<td>Irish Hall</td>
<td>1201 S Forest Ave</td>
<td>1940</td>
<td>Recommended Eligible – Criterion A and C</td>
</tr>
</tbody>
</table>

1 Valley Metro and FTA seek SHPO concurrence with the recommendations of eligibility of these four properties. Note that SHPO concurred in 2012 with the determination of eligibility of all other properties and districts in the APE.
Finding of Effects

The project would result in a “No Adverse Effect” on all of the historic properties and districts within the APE. The proposed Build Alternative for the Tempe Streetcar project is nearly all within the existing street curbs with the exception of minimal right-of-way acquisitions to accommodate a few streetcar stops and the traction power substations (TPSS) facilities needed to provide electric power to operate the streetcar. None of these acquisitions would be on contributing properties in historic districts or on individual properties listed in or eligible for listing in the National Register of Historic Places. The Build Alternative avoids physical and visual impacts to historic properties within the APE.

Consistent with previous findings along the Tempe Streetcar corridor, neither an eligible historic streetscape along Mill Avenue or Apache Boulevard nor an eligible historic commercial district was identified within the APE. Historic-era curbs and sidewalks are present within the current APE, but the curbs and sidewalks are not individually eligible, nor are they contributors to an eligible streetscape or district. The SHPO and the City of Tempe Historic Preservation staff have determined that the “WPA” [Works Progress Administration] impression stamps in the concrete sidewalks along the west side of Mill Avenue south of University Drive are character-defining features of a right-of-way that is so lacking in integrity as to be no longer able to convey their historic significance. Thus, they are not eligible for National Register listing (Ryden Architects, Inc. 2012:7, 47). However, SHPO has requested that the stamps be removed and provided to their office for interpretive opportunities (Jacobs [SHPO] to Forrest [Valley Metro], May 14, 2012). The Tempe Streetcar features, including traffic and pedestrian signals and stations, will not introduce structures taller than existing buildings and street features. Therefore, these new features would not introduce an adverse visual effect or disruption of the historic setting.

Measures to Minimize and Avoid Effects:

- If the TPSS site located near a historic property or historic district is selected for implementation, appropriate shielding of the TPSS would be provided such that the TPSS does not alter characteristics of the historic property or historic district that qualify the property for inclusion in the National Register.
- Although no adverse vibration impacts are anticipated as a result of the streetcar construction or operation, documentation of the existing conditions of the Hayden House adobe building would occur prior to project construction to create a baseline for monitoring potential future architectural or structural changes. The survey would include inspection of the building foundation, photographs of pre-construction conditions, and documentation of any existing cracks.
- Application of friction control would be included in the design to help reduce the occurrence of wheel squeal. Friction control consists of installing lubricators on
the rail or using an onboard lubrication system that applies lubrication directly to the wheels. Including friction control in the design would reduce the predicted noise levels to below the FTA moderate noise impact threshold at all noise-sensitive receivers.

- Installation of low-impact frogs for the special trackwork (i.e., switches and turnouts) to reduce vibration impacts to acceptable levels. Examples of low-impact frogs include monoblock frogs and flange-bearing frogs. Installing low-impact frogs would create a smoother transition through the gap in the rails at the special trackwork to reduce the predicted vibration levels to below the FTA impact threshold at all sensitive receivers.

With the considerations presented earlier and implementation of the measures above, the Build Alternative would pose no adverse physical or visual impacts to historic properties in the APE. Therefore, similar to the 2012 study, a finding of “No Adverse Effect” for the current APE is recommended.
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1.0 INTRODUCTION

1.1 PROJECT BACKGROUND

The Tempe Streetcar project is being funded by the Federal Transit Administration (FTA) and administered through Valley Metro and is, therefore, a federal undertaking. As a federal undertaking, a cultural resource study was required to determine potential impacts to historic properties as per Section 106 of the National Historic Preservation Act (NHPA) of 1966, as amended; Section 4(f) of the Department of Transportation Act; and the National Environmental Policy Act (NEPA). HDR, Inc., a prime contractor to Valley Metro, subcontracted with Archaeological Consulting Services, Ltd. (ACS) to conduct a historic building inventory, a National Register of Historic Places (National Register) eligibility assessment of properties dating prior to 1968, and an impact assessment—including potential visual and physical impacts—of the proposed undertaking on any identified historic properties within the current area of potential effects (APE).

This technical report details the historic building inventory for the Tempe Streetcar project Environmental Assessment (EA). The report includes a brief history of the overall project, along with the Build Alternative that is currently being considered, as well as a discussion of the federal, state, and local regulatory requirements that the project must meet. The report continues with previous research, historic contexts and areas of significance, methods for the field survey effort, a description of resources identified through the survey and their associated National Register of Historic Places (National Register) eligibility recommendations, a summary of potential effects, and measures to avoid or minimize effects for the proposed Build Alternative. Archaeological sites, including US Highway 80, are discussed in a separate technical report, Assessment of Archeological Resources, prepared by HDR, Inc. (Mark Brodbeck, Principal Investigator).

The majority of the historic-age properties in the current area of potential effects (APE) were evaluated in 2012 (Ryden Architects Inc. 2012) in conjunction with a streetcar alignment that was originally considered but never advanced. That initial alignment was presented to the City of Tempe Historic Preservation Commission and the State Historic Preservation Office (SHPO), as well as other interested parties in 2008. FTA and Valley Metro contacted Native American tribes with a potential interest in the project including: the Ak-Chin Indian Community, Fort McDowell Yavapai Nation, the Gila River Indian Community, the Hopi Tribe, the Salt River Pima-Maricopa Indian Community, and the Inter-Tribal Council of Arizona; however, none of the contacted tribes responded to Valley Metro's invitation to participate in Section 106 consultation at that time. The initial alignment included an APE that was one property deep flanking the streetcar line overlaid upon Mill Avenue, Rio Salado Parkway, Ash Avenue, and University Drive. The APE boundary also expanded along Mill Avenue south of Apache Boulevard to
encompass each listed or eligible historic district adjacent to the proposed Build Alternative.

The 2012 study documented 76 historic properties and nine historic districts. Forty-three historic properties and three historic districts (University Park, Park Tract, and Gage Addition) recorded during the 2012 assessment fall within the proposed Build Alternative APE, including 13 individual properties and one historic district currently listed in the National Register. Appendix C contains a map comparing the previously studied APE and the current APE. The SHPO concurred with the 2012 report and with a finding of “no adverse effect” to historic properties for the project (Limmer [FTA] to Garrison [SHPO], May 4, 2012; SHPO concurrence May 14, 2012). A copy of this concurrence letter, as well as additional project correspondence, is provided in Appendix A of this report.

In 2014, the route was modified to include the same downtown loop and portion of Mill Avenue south of University Drive to approximately 11th Street. However, the current project also includes a new segment on Rio Salado Parkway between Mill Avenue and Marina Heights (near Packard Drive). Another segment traversing the Gammage Curve between Mill Avenue and Apache Boulevard was also added which will extend east on Apache Boulevard to approximately Dorsey Lane. In total, the Build Alternative consists of a 3.0-mile modern streetcar line. In 2015, FTA provided the consulting parties with an updated project scope of work and APE and updated consultations with the consulting parties. Tribes added to the list of consulting parties include the Pascua Yaqui Tribe, the Tohono O’odham Nation, the Tonto Apache Tribe, White Mountain Apache Tribe, and the Yavapai-Apache Nation. Responses were received from the Gila River Indian Community and the Hopi Tribe. The Gila River Indian Community asked to be included in continuing consultations for the project and the Hopi Tribe asked for the opportunity to review the cultural resource reports for the project as they become available.

Previously documented properties were not revisited during the current study of the revised APE, but reference to these properties is included in the list of eligible properties and the effects assessment for the current Tempe Streetcar Build Alternative. The revised anticipated date of completion for the Tempe Streetcar project is 2018, which would make 1968 the 50-year historic age cutoff normally considered in the evaluation of eligibility. The current study newly identified four properties recommended eligible for listing in the National Register. In total, the inventory and research from both studies identified 47 buildings and three historic districts within the current APE, including 13 individual properties and one historic district previously listed in the National Register.
1.2 REGULATORY REQUIREMENTS

1.2.1 Federal Legal Requirements

National Environmental Policy Act
Section 101(b)(4) of NEPA (Title 42, U.S. Code, Section 4321 et seq.) stipulates that federal agencies work to preserve not only the natural environment but also historic and cultural aspects of our nation’s heritage. The cultural environment includes those aspects of the physical environment that relate to human culture and society, along with the institutions that form and maintain communities and link them to their surroundings (King and Rafuse 1994). Agency and public scoping identified three components of the cultural environment that are of concern: (1) archaeological sites; (2) historic districts, buildings, and structures; and (3) traditional cultural resources and life ways.

National Historic Preservation Act
In conjunction with assessing impacts on the cultural environment pursuant to NEPA, FTA addressed the closely related requirements of Section 106 of NHPA (Title 16, U.S. Code, Section 470), as recommended by the Council on Environmental Quality and Advisory Council on Historic Preservation (2013). Section 106 requires federal agencies to take into account the effect of their undertakings on any district, site, building, structure, or object included in or eligible for inclusion in the National Register. That consideration is to be conducted in consultation with the SHPO and other interested parties pursuant to regulations for Protection of Historic Properties (Title 36, Code of Federal Regulations [CFR] Part 800), which implement NHPA Section 106.

To be eligible for the National Register, properties must be 50 years old (unless they have exceptional historical importance) and have national, state, or local significance in American history, architecture, archaeology, engineering, or culture. They must possess sufficient integrity of location, design, setting, materials, workmanship, feeling, and association to convey their historical significance, and meet at least one of four criteria:

- **Criterion A**: are associated with events that have made a significant contribution to the broad patterns of our history
- **Criterion B**: are associated with the lives of people significant in our past
- **Criterion C**: embody distinctive characteristics of a type, period, or method of construction, or represent the work of a master, or possess high artistic values, or represent a significant and distinguishable entity whose components may lack individual distinction
- **Criterion D**: have yielded or may be likely to yield information important in prehistory or history (36 CFR 60)

Department of Transportation Act, Section 4(f)
Potential uses of historic resources also were considered in accordance with Section 4(f) of the Department of Transportation Act of 1966 (Title 49, United States Code,
Section 303). The intent of the statute is to avoid use or impairment of significant historic sites (as well as public parks, recreation areas, and wildlife refuges) for transportation projects, or where avoidance is not feasible and prudent, to minimize the use of such properties. Unless the use of a Section 4(f) property is determined to have a minor (de minimis) impact, the FTA must determine that no feasible and prudent avoidance alternative exists before approving the use of such land for the project. Feasible and prudent avoidance alternatives are those that avoid using any Section 4(f) property and do not cause other severe problems of a magnitude that substantially outweigh the importance of protecting the Section 4(f) property (23 CFR 774.17).

1.2.2 State and Local Legal Requirements

State Legislation
The cultural resource studies also considered requirements of the Arizona Antiquities Act (Arizona Revised Statutes 41-841 through 41-847). That law prohibits collection of archaeological or vertebrate paleontological specimens and excavation of any historic or prehistoric ruin, burial ground, archaeological or vertebrate paleontological site, or site including fossilized footprints, inscriptions made by human agency, or any other archaeological, paleontological, or historical feature on lands owned or controlled by the State of Arizona or local governments without a permit issued by the Arizona State Museum. The act directs those in charge of activities on such lands to notify the Arizona State Museum of the discovery of any sites or objects that are at least 50 years old.

The cultural resource studies also addressed the State Historic Preservation Act (Arizona Revised Statutes 41-861 et seq.) because ADOT would comply with that act in authorizing use of freeway right-of-way (ROW) for the project. That act requires ADOT to provide the SHPO an opportunity to review and comment on potential impacts to properties listed in or eligible for the Arizona Register of Historic Places (Arizona Register). The criteria for the Arizona Register are essentially identical to those for the National Register (Arizona Administrative Code Title 12, Chapter 8, Article 3, R12-8-302).

Tempe City Code
In 1980, an amendment to the National Historic Preservation Act established a framework for local preservation programs. This program allows cities and counties to apply to the SHPO to become Certified Local Governments (CLGs), and offers assistance and funding for local preservation programs. An official CLG under the State Historic Preservation Plan since October 14, 1997, the City of Tempe is responsible for enacting a preservation program that has included the establishment of a Historic Preservation Commission and Historic Preservation Officer (HPO) (Tempe City Code, Chapter 14A-3), the preparation and adoption of an official Historic Preservation Plan, and the establishment of a local register of historic places. Tempe City Code has established goals for identification and protection of the city’s historic resources, provide
protection for significant properties and archaeological sites which represent important aspects of Tempe’s heritage, and enhance the character of the community by taking such properties into account during development (Ordinance Nos. 95.35 and 2004.42). The local ordinance also establishes protocol for historic overlay and historic landmark zoning (Tempe City Code, Chapter 14A-4). Coordination with the Tempe HPO is required in the EA and Section 106 process. Subsequent project impact assessments and implementation actions would comply with any reviews required by local historic preservation ordinances. As a courtesy, Valley Metro copied the City of Tempe HPO (John Southard, M.A.) on the letter formally initiating Section 106 consultation with SHPO.

As a courtesy to Arizona State University (ASU), as a major educational institution and agency of the State of Arizona through the Board of Regents, Valley Metro has initiated consultation with the school’s Senior Architect and Historic Preservation Coordinator (Patricia Olson, PhD, RA). ASU has been party to the ongoing meetings, formal and informal consultations, and report submittals throughout the course of project design, planning, and historic preservation evaluations. ASU is in the process of preparing a Multiple Property Documentation Form (MPDF) for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Dr. Patricia Olson, Senior Architect at ASU, December 1, 2014).

1.3 METHODOLOGY OF INVESTIGATION

1.3.1 Archival Research Methods

Archival research was conducted to gather information regarding the historic development of the APE, and specific information regarding the individual properties within the project area. Resources and repositories consulted for historic background of the project area included:

**Arizona State University: Hayden Library**

Secondary sources relating to the history and development of Tempe and ASU were examined at the library, as well as the online ASU Digital Repository ([https://lib.asu.edu/](https://lib.asu.edu/)).

**Arizona State University: Hayden Library Arizona Collection**

Reference materials examined included city and business directories of Tempe and the East Valley. In addition, a variety of photographed and aerial photographs of the ASU campus were also examined.
Arizona State University: Noble Science Library
A variety of maps and aerial photographs were examined, including Arizona Department of Transportation (ADOT) aerial imagery, as well as any vicinity maps that might be useful for the building survey.

Arizona State Library, Archives and Public Records
Sanborn-Perris maps of the Tempe area were examined. Unfortunately, however, Sanborn-Perris maps did not cover lands along Apache Boulevard, east of College Avenue. Additionally, the latest publication of the Tempe Sanborn-Perris maps (1948) preceded construction of Sun Devil Stadium and the Rio Salado Parkway.

Maricopa County Assessor’s Office and GIS Portal
The Maricopa County Assessor’s Office administers real and personal property parcels for the county. Pertinent parcel data, including commercial construction dates were retrieved for filling out the inventory forms. The construction dates provided by the Assessor were compared for accuracy with aerial imagery provided by the Flood Control District of Maricopa County (FCDMC) and available on the County GIS Portal (http://gis.maricopa.gov/Index.html:accessed January 5, 2015).

Tempe History Museum
The Tempe History Museum maintains an online database of documents and photographs pertaining to Tempe’s history. This database was searched for photographs of buildings documented by ACS as part of this project.

1.3.2 Field Survey
A field survey was conducted to inventory all historic-age properties with the APE. Field data was collected and each property was photographed.

1.3.3 Inventory Forms
An individual Historic Property Inventory Form (HPIF) was completed for each parcel within the project area that contained an eligible historic-age building or structure. Forms completed by ACS for this project are provided in Appendix B, as well as forms previously completed by Solliday and Ryden Architects. A map showing the location of eligible buildings is provided in Appendix C. Each parcel was assigned an ACS field identification number, although some clusters of related individual properties with the same address were combined and treated as one property for the purposes of this survey. The property name was derived from whatever historical association was found with a house or building. Commercial properties are identified with the historic name, if known, and the current commercial name now associated with the property. The primary street address for each parcel was determined by what is currently on record at the Maricopa County Assessor’s Office. The Tax Parcel Number information also is based on data from the Maricopa County Assessor’s Office, which maintains...
information on listed parcels, current property ownership, and effective construction dates. Initially, the presumed construction date recorded was the Maricopa County Assessor’s Effective Construction Date. An effective construction date, however, does not always reflect the true original construction date of a building. If additions or other major alterations occurred since the date of original construction, the construction date on file is adjusted to reflect an “effective” construction date to incorporate those changes. An initial construction date was used if one could be determined; the effective construction date was used when an initial construction date could not be determined. A circa (ca.) date is indicated on the form when an absolute original construction date is unknown and an estimated date based on available data is used. The physical condition of a building is based on evidence of reasonable maintenance and repair, or visible structural damage or deterioration. However, problems with structural condition are not necessarily an indication of a building’s integrity, which is based on an evaluation of whether character-defining architectural elements are intact, missing, or altered. The determination of historic and present property use is based on historic aerials, city directory listings, and visual evidence of a property’s design.

1.3.4 Eligibility Understandings

Approaches to specific property types regarding recommendation of eligibility and determination of effect were discussed in consultation with SHPO and the City of Tempe HPO. Those points are listed below.

1.3.4.1 Historic Curbs and Sidewalks

Consistent with previous findings along the Tempe Streetcar corridor (Ryden Architects, Inc. 2012), historic-era curbs and sidewalks are present within the current APE, but the curbs and sidewalks are not individually eligible, nor are they contributors to an eligible streetscape or district. The SHPO and the City of Tempe Historic Preservation staff have determined that the “WPA” [Works Progress Administration] impression stamps in the concrete sidewalks along the west side of Mill Avenue south of University Drive are character-defining features of a right-of-way that is so lacking in integrity as to be no longer able to convey their historic significance. Thus, they are not eligible for National Register listing (Ryden Architects, Inc. 2012:7, 47). However, SHPO has requested that the stamps be removed and provided to their office for interpretive opportunities (Jacobs [SHPO] to Forrest [Valley Metro], May 14, 2012).

1.3.4.2 Transportation Resources

The Interim Procedures for the Treatment of Historic Roads (2002), as approved by the Federal Highway Administration (FHWA), ADOT, and SHPO, defines the Historic State Highway System (HSHS) as the network of roadways developed between 1912 and 1955 and whose remnants are preserved as in-use roadways and abandoned segments of roadway. As part of the HSHS, US 80 is considered eligible only under Criterion D for
its potential to yield significant information about the development of Arizona’s highway system. Individual segments of linear transportation sites are evaluated to assess their contribution to the site’s overall eligibility. Additional information regarding the documentation and assessment of US 80 may be found in the separate archaeological technical report *Assessment of Archeological Resources*, prepared in support of the Tempe Streetcar EA.

1.4 AREA OF POTENTIAL EFFECT

The APE includes properties that may be directly impacted (e.g., physical destruction or disturbance of any or all of the property either by the built project or during construction activities), as well as properties that may be indirectly impacted (e.g., through visual or audible impacts, changes in traffic circulation, or other effects to the environment that would diminish the integrity of a property’s surroundings) by project activities.

The APE has been defined through coordination with the Arizona State Historic Preservation Office (SHPO) and the City of Tempe Historic Preservation Office (CHPO) as the properties immediately adjacent (first tier of properties) to the Build Alternative ROW (Figure 1). This limitation of the first tier properties results in an apparent “hole” within the APE in the downtown area.

If a potentially affected parcel is a component of a potential district or group of associated buildings (e.g., commercial business park, apartment complex, or mobile home park), the entire potential district boundary is included within the APE. The historic district is considered as a single unit for the sake of evaluation just as though it were an individual building on a single parcel. The effect of the proposed undertaking on the entire district is evaluated for its impact not only on the few properties adjacent to the track alignment, but also on the historic district as a whole.
2.0 TEMPE STREETCAR PROJECT DEFINITION

2.1 BUILD ALTERNATIVE

The proposed Build Alternative connects the emerging commercial district of Rio Salado Parkway along the Tempe Town Lake front with the traditional downtown core of Tempe along Mill Avenue. South of University Drive and downtown Tempe, the alignment continues on Mill Avenue and wraps around the southern portion of ASU’s campus along Apache Boulevard to its terminus near the current Dorsey/Apache Blvd LRT Station. This alignment provides a direct linkage between Tempe Town Lake, the region’s LRT system, downtown Tempe, several destinations within ASU’s campus including Gammage Auditorium, and future employment and activity destinations such as Marina Heights. In total, the Build Alternative consists of a 3.0-mile modern streetcar line.

Described from north to south, the streetcar would operate bi-directionally on Rio Salado Parkway between the new Marina Heights development near Packard Drive and the intersection of Mill Avenue and Rio Salado Parkway. The streetcar would then loop around Tempe, operating on a one-way, counter-clockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, during normal operating conditions, where the trains on eastbound University Drive intersect with Mill Avenue, they would turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The Build Alternative is shown in Figure 2.

The existing number of traffic lanes would be maintained with two exceptions: 1) the short segment along Mill Avenue between University Drive and 11th Street. In that segment, the existing three southbound through lanes would be reduced to two lanes, and a southbound bicycle lane would be added. An additional northbound through lane would be added to provide a total of two northbound through lanes and a bicycle lane. At 10th Street, the left-turn lane would be removed; and 2) Ash Avenue southbound between Rio Salado Parkway and University Drive. In that segment, the existing two southbound through lanes would be reduced to one lane, and the southbound bicycle lane would be moved adjacent to the remaining southbound through lane.
The proposed streetcar system would operate with a single car and would generally share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way (ROW). The project intends to use modern streetcar vehicles, powered by an overhead catenary system. Although a specific vehicle has not been selected, streetcar vehicle lengths typically range for 66 to 82 feet, with passenger capacities of 125 to 150 persons. The streetcar is anticipated to have a minimum of two articulations (movable joints within the vehicle) to maneuver tight turns required for in-street operations. A portion of the vehicle will have a low floor to accommodate level boarding from platforms. The vehicle will either have adjustable suspension or bridge plates to accommodate Americans with Disabilities Act (ADA) requirements for vehicle/platform interface. The primary features of the Build Alternative are described in Table 4.
### TABLE 4: TEMPE STREETCAR AT-A-GLANCE

<table>
<thead>
<tr>
<th>From – To:</th>
<th>Rio Salado Parkway (between the Marina Heights development and intersection of Mill Avenue and Rio Salado Parkway) – This segment has a double-track configuration. Downtown Tempe (between University Drive and Rio Salado Parkway) – This segment includes a single track, one-way counter-clockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive to Mill Avenue. Northbound trains will operate on a single track, one-way alignment north on Mill Avenue. Mill Avenue (south of University Drive to Apache Boulevard) and Apache Boulevard (east of Mill Avenue to Dorsey Lane) – This segment contains a double-track configuration with the exception of the single-track configuration east of Terrace Road to Dorsey Lane.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Distance</td>
<td>3.0 route miles</td>
</tr>
<tr>
<td>Number of streetcar stops</td>
<td>14 total stops</td>
</tr>
<tr>
<td>Power requirements</td>
<td>Electric vehicles powered by overhead catenary lines and 3-4 traction power substations (TPSSs)</td>
</tr>
<tr>
<td>Traffic lanes</td>
<td>Operates on fixed-rail guideway and generally shares travel lanes with autos except on Rio Salado Parkway, Ash Avenue, University Drive and Mill Avenue south of University Drive, where it operates in semi-exclusive guideway. Existing numbers of traffic lanes are generally maintained with two exceptions: 1) between University Drive and 11th Street, where the existing three southbound lanes would be reduced to two and a bike lane would be added (existing one northbound lane would be increased to two lanes and existing bike lane remains) and 2) southbound Ash Avenue, where two southbound lanes are reduced to one lane.</td>
</tr>
<tr>
<td>Operations begin</td>
<td>2018</td>
</tr>
<tr>
<td>Headways</td>
<td>Weekdays: 10-minute frequency in each direction most of the day. 20-minute frequency in each direction in early mornings and late evenings.</td>
</tr>
<tr>
<td>Vehicle capacity</td>
<td>Up to 150 passengers – Vehicle capacity depends on the size and seating configuration of the vehicle selected.</td>
</tr>
<tr>
<td>Hours of operation</td>
<td>Sunday through Thursday 19 hours (5 a.m. to 12 a.m.) Friday and Saturday 22 hours (5 a.m. to 3 a.m.)</td>
</tr>
<tr>
<td>Number of vehicles</td>
<td>6 – includes revenue service vehicles and spares</td>
</tr>
<tr>
<td>Operations and maintenance</td>
<td>Uses existing Valley Metro Operations and Maintenance Center (OMC)</td>
</tr>
</tbody>
</table>

Source: Valley Metro, January 2015.

Construction of the Build Alternative considered is anticipated to take between 18 and 24 months. Design of the proposed alignment, track and guideway, streetcar stop locations, and associated roadway improvements are depicted in the drawings provided in Appendix D. The streetcar stop at 3rd St/Mill Ave, also depicted in those drawings, has a close (less than ½ block) and convenient connection to the existing LRT station on 3rd Street just west of Mill Avenue. Along with the 3rd St/Mill Ave Stop, the streetcar will terminate near the current Dorsey/Apache Blvd LRT Station, providing a second convenient connection to the existing LRT line which serves portions of Mesa, Tempe, and Phoenix.
The proposed Build Alternative’s vehicles will use the current Operations and Maintenance Center (OMC) now used to maintain and store light rail vehicles for the Valley Metro light rail system. The vehicles would use the existing LRT tracks to access the OMC. A total of 14 streetcar stops would be distributed throughout the 3.0-mile corridor as shown in Table 5.

### TABLE 5: STOP LOCATION BY TYPE

<table>
<thead>
<tr>
<th>Location</th>
<th>Platform Type</th>
<th>Orientation of Stop on Street</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marina Heights/Rio Salado Pkwy</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>Hayden Ferry/Rio Salado Pkwy</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>Tempe Beach Park/Rio Salado Pkwy</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>3rd St/Ash Ave</td>
<td>Side platform on curbside lane</td>
<td>Southbound</td>
</tr>
<tr>
<td>5th St/Ash Ave</td>
<td>Side platform on curbside lane</td>
<td>Southbound</td>
</tr>
<tr>
<td>University Dr/Ash Ave</td>
<td>Side platform on curbside lane</td>
<td>Southbound</td>
</tr>
<tr>
<td>6th St/Mill Ave</td>
<td>Side platform on curbside lane</td>
<td>Northbound</td>
</tr>
<tr>
<td>3rd St/Mill Ave</td>
<td>Side platform on curbside lane</td>
<td>Northbound</td>
</tr>
<tr>
<td>9th St/Mill Ave</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>11th St/Mill Ave</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>College Ave/Apache Blvd</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>McAllister Ave/Apache Blvd</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>Rural Rd/Apache Blvd</td>
<td>Center platform</td>
<td>Center of Street</td>
</tr>
<tr>
<td>Dorsey/Apache Blvd LRT Station</td>
<td>Side platform on street median</td>
<td>Center of Street</td>
</tr>
</tbody>
</table>

Source: Tempe Streetcar drawings, Valley Metro, April 2014.

Streetcars’ power is supplied by overhead electric lines. The overhead electric lines would be suspended by poles and hardware placed in the street right-of-way at intervals of approximately 80 feet to 110 feet. The poles and hardware are designed to be compatible with visual and aesthetic characteristics of the corridor. Where the track is side-running, the poles would be located on the curb side of the streetcar trackway with the overhead electrical line suspended over the streetcar tracks either by span wires or with cantilevered attachments. Where the track is median-running, generally the poles would be located within the median with the overhead line suspended over the streetcar tracks.

With few exceptions, the streetcar trackway, stops, and lane configurations would remain within the existing public ROW footprint; however ROW would be necessary for traction power substations (TPSS) and signal buildings. Additional information on ROW needs is shown on the drawings provided in Appendix D. The TPSSs would be spaced approximately one-mile apart from one another to provide electrical power for streetcar vehicles and special trackwork (i.e., switches and turnouts). The TPSS facilities convert electrical current to an appropriate type (AC to DC) and level to power streetcar vehicles. Signal houses are used to electronically activate special trackwork switches,
allowing the streetcar to switch from one track to another. The candidate locations for eight TPSSs are listed in Table 6 and shown on the drawings provided in Appendix D. Each location, with a land need (including setbacks and access drives) of approximately 70 feet by 100 feet, was sited to minimize impacts to the surrounding properties. The project would likely require fewer than eight TPSSs; however, all eight potential sites are evaluated for this project since the final sites cannot be selected until more detailed engineering occurs during preliminary engineering and final design. TPSS sites are selected to balance safety, reliability, cost, operational efficiency requirements, and aesthetics. The locations of special trackwork are also shown on the drawings.

### Table 6: Traction Power Substations Location Options

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Drawing Sheet No.</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>RS/P Option 1</td>
<td>3</td>
<td>Rio Salado Pkwy-Option 1</td>
</tr>
<tr>
<td>RS/P Option 2</td>
<td>2</td>
<td>Rio Salado Pkwy-Option 2</td>
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<tr>
<td>RS/A</td>
<td>4</td>
<td>Rio Salado Pkwy/Ash Ave</td>
</tr>
<tr>
<td>3/A</td>
<td>5</td>
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<td>3/M</td>
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<td>3rd St/Mill Ave</td>
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<td>U/M</td>
<td>7</td>
<td>University Dr/Mill Ave</td>
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<td>13/M</td>
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<td>13th St/Mill Ave</td>
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<td>A/T</td>
<td>13</td>
<td>Apache Blvd/Terrace Rd</td>
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*As shown in the set of drawings provided in Appendix D.*

#### 2.2 NO BUILD ALTERNATIVE

The No-Build Alternative assumes that the streetcar and supporting facilities would not be constructed. In the No-Build scenario, the 2035 transit system is comprised of a combination of the existing light rail system and facilities, arterial-running bus routes that utilize 35-foot, 40-foot, and 60-foot bus vehicles and Orbit, a neighborhood circulator service that utilizes 24-foot buses. Three new transit services are planned that will serve the study area including two express routes and Valley Metro LINK service in the Scottsdale/Rural Road corridor. Additionally, the Maricopa Association of Governments (MAG) and the City of Tempe identified minor roadway, bicycle, and pedestrian improvements within the study area.

#### 3.0 ENVIRONMENTAL SETTING

##### 3.1 HISTORIC PATTERNS OF DEVELOPMENT

The project corridor extends through the original Tempe townsite, which is located south and west of Tempe Butte, on the south bank of the Salt River. Historically, Tempe—like other communities in the Salt River Valley—was surrounded by fertile, cultivated lands that were watered by a network of private canal systems. Although lateral ditches and unimproved roads generally followed section lines, Tempe’s arterial streets (including
Mill Avenue) that make up the original townsite were located within the south half of Sections 15, Township 1 North, Range 4 East. University Drive, originally designated 8th Street, was located along the southern edge of Section 15. In the late nineteenth and early twentieth centuries, commercial development in Tempe was concentrated along Mill Avenue. The Arizona Territorial Normal School was established along 8th Street (later designated University Drive) in 1885, and would be a major influence in the growth and development of Tempe through the twentieth century.

As Tempe expanded southward in the twentieth century, so too did its arterial street system. Much of the current Apache Boulevard alignment between Tempe and Mesa (initially designated 13th Street in Tempe and designated Main Street in Mesa), was a component of the Tempe-Mesa Road, which would later be incorporated into the Apache Trail after completion of Roosevelt Dam in 1911. This important route would be designated US Highway 80 (US 80) in 1927, and would eventually be shared by US Highways 60, 70, and 89. In 1935, the portion of Apache Boulevard within the current APE was incorporated into the US 80 alignment. Up to this time, the landscape along Apache Boulevard was predominantly agricultural. Within a period of three decades, commercial and residential development expanded. This growth was coupled with the expansion of Tempe’s Normal School (known after 1945 as Arizona State College and now as ASU) south of University Drive to US 80 along Apache Boulevard. Like all major communities in the Salt River Valley, steady growth by the end of the historic period (1968) permanently altered the rural landscape around Tempe into a modern, urban landscape with commercial businesses, residential suburbs, and well-developed arterial streets.

3.2 CHARACTER OF THE EXISTING SETTING

The urban setting of the APE along the proposed Build Alternative is a predominantly commercial landscape that is flanked by residential subdivisions. In addition, the expanded ASU campus occurs within the APE along Rio Salado Parkway and Apache Boulevard. A review of aerial photographs indicates that the APE was transformed from a rural to urban landscape from the early twentieth century through the 1960s. Along Apache Boulevard, inventoried properties were constructed after 1940, reflecting a mid-century modern character. A large number of modern buildings are also evident throughout the overall APE, many of which were constructed in the last three decades, replacing earlier structures that had once occupied the parcels.

Through the middle decades of the twentieth century (1927–1960s), Apache Boulevard and Mill Avenue were located on a major transportation corridor from which US Highways 60, 70, 80, and 89 extended through the Salt River Valley. In the postwar period, auto travel along the paved highways of Arizona increased substantially. While Mill Avenue retained its historic commercial character somewhat, Apache Boulevard changed significantly as commercial businesses were established to serve travelers, including motels and auto courts, restaurants, and service stations. Simultaneously,
postwar residential development occurred across the city as Tempe was transformed into a municipality. Intermixed with the commercial tourist businesses on Apache Boulevard were grocery stores that catered to the expanding neighborhoods, as well as strip malls, banks, and restaurants. Finally, the expansion of ASU after 1940 (ASU secured university status in 1958) included land parcels along the current APE’s north and south boundaries on Rio Salado Parkway and Apache Boulevard.

In this period of urban expansion, Apache Boulevard functioned not only as a major highway corridor, but also a municipal arterial street. Sidewalks and curbs were constructed for more effective pedestrian use, and medians were constructed in the roadway with ornamental landscaping and streetlights. Today, Apache Boulevard is a four lane arterial corridor, and no longer claims shared use with the major US highways that historically passed through Tempe. This postwar transformation of the landscape is not unique to Tempe along the Salt River. Indeed, the Salt River Valley can be considered an extensive metropolis with several million residents.

3.3 HISTORIC OVERVIEW

The settlement and growth of the Salt River Valley in the late nineteenth and early twentieth centuries was largely a result of an agricultural economy dependent on a sustainable irrigation system. The federal government established the National Homestead Act in 1862 to encourage settlement of public lands in U.S. territories, including the arid lands of Arizona. Initially, homesteaders were granted land parcels of 80 or 160 acres at no cost, so long as the homestead was settled for a period of five years, with at least four years of cultivation occurring on a segment of the claim. Alternatively, the patentee could commute his claim by purchasing the claim outright, thereby bypassing residency requirements; such purchases were known by the term “Cash-Entry (CE).”

Through the late nineteenth century, aided by the cadastral survey and homesteading of the Salt River Valley, intensive agricultural development and construction of independent canal systems occurred along the major drainages of Arizona—particularly in the Salt River Valley, where the communities of Phoenix, Tempe, and Mesa were established along the Salt River. Canals constructed north and south of the Salt River would eventually consolidate in the twentieth century under the Salt River Valley Water Users Association (SRVWUA), the predecessor of today's Salt River Project (SRP). Within a generation after its founding, Phoenix and other communities in the Salt River Valley emerged as the central hub of commercial activity in Arizona, with access to regional and national markets of commerce and industry.

3.3.1 Settlement and Development of Tempe: 1873–1968

Tempe began not as a town, but as a series of separate settlements on the south side of the Salt River. Through the late 1860s and 1870s, Mexican-American and
Euroamerican homesteaders established farms on the south side of the Salt River and constructed the Tempe Canal to deliver water to agricultural fields. Charles T. Hayden, a Tucson merchant and freighter, chose to move his business operation to the more centrally located site in the Salt River Valley. His homestead and thriving commercial establishment along the west slope of Tempe Butte were established in 1873, and collectively was soon known as Hayden’s Ferry. By 1878, the growing settlement of Hayden’s Ferry comprised one quarter of the Valley’s population; aside from the thriving business enterprise of Charles Hayden along Tempe Butte, Hayden’s Ferry also included a school house, a post office, a Justice of the Peace, two stores, and one rum shop (Arizona Enterprise 1878). Hispanic settlers, who had migrated from southern Arizona and northern Mexico to work as laborers and till the fields, established two separate residential communities known as San Pablo and Sotelo Ranch around the butte. Each settlement had its own distinct character and purpose; despite the differences between these scattered clusters of people, they were all unified under a single canal system. By 1879 there was an emerging consensus that they all comprised a single community known as Tempe; on May 5, 1879, the post office was renamed Tempe (Hayden 1972:36; Solliday 1993:56; Solliday and Vargas 2008).

3.3.1.1 Early Settlement of Tempe: 1880–1900

In 1880, Tempe was a widely dispersed agricultural community, essentially an irrigation district, that covered the south half of Township 1 North, Range 4 East, from the river to the baseline (now Baseline Road). The population comprised 135 people, of which 85 percent were Hispanic. About half of the people were farmers living on 160-acre homesteads spread across 12,000 acres of irrigated farmland under the Tempe Canal system. They grew wheat, barley, alfalfa, and some experimental plantings of deciduous fruit and grapes, most of which would fail from the seasonal heat. There were three distinct population centers in this area—Hayden’s Ferry, San Pablo, and the Sotelo Ranch—that were quickly growing with the arrival of a few families, but mostly single men coming to work. The residents of Hayden’s Ferry were primarily the employees of Charles T. Hayden, functioning as freighters, carpenters, blacksmiths, millers, and general laborers. By 1883, Tempe had four stores and several saloons and restaurants, and was truly a bustling town along one of the main roads in the territory (Goodson 1971; Janus Associates 1983; Salt River Herald 1878; Simkins 1989:43–45; Solliday 1993:37–38, 51–59; Solliday and Vargas 2008; Tempe Irrigating Canal Company 1870–1879; Tempe News 1889; U.S. Census Bureau 1880).

In the late 1870s, several parties of Mormon farmers from Utah visited and eventually settled in the Salt River Valley. The townsite of Lehi was established on the south bank of the river upstream from Tempe in 1877, and in 1878, a larger group of Mormon families settled on higher ground that became the town of Mesa (McClingtlock 1985:197–206). Charles T. Hayden maintained a close relationship with this new neighboring community; he extended credit, provided supplies, and bought their surplus grain. In 1882, Benjamin Franklin Johnson and Joseph E. Johnson purchased 80 acres from
Hayden and started a Mormon colony in Tempe. The land was located south of Hayden’s Ferry and west of San Pablo, between what is now 5th Street and University Drive. B. F. Johnson, who arrived with as many as seven wives and 42 children, was joined by the Openshaw, Wilson, LeBaron, and Babbitt families. The arrival of about 300 newcomers nearly doubled the local population. They built homes and a cooperative store, planted 100,000 trees, vines, and shrubs, and imported bees from California. Within a year, they created a well-established community that became known as West Tempe (Clayton 1974:365-366; Idso and Idso 1980:3–5; McClintock 1985:219; Simkins 1989:45–47, 64; Solliday and Vargas 2008).

Charles T. Hayden, a widely known and respected pioneer businessman of the Arizona Territory, had always sought to promote the growth and improvement of Tempe, but in the 1880s, it was his most trusted employee, John S. Armstrong, who was most effective at bringing important changes to the town. Armstrong originally came to Arizona in 1879 to teach at the Indian School at Sacaton. Hayden hired him to manage his store, and Armstrong soon took an active role in operating the mill and his other business ventures. Armstrong was well educated and highly respected in the community. Hayden encouraged him to become involved in territorial politics, and in 1884, Armstrong was elected to the territorial House of Representatives. As a legislator, he proved to be very influential, effectively representing the interests of the people of Tempe, which tended to also reflect those of his employer. Armstrong worked on an important bill to subsidize construction of a 30-mile rail line to connect Phoenix to the Southern Pacific Railroad via Tempe. Perhaps his most important legislative accomplishment was the selection of Tempe as the site for the Territorial Normal School. Hayden was particularly supportive of this effort, telling Tempe residents that the presence of a teacher training school would bring more families to the town. Several local farmers and businessmen joined Hayden in donating funds to purchase a five-acre site, and Armstrong secured a $6,000 appropriation for construction of the four-room school building. The Territorial Normal School opened on February 8, 1886, and its principal, Hiram B. Farmer, began teaching the first class of future teachers. As Hayden had predicted, the educational institution would play an integral role in the development of Tempe, growing along with the town and eventually becoming Arizona State University (Goff 1996:45; Hopkins and Thomas 1960:45–52, 80-82; Lamb 1981; Solliday and Vargas 2008; Wright 1901).

After several failed efforts to build a railroad from the Southern Pacific Railroad mainline to Phoenix, a new Maricopa and Phoenix (M&P) Railroad, incorporated in 1886, finally succeeded in crossing the Gila River and laying tracks to the north. The railroad reached Tempe by June 19, 1887. The first bridge across the Salt River was built at Tempe, and the first train arrived in Phoenix on July 4, 1887. With the completion of the M&P Railroad and the inauguration of freight and passenger service, Tempe was connected to the growing commercial center of Phoenix, and to the modern world far beyond the boundaries of the Arizona Territory (Myrick 1980).
The investors in the M&P Railroad, in the classic railroad tradition, sought to control development of townsites at strategic points along the route of their line. On July 16, 1887, just two weeks after the last tracks were laid, Francis Cutting and Lewis W. Blinn, principal stockholders in the M&P Railroad, joined with E. B. Gage, C. W. Leach, and Charles A. Hooper and incorporated the Tempe Land and Improvement Company (TLIC) to capitalize on the expected growth of the town (Myrick 1980:501; Phoenix Herald 1887; Simkins 1989:64). Land companies such as the TLIC were typically formed in association with a railroad, buying land, laying out a townsite, subdividing the land into lots, marketing the boom town’s glorious attributes in major cities back east and in western cities (e.g., San Francisco, Los Angeles), building commercial and financial institutions, and selling the newly subdivided lots to settlers for a handsome profit. Land prices during such boom years could rise exponentially over short periods of time and speculators counted on this price increase for their generous profits. There was a significant amount of money to be made in this arena as the railroads further connected towns and cities across the West (Solliday and Vargas 2008).

**Commercial Development in the Tempe Townsite**

On April 2, 1887, just as the M&P Railroad was approaching Tempe, an announcement in the *Arizona Citizen* stated that “[a] large land sale at Tempe by Mr. C. T. Hayden, is about to be consummated. The purchasers will subdivide the property, build hotels, etc., and make it a lively and flourishing resort” (*Arizona Citizen* 1887:2). Shortly thereafter, the TLIC acquired a total of 705 acres of land, of which 305 acres were purchased from Charles T. Hayden, which included the southern portion of his landholdings and the Tempe Butte, but not the mill, store, or house property.

Twelve days later, the *Phoenix Herald* (1887:1) published more details on the agreement that Lewis W. Blinn had reached with Hayden and others:

[Blinn] has purchased from C. T. Hayden 305 acres and from the Mormon colony an adjoining 80 acres, exclusive of a few reservations amounting to 20 acres or thereabouts. Mr. Hayden reserved his mill and his homestead upon the banks of the river. Mr. Blinn has also bought the Benton place of 160 acres and from Mr. Larsen 160 acres more, both two miles south of town. This gives Mr. Blinn and his associates a holding of about 700 acres in the very heart of this valley and at a spot where nature has said there should be a large and prosperous city.

The work of surveying and mapping the townsite and suburban divisions of this magnificent property will be begun at an early day and by the time the railroad reaches there they will be ready to make sales to those desiring business or residence property. Just what they proposed to do the reporter for the Herald was unable to find out as Mr. Blinn is not a talker, but on the contrary, a worker. It has been rumored that the not remote contingency is an elegant hotel on Tempe Butte, with a fine graded road winding its way to the top. It is also rumored that a large reservoir will be built upon its summit and steam pumps erected to pump the water from the river into this receptacle from which will run a
main to the townsite and thence run distributing pipes throughout the town. Of one thing we are assured, there will be no more impediments thrown in the way of the advancement of Tempe along the royal road of progress to prosperity and greatness.

Development of the townsite proceeded quickly once the TLIC took ownership of the properties. The land was surveyed and subdivided into a grid of city blocks with residential and business lots. The initial real estate promoter for the TLIC was the firm of A. R. Jenkins and Company, but soon Schultz & Franklin were hired to begin a national sales campaign (Tempe News 1888a). They produced pamphlets, advertisements, and an impressive full-color bird’s-eye view map of Tempe by Czar J. Dyer. The Dyer Map (Figure 3) paints an almost Elysian picture of the town with flowery language describing all its advertised attributes (Dyer 1888):

1st  We have a supply of water equal in volume to the entire supply of the three Southern counties of California.
2nd  We have a larger and more productive body of land susceptible of irrigation than can be found elsewhere.
3rd  We are from two to three weeks earlier with our fruits than California’s most favored spots.
4th  We are from one to two days nearer the Eastern markets.
5th  Our lands are yet low enough to give the husbandman an opportunity to purchase at reasonable figures, viz: unimproved land from $4 and improved land from $25 per acre upwards according to location.

To the poor and the rich, the high and the low, the well and the sick, to all, except the “born tired,” we say come! Come to “Sun-Kissed” Valley of bright days and beautiful nights, of flowers and fruits. Its climate is superb, its surrounding picturesque, its lands cheap and fertile, and homes with comforts and luxuries of life can be made quickly.

Schultz & Franklin had 10,000 copies of Dyer’s color lithograph map printed (Tempe News 1888b), and the sales campaign was very successful in bringing new residents to Tempe. Within five years, Mill Avenue was a bustling business district, and new residential construction was extending to the south (Lamb 1981; Phoenix Herald 1887; 1888, 1888b; Tempe News 1888c, 1889, 1892a, 1892b, 1892c, 1893a, 1893b, 1893c, 1893d). By 1890, Hayden’s flour mill was still the primary manufacturing industry, but now its main markets lay in the southeastern parts of the territory. The town became a major shipping point in the Southwest with regular outbound shipments of cattle, grain, hay, fruit, and honey. Tempe and Phoenix both were growing quickly and enjoying fairly equal prosperity.
FIGURE 3: PORTION OF THE PANORAMIC MAP OF TEMPE, MARICOPA COUNTY, ARIZONA, LOOKING NORTHEAST (DYER 1888)
However, Tempe did not keep pace with Phoenix for long. By the mid 1890s, Tempe's booming economy slowed. An 1897 article in the *Tempe News* stated that "… the town has been at a standstill for a long time and needlessly so, for where can anyone find a town with more natural advantages than are possessed by Tempe?" (*Tempe News* 1897). Despite the many problems that besieged Tempe in the 1890s, not all was bleak. On November 26, 1894, Tempe was incorporated as the Town of Tempe.

The new town council immediately began municipal improvements in 1895, starting with surveying and graveling the streets to improve drainage. James C. Goodwin and his brothers ran Tempe's first public transportation system using mule-drawn street cars with tracks running along Mill Avenue and 8th Street (University Drive), past the Normal School to the canal. James and Robert Goodwin also constructed the Kyrene Irrigation Ditch, and in 1894, they incorporated the Phoenix, Tempe, and Mesa Railway. After many delays, trains began running on the new railway on December 9, 1895. That same day, the Phoenix, Tempe, and Mesa Railway was consolidated with the M&P Railroad to form the Maricopa & Phoenix and Salt River Valley Railroad Company (Myrick 1980:519; Solliday and Vargas 2008).

### 3.3.1.2 Tempe in the New Century: 1900–1945

After 1900, the local and national economies were again expanding and new construction began to be seen across Tempe. M. H. Meyer and James W. Woolf were the leading home builders in Tempe in the early 1900s, using locally produced rusticated concrete block. Niels Stolberg was building wood-framed houses, one after another, and many home buyers were waiting to move into new houses (Janus Associates 1983). The Pacific Creamery, a large dairy processing and shipping plant, opened just east of town on the Tempe-Mesa Road (East 8th Street). The Southside Power and Electric Company obtained a franchise to provide the first electric power for the town, and limited telephone service was instituted (Lamb 1981). In 1901, Tempe voters authorized the sale of municipal bonds to build a domestic water system, which included a well and pump on East 7th Street, a 250,000-gallon concrete reservoir on top of Tempe Butte, and a network of iron pipes to deliver the water to every house in Tempe (Pry 2003:16–17, 21).

By 1909, George Gage was in poor health and decided to retire. He subdivided the last undeveloped portion of the company's original holdings, an 80-acre pasture in the northwest quarter of Section 22, and platted the Gage Addition, stretching south from 8th Street (Ryden Architects 1997a). He then moved to Los Angeles, where he passed away on May 15, 1913 (*Tempe News* 1913). In 1912, when the TLIC filed for renewal of its corporate charter, the remaining owners of the company included L. W. Blinn, C. A. Hooper, and Peter Corpstein, who represented more than 49,000 of 50,000 shares. In addition to the three original partners, other directors included Ben Goodrich and C. G. Lynch (*Tempe News* 1912).
Roosevelt Dam, one of the first federal reclamation projects in the West, was completed in 1911. A year later, on February 14, 1912, Arizona joined the union as the 48th state. There was great optimism throughout the Valley as these two events seemed to remove the last obstacles to central Arizona's rapid development. Visible signs of progress in Tempe included the installation of electric street lights and construction of a grand city hall on 5th Street. In 1915, town marshal M. C. Browning was given the new title of city manager and an annual budget of $1,420 (Ketelaar 1990) (Figure 4).

**Tempe’s Growth in the Cotton Era**

The completion of Roosevelt Dam in 1911 ensured a dependable supply of water for the Salt River Valley. This accomplishment was soon followed by the introduction of Arizona’s first lucrative cash crop—Egyptian cotton. The U.S. Department of Agriculture (USDA) had been experimenting with this unique plant, which had never been grown successfully outside of Egypt. A hybrid was developed that grew well in the Arizona desert, where growing conditions were similar to those in North Africa (Fairchild 1944:142, 207; McGowen 1961:35–36). This particular “long-staple” variety produced long industrial grade fiber that would bring high prices for Arizona farmers. In 1912, USDA agent E. W. Hudson began distributing seeds to farmers in Mesa, Tempe, and Chandler. Thirty-two farmers planted a total of 303 acres in cotton in the first year, and the winter harvest produced a bumper crop of high-quality lint. The acreage planted in cotton increased nearly tenfold in 1913, and the Arizona cotton industry was firmly established (Solliday 2000; Solliday and Vargas 2008; Stevens 1955:33–34). Central Arizona quickly became one of the leading cotton-producing regions in the nation.

One requirement for the new cotton industry was the immediate construction of cotton gins. Using modern high-speed equipment, a gin mechanically separated seeds from the lint and turned the crop into a marketable product. The lint was pressed into 500-pound bales and shipped to eastern mills where it was spun into thread and yarn for fabrics or manufactured goods. By 1913, gins were in operation in Chandler and Mesa. The Tempe Cotton Exchange (TCE) was formed in 1914. This cooperative of Tempe and Scottsdale growers built a 10-stand gin and bale compressor at 7th Street and Ash Avenue. The complex included a warehouse, a seed storage house, and a railroad siding (Stevens 1955:34; Tempe News 1914). More than a million pounds of raw cotton was processed in the first year, and by the final run of the season, 1,400 bales had been pressed at Tempe (Tempe News 1915).
FIGURE 4: PORTION OF THE 1915 MESA 15' TOPOGRAPHIC QUADRANGLE, SHOWING THE BOUNDARY OF TEMPE.
In 1917, there were 33,000 acres planted in Pima cotton. As the price paid for long-staple cotton increased each year, the acreage continued to grow. In 1919, Pima cotton sold for more than a dollar per pound. By 1920, cotton acreage had increased to 230,000 acres, or three-quarters of all irrigated farmlands in the Salt River Valley (McGowen 1961:36; Stevens 1955:47–48). The sudden interest in Arizona-grown cotton brought new crop-related businesses into Tempe. E. A. Shaw & Company, a Boston brokerage firm, opened an office in Tempe in 1916 to buy cotton directly from the farmers and ship it to eastern mills (Arizona Directory Company 1916, 1917, 1918, 1920, 1930; Tempe News 1917). In the following year, B. B. McCall and E. G. Attaway built a second gin in Tempe on East 4th Street. In 1918, the Arizona Cotton Growers Association opened an office on Mill Avenue, and Tempe became the first destination for field workers who were recruited in Mexico and brought to Tempe by train, and then taken to a camp between 1st Street and the Salt River, where they stayed until they were sent to individual farms (Peterson 1975:17–22).

In just a few years, the new cotton industry had brought prosperity to central Arizona, but reliance on a single crop eventually proved to be disastrous. In the spring of 1920, Pima cotton was selling for more than a dollar per pound, but by the time of the winter harvest, the market collapsed and prices fell to less than thirty cents a pound (Peterson 1975:53, 56, 74, 81; Stevens 1955:47–49). The Cotton Crash of 1920 brought the most severe economic depression experienced in central Arizona, leading to foreclosures and bankruptcies throughout the Valley. Within a few months, the young Arizona cotton industry was nearly destroyed (McGowen 1961:36; Soliday 2000; Soliday and Vargas 2008; Stevens 1955:47–49). Arizona had ideal growing conditions for cotton, and the industry eventually recovered after many unprofitable years, but farmers decided to grow a wider variety of crops, including the more common "upland" short-staple cotton. In 1924, the TCE built a new gin for short staple cotton on the south side of 8th Street (University Drive) (Tempe Daily News 1924).

**Economic Depression in Tempe and the Salt River Valley**

The building boom of the early 1900s came to an abrupt halt after the Cotton Crash of 1920. Agricultural prices remained low throughout the 1920s, and then the Great Depression brought continued economic hardships into the 1930s. Only four new subdivisions were platted in those two decades, and construction of homes and businesses slowed to just a few per year. For a brief period, more people left Tempe than arrived (Lamb 1981). The Great Depression was actually a period of recovery for Tempe, which was not as affected by the economic downturn as industrial cities. Due in part to a more diverse agricultural base, local farmers were exporting such crops as citrus fruit, cantaloupes, and lettuce, in addition to cotton.

Federal recovery programs, notably the Public Works Administration (PWA) and WPA, provided local construction jobs for work on improvements in streets and highways, drainage, parks, and other city infrastructure. Perhaps the greatest effect these programs had on Tempe was the construction of several new buildings on the campus.
of the teacher training school which in 1929 had been renamed Arizona State Teachers College. The college received nearly $2 million in federal grants and loans through the 1930s, which financed the construction of West Hall, Krause Dining Hall, Lyceum Theater, Moeur Activity Building, Irish Hall, and Dixie Gammage Hall (Ryden Architects 1997a). However, residential development was mostly limited to small apartment buildings. Few single-family homes were built during the Depression due to a lack of funds and credit. The Federal Housing Administration (FHA) was created in 1934 to insure home mortgages, and in the process, stabilize the construction industry, but these loans were not available in Tempe until the end of World War II (WWII) (Solliday 2001a:17; Solilday and Vargas 2008).

The Tempe City Council approved its first zoning ordinance, Ordinance No. 177, on April 14, 1938. City planning and zoning was a relatively new idea, having just begun in New York and other cities in the 1920s. The stated purpose of Tempe’s ordinance was to avoid overcrowding and facilitate the adequate provision of transportation, sewers, schools, and parks. It established building zones with restrictions on types of property uses within certain areas. The primary business district was located along Mill Avenue, from 3rd Street to 8th Street. Other zones were created for a mixed business and apartment house district, and areas for auto courts, tourist camps, and trailer courts. Areas reserved for residential development extended to the southern boundary of town at 13th Street. Industrial businesses were limited to both sides of the railroad tracks between 3rd and 8th Streets, and on the west and east sides of Tempe Butte. These new restrictions were not considered onerous, mostly because they reflected the existing development and property uses in Tempe at that point (Ryden Architects 1997a). By 1940 the incorporated area of Tempe encompassed 1.9 square miles of land (Solliday 2001b; Solliday and Vargas 2008) (Figure 5).

Shortly after construction of Williams Field in 1941 for the Army Air Corps Advanced Flying School, the United States entered WWII. Located just a few miles east of Chandler, this field became an important training facility for combat pilots. Through the course of the war, additional military installations, as well as manufacturing plants were constructed around the Salt River Valley. Tempe and other municipalities benefited from the influx of soldiers and workers, as well as goods and supplies. Farmers also benefited from the Valley wartime economy. Cotton was in great demand by the military, and grapefruit and lettuce also became important crops. Tempe became a regional shipping center for large commercial citrus groves in the Kyrene District, just south of town (Solliday 2001b). The City’s population was growing quickly, but wartime restrictions on lumber, copper wire, and other building materials soon brought all new construction to a halt. Tempe now faced a severe housing crisis, which worsened as the war started drawing to a close in early 1945 and the first wave of veterans was returning home.
3.3.1.3 Postwar Growth in Tempe: 1945–1968

By early 1945, when building restrictions were lifted, three new subdivisions were platted south of 13th Street, and four others were established just east of town, along US 80 (Apache Boulevard). At the end of the year, more than 40 new homes had been completed. More new subdivisions were constructed in and around Tempe each year, and the City Council regularly approved annexations to incorporate the new neighborhoods (Solliday 2001a:15–23). Much of the city’s growth was due to the transformation of the teachers college into a four-year liberal arts college. The school officially became Arizona State College at Tempe on March 9, 1945. New or expanded programs in science, business, agriculture and industrial arts, and liberal arts appealed to returning veterans who were eligible for an educational allowance to go to college under the G.I. Bill of Rights. Immediately after the war, enrollment at Arizona State College soared. In the fall of 1945, there were 553 registered students, but a year later, the college had grown to about 2,200 students, and attendance doubled every semester (Hopkins and Thomas 1960:245–248, 263–265, 274–277).

By the early 1950s, residential development had spread as far south as Broadway Road, and to the north side of the Salt River (Figure 6). With this rapid expansion, the City had to construct new water works and a sewage treatment plant, residential irrigation systems, and paved roads. As homes spread in every direction, retail businesses also started moving away from downtown Tempe and closer to the new neighborhoods. Tempe's first two shopping centers—the A. J. Bayless Supermarket Center on East Apache Boulevard and the $1 million Tempe Center at Mill Avenue and 8th Street—opened in 1956 (Solliday and Vargas 2008).

The runaway growth of the City also brought the loss of much farmland. Farms and dairies ceased operation as lands were sold to builders and realtors. With fewer farmers in the area, the cotton gins and creamery closed. At the same time, Tempe emerged as a major shipping center for citrus fruit. Several new packing sheds and juicing plants built along the Southern Pacific Railroad tracks received fruit from orchards far to the south in the Kyrene District and at South Mountain. While farming did not disappear entirely from the Tempe area, the sustained growth of the City relied on the introduction of new nonagricultural industries (Figure 7). Penn-Mor Manufacturing Company (garments), Capitol Foundry Company (steel products), Superlite Block, and Solid State Electronic Controls opened plants in the late 1950s and became the largest employers in Tempe (Solliday 2001a: 27, 43–45, 49, 53–57; Solliday and Vargas 2008).
FIGURE 5: 1939 MAP OF TEMPE, SHOWING THE BOUNDARY OF THE CITY LIMITS. AS SHOWN, 13TH STREET FORMED THE SOUTHERN BOUNDARY.
In the post-WWII period, Tempe’s population rose from less than 5,000 at the end of the war to 24,897 in 1960, representing a 400 percent increase in just 15 years. During this time, more than 3,200 acres of new residential subdivisions were developed, extending neighborhoods as far south as Southern Avenue and to the City’s present boundaries with Scottsdale, Mesa, and Phoenix. The city’s current boundaries were achieved by 1974. This post-WW II pattern of growth led to the rapid replacement of most of the local farms by modern urban buildings and facilities. Today, manufacturing is the principal industry. As of 2012, 166,842 people reside in Tempe, which encompasses an area of 40.1 square miles (City-Data.com 2013).

FIGURE 6: PORTION OF THE 1952 MESA 15’ TOPOGRAPHIC QUADRANGLE SHOWING THE CONTINUING GROWTH OF TEMPE AFTER WORLD WAR II.
FIGURE 7: PORTION OF A 1964 ADOT AERIAL PHOTOGRAPH SHOWING THE URBAN DEVELOPMENT OF TEMPE NEAR THE CLOSE OF THE HISTORIC PERIOD. AS SHOWN, THE BULK OF FARMLANDS WITHIN AND AROUND TEMPE HAD BEEN DEVELOPED BY THIS TIME. Note that Rio Salado Parkway was not yet constructed along the north edge of Tempe Butte.
4.0 ELIGIBILITY OF HISTORIC RESOURCES

4.1 AGE CRITERION FOR ELIGIBILITY

As previously noted, to be eligible for listing in the National Register, a property generally must be at least 50 years old unless it meets Criteria Exception G for properties that have achieved significance within the past 50 years. Historic age is determined as 50 years prior to the date of completion of the undertaking (i.e., construction). The anticipated date of completion for the current project is 2018, which would make 1968 the historic age cutoff. Many of the commercial properties within the overall APE were constructed from the late nineteenth century through the late historic period (ca. 1870s–1968). In recent decades, a number of historic buildings within the APE have been razed, with new development occurring on the parcels.

Such is the case with the commercial landscape along Apache Boulevard. While nearby residential neighborhoods, such as the Gage Addition, Park Tract, and University Park (all located within the APE) have retained their integrity, a large number of historic buildings along Apache Boulevard have been demolished to accommodate new businesses, as well as the recent, expansive development of the ASU campus. Consequently, only a relative few mid-century modern commercial buildings now occur within the APE along Apache Boulevard. Rio Salado Parkway was developed over a period of time from the late 1970s. Consequently, no historic properties actually occur along its alignment; indeed, only three historic properties occur near the arterial street, including Hayden House (Property 1.7), Hayden Flour Mill (Property 1.8), and Sun Devil Stadium (ACS-9).

4.2 AREAS OF SIGNIFICANCE

Historic properties within the APE are part of the extended commercial corridor along Mill Avenue and Apache Boulevard that reflect Tempe’s Community Planning and Development from the late nineteenth century through the late historic period (ca. 1870s–1968). The following areas of significance apply to documented properties within the APE, and were used to evaluate these properties for significance under Criterion A (Event/History):

- Commercial Development along US 80 (Mill Avenue, Apache Boulevard) (ca. 1870s–1968)
- Post-WWII Residential Development along Mill Avenue and Apache Boulevard (1945–1968)
- Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959)
In addition, properties were also evaluated for distinctive characteristics of design and construction (Criterion C). What follows is a discussion of these areas of significance, as well as a discussion on distinctive architectural types identified in the survey. As previously stated, Ryden Architects, Inc. conducted a historic building inventory and effects analysis in 2012 for an alternate Tempe Streetcar alignment, a portion of which falls within the current Build Alternative APE (Ryden Architects, Inc. 2012). Areas of significance previously discussed in the 2012 assessment are provided in this report verbatim from the previous study, indicated by indented paragraphs.

4.2.1 Community Planning and Development

Historic properties within the APE are part of the extended commercial corridor that developed historically along US 80. Since 1912, this important alignment, which was also shared by US Highways 60, 70, and 89, crossed the Salt River in Tempe, as it continued through Phoenix and the Salt River Valley, and into California via another major river crossing in Yuma. After 1935, US 80 was realigned as it extended through Tempe; rather than following 8th Street to Mill Avenue, the Apache Trail was extended westward to terminate at Mill Avenue at what became 13th Street. Commercial buildings constructed along Apache Boulevard (originally designated 13th Street) reflect Tempe’s postwar community planning development. The converging highways through Mesa and Tempe were well traveled in the postwar period as the economy soared across the country and in the Salt River Valley. Simultaneously, residential development expanded significantly in Tempe and other incorporated cities in the Valley. Cultivated agricultural fields gave way within a short time to a modern suburban landscape. Tempe’s commercial based corridor along Apache Boulevard and Mill Avenue fully matured in this time period as Tempe’s corporate boundaries also increased.

4.2.1.1 Development of the Tempe-Mesa Road (Bankhead Highway/US 80)

The Tempe Streetcar project originates on Rio Salado Parkway along Tempe Town Lake, and continues south on Mill Avenue, thence following the existing curve onto Apache Boulevard. Since the late nineteenth century, Mill Avenue has been an important juncture of major transportation routes crossing the Salt River. It was not until after WWII, with the development of the street grid and interstate highways, that there were alternative routes that bypassed downtown Tempe. More recently, Tempe Crossing on the Salt River has reemerged as an important corridor in the modern regional transportation system. Since the 1990s, the construction of the Red Mountain Freeway, the Second Mill Avenue (northbound) Bridge, and the Valley Metro Light Rail Bridge have once again made this unique location an important link connecting Phoenix to the East Valley and beyond.
The Tempe-Mesa Road: 1879–1919

Prior to 1919, the Bankhead Highway alignment through Tempe was known as the Tempe-Mesa Road. The road was first conceived in 1879 after county expenditures were set aside for construction of two roads near Tempe. The road originated near current Priest Drive on the northwest corner of Section 21, continuing along the 8th Street alignment to the Hayden Ditch, thence running northerly along the Salt River to Lehi and Mesa. This original Tempe-Mesa Road was replaced in 1892 when a new alignment was constructed across Tempe Canal near current Alma School Road in Section 17, extending east to connect with Main Street in Mesa (Solliday et al. 2008).

Until the first decade of the twentieth century, however, access to the north side of the Salt River and Phoenix was possible only by the M&P Railroad Bridge at Tempe Crossing. Ferry service was still available to wagons, or if viable, the river could be crossed in good weather. Despite attempts by local leaders to construct a wagon bridge parallel to the M&P Railroad Bridge, no action was taken. The impetus for building improved roads and bridges in central Arizona in the first decades of the twentieth century came largely as a result of national trends and the introduction of the automobile. After construction of the Central Avenue Bridge over the Salt River between 1909 and 1911, the office of the Territorial Engineer was established to construct a system of roads and bridges throughout the territory. Over the next three years when Arizona became a state, and the office was recreated as the State Engineer, five additional bridges across the state had been completed, and construction of a new bridge over the Salt River at Tempe was in progress; this bridge, known as the Tempe Bridge, or Ash Avenue Bridge, was completed in 1913. The Tempe-Mesa Road was now connected directly to the Phoenix-Tempe Road, which would later become an extension of Van Buren Street (Solliday et al. 2008).

The Bankhead Highway and the Establishment of the Federal Highway System

When Arizona became a state in February 1912, the role of the State Engineer in improving transportation across the state was not immediately clear. The counties were still responsible for nearly all road construction and maintenance. A tentative highway system was drawn in 1912 by the State Engineer that included two statewide highways—an east-west alignment between Yuma and Clifton and a north-south alignment from Douglas to the Grand Canyon (Arizona State Engineer 1914); transportation routes were proposed to connect all county seats in Arizona. By mid-1912, Girand, the first Arizona State Engineer, reported that 86.5 miles of graded state roads had been constructed during the fiscal year just ended; additionally, surveys continued for different routes that would eventually be tied together into the north-south state highway connecting Douglas, Bisbee, Tucson, Florence, Mesa, Tempe, Phoenix, Prescott, and Flagstaff (Arizona Board of Control 1912:7–8, 1913:7; Arizona State University 1968:2).

State and county road-building activity was largely focused on connecting cities and towns in Arizona, but in Chicago and other distant cities, national touring clubs and
automobile associations were considering how Arizona fit into their plans to promote transcontinental highways. The American Automobile Association, formed in 1902, was one of the first organizations to propose cross-country routes. In 1910, the Touring Club of America started exploring and promoting many well-known routes, including the Ocean-to-Ocean Highway. A few years later, the National Old Trails Road Ocean-to-Ocean Highway Association focused on identifying the famous historic trails that had fostered westward expansion and settlement into every part of the country. All of these organizations followed the same basic approach: they explored the country, designated routes which incorporated the best available state, county, and local roads, and published maps and guidebooks to encourage Americans to take to the roads and see their country (Kaszynski 2000:35–42). One of the most famous of these early routes, the Ocean-to-Ocean Highway, stretched from Savannah to San Diego. As it went through Arizona, it followed much of the State Engineer’s meandering chain of roads, passing through Bisbee, Tucson, Florence, Mesa, Tempe, and Phoenix before continuing on to California (Arizona Good Roads Association 1987:42, 45; Hi-way Travel Services ca.1935). The portion of this highway running through the Salt River Valley extended through Mesa, following an alternative alignment of the Tempe-Mesa Road into Tempe that ran along the future Apache Boulevard alignment to 8th Street, thence northwesterly to the Tempe Bridge (Ash Avenue Bridge). From the north side of the Salt River, the highway continued westward along the Phoenix-Tempe Road (later designated an extension of Van Buren Street) and into Phoenix (Figure 8). Other notable designations of what would later become US 80 through Arizona and the southwest included the Dixie Overland Highway, Old Spanish Trail, Jefferson Davis National Highway, Lee Highway, and finally, the Bankhead Highway, which was designated in 1919 to honor Senator John H. Bankhead of Alabama, the sponsor of the Federal-Aid Road Act of 1916.

Passage of the Federal Highway Acts of 1916 and 1921 was significant in that federal funds were made available for the construction and improvement of state highways in order to develop a continental system of highways previously advocated and funded by the organized road promoters. As with the early state highway system, highways included in the national system did not confer any federal ownership or control; such designation generally meant only that the highway was funded in part with Federal aid and met certain minimum design standards. Highway construction through the 1920s focused on connecting the county seats and principal communities; many new roads were graded and improved, but paving was still reserved for urban communities and economically viable roadways (Arizona Highway Department 1924; Keane and Bruder 2004). Many of these highway projects were constructed and maintained using federal funds provided by Federal Highway Acts; these projects were designated Federal Aid Projects (FAPs).

Because the Phoenix-Mesa Highway was an important segment of a national highway, and the principal east-west highway first proposed by the Arizona Territorial Engineer in 1909, federal funds were allocated for road improvements and maintenance. FAP 30
extended from the Phoenix town limits for approximately 3 miles; FAP 2 referred to the estimated 4 miles between the Tempe Bridge and FAP 30. On the south side of the Salt River, the highway extended from the Tempe Bridge through Tempe and into Mesa as FAP 8. Prior to 1919, the State Engineer had maintained the entire Phoenix-Mesa Highway as a graded 18-foot-wide road, with a caliche and/or decomposed granite surface and earthen shoulders. As-Built maps of the highway through Tempe reveal that the road was paved with concrete in 1919; by 1923, the bulk of the 18-foot-wide alignment between Phoenix and Mesa had been paved with concrete (Arizona Highway Department 1924:102,119). As-Built maps for FAP 8 through Tempe indicate that concrete pipe culverts were installed where necessary. Through the 1920s, as stated above, the Ocean-to-Ocean Highway in the Salt River Valley was also known as the Bankhead Highway.

In 1927, eligible highways across the country were assigned route numbers, which were posted along the roadways on standard signs with the federal highway shield (Arizona State University 1968:2; Cross et al. 1960:220; Kaszynski 2000:59–60). Principal U.S. Federal-Aid Highways through the Salt River Valley included (Arizona State Highway Department 1939:16–20):

- **U.S. 80**, known variously as the Dixie Overland Highway, Ocean-to-Ocean Highway, Old Spanish Trail and the Bankhead National Highway. The highway stretched from Savannah, Georgia, to San Diego; it entered Arizona near Douglas, and extended through Bisbee, Tucson, and the Salt River Valley, from whence it continued through Buckeye, Gila Bend, and Yuma (route established through Tempe in 1927).
- **U.S. 89**, which was the only major north-south highway in the state, began at Nogales and went through Tucson, Florence, the Salt River Valley, Wickenburg, Prescott, Flagstaff, and Fredonia before continuing on to Salt Lake City (route established through Tempe in 1927).
- **U.S. 60**, which ran from Richmond, Virginia, to Los Angeles; it entered Arizona near Springerville, and went through Show Low, Globe, and the Salt River Valley (route established through Tempe, ca. 1933).
- **U.S. 70**, previously known as the Jefferson Davis Highway and the Sunkist Trail, which ran from Raleigh, North Carolina, to Globe, Arizona; it entered the state near Safford, and was later extended to the Salt River Valley and Los Angeles (route established through Tempe, ca. 1933).

The east-west route of future US 80 was conceived along the Phoenix-Mesa Highway; consequently, it was the principal designation of this alignment. US 89, representing the original north-south highway in Arizona, also followed this alignment through the Salt River Valley; US 60 and 70 were later extended through the Salt River Valley along the same alignment. These four US highways converged at Florence Junction, followed the
Apache Trail to Main Street in Mesa, and along the Phoenix-Mesa Highway into Phoenix. The alignments eventually separated again at Five Points, where Grand Avenue began; Routes 60, 70, and 89 went northwest to Wickenburg, and Route 80 continued west to Buckeye, Yuma, and Los Angeles (American Automobile Association 1930; Arizona State Highway Commission 1933; 1942; 1970; Cross et al. 1960:225; Highway Travel Services ca.1935; Kaszynski 2000:35–42, 57; Luckingham 1989:82; Rush 1922; Touring Guide Publishing Company 1926).

Through the late 1920s, automobile traffic increased significantly on US 80 through the Salt River Valley; of particular concern to the newly formed Arizona State Highway Commission was the 18-foot-wide Tempe Bridge that was incapable of accommodating two-way traffic over the Salt River. Consequently, the 36-foot-wide Mill Avenue Bridge was completed in the summer of 1931. Located east of the original Tempe Bridge, traffic from Phoenix now entered Tempe directly onto Mill Avenue, which had also been widened and improved. The new bridge could now accommodate the steady increase of traffic crossing the Salt River on a daily basis (Solliday et al. 2008). Apparently, congested traffic conditions on the original 18-foot-wide Bankhead Highway through Tempe was also a growing concern. The Arizona Highway Department As-Built plans for Project NRH 8A indicate that by 1935, a portion of the original highway had been rerouted to the south. Whereas the original Bankhead Highway had extended along 8th Street from Mill Avenue to McClintock Road, the new route continued south on Mill Avenue to 13th Street (later designated Apache Boulevard) before turning east towards Mesa (Figure 9). In addition, the entire existing alignment along Apache Boulevard was widened to 40 ft into Mesa (48 ft in some locations) (Figure 10). Finally, between 1961 and 1963, US 80 through Tempe was widened to more than 80 ft, with a median added to the centerline (see ADOT As-Built plans for F-022-3[6] and F-022-3[15]). The concrete highway alignment was generally left in place, while two successive layers of bituminous mix and a seal coat were applied over the improved 82-foot-wide highway (Figure 11).

After passage of the 1956 Federal Aid Highway Act, a new interstate system was developed to create a more efficient national transportation network, wherein all designated interstate highways would contain multiple lanes with no traffic intersections, or commercial properties and structures within the right-of-way. Over several decades, traditional US Highways were supplanted, or converted into Interstate highways. Although Interstate 10 through Phoenix was not yet complete, the Yuma to Benson alignment of US 80 was officially eliminated in 1977 as a numbered route; by 1989, the remaining section through Douglas was eliminated (Weingroff 2004). Likewise in 1992, US 60 was relocated to the Superstition Freeway (Tempe Historical Museum 2008: Tempe History FAQ). Currently, Mill Avenue and Apache Boulevard are no longer on the national network of highways.
FIGURE 8: PORTION OF THE 1915 USGS MESA 15’ TOPOGRAPHY MAP HIGHLIGHTING THE ORIGINAL BANKHEAD HIGHWAY (RED HIGHLIGHT) EXTENDING THROUGH TEMPE ALONG 8TH STREET AND MILL AVENUE.

FIGURE 10: PORTION OF A 1955 OBLIQUE AERIAL OF TEMPE, SHOWING DEVELOPMENT ALONG APACHE BOULEVARD (US 60, 70, 80, AND 89) WITHIN THE CURRENT APE. AS SHOWN, APACHE BOULEVARD WAS CHARACTERIZED AS A TWO-LANE PAVED ROAD WITH ORNAMENTAL LANDSCAPING ON EITHER SIDE. (CP MCL 34074, Arizona Collection, Herb and Dorothy McLaughlin Photograph Collection, Arizona State University)
FIGURE 11: PORTION OF A 1963 OBLIQUE AERIAL SHOWING ONGOING DEVELOPMENT ALONG APACHE BOULEVARD AND THE CURVE AT MILL AVENUE. BY THIS TIME, THE MAJOR HIGHWAY HAD BEEN WIDENED TO A FOUR-LANE HIGHWAY WITH SIDEWALKS, AND MEDIANS WITH LIMITED ORNAMENTAL LANDSCAPING.

The palm trees fronting Gammage Center (shown here under construction) were planted in the late 1940s when the college established Victory Village to house returning veterans and their families who were attending college. Also note the landscaping in the “wedge” that would later be designated Birchett Park (UP UPC ASUB A355 1960s #7, Arizona Collection, Arizona State University).
4.2.1.2 Commercial Development along Mill Avenue (ca. 1870s–1968)

Properties within the APE corridor along Mill Avenue were previously documented by Ryden Architects, Inc., and not revisited by ACS in the current study. The following provides a short summary of development along the Mill Avenue corridor. Other previous studies conducted along Mill Avenue also provide concise summaries of commercial development along this important corridor, including Fireman (1976), Janus Associates (1983), Ryden Architects, Inc. (1997a), and Stone and Ayres (1985). From the 2012 Ryden survey (2012:31–32, 34):

Tempe’s Mill Avenue (north of Apache Boulevard) is recognized by the Arizona SHPO as a traditional transportation corridor that has sustained many changes of character through the years both of the right-of-way features and to the adjacent properties. As the landing point for Hayden’s ferry across the Salt River, Mill Avenue began as the primary local commercial street of the original townsite and has retained that function to this day. The Mill Avenue Bridge (National Register-listed) and Hayden Flour Mill (National Register-eligible) are the entrance landmarks to historic Downtown Tempe. The stretch of Mill Avenue within the original townsite (today’s Rio Salado Parkway to University Boulevard) is considered the downtown business district. The buildings here are zero-lot-line storefronts constructed at a pedestrian scale. The function and character of Mill Avenue has changed dramatically since that time.

In 1907, 13th Street (called Apache Boulevard east of Mill Avenue) became part of the Apache Trail, a supply route connecting Tempe and Mesa to the construction site of the Roosevelt Dam in the Salt River Canyon. In 1927, Apache Boulevard and Mill Avenue were designated a component of US Route 60 which, by 1932, connected Los Angeles to Springfield, Missouri. Later, by stitching together other existing highways, US Route 60 extended east to Virginia Beach, thus spanning the United States from ocean to ocean. The commercial opportunities to capture transcontinental traveler dollars brought with it automobile-related businesses that had not been seen before. Motels, gas stations, mechanics, gift shops, and restaurants appeared within the townsite and at its agricultural outskirts along Apache Boulevard to the east of Tempe. The US Route 60 designation was relocated in 1977 to the Superstition Mountain Freeway south of downtown Tempe and to the Interstate 10 west of downtown Tempe. US 60 continues through Phoenix running concurrently with Interstate 10 and a portion of Interstate 17 to Thomas Road where US 60 turns to the northeast on Grand Avenue to Wickenburg. From Wickenburg US 60 turns generally west to an interchange near Quartzsite where the highway rejoins Interstate 10 running to the California border.
At that time, the City was able to treat Mill Avenue as a local shopping and business street once again. The decommissioning of Mill Avenue as a highway allowed streetscape enhancement projects to transform the traditional sidewalks and roadways into a more pedestrian-friendly setting that previously had been shaped by highway design standards. This new image was intended to help downtown merchants compete with the regional shopping centers and malls springing up in suburban neighborhoods during the 1970s and 1980s.

During the 1980s, the surge of urban redevelopment of downtown Tempe, coupled with strict interpretations of building codes, resulted in the demolition rather than the rehabilitation of most of the historic buildings along Mill Avenue. The historic brick buildings were replaced by Post-modern brick replicas of historic buildings. Redevelopment rapidly diminished the architectural integrity of Mill Avenue’s commercial streetscape setting. The Tempe Historic Preservation Commission identifies this urban site and its surviving community cultural resources as the “Downtown Heritage Core.”

**Post-WWII Commercial Subdivision**

Of particular interest in the realm of post-WWII suburban development is the rare example of the commercial subdivision. Similar in concept to the residential subdivisions of the time, the commercial subdivision consisted of individually owned adjacent parcels set amid a commonly managed parking lot. In Tempe at the southwest corner of Mill and Southern Avenues, the Danelle Plaza of 1964 may be the only example of a speculative neighborhood strip center.

The original developer built strips of identical, common-wall storefront spaces for sale to business owners. The strips of storefronts were constructed around the perimeter of the large shopping center property. While a single row of parking spaces was provided curbside at the arterial street frontages, most of the parking was found within the center of the property. Thus, most of the stores were entered from both front and rear. The Mill Avenue frontage provided contiguous parcels for customized buildings. The shopping center was never fully developed. The center and rear strips of buildings have never yet been constructed. This experiment in commercial subdivisions did not catch on in Tempe.
4.2.1.3 Commercial Development along Apache Boulevard: 1935–1968

As summarized above, lands within and adjacent to the APE along Apache Boulevard were essentially undeveloped through the 1930s. Indeed, as shown in Figure 12, prior to this time, there was no 13th Street alignment extending to Mill Avenue. Rather, these lands were under cultivation by notable Tempe farmers and residents, such as Hugh F. and Bessie Hudson, J.T. and J.R. Birchett, and J.C. Robbins. After the realignment of US 80 in 1935, however, these lands were sold and subdivided for residential and commercial development.

As WWII progressed, however, Americans and servicemen migrated to the Salt River Valley on US Highways 60, 70, 80, and 89, all of which converged at Florence Junction, extending along Main Street through Mesa, and in Tempe, along 13th Street and Mill Avenue. As residential subdivisions spread beyond Tempe’s traditional boundaries, so too did commercial development. The 1948/1949 Mesa and Tempe City Directory (Salisbury Publishing Co. 1948) lists addresses on 13th Street between Mill Avenue and Rural Road. East of Rural, the alignment was known simply as Apache Trail, or Tempe-Mesa Highway. Nonetheless, addresses are listed for businesses and houses located along the major highway between Mill Avenue and current Price Road. A review of the 1948/1949 city directory indicates that an estimated 25 hotels or motels were situated along this alignment, as well as 10 trailer parks, five service stations, six restaurants, and two markets. Among the commercial businesses listed along what would become Apache Boulevard was Vogel Hatchery (ACS-2).

Commercial development increased through the decade of the 1950s, as did the expansion of the ASU campus (designated a university in 1958). The 1960 Mesa and Tempe City Directory (Mullin-Kille Company 1960) indicates as much, with an increase of tourist facilities, including the Wigwam Lodge & Travel Court (located at 634 E. Apache Boulevard, near McAllister Avenue). Apartments were also present along this portion of the highway, including Arn’s Circle A (ACS-2), which apparently converted the previous hatchery building into a residential facility. As previously noted in Chapter 3 of this report, Tempe’s first two shopping centers—the A. J. Bayless Supermarket Center on East Apache Boulevard and Tempe Center at Mill Avenue and 8th Street—opened in 1956.

Through the course of the 1950s and 1960s, commercial businesses filled vacant parcels along Apache Boulevard, and within the APE. As shown in Figure 13, Tempe’s commercial corridor had spread far to the south and east of the original townsite, reflecting the importance of Mill Avenue and Apache Boulevard as part of a US Highway, and as major arterial streets for its residents. Tourism by this time had become one of the principal industries in Mesa and Tempe, as indicated in city directories through the early 1970s. Restaurants and service stations were also common fixtures along Apache Boulevard, including Henry’s Drive-In Restaurant (ACS-1), Sambo’s Restaurant (ACS-4), and Village Inn Pizza Parlor (ACS-5).
FIGURE 12: PORTION OF A CA. 1917 OWNERSHIP PLAT FOR TOWNSHIP 1N, RANGE 4E, SHOWING HOMESTEAD FARMS SURROUNDING THE TOWN LIMITS OF TEMPE.  
As shown, the Tempe-Mesa Highway (future US 80) followed the Apache Trail alignment to the west line of Section 24, before turning north to follow 8th Street to Mill Avenue. The current Apache Boulevard alignment with the curve at Mill Avenue was not yet constructed (red dashed line).
FIGURE 13: PORTION OF THE 1964 ADOT AERIAL SHOWING DEVELOPMENT ALONG APACHE BOULEVARD WITHIN THE CURRENT APE.

By this time, the bulk of APE had essentially been developed, with the exception of vacant parcels south of the ASU campus (which were used for student parking at this time), as well as vacant, undeveloped parcels east of Terrace Road.
Equally important to the commercial development along Apache Boulevard, as alluded to previously, was the expansion of the ASU campus along Apache Boulevard, particularly in the two decades following WWII. Indeed, the north side of Apache Boulevard between Mill and Normal Avenues was part of the college campus, and contained notable properties, such as Victory Village (currently occupied by Gammage Auditorium); men’s dormitories, including Irish Hall (RYDEN T-438), Hayden Hall (ACS-6), and Best Hall (ACS-7); and Goodwin Stadium (constructed 1936, and demolished 1978).

4.2.1.4 Post-WWII Residential Development along Mill Avenue and Apache Boulevard (1945–1968)

The previous Ryden Architects assessment identified multiple residential subdivisions along the APE corridor on Mill Avenue and Apache Boulevard. No additional residential subdivisions were identified or documented by ACS in the current study. Following is a short summary of postwar residential development along Mill Avenue (Ryden 2012:33–34):

South of Apache Boulevard, where the US 60 designation turned eastward, Mill Avenue developed from a farm road to a suburban arterial street in the decades following World War II. This stretch of Mill Avenue has a modern character provided by Ranch Style residential subdivisions, neighborhood shopping centers, and commercial buildings. Few remnants of the early agricultural development flanking Mill Avenue survive in the form of rural estate houses such as the 1888 Gage House and 1925 Stone House.

Post-WWII Custom Residential Subdivisions

The earliest post-war suburban subdivisions consisted of large lots for custom-designed houses. Various local contractors built these houses one-by-one for individual families. Within the APE, the post-WWII custom-built residential subdivisions include Date Palm Manor, Tempe Estates, University Estates, and University Park. Custom residential subdivisions are significant under Criterion A for Community Planning and under Criterion C for Architecture where each design is a unique expression.

Post-WWII Production Housing Subdivisions

In about 1958, the approach to building residential subdivisions in Tempe drastically changed from custom building by small local contractors to mass production by large regional developers. The scale of building and thinking changed greatly. Production housing methods emphasized the subdivision as the primary unit of development rather than the house.
Developers saw the look-alike houses they manufactured as “product” rather than as distinct homes for individual families. Using mass production methods perfected on World War II assembly lines, developers moved specialized subcontractor crews down a stationary row of lots to construct houses in a quick, efficient way. Homebuyers would be given a handful of floor plans from which to choose. Several elevations were offered with a variety of details to give slight distinction to each street façade.

Unlike in custom home subdivisions, architecture is only a minor consideration in evaluating the significance of a production housing subdivision. Of nearly equal importance to architectural style are financing, marketing, site planning, construction methods, and pre-manufactured materials. Air conditioning systems were an important up-grade from the earlier evaporative cooler units.

4.2.2 Development of Higher Education in Tempe

The Arizona Territorial Normal School was established in 1885 under the Thirteenth Territorial Legislature, the same legislature that established Arizona’s first university in Tucson. The Normal School’s mission for many years was to provide training and accreditation of teachers, a profession in great demand through the territorial period. The campus opened in February 1886, with 31 students in attendance in a single building. Over the course of several decades, the Normal School slowly developed as the number of students increased. By 1912, when Arizona achieved statehood, the small campus had increased to more than 10 buildings, with a student population greater than 260. Over the course of the next half century, the Normal School continued to expand, eventually “graduating” to College status, then to University. In the more than seven decades of development for this institution of learning, the school inherited a number of formal designations (DeLuse 2012; Hopkins and Thomas 1960):

- Arizona Territorial Normal School (1885–1912)
  (also known variously as Arizona Normal School, Normal School of Arizona)
- Tempe Normal School (1912–1925)
- Tempe State Teachers College (1925–1928)
- Arizona State Teachers College (1928–1945)
- Arizona State College (1945–1958)
- Arizona State University (1958–present)

By the late 1930s, just as the effects of the Great Depression were being felt across the state and the nation, Arizona State Teacher’s College boasted a student population of 732 students. Eight educational buildings were present on the 30-acre campus, with four women’s dorms and one men’s dorm. In the three year period (1930–1933) before
Grady Gammage ascended to the presidency of the college, the number of students decreased significantly, as did faculty positions. For those in the faculty lucky enough to have kept their jobs, pay cuts were announced. By 1933, when Grady Gammage became president of the college, there were only 34 faculty members on the campus, compared with 56 in 1930 (Hopkins and Thomas 1960:210–222).

4.2.2.1 The Era of Grady Gammage at ASU (1933–1959)

By the fall semester of 1933, Gammage and the Teachers College Board had developed a plan to improve existing buildings on the campus, and apply for New Deal loans to expand. The loan was eventually approved in 1935 by the PWA. In the meantime, pay cuts to the faculty were restored. In the years leading to the onset of WWII, the PWA loan funded a number of new projects, from which labor was supplied through the WPA (Hopkins and Thomas 1960:238–244; Thomas 1960) (Table 7).

In addition to the extensive building program, walkways, sidewalks, and streets were paved or improved. As the student population increased through the 1930s, Gammage hired additional staff to accommodate the increased numbers in classes. Additional college programs were also added, including Liberal Arts, Sciences, and Agricultural and Commercial Training. Unfortunately, given the status of the school as a teacher's college, bachelor degrees were not offered for these programs. Through the period of the WWII (1939–1945), Gammage fought passionately to change the designation of Arizona State Teacher’s College. On the campus, additional courses were offered for the various programs. At the state capital in Phoenix, bills were introduced between 1939 and 1945 to gain accreditation for other degrees by renaming the college Arizona State College. Not surprisingly, university officials and influential politicians in Tucson fought against such measures, claiming that the University of Arizona would suffer financially, as would taxpayers across the state (Hopkins and Thomas 1960:245–248). After America’s entrance into WWII in 1941, student attendance decreased dramatically as the men enlisted (teachers and students) and women aided in the war effort. From 1941 to 1945, the teachers college was unable to advance requests to the legislature to become a multi-degree institution.

TABLE 7: BUILDINGS CONSTRUCTED ON THE CAMPUS OF ARIZONA STATE UNIVERSITY UNDER THE PRESIDENCY OF GRADY GAMMAGE1,2

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<thead>
<tr>
<th>Arizona State Teacher’s College: 1933–1945</th>
</tr>
</thead>
<tbody>
<tr>
<td>Matthew’s Library addition (1935)</td>
</tr>
<tr>
<td>West Hall (1936)</td>
</tr>
<tr>
<td>Annex VIII Building, Publisher’s Office (1936)</td>
</tr>
<tr>
<td>Dining hall and heating plant (1937)</td>
</tr>
<tr>
<td>Garfield A. Goodwin Stadium (1936 and 1940)</td>
</tr>
<tr>
<td>Lyceum (1938)</td>
</tr>
<tr>
<td>B.B. Moeur Activity Building (1938–1939)</td>
</tr>
<tr>
<td>Auditorium and Cafeteria (1939)</td>
</tr>
<tr>
<td>Various farm buildings on the campus training center (1939)</td>
</tr>
<tr>
<td>Haigler Hall (1940)</td>
</tr>
<tr>
<td>E.M. Irish Hall (RYDEN T-438) (1940)</td>
</tr>
<tr>
<td>Dixie Gammage Hall (1941)</td>
</tr>
</tbody>
</table>
By late 1944, in the final months of the war, veterans returned home with government aid in the form of the GI Bill, which among other things, provided assistance for educational advancement. Keenly aware that millions of veterans would be returning to the Salt River Valley, Gammage began an aggressive statewide campaign to encourage legislative leaders to approve the change from teachers college to state college with multiple degree programs. It was clear to these political leaders that the University of Arizona would not be able to address the educational needs of all returning veterans for the State of Arizona. On March 9, 1945, Governor Osborn signed the bill establishing Arizona State College at Tempe (ASC), and Arizona State College at Flagstaff (Hopkins and Thomas 1960:250–262).

Between the fall semester of 1945 and spring semester of 1946, the number of enrolled students increased from 553 to 1,163; by fall of 1946, the number had grown to more than 2,000. The numbers would continue to increase through 1950 as veterans began their new life in the Valley of the Sun. Realizing that many attending veterans had families to take care of and would never be able to adapt to the small dorm rooms on campus, college officials established Victory Village on the southwest corner of the campus, along the curve of Apache Boulevard. The village included trailers recycled from the defunct Poston Relocation Camp that were used for living spaces for families, as well as office space. Victory Village would remain in use through 1960, when groundbreaking activities for the future Gammage Auditorium were initiated. In the postwar period through 1958, a large number of additional buildings were constructed on the expanding campus to keep up with demand (Thomas 1960) (Figures 14 to 17; Table 7).

In the decade of the 1950s, as the population in the Salt River Valley climbed, so too did the ASC student population. By 1954, more than 4,000 students were in attendance at the college. While local leaders and college officials, including Grady Gammage, felt

<table>
<thead>
<tr>
<th>Arizona State College: 1945–1958</th>
</tr>
</thead>
<tbody>
<tr>
<td>Victory Village Apartments (1946)</td>
</tr>
<tr>
<td>Danforth Meditation Chapel (1948)</td>
</tr>
<tr>
<td>Agriculture Building (1950)</td>
</tr>
<tr>
<td>Home Economics Building (1951)</td>
</tr>
<tr>
<td>James H. McClintock Halls (1951 and 1956)</td>
</tr>
<tr>
<td>Infirmary (1954)</td>
</tr>
<tr>
<td>Adelphi Housing Units (1954)</td>
</tr>
<tr>
<td>English Building (1955)</td>
</tr>
<tr>
<td>Sahuaro Hall (1956)</td>
</tr>
</tbody>
</table>

1 Information from (Hopkins and Thomas 1960:238–244; Thomas 1960).
2 ASU buildings documented as part of the Tempe Streetcar study are in bold text.
that ASC should be designated a University, political forces in the state, particularly in Tucson, were hesitant to do so. The Board of Regents requested that a study of Arizona’s educational system be completed by the U.S. Office of Education. The Hollis Commission was established to conduct this study, and, in 1954, released a report that recommended, among other things, that Arizona should create a second university. The Board of Regents, though voting to expand the number of colleges and schools at the ASC campus, nevertheless avoided the issue of formal designation. Over the next four years, the Board of Regents increased the number of graduate degrees and expanded the college in other respects; nonetheless, political haranguing on the Board, as well as at the state legislature, delayed the inevitable. Finally, in 1958, the issue of formal designation was added to the ballot as a state initiative. The initiative passed overwhelmingly, despite intense opposition from Pima County. Arizona State University was formally established by Governor Ernest W. McFarland on December 5, 1958 (Hopkins and Thomas 1960:279–302).

By 1960, the university had expanded significantly north to Tempe Butte with additional dormitories and other buildings. One of the largest projects completed in this period was Sun Devil Stadium in 1958–1960. Constructed on the “saddle” of the butte, the stadium (ACS-9) was greater than 190,000 square feet, and boasted an initial capacity of 30,000 people (Thomas 1960). For several decades afterward, access to the stadium and vehicle parking were on its south side, along Stadium Drive. The Rio Salado Parkway alignment was a rather late addition to Tempe’s arterial street system, having been established sometime in the 1970s, and altered to its current alignment in the late 1990s.

Dr. Grady Gammage died in 1959, one year before the Arizona Board of Regents approved the last of his proposed improvements—an auditorium and fine arts center. Originally designed by Frank Lloyd Wright for an opera house in Baghdad, Iraq that was not built, Wright adapted the design to the present site (Arizona State University 2015a). The building was constructed over a period of several years on the curve of Apache Boulevard and on the site of Victory Village, which had become obsolete in the postwar period of extensive growth across the Salt River Valley. The auditorium was christened Grady Gammage Center in honor of the man who had orchestrated the transformation of Tempe’s Normal School to Arizona State University. Today, ASU is one of the largest universities in the country, with 67,507 undergraduate students in enrollment (Arizona State University 2015b).
FIGURE 14: PORTION OF A 1955 OBLIQUE AERIAL OF TEMPE, SHOWING THE ASC CAMPUS (YELLOW DASHED LINE) ALONG APACHE BOULEVARD (US 60, 70, 80, AND 89).

As shown, Victory Village is active along the curve of Apache Boulevard. Hayden Hall (ACS-6) and Irish Hall (Ryden T-438) are also shown on the map. Best Hall had not yet been constructed; the buildings shown were known as Green Gables men’s dormitory. These frame buildings were donated from the federal government as part of the postwar efforts to provide housing for veterans attending classes at the college.

(CP MCL 35619, Arizona Collection, Herb and Dorothy McLaughlin Photograph Collection, Arizona State University)
FIGURE 15: 1968 AERIAL PHOTOGRAPH SHOWING THE SUN DEVIL STADIUM, AND ACCESS ALONG STADIUM DRIVE ON THE SOUTH END.

As shown, Rio Salado Parkway had not yet been established, nor was parking available north of the stadium (Maricopa County 2013: accessed January 12, 2015).

FIGURE 16: 1979 AERIAL PHOTOGRAPH SHOWING THE SUN DEVIL STADIUM, AND ACCESS FROM THE NORTH AND SOUTH ENDS OF THE STADIUM.

As shown, an early alignment of what would later become Rio Salado Parkway was paved to provide parking for students of ASU, as well as attendants of sporting activities (Maricopa County 2013: accessed January 12, 2015).
4.2.3 Architecture

The properties within the APE are primarily commercial, with the presence of residential subdivisions on the outskirts of the Build Alternative. As summarized by Ryden Architects, Inc. in their previous study (2012:35):

> The timeline of architectural styles and construction methods reflect the changing nature of Tempe as seen on a tour of Mill Avenue from the Salt River south to Southern Avenue. The architectural history of Tempe follows the same patterns found in other cities in the Salt River Valley and, in general, in the nation.

The previous assessment provided a table of architectural styles identified within the APE corridor along Mill Avenue. Table 8 presents the architectural styles of buildings within the APE. For each style, a building example is provided with its year of construction. In the current assessment conducted by ACS, several buildings identified along Apache Boulevard included architectural elements of the International and Art Moderne Styles. These distinctive architectural styles are discussed briefly below.
TABLE 8: EXAMPLES OF ARCHITECTURAL STYLES

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name Or Land Use Type</th>
<th>Year Built</th>
<th>Architectural Style</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.1</td>
<td>Gage House</td>
<td>1888</td>
<td>Queen Anne</td>
</tr>
<tr>
<td>1.10</td>
<td>Andre Building</td>
<td>1900</td>
<td>Victorian Eclectic</td>
</tr>
<tr>
<td>2.3</td>
<td>Mullen House</td>
<td>1924</td>
<td>Classical Revival or Neoclassical</td>
</tr>
<tr>
<td>1.9</td>
<td>Hotel Casa Loma</td>
<td>1899</td>
<td>Mission Revival</td>
</tr>
<tr>
<td>2.5</td>
<td>Living Canvas Tattoos</td>
<td>1930</td>
<td>Spanish Colonial Revival</td>
</tr>
<tr>
<td>4.4</td>
<td>Stone House</td>
<td>1925</td>
<td>Pueblo Revival</td>
</tr>
<tr>
<td>2.4</td>
<td>State Farm Insurance</td>
<td>1925</td>
<td>(English Cottage Revival)</td>
</tr>
<tr>
<td>1.17</td>
<td>Tempe National Bank</td>
<td>1912</td>
<td>(Egyptian Revival)</td>
</tr>
<tr>
<td>1.13</td>
<td>College Theater</td>
<td>1938</td>
<td>Commercial Style</td>
</tr>
<tr>
<td>2.9</td>
<td>Minson House</td>
<td>1925</td>
<td>Bungalow/Craftsman</td>
</tr>
<tr>
<td>2.6</td>
<td>Vanity on Mill Hair Gallery</td>
<td>1933</td>
<td>(Southwest Style)</td>
</tr>
<tr>
<td>2.21</td>
<td>Tempe Women's Club</td>
<td>1936</td>
<td>(Minimal Traditional)</td>
</tr>
<tr>
<td>2.20</td>
<td>House 1220 S Mill Ave</td>
<td>1939</td>
<td>(Simple) Ranch Style</td>
</tr>
<tr>
<td>2.11</td>
<td>House 1100 S Mill Ave</td>
<td>1942</td>
<td>(French Provincial) Ranch Style</td>
</tr>
<tr>
<td>2.12</td>
<td>Selleh House</td>
<td>1940</td>
<td>(Spanish Colonial) Ranch Style</td>
</tr>
<tr>
<td>4.2</td>
<td>Apartments 2024 S Mill Ave</td>
<td>1960</td>
<td>(Chalet) Ranch Style</td>
</tr>
<tr>
<td>4.1</td>
<td>Medical Offices</td>
<td>1960</td>
<td>California Ranch Style</td>
</tr>
<tr>
<td>2.14</td>
<td>House 1112 S Mill Ave</td>
<td>1952</td>
<td>(Contemporary) Ranch Style</td>
</tr>
<tr>
<td>4.7</td>
<td>Mill Ave Medical Center</td>
<td>1963</td>
<td>International Style</td>
</tr>
<tr>
<td>2.10</td>
<td>Grady Gammage Auditorium</td>
<td>1964</td>
<td>Wrightian</td>
</tr>
<tr>
<td>RYDEN T-438</td>
<td>Irish Hall</td>
<td>1940</td>
<td>Art Moderne</td>
</tr>
<tr>
<td>ACS-6</td>
<td>Charles T. Hayden Hall</td>
<td>1951</td>
<td>International Style</td>
</tr>
<tr>
<td>ACS-7</td>
<td>Best Hall</td>
<td>1956</td>
<td>International Style</td>
</tr>
<tr>
<td>1.7</td>
<td>Hayden House</td>
<td>1873</td>
<td>(Sonoran Vernacular)</td>
</tr>
<tr>
<td>1.8</td>
<td>Hayden Flour Mill</td>
<td>1919</td>
<td>Industrial Cast-in-Place Concrete</td>
</tr>
<tr>
<td>1.8</td>
<td>Hayden Silos</td>
<td>1952</td>
<td>Industrial Cast-in-Place Concrete</td>
</tr>
<tr>
<td>1.6</td>
<td>Tempe Beach Stadium</td>
<td>1937</td>
<td>River Cobble Masonry &amp; Concrete</td>
</tr>
<tr>
<td>ACS-9</td>
<td>ASU Sun Devil Stadium</td>
<td>1958-1960</td>
<td>Concrete and steel construction</td>
</tr>
</tbody>
</table>

1 This table includes properties previously evaluated by Ryden Architects, Inc. (Ryden Architects, 2012). Locations of these historic properties may be found on maps in Appendix B. Properties in bold text were inventoried by ACS along Apache Boulevard and Rio Salado Parkway.
2 In parentheses are terms discerning style subsets beyond categories of the National Register Bulletin.
4.2.3.1 The Modernist Movement and Modern Architecture

Modernism is thought to have derived in the late nineteenth and early twentieth centuries. Popular in Europe before and after World War I (1914–1918), this movement, as it has been called, was championed by a number of notable architects, such as Le Corbusier, Ludwig Mies van der Rohe, and Walter Gropius. Over a period of decades, a number of distinctive architectural styles emerged as a result of this modern influence of architecture, including Art Deco, Art Moderne (a.k.a., Streamline Moderne), and International Style. The principles dominant in the Modernist movement were rooted in the changing global conditions of industry, culture, and technology, and were influential, not only in architecture, but also art and literature. Architecturally, Modernism emphasized the use of new materials, such as concrete, glass, and steel. As coined by Louis Sullivan, an American architect influenced by this new trend, modern architecture reflected the philosophy that “Form follows Function.” Generally, modernist buildings were constructed without excessive ornamentation. Massive, ornate buildings of the past were replaced by simplified structures that reflected their function, accentuating the new array of materials used in the building’s construction. Although American architects were influenced by this movement, including Frank Lloyd Wright, its impact in America was more pronounced after the 1930s when political turmoil across Europe forced many European architects to emigrate to the United States (Bose 2008; Denzer 2004).

International Style (ca. 1930s–1970s)
The term International Style was first coined after a 1932 exhibit of architecture at the New York Museum of Modern Art. This exhibit was later summarized in the well-known book, The International Style, authored by Henry-Russell Hitchcock and Philip Johnson. The book emphasized several principles of the International Style, including (Hitchcock 1966; McAlester and McAlester 1989; Walker 1997):

- **Volume rather than Mass:** Traditional buildings were constructed of walls that functioned as the primary support system of the structure. In an International Style building, an interior frame of steel or concrete was constructed from which the walls are attached, not as structural support, but as elements of the building. Some buildings displayed their structural components as part of their design. Flat roofs were encouraged on International Style buildings to reflect their emphasis on volume.

- **Regularity:** An International building could be constructed with asymmetric components (e.g., use of different material types, as well as variations in room dimensions, height, and setbacks), so long as its features were regular. The “regular” placement of windows was a common component of the International Style building; this regular placement has been characterized as “banding.” In addition, whereas Art Deco buildings emphasized vertical form (e.g., skyscrapers, public buildings, apartment buildings, movie theatres), many Art Moderne and International Style buildings emphasized horizontal form as a
“regular” feature of these styles (although International Style skyscrapers have been constructed).

- **Minimal ornamentation**: Whereas Modernist Art Deco buildings used decorative ornamentation to accentuate their buildings, International Style buildings generally used minimal ornamentation, preferring to highlight the regularity of the building features.

Through the 1930s and well into the 1970s, International Style buildings were common features of the modern urban landscape across America. International Style was influential in this period in some residential housing, but primarily on commercial, public, and government buildings.

**Art Moderne (ca. 1930s–1950s)**

Whereas Art Deco buildings displayed prominent geometric ornamentation of modern materials on its buildings, the Art Moderne style was more closely related to the International Style in its emphasis on horizontal form, flat roofs, and regularity of building features (e.g., window banding). The primary difference was in the style’s use of minimal ornamentation, such as glass block windows and panels (concrete or steel), as well as other notable structural features, including curved corners and window wraparounds. Stainless steel and aluminum may have been used for trim around windows and doors. This architectural style, like the International Style, was common for public and commercial buildings. This style was also common in Main Street architecture in the postwar period (Liebs 1985; Ryden Architects 1997a; Walker 1997). Character-defining elements of Art Moderne include low, horizontal orientation; rounded edges with corner windows and glass block walls; horizontal window rows, including steel casement; flat roof; subdued colors; smooth exterior wall surfaces; horizontal grooves or lines in walls; and asymmetrical façades.

**4.3 METHODOLOGY OF ELIGIBILITY AND INTEGRITY**

The historic significance of properties in the project area is derived from their relationship to the historic context of Commercial Development along US 80 (Mill Avenue and Apache Boulevard) (1870s–1968), Post-WWII Residential Development Along Mill Avenue and Apache Boulevard (1945–1968), and Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959) (Criterion A). Properties may also be individually eligible based on their embodiment of distinctive characteristics of a type, period, or method of construction or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction (Criterion C).

The age criterion for eligibility evaluation includes properties that will be 50 years old as calculated back from 2018 when the project is scheduled for completion. Thus, properties constructed in 1968 or earlier qualify for evaluation for NRHP eligibility.
Buildings or districts meeting the age criterion were researched and evaluated for significance within the contexts of community planning and development (Criterion A) or for their design and construction (Criterion C); no properties within the APE were associated with an important person (Criterion B). After this list of potentially historic properties was identified, a field survey was conducted to assess integrity for those properties that possessed significance either at the individual level or as a contributor to a district.

Integrity refers to the physical characteristics of a property that allow it to show its significance and historic character. To be considered eligible for the National Register, a property must retain integrity of its basic form and character-defining features to the degree that it still provides a true and authentic representation of its historic appearance. The criteria used to evaluate the historic integrity of properties in this study were drawn from the *Secretary of the Interior's Standards for the Treatment of Historic Properties* (Weeks and Grimmer 1995), *How to Apply the National Register Criteria for Evaluation* (National Register of Historic Places 2002), and the newly revised Arizona SHPO policy statement on eligibility (Arizona State Historic Preservation Office 2011).

There are seven aspects of integrity that must be considered when evaluating the National Register eligibility of a property: location, design, setting, materials, workmanship, feeling, and association.

**Location**
“Location is the place where the historic property was constructed or the place where the historic event occurred” (National Register of Historic Places 2002:44). Structures that have been moved from their original location are usually ineligible for listing in the National Register. However, under National Register Criteria Consideration B, if the moved property is significant primarily for architectural value or if it is the surviving property most importantly associated with a historic person or event, it may be eligible for listing.

**Design**
“Design is the combination of elements that create the form, plan, space, structure, and style of a property” and “…includes such elements as organization of space, proportion, scale, technology, ornamentations, and materials” (National Register of Historic Places 2002:44). An eligible property should still possess important elements of its design from its period of significance, such as roof type, fenestration, and decorative elements or—in the case of historic districts—layout, plan, circulation, and other related design aspects (Standards 2, 3, and 9 in Weeks and Grimmer 1995). Modifications that were made during the period of significance are usually considered an essential part of a building’s history (Standard 4). If modifications were made after the period of significance and were sensitive to the original design, a building may still retain enough of its character-defining elements to communicate its historic character.
Setting
“Setting is the physical environment of a historic property” and “refers to the character of the place in which the property played its historic role” (National Register of Historic Places 2002:45). It consists of the relationship of a property to its surrounding natural and built environment. Relationships and features are considered both within the boundaries of the property and, especially in the case of historic districts, between the property and its surroundings (National Register of Historic Places 2002:45). Redevelopment and infill construction, demolition of nearby properties, widening of streets, and proximity of poorly maintained properties and vacant buildings can all adversely impact integrity of setting (Standard 9). As with design, however, modifications to a property’s setting made during the period of significance are typically considered an essential part of the setting’s history (see Standard 4).

Materials
“Materials are the physical elements that were combined or deposited during a particular period of time and in a particular pattern or configuration to form a historic property” (National Register of Historic Places 2002:45). A property’s materials dating from the period of its historic significance should be preserved, properly maintained, and visible to the greatest extent possible (Standards 2, 5, 7, and 9). New materials used for repairs and maintenance should be similar to those that were used in the original construction (Standard 6). The loss of a building’s original materials is most evident in walls where brick masonry has been painted, stucco plaster has been applied over brick or concrete block, or metal, vinyl, or other siding materials have been mounted over exterior walls. Such applications are usually irreversible (see discussion below regarding evaluation of integrity in such cases). However, as with design and setting, modification to a property’s materials made during the period of significance may be considered an essential part of the property’s history and not constitute a loss of integrity (Standard 4).

Workmanship
“Workmanship is the physical evidence of the crafts of a particular culture or people during any given period in history or prehistory…Workmanship can apply to the property as a whole or to its individual components” (National Register of Historic Places 2002:45). To maintain historic integrity, character-defining features of workmanship originally evident in the property (or added during its period of significance [Standard 4]) must be preserved and remain visible (Standards 5 and 9). Workmanship also includes the treatment of small-scale features such as curbs, walls, sidewalks, and objects.

Feeling
“Feeling is a property’s expression of the aesthetic or historic sense of a particular period of time. It results from the presence of physical features that, taken together, convey the property’s historic character” (National Register of Historic Places 2002:45). To retain historic integrity, a property must be able to communicate its historic character (Standards 2, 5, and 9).
Association

“Association is the direct link between an important historic event or person and a historic property. A property retains association if it is the place where the event or activity occurred and is sufficiently intact to convey that relationship to an observer” (National Register of Historic Places 2002:45). In order to be considered eligible as contributors to a historic district, properties must be associated in an important way with the area of significance identified for the district and must still be able to convey that association (Standards 1 and 2).

Alterations to Historic Buildings

All buildings undergo change over time, so it is not essential that all seven attributes of integrity have been preserved intact, but an eligible property must still convey a sense of the time during which it attained its significance, including the following stipulations:

- Historic wall material must be intact and visible;
- Additions must be sensitive to the historic design and materials of the building;
- Historic fenestration patterns must be intact and visible;
- Roof types must retain their original form;
- Front porches should not be removed, filled, or enclosed;
- A property must not be obscured by modern walls or vegetation;
- To be considered a contributor to a historic district, a property must be contiguous to other contributing properties.

4.4 ELIGIBLE AND LISTED PROPERTIES AND DISTRICTS

In 2012, Ryden Architects, Inc., conducted a historic building inventory and effects analysis for the initial Tempe Streetcar alignment, a portion of which falls within the current Build Alternative APE (Ryden Architects Inc. 2012). All properties of historic age within the APE, that is, properties constructed before 1968, were inventoried; no properties were identified within the APE that would qualify under Criterion Consideration G for exceptional properties less than 50 years old. That study documented 76 historic properties and nine historic districts, of which 43 individual historic properties and nine historic districts fall within the current project’s APE for the proposed Build Alternative (Tables 9 and 10). Of those historic properties and districts within the current APE, 13 individual properties and one historic district are currently listed in the National Register.

Five of the properties identified in Table 9 are territorial-era buildings originally constructed in 1910 (Property Numbers 1.1–1.5) and were relocated to their current location at 150–180 South Ash Avenue, named “Olde Towne Square.” The relocation of these properties in 1992 represents an early effort to preserve these important buildings. Because significance not only relates to the properties themselves, but also to
their locations and settings, preservation of historic properties within their communities is one of the key purposes of the National Register. As artificial groupings of buildings for the purposes of interpretation, protection, or maintenance may create a false sense of historic development, this approach to preservation is discouraged. Even though these properties have been relocated, they are eligible under Criterion C (architectural value) and Consideration B (moved property), as it is possible for those properties to retain sufficient integrity to convey architectural value through integrity of design, materials, workmanship, feeling, and association (National Register of Historic Places 2002). The properties associated with Olde Towne Square retain excellent integrity, having been disassembled and reassembled in exacting detail, preserving key elements of their construction including design, materials, and workmanship. In addition to retaining these aspects of integrity, a moved property must also retain an association to the original setting and general environmental of the original location compatible with the property's significance (National Register of Historic Places 2002). The properties' current location within downtown Tempe retains their association with the original townsite.

The 2012 Ryden study did not evaluate the Olde Towne Square properties for integrity. Valley Metro worked with the CHPO and SHPO and all parties agreed that reevaluation of those properties was not required as the project would not result in an adverse effect to them (Ryden 2012). For purposes of the current study, it was determined to simply treat them as eligible.

The initial project was presented to the City of Tempe Historic Preservation Commission, SHPO, and other interested parties. SHPO concurred on the determinations of eligibility and findings of no adverse effect for that project on May 14, 2012 (Appendix A). Subsequent to SHPO concurrence, Valley Metro and the City of Tempe decided not to move forward with the project as then defined. As the previous 2012 Tempe Streetcar assessment was concurred on by SHPO, properties included in that study are listed as “Eligible” for this study.

When the streetcar project was modified in 2014 to include extensions on Rio Salado Parkway and on Apache Boulevard as discussed in Sections 1.1 and 2.0, ACS initiated a survey of the APE within the modified portions of the project and found no additional properties or districts listed in the National Register. However, four new properties are recommended as eligible (Table 11). ACS did not recommend as eligible any additional historic districts. Valley Metro is requesting concurrence on the eligibility of these four new properties. In total, the inventory and research from both studies identified 47 individual historic properties and three historic districts within the current APE, including 13 individual properties and one historic district previously listed in the National Register.
## TABLE 9: INDIVIDUAL HISTORIC-ERA PROPERTIES
### LISTED AND ELIGIBLE IN THE APE—

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name 2</th>
<th>Address</th>
<th>Year Built</th>
<th>Status and Criteria 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.1</td>
<td>Frankenberg House (relocated and rehabilitated as office)</td>
<td>180 S Ash Avenue</td>
<td>1910</td>
<td>Treated as Eligible (Listed prior to move) – Criterion C and Consideration B</td>
</tr>
<tr>
<td>1.2</td>
<td>Long House (relocated and rehabilitated as office)</td>
<td>150 S Ash Avenue</td>
<td>1910</td>
<td>Treated as Eligible (Listed prior to move) – Criterion C and Consideration B</td>
</tr>
<tr>
<td>1.3</td>
<td>House (relocated and rehabilitated as office)</td>
<td>150 S Ash Avenue</td>
<td>ca. 1910</td>
<td>Treated as Eligible – Criterion C and Consideration B</td>
</tr>
<tr>
<td>1.4</td>
<td>House (relocated and rehabilitated as office)</td>
<td>150 S Ash Avenue</td>
<td>ca. 1910</td>
<td>Treated as Eligible – Criterion C and Consideration B</td>
</tr>
<tr>
<td>1.5</td>
<td>House (relocated and rehabilitated as office)</td>
<td>150 S Ash Avenue</td>
<td>ca. 1910</td>
<td>Treated as Eligible – Criterion C and Consideration B</td>
</tr>
<tr>
<td>1.18</td>
<td>Brown / Strong / Reeves House</td>
<td>604 S Ash Avenue</td>
<td>1883</td>
<td>Listed – Criterion C</td>
</tr>
<tr>
<td>1.6</td>
<td>Tempe Beach Stadium</td>
<td>Ash Avenue at 1st Street</td>
<td>1937</td>
<td>Listed – Criterion A</td>
</tr>
<tr>
<td>1.7</td>
<td>Hayden House (adobe) (Monti’s La Casa Vieja)</td>
<td>3 W 1st Street</td>
<td>1873</td>
<td>Listed – Criterion C</td>
</tr>
<tr>
<td>1.8</td>
<td>Hayden Flour Mill (vacant)</td>
<td>119 S Mill Avenue</td>
<td>1918</td>
<td>Eligible – Criteria A, C, and D</td>
</tr>
<tr>
<td>1.9</td>
<td>Hotel Casa Loma</td>
<td>398 S Mill Avenue</td>
<td>1899</td>
<td>Listed – Criterion C</td>
</tr>
<tr>
<td>1.10</td>
<td>Andre Building (Rula Bula)</td>
<td>401-403 S Mill Avenue</td>
<td>1900</td>
<td>Listed – Criteria A and C</td>
</tr>
<tr>
<td>1.11</td>
<td>Vienna Bakery (Ra Sushi)</td>
<td>415 S Mill Avenue</td>
<td>1893</td>
<td>Listed – Criteria A and C</td>
</tr>
<tr>
<td>1.12</td>
<td>Restaurant Mexico</td>
<td>423 S Mill Avenue</td>
<td>1955</td>
<td>Eligible – Criterion A</td>
</tr>
<tr>
<td>1.13</td>
<td>College Theatre (Valley Art)</td>
<td>505-509 S Mill Avenue</td>
<td>1938</td>
<td>Eligible – Criterion A</td>
</tr>
<tr>
<td>1.14</td>
<td>Goodwin Building</td>
<td>512-518 S Mill Avenue</td>
<td>1907</td>
<td>Listed – Criteria A and C</td>
</tr>
<tr>
<td>1.15</td>
<td>Tempe Hardware / Curry Hall</td>
<td>520 S Mill Avenue</td>
<td>1898</td>
<td>Listed – Criteria A and C</td>
</tr>
<tr>
<td>1.16</td>
<td>Tempe National Bank</td>
<td>526 S Mill Avenue</td>
<td>1912</td>
<td>Listed – Criterion A</td>
</tr>
<tr>
<td>1.17</td>
<td>Joseph A. Birchett Building (Hippie Gypsy)</td>
<td>601 S Mill Avenue</td>
<td>1935</td>
<td>Eligible – Criteria A and C</td>
</tr>
<tr>
<td>2.1</td>
<td>Gage House (Mrs. Rita's)</td>
<td>115 W University Drive</td>
<td>1888</td>
<td>Eligible – Criteria A and B</td>
</tr>
<tr>
<td>2.2</td>
<td>University Inn and Suites</td>
<td>902 S Mill Avenue</td>
<td>1956</td>
<td>Eligible – Criterion A</td>
</tr>
<tr>
<td>2.3</td>
<td>Mullen House</td>
<td>918 S Mill Avenue</td>
<td>1924</td>
<td>Listed – Criteria B and C</td>
</tr>
<tr>
<td>2.4</td>
<td>State Farm Insurance Office</td>
<td>928 S Mill Avenue</td>
<td>1925</td>
<td>Contributor to Eligible Gage House Addition HD – Criterion A</td>
</tr>
<tr>
<td>Property Number</td>
<td>Property Name</td>
<td>Address</td>
<td>Year Built</td>
<td>Status and Criteria</td>
</tr>
<tr>
<td>-----------------</td>
<td>-------------------------</td>
<td>--------------------</td>
<td>------------</td>
<td>----------------------------------------------------------</td>
</tr>
<tr>
<td>2.5</td>
<td>Living Canvas Tattoos</td>
<td>930 S Mill Avenue</td>
<td>1930</td>
<td>Contributor to Eligible Gage Addition HD – Criterion A</td>
</tr>
<tr>
<td>2.6</td>
<td>Vanity on Mill Hair Gallery</td>
<td>944 S Mill Avenue</td>
<td>1933</td>
<td>Contributor to Eligible Gage Addition HD – Criterion A</td>
</tr>
<tr>
<td>2.7</td>
<td>Campus Cellular</td>
<td>946 S Mill Avenue</td>
<td>1955</td>
<td>Contributor to Eligible Gage Addition HD – Criterion A</td>
</tr>
<tr>
<td>2.8</td>
<td>3 Roots Coffee House</td>
<td>1020 S Mill Avenue</td>
<td>1964</td>
<td>Eligible – Criterion A</td>
</tr>
<tr>
<td>2.9</td>
<td>Minson House (Church)</td>
<td>1034 S Mill Avenue</td>
<td>1925</td>
<td>Eligible (also a contributor to Eligible Park Tract HD) – Criterion C</td>
</tr>
<tr>
<td>2.11</td>
<td>Residence</td>
<td>1100 S Mill Avenue</td>
<td>1942</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.12</td>
<td>Selleh House</td>
<td>1104 S Mill Avenue</td>
<td>1940</td>
<td>Listed – Criteria B and C</td>
</tr>
<tr>
<td>2.13</td>
<td>Residence</td>
<td>1110 S Mill Avenue</td>
<td>1935</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.14</td>
<td>Residence</td>
<td>1112 S Mill Avenue</td>
<td>1952</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.15</td>
<td>Residence</td>
<td>1160 S Mill Avenue</td>
<td>1950</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.16</td>
<td>Residence</td>
<td>1170 S Mill Avenue</td>
<td>1935</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.17</td>
<td>Residence</td>
<td>1190 S Mill Avenue</td>
<td>1935</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.10</td>
<td>Grady Gammage Auditorium</td>
<td>1200 S Mill Avenue</td>
<td>1964</td>
<td>Listed – Criterion C</td>
</tr>
<tr>
<td>2.18</td>
<td>Residence</td>
<td>1202 S Mill Avenue</td>
<td>1940</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.19</td>
<td>Residence</td>
<td>1212 S Mill Avenue</td>
<td>1950</td>
<td>Contributor to Eligible Park Tract HD – Criteria A and C</td>
</tr>
<tr>
<td>2.20</td>
<td>Butler (Gray) House</td>
<td>1220 S Mill Avenue</td>
<td>1939</td>
<td>Eligible (also a contributor to Eligible Park Tract HD) – Criterion A and C</td>
</tr>
<tr>
<td>2.21</td>
<td>Tempe Women’s Club</td>
<td>1290 S Mill Avenue</td>
<td>1936</td>
<td>Listed – Criteria A and C</td>
</tr>
<tr>
<td>3.2</td>
<td>Residence</td>
<td>1319 S Mill Avenue</td>
<td>1947</td>
<td>Contributor to Listed University Park HD – Criteria A and C</td>
</tr>
<tr>
<td>3.3</td>
<td>Residence</td>
<td>1421 S Mill Avenue</td>
<td>1952</td>
<td>Contributor to Listed University Park HD – Criteria A and C</td>
</tr>
</tbody>
</table>
### TABLE 10: HISTORIC DISTRICTS LISTED AND ELIGIBLE IN THE APE

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name</th>
<th>Location</th>
<th>Year Built</th>
<th>Status and Criteria</th>
</tr>
</thead>
<tbody>
<tr>
<td>TSC-HD1</td>
<td>Gage Addition Historic District</td>
<td>NWC 10th St &amp; Mill</td>
<td>1919-1954</td>
<td>Eligible – Criteria A and C</td>
</tr>
<tr>
<td>TSC-HD2</td>
<td>Park Tract Historic District</td>
<td>SWC 10th St &amp; Mill</td>
<td>1930-1960</td>
<td>Eligible – Criteria A and C</td>
</tr>
<tr>
<td>TSC-HD4</td>
<td>University Park Historic District</td>
<td>SEC Apache Blvd &amp; Mill</td>
<td>1946-1956</td>
<td>Listed – Criteria A and C</td>
</tr>
</tbody>
</table>

1 This table includes historic districts previously evaluated by Ryden Architects, Inc. (Ryden Architects Inc. 2012). The report received SHPO concurrence on May 12, 2012. Locations of these historic districts are provided in Appendix C.
2 HD = Historic District. There is no TSC-HD3 (College View Historic District) in the revised APE. The eligible historic district assigned this number has been removed from the revised APE because no portion of the district is adjacent to the current Build Alternative.

### TABLE 11: PROPERTY ELIGIBILITY RECOMMENDATIONS

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name</th>
<th>Location</th>
<th>Year Built</th>
<th>Status and Criteria</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACS-9</td>
<td>Sun Devil Stadium</td>
<td>500 E Veteran's Way</td>
<td>1958</td>
<td>Recommended Eligible – Criterion A</td>
</tr>
<tr>
<td>ACS-6</td>
<td>Charles Hayden Hall</td>
<td>250 E Apache Blvd</td>
<td>1951</td>
<td>Recommended Eligible – Criteria A and C</td>
</tr>
<tr>
<td>ACS-7</td>
<td>Best Hall</td>
<td>1215 S Forest Ave</td>
<td>1956</td>
<td>Recommended Eligible – Criteria A and C</td>
</tr>
<tr>
<td>RYDEN T-438</td>
<td>Irish Hall</td>
<td>1201 S Forest Ave</td>
<td>1940</td>
<td>Recommended Eligible – Criteria A and C</td>
</tr>
</tbody>
</table>

1 Valley Metro and FTA seek SHPO concurrence with the recommendations of eligibility of these four properties. Note that SHPO concurred in 2012 with the determination of eligibility of all other properties and districts in the APE.
4.4.1 Newly Identified Individual Buildings

The revised APE included properties located along Rio Salado Parkway east of Mill Avenue, as well as properties located along Apache Boulevard east of Gammage Auditorium. These documented properties largely represent construction associated with the ASU Tempe Campus and commercial buildings constructed during the late 1950s and early 1960s associated with historic US 80. Individual Historic Property Inventory Forms were prepared for the four properties documented by ACS. These forms may be found in Appendix B. Consistent with the previous Tempe Streetcar study, no eligible commercial historic district or historic streetscapes for Mill Avenue or Apache Boulevard were identified within the APE. The following summaries provide information regarding property significance, integrity, and eligibility recommendation for all properties recommended eligible. Only the four eligible properties documented in the current survey by ACS are discussed in detail below.

RYDEN T-438 Irish Hall (1940)

This property was documented in 1997 by Ryden Architects as part of the City of Tempe Multiple Resource Area Update (Ryden Architects 1997b). As such, ACS has retained its original inventory number for this current project. The following description is from the previous report.

**Significance:**
Irish Hall (RYDEN T-438) is a complex of three buildings constructed between 1940 and 1946. Two units (north and central buildings) were constructed in 1940, with the third unit (south building) completed in 1946. All three buildings are characterized as Art Moderne style structures with distinctive elements including low, horizontal massing and a flat roof, as well as rounded walls in the breezeway of the main central building. Horizontal linear banding along the exterior walls compliments the layout of the steel casement windows. The property has served as a student dormitory since its construction in 1940.

**Integrity:**
Distinctive features and proportions of the building are well-maintained. Currently, Irish Hall (RYDEN T-438), Charles Hayden Hall (ACS-6), and Best Hall (ACS-7), comprise the Arcadia Residential Community at ASU, which houses students pursuing degrees at the university.

**Eligibility:**
The building was previously recommended eligible for listing in the National Register at a local level of significance under Criterion C as an excellent example of Art Moderne, a rare building type in the area (Ryden Architects 1997b). The building has retained a high level of integrity since its initial recording in 1997. Furthermore, the complex was designed by the local architectural firm, Lescher and Mahoney, which is recognized today as one of the most prolific and significant Arizona architectural firms of the
twentieth century (Vargas 2008). Finally, ACS recommends the dormitory complex individually eligible under Criterion A for its association with the presidency of Grady Gammage at Arizona State College (1933–1959). Under his leadership and 26-year tenure, the campus was significantly expanded and modernized with the addition of new buildings.

ASU is in the process of preparing a MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Dr. Patricia Olson, Senior Architect at ASU, December 1, 2014).

ACS-6 Charles T. Hayden Hall (1951)
This property includes the original Hayden Hall building, constructed in 1951, and two modern wing additions.

Significance:
The primary building, designed by H.H. Green, is constructed with brick, and is characterized as an International Style building, with distinctive elements including low, horizontal massing, and a flat roof. The three levels of cantilevered windows form horizontal bands across the front façade of the structure. The property has served as a student dormitory since its construction. A review of historical aerials indicates the two wing additions were constructed in 2001 to house additional students (Maricopa County 2013: accessed January 12, 2015).

Integrity:
Distinctive features and proportions of the building are well-maintained. Currently, Irish Hall (RYDEN T-438), Charles Hayden Hall (ACS-6), and Best Hall (ACS-7), comprise the Arcadia Residential Community at ASU, which houses students pursuing degrees at the university.

Eligibility:
The primary building is recommended individually eligible for listing in the National Register at a local level of significance under Criterion A for its association with the Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959). Under his leadership and 36-year tenure, the campus was significantly expanded and modernized with the addition of new buildings.

As noted by Mark Vinson, City Architect for the City of Tempe, “Although widespread nationally, examples of the International Style (as termed in the 1932 “Modern Architecture - International Exhibition” at the Museum of Modern Art curated by Henry Russell Hitchcock and Philip Johnson) which retain a high degree of integrity are relatively scarce in Tempe. The only significant local concentration of buildings from this
era is found on the Tempe Campus of Arizona State University and represents the rapid post-WW II growth of the institution. Further campus expansion and renovation via infill and redevelopment have further reduced this inventory. Hayden Hall and the A & B wings of Best Hall are among the best remnant examples” (personal communication, June 2, 2015). Therefore, Hayden Hall is recommended individually eligible for listing in the National Register at a local level of significance under Criterion C, as it embodies distinctive characteristics of the International Style, a rare architectural type within the City of Tempe.

ASU is in the process of preparing an MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Dr. Patricia Olson, Senior Architect at Arizona State University, December 1, 2014).

ACS-7 Best Hall (1956)
Best Hall (ACS-7) is a complex of three buildings constructed over a period of time between 1956 and ca. 1969.

Significance:
Two units (north and central buildings) were constructed in 1940, with the third unit (south building) completed by 1968. The two original buildings (north and south buildings) are identical brick buildings, and characterized as International Style structures with distinctive elements including low, horizontal massing, and a flat roof. The three levels of cantilevered windows form horizontal bands across the visible façades of the structures. The property has served as a student dormitory since its original construction in 1956.

Integrity:
Distinctive features and proportions of the building are well-maintained. A review of historical aerials indicates the central addition was constructed by 1968 (Maricopa County 2013: accessed January 12, 2015). This newer addition is a five-story brick structure. Although not reflecting the horizontal massing of its predecessors, the building nonetheless exhibits features of the International Style, including the flat roof, and horizontal placement of the cantilevered windows. Currently, Irish Hall (RYDEN T-438), Charles Hayden Hall (ACS-6), and Best Hall (ACS-7), comprise the Arcadia Residential Community at ASU, which houses students pursuing degrees at the university.

Eligibility:
The property as a whole is recommended individually eligible for listing in the National Register at a local level of significance under Criterion A for its association with the
Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959). Under his leadership and 36-year tenure, the campus was significantly expanded and modernized with the addition of new buildings.

As noted by Mark Vinson, City Architect for the City of Tempe, “Although widespread nationally, examples of the International Style (as termed in the 1932 “Modern Architecture - International Exhibition” at the Museum of Modern Art curated by Henry Russell Hitchcock and Philip Johnson) which retain a high degree of integrity are relatively scarce in Tempe. The only significant local concentration of buildings from this era is found on the Tempe Campus of Arizona State University and represents the rapid post-WW II growth of the institution. Further campus expansion and renovation via infill and redevelopment have further reduced this inventory. Hayden Hall and the A & B wings of Best Hall are among the best remnant examples” (personal communication, June 2, 2015). Therefore, Best Hall is recommended individually eligible for listing in the National Register at a local level of significance under Criterion C, as it embodies distinctive characteristics of the International Style, a rare architectural type within the City of Tempe.

ASU is in the process of preparing an MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Dr. Patricia Olson, Senior Architect at Arizona State University, December 1, 2014).

ACS-9 ASU Sun Devil Stadium (1958–1960)

Significance:
The Goodwin Stadium, constructed in 1936 with federal assistance from the PWA, functioned as the primary campus stadium for 20 years. In the postwar years, however, the college realized a larger stadium was needed to raise much-needed funds and awareness of the growing campus. The Sun Devil Stadium was constructed between 1958 and 1960. Aside from college football games, the stadium hosted professional football games as the home stadium of the Arizona Cardinals NFL Team (1988–2005) (Arizona State University 2014; Thomas 1960).

Integrity:
The Sun Devil Stadium and attached facilities are in good condition and have changed somewhat since the stadium’s completion in 1960. Additions have been made to the structure in the modern era, including the expansion of seating, a new scoreboard, loge and upper deck, and the Nadine and Ed Carson Student Athlete Center. These applications do not detract from the original building design or impact the building’s ability to convey its significance.
Eligibility:
The building is recommended eligible for listing in the National Register at a local level of significance under Criterion A for its association with the Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959). Under his leadership and 36-year tenure, the campus was significantly expanded and modernized with the addition of new buildings. Sun Devil Stadium, completed between 1958 and 1960, is an example of this expansion.

ASU is in the process of preparing an MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Dr. Patricia Olson, Senior Architect at Arizona State University, December 1, 2014).

4.4.2 Historic Districts

Three historic districts (Gage Addition, Park Tract, and University Park) fall within the current APE and were previously documented by Solliday (2001a) and noted in the Ryden 2012 Tempe Streetcar survey. The three historic districts are residential subdivisions that represent a broad range of early and mid-20th century architectural styles. The Gage Addition began construction in 1919 and continued through 1954 with the homes built Postwar representing infill of the remaining lots in the older established neighborhood. The homes represent a broad range of early and mid-20th century styles including Transitional/Early Ranch and National Folk. This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

The residential subdivision in the Park Tract Historic District was initiated in 1920 with the organization of the Park Tract Trust; however, development of the subdivision did not begin until the 1930s. The homes represent a broad range of early and mid-20th century styles, including Spanish Colonial Ranch and French Provincial Ranch. There is some encroachment of later high-density residential development. Large irrigated lots have mature trees and lush vegetation. Homes built during the Postwar period represent infill of remaining lots in an older neighborhood. This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

The University Park Historic District is an 80-acre subdivision built starting in approximately in 1945 and consists of large custom homes on large irrigated lots with mature trees and lush vegetation. Representative home styles include Transitional/Early Ranch, Spanish Colonial Ranch, and French Provincial Ranch. Most homes are well maintained and have a very high level of architectural integrity. Two churches, Tempe
Seventh-Day Adventist Church and Lutheran Church of the Good Shepherd, are located in the tract. This subdivision is also associated with the contexts of Community Planning and Development and Builders and Developers.

In addition to these three historic districts, the College View Historic District (TSC-HD3) was previously documented by the 2012 Ryden study of the original Streetcar APE. The eligible historic district assigned this number has been removed from the APE because no portion of the district is adjacent to the current project.

4.4.3 Linear Transportation Structures

Although US 80 has lost aspects of integrity and has not been recommended as an eligible streetscape, it is still considered eligible under Criterion D for information potential regarding prehistory and history of the area. If archaeological remains are identified during construction activities, data recovery efforts would be conducted without change to the Build Alternative design. The separate archaeological technical report, Assessment of Archeological Resources, prepared in support of the Tempe Streetcar covers this in greater detail.

4.5 NON-ELIGIBLE PROPERTIES

The previous assessment, conducted by Ryden Architects, Inc. (2012), identified through field notes and subsequent archival research those properties within the APE of the initial Streetcar route that were not eligible for listing in the National Register. Those properties which are included in the current project’s APE are shown in Table 12. As previously mentioned, the SHPO concurred with the Ryden report and its determinations of property eligibility on May 14, 2012 (Appendix A) (Ryden Architects Inc. 2012:43–45):

Through archival research for age and historic significance and through field observation for architectural significance and integrity, it was determined which resources are not eligible for listing in the National Register of Historic Places per the National Register Bulletin Criteria for Evaluation. Most determinations of non-eligibility are caused by the loss of architectural integrity due to inappropriate additions and alterations. One former contributor to a historic district is considered missing and non-eligible, for it was demolished and replaced by a new house. Because these historic-aged properties were determined not eligible during the resource survey due to loss of integrity, no further documentation was conducted, and no historic inventory forms were prepared.

It is also important to note that the SHPO and the Tempe Historic Preservation Office agreed in 2012 that the “WPA” stamps in concrete sidewalks associated with the New Deal era are considered character-defining features of a streetscape that has lost its
integrity and therefore is no longer able to convey its historic significance. Thus, they are not eligible for National Register listing. These stamps and sidewalks are located along portions of Mill Avenue south of University Boulevard.

### TABLE 12: NON-ELIGIBLE HISTORIC-ERA PROPERTIES PREVIOUSLY DOCUMENTED

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name</th>
<th>Location</th>
<th>Year Built</th>
<th>Reason for Ineligibility</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.22</td>
<td>Laird-Simpson House</td>
<td>1204 S Mill Avenue</td>
<td>1940</td>
<td>Partially burned interior; shell intact except hole in roof</td>
</tr>
<tr>
<td>3.13</td>
<td>Residence NC to UP</td>
<td>1303 S Mill Avenue</td>
<td>1942</td>
<td>Carport with roof deck added on primary façade</td>
</tr>
<tr>
<td>3.1</td>
<td>Residence</td>
<td>1315 S Mill Avenue</td>
<td>1947</td>
<td>Six-foot-tall block wall added at perimeter of parcel hides house</td>
</tr>
<tr>
<td>3.15</td>
<td>Residence NC to UP</td>
<td>1409 S Mill Avenue</td>
<td>1950</td>
<td>Loss of integrity</td>
</tr>
<tr>
<td>3.16</td>
<td>Residence NC to UP</td>
<td>1415 S Mill Avenue</td>
<td>1998</td>
<td>Replaced by new house in 1998</td>
</tr>
<tr>
<td>3.14</td>
<td>Residence NC to UP</td>
<td>5 E 14th Street</td>
<td>1947</td>
<td>Loss of integrity</td>
</tr>
<tr>
<td>3.17</td>
<td>Residence NC to UP</td>
<td>7 E 15th Street</td>
<td>1950</td>
<td>Loss of integrity</td>
</tr>
<tr>
<td>1.19</td>
<td>Hooter's Restaurant</td>
<td>1 E 5th Street</td>
<td>1930</td>
<td>Heavily remodeled; window openings altered; new storefronts; balcony porches and false tower added</td>
</tr>
<tr>
<td>1.20</td>
<td>Zuma Grill &amp; Mill Cue Club</td>
<td>605 S Mill Avenue</td>
<td>1930</td>
<td>New storefronts and canopy</td>
</tr>
</tbody>
</table>

1 NC = Non-contributor; UP = University Park Historic District  
2 The first entry under “Property Name” was the name of the business, building, property, etc., when first built. The name in parenthesis indicates the current name as of the date of the field survey.

ACS recently surveyed those portions of the APE that are new to the project alignment. As a result of detailed field notes and subsequent archival research, ACS recommended that five additional buildings in the APE along Apache Boulevard and Rio Salado Parkway are not eligible for listing in the National Register (Table 13). The table also summarizes the reasons that each property is not eligible. In addition, no eligible commercial historic district or historic streetscapes along Apache Boulevard or Rio Salado Parkway were identified within the APE. Valley Metro requests SHPO concurrence with the ACS determinations. As with the previous Ryden study (2012), no historic property inventory forms were prepared for non-eligible properties.
TABLE 13: NON-ELIGIBLE HISTORIC-ERA PROPERTY RECOMMENDATIONS

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name1,2</th>
<th>Location</th>
<th>Year Built</th>
<th>Reason for Ineligibility</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACS-1</td>
<td>Henry’s Drive-In Restaurant (King Tut Café)</td>
<td>1125 E Apache Boulevard</td>
<td>ca. 1968</td>
<td>Not individually significant for planning/development or architectural design</td>
</tr>
<tr>
<td>ACS-2</td>
<td>Vogel Hatchery (Yoga Place)</td>
<td>1100 E Apache Boulevard</td>
<td>ca. 1945</td>
<td>Not individually significant for planning/development or architectural design</td>
</tr>
<tr>
<td>ACS-3</td>
<td>VFW Post No. 3632 (Church)</td>
<td>1040 E Apache Boulevard</td>
<td>ca. 1954</td>
<td>Not individually significant for planning/development or architectural design</td>
</tr>
<tr>
<td>ACS-4</td>
<td>Royal Inn of Tempe and Sambo’s Restaurant (Super 8 Motel)</td>
<td>1020 E Apache Boulevard</td>
<td>ca. 1968</td>
<td>Integrity of materials lost due to significant alterations to front façade</td>
</tr>
<tr>
<td>ACS-5</td>
<td>Village Inn Pizza Parlor (The Vine)</td>
<td>801 E Apache Boulevard</td>
<td>ca. 1964</td>
<td>Not individually significant for planning/development or architectural design</td>
</tr>
</tbody>
</table>

1 NC = Non-contributor; UP = University Park Historic District
2 The first entry under “Property Name” was the name of the business, building, property, etc., when first built. The name in parenthesis indicates the current name as of the date of the field survey.

5.0 EVALUATION OF EFFECTS ON RESOURCES

The Section 106 process requires identification and evaluation of the effects of an undertaking on properties that have been listed or are eligible for listing in the National Register (36 CFR §800.4(d)). This section describes Valley Metro’s efforts to avoid adverse effects (Section 5.1), defines the types of effects (Section 5.2), and makes findings of effects on historic properties (Section 5.3) based on the conceptual design drawings provided in Appendix D. Measures to avoid or minimize effects are presented in Section 5.4. Note that the SHPO concurred with the previous report on the initial project and its preliminary findings of effects to historic properties in 2012 (Limmer [FTA] to Garrison [SHPO], May 4, 2012; SHPO concurrence May 14, 2012). The current report provides a summary of the previous findings for those portions of the initial project that are also included in the current design. This report also makes preliminary findings of effects on historic properties included in the new portions of the APE.

5.1 EFFORTS TO AVOID ADVERSE EFFECTS

Since initiation of the conceptual design effort, the design of the Tempe Streetcar project has been carried out taking into consideration the historic properties and districts located along the alignment and designing the project to avoid historic properties. This was accomplished through early identification of locations of listed, eligible, and potentially eligible historic properties and districts within the APE. Their locations were
provided to the project’s design team, and Valley Metro instructed them to design the project to avoid direct impacts to these properties if at all possible. The streetcar guideway, stops, and other appurtenances were located mostly within the street rights-of-way. A criterion for selection of the TPSS locations was to avoid placing them within historic properties or districts. Note that SHPO, the City of Tempe, and ASU historic preservation staffs have been invited to participate and have provided valuable input into the project’s design and its potential effects on historic properties.

5.2 TYPES OF EFFECTS

Under Section 106 (Public Law 89-665; 16 USC 470 et seq.), 36 CRF 800, an undertaking’s adverse effects on cultural resources must be considered if a resource meets the eligibility criteria for listing in the National Register (i.e., historic property). Federal regulations define an adverse effect when the effect may lessen a historic property’s integrity of location, design, setting, materials, workmanship, feeling, or association.

As summarized in the previous assessment (Ryden Architects Inc. 2012:46), the three terms that describe potential effects of the project on specific historic properties include “No Historic Properties Affected,” “No Adverse Effect,” and “Adverse Effect.” This section defines each of these terms. It is possible that not all of these typical effects will actually occur in this project. Nonetheless, they are presented for consideration during evaluation. The type of effect will determine if a resolution of effect is required for each historic property and its setting.

SHPO concurred with the previous assessment, and its definitions of effects on historic properties in 2012 (Limmer [FTA] to Garrison [SHPO], May 4, 2012; SHPO concurrence May 14, 2012).

5.2.1 No Historic Properties Affected (§800.4(d)(1))

Per 36 CFR 800.4(d)(1), No Historic Properties Affected means that either there are no historic properties present or there are historic properties present, but the undertaking will have no effect on them as defined in 800(d)(1), meaning that there is no alteration to the characteristics of a historic property qualifying it for inclusion in or eligibility for the National Register.

5.2.2 No Adverse Effect (§800.5(d)(1))

According to Section 800.5(b)—Assessment of Adverse Effects, No Adverse Effect occurs when the undertaking’s effects do not meet the Adverse Effect criteria of paragraph (a)(1) of Section 800.5 or the undertaking is modified or conditions are imposed to avoid adverse effects. The 2012 Ryden report included a number of specific conditions for a finding of No Adverse Effect, and SHPO previously concurred on those
conditions. These same conditions were used in considering whether the current project has an Adverse Effect. Of all the conditions listed in the 2012 Ryden report, the four listed below also apply to the current project. They include:

A. Located between the curbs within the existing street rights-of-way, the streetcar alignment runs adjacent to a historic individual property or district with no streetcar stop immediately adjacent to the property or a contributor;
B. A streetcar stop is located within the median of the existing street rights-of-way or on the opposite side of the street from a historic property. The stop does not affect the curb or property of the adjacent historic property;
C. Curbs adjacent to a historic property are relocated to widen the street to accommodate the tracks plus combinations of features (such as streetcar stops, traffic and turn lanes, and bicycle lanes). The curbs may be moved toward the street centerline to accommodate a stop. The project does not require acquisition of any portion of the historic property, or if it does, the portion acquired does not alter characteristics of the property that qualify the property for inclusion in the National Register in a manner that would diminish integrity of the property's location, design, setting, materials, workmanship, feeling, or association; and
D. Project work is adjacent to National Register-listed or eligible relocated buildings significant under both Criterion C for architectural design and Criteria Consideration B for relocation. Such relocated buildings, having lost their original locations and setting, may still be important only as individual architectural artifacts exemplifying rare surviving stylistic details or construction materials and methods.

Two additional conditions for a finding of No Adverse Effect have been added to the list for the current project:

E. Installation of a TPSS adjacent to a historic property or historic district when appropriate shielding of the TPSS is provided such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register in a manner that would diminish integrity of the property's location, design, setting, materials, workmanship, feeling, or association; and
F. Noise or vibration impacts on a historic property or historic district when appropriate measures are provided to reduce the impacts to acceptable levels.

Where the project undertaking has No Adverse Effect on a historic resource, no resolution of effects is required as described in Section 800.6 of 36 CFR Part 800.

5.2.3 Adverse Effect (§800.5(d)(2))

According to Section 800.5 (a)(1)—Assessment of Adverse Effects, “an adverse effect is found when an undertaking may alter, directly or indirectly, any of the characteristics of a historic property that qualify the property for inclusion in the National Register in a
manner that would diminish the integrity of the property's location, design, setting, materials, workmanship, feeling, or association. Consideration shall be given to all qualifying characteristics of a historic property, including those that may have been identified subsequent to the original evaluation of the property's eligibility for the National Register." If not avoided by the project design, an Adverse Effect requires resolution.

An “Adverse Effect” to an National Register-eligible or -listed property occurs when project work requires the partial or full acquisition of a property, and it adversely affects the historic integrity of setting, feeling, design, materials, or workmanship of the property that made it eligible for the National Register. This work may involve taking a portion or all of a building or structure, landscaping, driveways, parking, or other vacant land on the property when it adversely affects the characteristics defined. The adverse effect under these conditions would usually require the full or partial demolition of character-defining features.

An “Adverse Effect” to a National Register-eligible or -listed property also occurs when project work requires activities which can indirectly affect the integrity of setting, feeling, or design. This type of adverse effect may detract from or obstruct the view shed from the property and/or may detract from or obstruct the view of the property. This work may include construction of streetcar stops, TPSS buildings, and other vertical structures when the view shed is adversely affected. It does not include installation of overhead wire structures within the roadways. This type of adverse effect also occurs if the project results in indirect atmospheric or audible elements that would diminish the integrity of the features qualifying the property for eligibility for listing in the National Register. In addition, an adverse effect could occur if reasonably foreseeable effects caused by the project occur later in time, are farther removed in distance, or are cumulative in nature.

5.3 FINDING OF EFFECTS

5.3.1 Effect Findings for the Previous Project Which Still Apply to the Current Project

Table 14 lists the findings of effects for properties within the portion of the current APE where the project location and design remain the same as the previous project. These findings were listed in the 2012 Ryden report, and SHPO concurred with these findings of effect in May 2012.
<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name Or Land Use Type/Location</th>
<th>No Adverse Effect&lt;sup&gt;2&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.1</td>
<td>Frankenberg House (relocated and rehabilitated as office) 180 S Ash Avenue</td>
<td>C, D</td>
</tr>
<tr>
<td>1.2</td>
<td>Long House (relocated and rehabilitated as office) 150 S Ash Avenue</td>
<td>C, D</td>
</tr>
<tr>
<td>1.3</td>
<td>House (relocated and rehabilitated as office) 150 S Ash Avenue</td>
<td>C, D</td>
</tr>
<tr>
<td>1.4</td>
<td>House (relocated and rehabilitated as office) 150 S Ash Avenue</td>
<td>C, D</td>
</tr>
<tr>
<td>1.5</td>
<td>House (relocated and rehabilitated as office) 150 S Ash Avenue</td>
<td>C, D</td>
</tr>
<tr>
<td>1.18</td>
<td>Brown /Strong/ Reeves House 604 S Ash Avenue</td>
<td>A</td>
</tr>
<tr>
<td>1.6</td>
<td>Tempe Beach Stadium Ash Avenue at 1st Street</td>
<td>B</td>
</tr>
<tr>
<td>1.7</td>
<td>Hayden House (adobe) (Monti’s La Casa Vieja) 3 W 1st Street</td>
<td>A</td>
</tr>
<tr>
<td>1.9</td>
<td>Hotel Casa Loma 398 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>1.10</td>
<td>Andre Building (Rula Bula) 401-403 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>1.11</td>
<td>Vienna Bakery (Ra Sushi) 415 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>1.12</td>
<td>Restaurant Mexico 423 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>1.13</td>
<td>College Theatre (Valley Art) 505-509 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>1.17</td>
<td>Joseph A. Birchett Building (Hippie Gypsy) 601 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.1</td>
<td>Gage House (Mrs. Rita’s) 115 W University Drive</td>
<td>A</td>
</tr>
<tr>
<td>2.4</td>
<td>State Farm Insurance Office 928 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.5</td>
<td>Living Canvas Tattoos 930 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.6</td>
<td>Vanity on Mill Hair Gallery 944 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.7</td>
<td>Campus Cellular 946 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.11</td>
<td>Residence 1100 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.12</td>
<td>Selleh House 1104 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.13</td>
<td>Residence 1110 S Mill Avenue</td>
<td>A</td>
</tr>
<tr>
<td>2.14</td>
<td>Residence 1112 S Mill Avenue</td>
<td>A</td>
</tr>
</tbody>
</table>
5.3.2 Effect Findings for the Current Project

ACS conducted additional evaluations for findings of effect on historic properties for the current project in cases where:

- The current project design has been modified in areas where the original project and current project alignments are the same;
- The current project design is located in areas which were not in the original project alignment; and
- The noise and vibration impacts analysis indicates potential impacts regardless of whether the area is within the original project APE or in the areas not in the original project alignment.

Figure 18 shows the additional locations that were evaluated, as well as new effects from the project on previously evaluated properties. The recommended findings of effect are presented in Table 15 (for individual properties), and in Table 16 (for historic districts [HD]). The bolded and italicized entries in the tables indicate those locations which were not in the original project alignment’s APE. The findings of effects were conducted based on conceptual engineering plans overlaid on 2010 aerials of the APE.
FIGURE 18: LOCATIONS FOR ADDITIONAL EFFECT FINDINGS FOR THE CURRENT PROJECT
Evaluations of effects were carried out in consultation with SHPO, the City of Tempe, and ASU, as well as tribal representatives from the Salt River Pima-Maricopa Indian Community, the Gila River Indian Community, Yavapai-Apache Nation, Ak-Chin Indian Community, Hopi Tribe, Fort McDowell Yavapai Nation, Pascua-Yaqui Tribe, Tonto Apache Tribe, Tohono O’odham Nation, White Mountain Apache Tribe, and the Inter-Tribal Council of Arizona. In addition, the Tempe Historic Preservation Commission was presented with updated information to discuss the potential effects of the current project.

**Direct Effects**

The Build Alternative is nearly entirely within the existing street curbs with the exception of minimal ROW acquisitions to accommodate a few streetcar stops and the TPSS facilities needed to provide electric power to operate the streetcar. None of these ROW acquisitions will be on contributing properties in historic districts or on individual properties listed in or eligible for listing in the National Register and would not involve any physical destruction, damage, removal or alteration, or the transfer/sale/lease of any historic properties. The Build Alternative also would not change the character of any property’s use or physical features within the property’s setting that contribute to its historic significance.

As discussed in Section 4.5, the APE contains WPA impression stamps in the existing concrete sidewalks along the west side of Mill Avenue south of University Drive. The stamps occur in sidewalks that are perpendicular to the sidewalk along Mill Avenue and would not be directly impacted by construction. Therefore, there are no direct effects on historic properties as a result of the Build Alternative.

**Indirect Effects**

- Indirect effects can include visual, noise or vibration elements that would diminish the integrity of the features qualifying the property for eligibility for listing in the National Register. A total of eight TPSS sites have been identified along the alignment to power the streetcar. However, only about three or four TPSS sites will be needed for the entire Build Alternative. None of the TPSSs would be placed within any of the historic properties or districts; however, they would be placed on parcels near or adjacent to the following historic property and/or district:
  - Two eligible properties: Hayden Flour Mill (near Mill Avenue and Rio Salado Parkway) and Sun Devil Stadium (near the Build Alternative northern terminus on Rio Salado Parkway). A TPSS could potentially be located approximately 400 feet from the Hayden Flour Mill and potentially two others between 726 and 557 feet from Sun Devil Stadium.
  - One listed property: Tempe Women’s Club (west side of Mill Avenue north of 13th Street). A TPSS could potentially be located adjacent to the historic district and another approximately 120 feet from the listed site.
o One listed historic district: University Park (east side of Mill Avenue south of 13th Street). A TPSS could be located adjacent to this historic district.

o Two eligible historic districts: Gage Addition (west side of Mill Avenue north of 10th Street) and Park Tract (west side of Mill Avenue south of 10th Street). A TPSS could be located adjacent to the Gage Addition historic district and another approximately 120 feet from the Park Tract historic district.

Appropriate shielding, such as screen walls or vegetation that fit into the existing characteristic of the surrounding area, would be provided for the TPSSs on properties next to historic properties. With the implementation of the appropriate shielding for each of the three or four TPSSs, the Build Alternative would have no adverse visual impacts to these historic properties.

There are several historic properties located in an area where potential noise impacts due to streetcar vehicle wheel squeal have been identified. These properties include:

- Four single-family residences (all in the 1100 block of Mill Avenue) that are contributors to the Park Tract Historic District.
- Hayden Residence Hall (250 East Apache Boulevard). The dormitory is one of the properties in the revised APE that FTA and Valley Metro are seeking concurrence on its eligibility for inclusion on the National Register.

Friction control would be included in the design to reduce the occurrence of wheel squeal, reducing the predicted noise levels to below the FTA moderate noise impact threshold at these sites. Therefore, the Build Alternative would not result in noise impacts to historic resources.

There are four single-family residences near University Drive and Mill Avenue within the Gage Addition Historic District that could result in noise impacts from the placement of a TPSS unit on an adjacent parcel. The TPSS unit will be placed strategically within the site, with the cooling fans facing toward Mill Avenue. This orientation of the TPSS unit would reduce the level of noise below the applicable threshold and not result in a noise impact to the historic district.

There are two historic properties (University Inn [an eligible property at 902 South Mill Avenue] and Mullen House [a listed property at 918 South Mill Avenue]) located at approximately 51 feet and 66 feet, respectively, to special trackwork that could result in vibration impacts. Installation of low-impact frogs would reduce the predicted vibration levels to below the FTA impact threshold. Therefore, the Build Alternative would not result in vibration impacts to these historic resources.

The project is located within existing urban transportation corridors that contain traffic signals, street lights, electric power lines and landscaping in the median and along the sides of the roadways. The addition of overhead catenary wires and poles, tracks, traffic
and pedestrian signals and stops will not introduce structures taller than existing buildings and street features or a massing effect to the visual character of any historic properties or districts. The addition of these new streetcar features would be consistent with the existing urban character along the alignment and, therefore, would not introduce an adverse visual effect or disruption of the historic setting.

In summary, the Build Alternative avoids direct and indirect impacts to historic properties. Therefore, the Build Alternative is expected overall to have no adverse effect on historic properties within the APE, for the undertaking does not alter, either directly or indirectly, any of the characteristics of historic properties that qualify those properties for inclusion in the National Register in a manner that would diminish their integrity.

Transit projects, in general, and the Tempe Streetcar project, in particular, may encourage redevelopment and up-zoning of residential districts to include either higher density residential or commercial use. However, potential intensification of uses within the historic districts can occur with sensitivity through compliance with both the Tempe zoning ordinance as well as the Secretary of Interior’s Standards for Rehabilitation. The City of Tempe has incorporated some safeguards into their policies contained in the Historic Preservation Ordinance as well as in the Historic Preservation Element of the Tempe General Plan 2040 and the Transportation Overlay District section of their Zoning and Development Code. As long as the City of Tempe enforces these ordinances and policies, potential upzoning that may occur as a result of the streetcar project would occur with sensitivity in the context of the existing historic properties along, and in the vicinity of, its route. Therefore, the proposed Build Alternative would not contribute to adverse cumulative effects.
TABLE 15: SUMMARY OF NEW FINDINGS OF EFFECTS—INDIVIDUAL HISTORIC PROPERTIES

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name Or Land Use Type/Location</th>
<th>Condition that Applies to Finding of No Adverse Effect</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACS-9</td>
<td>ASU Sun Devil Stadium 500 E. Veteran’s Way</td>
<td>C, E</td>
</tr>
<tr>
<td>1.8</td>
<td>Hayden Flour Mill (vacant) 119 S Mill Avenue</td>
<td>C, E</td>
</tr>
<tr>
<td>1.14</td>
<td>Goodwin Building 512-518 S Mill Avenue</td>
<td>B</td>
</tr>
<tr>
<td>1.15</td>
<td>Tempe Hardware / Curry Hall 520 S Mill Avenue</td>
<td>B</td>
</tr>
<tr>
<td>1.16</td>
<td>Tempe National Bank 526 S Mill Avenue</td>
<td>B</td>
</tr>
<tr>
<td>2.2</td>
<td>University Inn 902 S Mill Avenue</td>
<td>A, F</td>
</tr>
<tr>
<td>2.3</td>
<td>Mullen House 918 S. Mill Ave.</td>
<td>A, F</td>
</tr>
<tr>
<td>2.8</td>
<td>3 Roots Coffee House 1020 S Mill Avenue</td>
<td>B</td>
</tr>
<tr>
<td>2.9</td>
<td>Minson House (Church) 1034 S Mill Avenue</td>
<td>B</td>
</tr>
<tr>
<td>2.21</td>
<td>Tempe Women’s Club 1290 S Mill Avenue</td>
<td>A, E</td>
</tr>
<tr>
<td>ACS-6</td>
<td>Charles Trumbull Hayden Hall 250 E. Apache Boulevard</td>
<td>B, F</td>
</tr>
<tr>
<td>ACS-7</td>
<td>Best Hall 1215 S Forest Avenue</td>
<td>A</td>
</tr>
<tr>
<td>RYDEN T-438</td>
<td>Irish Hall 1201 S. Forest Avenue</td>
<td>A</td>
</tr>
</tbody>
</table>

1 This table includes properties evaluated by ACS in 2015. The entire entry is bolded and italicized for those individual properties located within the newest portions of the APE. The other properties are contained in the APE of the initial project where the current design has been modified from the earlier project or where noise or vibration impacts may be of concern. Locations of these historic properties may be found in Figure 18.

3 See Section 5.2.2 for definitions of effects.
TABLE 16: SUMMARY OF FINDINGS OF EFFECTS—HISTORIC DISTRICTS

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name Or Land Use Type/Location</th>
<th>Condition that Applies to Finding of No Adverse Effect</th>
</tr>
</thead>
<tbody>
<tr>
<td>TSC-HD1</td>
<td>Gage Addition Historic District Northwest Corner 10th St &amp; Mill Ave</td>
<td>A, E, F</td>
</tr>
<tr>
<td>TSC-HD2</td>
<td>Park Tract Historic District Southwest Corner 10th St &amp; Mill Ave</td>
<td>B, C, E, F</td>
</tr>
<tr>
<td>TSC-HD4</td>
<td>University Park Historic District Southeast Corner Apache Blvd &amp; Mill Ave</td>
<td>A, E</td>
</tr>
</tbody>
</table>

1 This table includes historic districts (HD) re-evaluated by ACS in 2015. Locations of these historic properties may be found in Figure 18.
2 There is no TSC-HD3 in the APE. The eligible historic district assigned this number, College View Historic District, has been removed from the APE because no portion of the district is adjacent to the current project.
3 See Section 5.2.2 for definitions of effects.

5.4 MEASURES TO MINIMIZE OR AVOID EFFECTS

With the implementation of minimization and avoidance measures identified below and in Table 17, the project would result in no adverse effect to historic properties. Locations of these properties are shown in Figure 19, and the appropriate measures will be coordinated between FTA, Valley Metro, SHPO and City of Tempe through consultation. Note that most of the planned measures have to do with the potential location of a TPSS to supply electric power to the streetcar vehicles. TPSSs would be appropriately shielded using techniques such as screen walls or vegetation that fit into the existing characteristic of the surrounding area to avoid visual effects to nearby historic resources.

Visual Impacts Associated with a TPSS

If a TPSS is located adjacent to a historic property, then appropriate shielding of the TPSS would be provided, such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. Shielding would include screen walls or vegetation that fits into the existing characteristics of the surrounding area such that the TPSS does not alter the characteristics of the property. Shielding would minimize the size and contrast of the TPSS and signal building access drives with appropriate landscape surface materials.

Noise Impacts Associated with a TPSS

If a TPSS site is implemented adjacent to the Gage Addition Historic District where noise impacts from the TPSS have been identified, the cooling fans will be faced away from properties, or constructing a sound enclosure around the TPSS unit would reduce the noise impact to acceptable levels for the 4 contributor houses to the historic district located along Ash Avenue behind the TPSS site on a parcel located along Mill Avenue south of University Boulevard. Measures to avoid or minimize impacts for the predicted...
noise impact would be to locate the TPSS unit strategically within the site, with the major noise source, the cooling fans, being as far from the residences as possible. If the TPSS unit is located within the parcel as far as feasible and oriented with the cooling fans facing away (toward Mill Avenue) and more than 50 feet from the sensitive receivers on Ash Avenue, the predicted noise level would be reduced to below the impact threshold. If there is not much flexibility on where to locate the unit within the parcel, a sound enclosure would be built around the TPSS unit to reduce noise levels at the sensitive receivers.

**Noise Impacts Associated with Operations**

To minimize the potential noise impacts, the application of friction control device would be included in the design to help reduce the occurrence of wheel squeal. Friction control consists of installing lubricators on the rail or using an onboard lubrication system that applies lubrication directly to the wheel. Including friction control in the design would reduce the predicted noise levels to below the FTA moderate noise impact threshold at all noise-sensitive receivers.

**Vibration Impacts Associated with Operations**

To minimize vibration impacts at the University Inn (902 S. Mill Ave.) and the Mullen House (918 S. Mill Ave.), low-impact frogs would be installed for the special trackwork. This would reduce the predicted vibration impacts to below the FTA impact threshold at all sensitive receivers. Examples of low-impact frogs include monoblock frogs or flange-bearing frogs. Installing low-impact frogs would create a smoother transition through the gap in the rails at the special trackwork to reduce the predicted vibration levels.

Although no adverse vibration impacts are anticipated to the Hayden House as a result of the streetcar construction or operation, documentation of the existing conditions of the adobe building prior to project construction would occur.
FIGURE 19: LOCATIONS FOR AVOIDANCE AND MINIMIZATION MEASURES

Legend:
- White: Area of Potential Effect (APE)
- Red: Historic Property
- Purple: Area not included in APE
- Blue: Historic District
TABLE 17: MEASURES TO AVOID AND MINIMIZE EFFECTS—INDIVIDUAL HISTORIC PROPERTIES¹

<table>
<thead>
<tr>
<th>Property Number</th>
<th>Property Name/Location</th>
<th>Measures to Avoid or Minimize Effects</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACS-9</td>
<td>ASU Sun Devil Stadium ¹ 500 E Veteran's Way</td>
<td>Provide appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. This measure would avoid visual impacts.</td>
</tr>
<tr>
<td>1.8</td>
<td>Hayden Flour Mill¹ 119 S Mill Ave</td>
<td>Provide appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. This measure would avoid visual impacts.</td>
</tr>
<tr>
<td>2.21</td>
<td>Tempe Women’s Club¹ 1290 S Mill Ave</td>
<td>Provide appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. This measure would avoid visual impacts.</td>
</tr>
<tr>
<td>1.7</td>
<td>Hayden House 3 W 1st St</td>
<td>This adobe building has undergone deterioration over the years. Although no adverse vibration impacts are anticipated as a result of the streetcar construction or operation, documentation of the existing conditions of the adobe building would be undertaken prior to Build Alternative construction to create a baseline for monitoring potential architectural or structural changes to the Hayden House in the future.</td>
</tr>
<tr>
<td>2.2</td>
<td>University Inn 902 S Mill Ave</td>
<td>Installation of low-impact frogs for the special trackwork to reduce vibration impacts to acceptable levels. This measure would minimize noise impacts.</td>
</tr>
<tr>
<td>2.3</td>
<td>Mullen House 918 S Mill Ave</td>
<td>Installation of low-impact frogs for the special trackwork to reduce vibration impacts to acceptable levels. This measure would minimize noise impacts.</td>
</tr>
<tr>
<td>2.11 2.15 2.16 2.17</td>
<td>Park Tract HD (4 SFR contributors): 1100 S. Mill Ave. 1160 S. Mill Ave. 1170 S. Mill Ave. 1190 S. Mill Ave.</td>
<td>Application of friction control would be included in the design to help reduce the occurrence of wheel squeal. This measure would minimize noise impacts.</td>
</tr>
<tr>
<td>ACS-6</td>
<td>Charles Trumbull Hayden Hall 250 E. Apache Blvd.</td>
<td>Application of friction control would be included in the design to help reduce the occurrence of wheel squeal. This measure would minimize noise impacts.</td>
</tr>
<tr>
<td>N/A</td>
<td>WPA sidewalk stamps Various locations along Mill Avenue south of University Boulevard</td>
<td>Although not eligible for listing on the National Register, Valley Metro will ensure that the WPA sidewalk stamps that need to be removed will be preserved and made available for future interpretive displays. This measure would avoid impacts.</td>
</tr>
</tbody>
</table>

¹The measures listed assume all TPSS sites adjacent to historic properties would be required. However, although eight candidate TPSS sites are being considered, only three or four of these sites will likely be needed for the project. Therefore, the measures would only apply to those TPSS sites that are actually selected for implementation. SFR=Single-family residence.
### TABLE 18: MEASURES TO AVOID AND MINIMIZE EFFECTS—HISTORIC DISTRICTS

<table>
<thead>
<tr>
<th>District Number</th>
<th>District Name/Location</th>
<th>Measures to Avoid or Minimize Effects</th>
</tr>
</thead>
<tbody>
<tr>
<td>TSC-HD 1</td>
<td>Gage Addition Historic District, Northwest Corner 10th St &amp; Mill Ave</td>
<td>Provide appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. In addition, the TPSS unit will be oriented where the major noise source, the cooling fans, face Mill Avenue, reducing the noise levels to below the applicable threshold such that it will not alter characteristics of the property that qualify the property for inclusion in the National Register. This measure would avoid visual impacts.</td>
</tr>
<tr>
<td>TSC-HD 2</td>
<td>Park Tract Historic District, Southwest Corner 10th St &amp; Mill Ave</td>
<td>Provide appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. This measure would avoid visual impacts.</td>
</tr>
<tr>
<td>TSC-HD 4</td>
<td>University Park Historic District, Southeast Corner Apache Blvd &amp; Mill Ave</td>
<td>Provide appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. This measure would avoid visual impacts.</td>
</tr>
</tbody>
</table>

**HD=Historic District**

1. The measures listed assume all TPSS sites adjacent to historic properties would be required. However, although eight candidate TPSS sites are being considered, only three or four of these sites will likely be needed for the project. Therefore, the measures would only apply to those TPSS sites that are actually selected for implementation.

### 6.0 CONCLUSION

Based on the assessment documented in this report, the FTA finds that the proposed Tempe Streetcar project would result in a no adverse effect on properties listed in or eligible for the National Register, for the undertaking does not alter, either directly or indirectly, any of the characteristics of historic properties that qualify those properties for inclusion in the National Register in a manner that would diminish their integrity.

The inventory and research from the Ryden (2012) and 2015 ACS studies identified 47 historic properties and three historic districts within the current APE, including 13 individual properties and one historic district listed in the National Register. The proposed Build Alternative is nearly all within the existing street curbs with the exception of minimal right-of-way acquisitions to accommodate a few streetcar stops and the TPSS facilities needed to provide electric power to operate the streetcar. None of these acquisitions would be on contributing properties in historic districts or on individual properties listed in or eligible for listing in the National Register. The Build Alternative avoids physical and visual impacts to historic properties within the APE.

With implementation of measures identified in this study, the project would have no adverse effects on historic properties or districts. Measures to minimize or avoid effects include:
• If the TPSS site located near a historic property or historic district is selected for implementation, then appropriate shielding of the TPSS would be provided and would result in no adverse effect, such that the TPSS does not alter characteristics of the historic property or historic district that qualify the property for inclusion in the National Register.

• If the TPSS is located adjacent to the Gage Addition Historic District, appropriate shielding of the TPSS using techniques such as screen walls or vegetation that fits into the existing characteristic of the surrounding area such that the TPSS does not alter characteristics of the property that qualify the property for inclusion in the National Register. In addition, the TPSS unit will be oriented where the major noise source, the cooling fans, face Mill Avenue, reducing the noise levels to below the applicable threshold such that it will not alter characteristics of the property that qualify the property for inclusion in the National Register.

• Although no adverse vibration impacts are anticipated as a result of the streetcar construction or operation, documentation of the existing conditions of the Hayden House adobe building is advised prior to project construction to create a baseline for monitoring potential architectural or structural changes to the Hayden House in the future. The survey should include inspection of the building foundation, photographs of pre-construction conditions, and documentation of any existing cracks.

• Application of friction control would be included in the design to help reduce the occurrence of wheel squeal. Friction control consists of installing lubricators on the rail or using an onboard lubrication system that applies lubrication directly to the wheel. Including friction control in the design would reduce the predicted noise levels to below the FTA moderate noise impact threshold at all noise-sensitive receivers.

• Installation of low-impact frogs for the special trackwork to reduce vibration impacts to acceptable levels. Examples of low-impact frogs include monoblock frogs or flange-bearing frogs. Installing low-impact frogs would create a smoother transition through the gap in the rails at the special trackwork to reduce the predicted vibration levels to below the FTA impact threshold at all sensitive receivers.
7.0 BIBLIOGRAPHY

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1897  "The town has been at a standstill for a long time."  4 September. Tempe.
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1915  "The Tempe cotton gin will start tomorrow on another short run."  29 January:3. Tempe.
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Appendix A: Project Correspondence
This page intentionally left blank.
Mr. James Garrison  
State Historic Preservation Officer  
Arizona State Parks  
1300 West Washington Street  
Phoenix, AZ  85007  

Re: Section 106 Consultation for Tempe South  
Alternatives Analysis/Environmental  
Impact Statement  

Dear Mr. Garrison:  

The Federal Transit Administration (FTA) is currently working with Valley Metro Rail as sponsoring agency on the Environmental Impact Statement for the proposed Tempe South Corridor Project.  

FTA has delegated Valley Metro Rail the authority to work directly with your office on FTA's behalf, pursuant to 36 CFR 800.3-800.4. We understand that FTA remains legally responsible for all findings and determination pursuant to 36 CFR 800. We request your agreement with this delegation.  

If you have questions, please call Mr. Hymie Luden, City and Regional Planner, at (415) 744-2732.  

Sincerely,  

[Signature]  

Leslie T. Rogers  
Regional Administrator  

cc: Mr. Richard Simonetta, Valley Metro Rail
February 6, 2008

Mr. Richard J. Simonetta
Chief Executive Officer
Valley Metro Rail
101 N 1st Ave, Suite 1300
Phoenix, AZ 85003

Re: Tempe South Corridor Transit Improvements
    Tempe and Chandler, Maricopa County, Arizona

Dear Mr. Simonetta:

On January 31, 2008, the Advisory Council on Historic Preservation (AChP) received your invitation to participate in the environmental review process for the referenced undertaking pursuant to Section 6002 of the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU). At this time, we do not expect to attend meetings or provide formal comments at environmental review milestones. However, we retain the right to become involved in the environmental review for this action in the future if, based on information provided by the Federal Transit Administration (FTA) or other consulting parties, we determine that our involvement is warranted.

In order to ensure compliance with Section 106 of the National Historic Preservation Act, the AChP encourages FTA to initiate the Section 106 process by notifying, at its earliest convenience, the appropriate State Historic Preservation Officer (SHPO) and/or Tribal Historic Preservation Officer (THPO), Indian tribes, and other consulting parties pursuant to our regulations, “Protection of Historic Properties” (36 CFR Part 800). Through early consultation, FTA and your agency will be able to determine the appropriate strategy to ensure Section 106 compliance for this undertaking. Please note that FTA, as the federal agency, must be involved in the notification of consulting parties.

FTA and Valley Metro Rail should continue consultation with the appropriate SHPO/THPO, Indian tribes, and other consulting parties to identify and evaluate historic properties and to assess any potential adverse effects on those historic properties. If you determine through consultation with the consulting parties that the undertaking will adversely affect historic properties, or that the development of an agreement document is necessary, FTA must notify the AChP and provide the documentation detailed at 36 CFR § 800.11(e). In the event that this undertaking is covered under the terms of an existing agreement document, you should follow the process it outlines.
Should you have any questions as to how your agency should comply with the requirements of Section 106, please contact me by telephone at (202) 606-8552 or by e-mail at bsemmer@achp.gov.

Sincerely,

Blythe Semmer
Historic Preservation Specialist
Office of Federal Agency Programs
April 16, 2008

Mr. John Lewis  
Executive Director  
Inter-Tribal Council of Arizona  
2214 N. Central Avenue, Suite 100  
Phoenix, AZ 85004  

RE: TEMPE SOUTH MESA ALTERNATIVES ANALYSIS  
SECTION 106 OF THE NATIONAL HISTORIC PRESERVATION ACT  

Dear Mr. Lewis:

Valley Metro Rail (METRO) has initiated planning to extend high capacity transit to downtown Tempe, Arizona State University, southern Tempe, and West Chandler. The enclosed scoping brochure provides an overview of the study process, scoping process, the study area, and the project development process.

The project is a federal undertaking that could result in effects to historic properties listed in or eligible for the National Register of Historic Places, including archaeological sites, historical buildings and structures, and traditional cultural resources. Therefore, METRO, on behalf of the Federal Transit Administration (FTA) is initiating consultation with potentially interested parties pursuant to Section 106 of the National Historic Preservation Act (Title 16, USC, Section 470).

Interested Parties

We have identified the following parties as having interest in the potential effects of the proposed undertaking on historic properties:

1. State Historic Preservation Office;  
2. Tempe City Historic Preservation Office;  
3. Community Services, City of Chandler;  
4. Salt River Pima-Maricopa Indian Community;  
5. Gila River Indian Community;  
6. Fort McDowell Yavapai Nation;  
7. Hopi Tribe;  
8. Ak-Chin Indian Community; and
9. Inter-Tribal Council of Arizona.

Please let us know if you want to participate in the Section 106 consultations. If you are aware of any additional agencies, organizations, or individuals that could be interested in the effects of the proposed project on historic properties, please provide me with the appropriate contact information.

**Area of Potential Effect**

We propose to define the area of potential effects (APE) for each alternative route as the existing street right-of-way plus the adjacent parcels of property on both sides of the street. If historic districts or historic-age subdivisions listed in or eligible for the National Register are identified within this APE, the entire districts or subdivisions would be considered part of the APE.

**Known Historic Properties**

If you are aware of historic properties within the study area, particularly traditional cultural resources that have significance for your community, please provide that information so that we may consider those resources as project planning continues.

We would appreciate receiving your comments within 30 days of the date of this letter. Please contact me at 602-744-5584 or jhorst@metrolightrail.org if you have questions.

Sincerely,

Jerri Horst
Environmental Manager

Enclosure

cc: James Garrison, SHPO (w/o enclosure)
Joe Nucci, Tempe City Historic Preservation Officer (w/o enclosure)
Jean Reynolds, Public History Coordinator, City of Chandler (w/o enclosure)
Hymie Luden, FTA Region IX (w/o enclosure)
Gene Rogge/Kirsten Erickson, URS Corporation (w/o enclosure)
April 16, 2008

The Honorable Raphael Bear
President
Fort McDowell Yavapai Nation
P.O. Box 17779
Fountain Hills, AZ  85269

RE: TEMPE SOUTH ALTERNATIVES ANALYSIS
SECTION 106 OF THE NATIONAL HISTORIC PRESERVATION ACT

Dear President Bear:

Valley Metro Rail (METRO) has initiated planning to extend high capacity transit to downtown Tempe, Arizona State University, southern Tempe, and West Chandler. The enclosed scoping brochure provides an overview of the study process, scoping process, the study area, and the project development process.

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7. Hopi Tribe;
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We would appreciate receiving your comments within 30 days of the date of this letter. Please contact me at 602-744-5584 or jhorst@metrolighttrail.org if you have questions.

Sincerely,

[Signature]

Jerri Horst
Environmental Manager

Enclosure

cc: James Garrison, SHPO (w/o enclosure)
    Joe Nucci, Tempe City Historic Preservation Officer (w/o enclosure)
    Jean Reynolds, Public History Coordinator, City of Chandler (w/o enclosure)
    Hymie Luden, FTA Region IX (w/o enclosure)
    Gene Rogge/Kirsten Erickson, URS Corporation (w/o enclosure)
    Gary Loutzenheiser, Fort McDowell Yavapai Nation (w/ enclosure)
April 16, 2008

The Honorable Benjamin Nuvamsa
Chairman
Hopi Tribe
P.O. Box 123
Kykotsmovi, AZ 86039

RE: TEMPE SOUTH ALTERNATIVES ANALYSIS
SECTION 106 OF THE NATIONAL HISTORIC PRESERVATION ACT

Dear Chairman Nuvamsa:

Valley Metro Rail (METRO) has initiated planning to extend high capacity transit to downtown Tempe, Arizona State University, southern Tempe, and West Chandler. The enclosed scoping brochure provides an overview of the study process, scoping process, the study area, and the project development process.

The project is a federal undertaking that could result in effects to historic properties listed in or eligible for the National Register of Historic Places, including archaeological sites, historical buildings and structures, and traditional cultural resources. Therefore, METRO, on behalf of the Federal Transit Administration (FTA) is initiating consultation with potentially interested parties pursuant to Section 106 of the National Historic Preservation Act (Title 16, USC, Section 470).

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Please let us know if you want to participate in the Section 106 consultations. If you are aware of any additional agencies, organizations, or individuals that could be interested in the effects of the proposed project on historic properties, please provide me with the appropriate contact information.

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We would appreciate receiving your comments within 30 days of the date of this letter. Please contact me at 602-744-5584 or jhorst@metrolightrail.org if you have questions.

Sincerely,

Jerri Horst
Environmental Manager

Enclosure

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    Jean Reynolds, Public History Coordinator, City of Chandler (w/o enclosure)
    Hymie Luden, FTA Region IX (w/o enclosure)
    Gene Rogge/Kirsten Erickson, URS Corporation (w/o enclosure)
    Leigh Kuwanwisiwma, Hopi Tribe (w/ enclosure)
    Terry Morgart, Hopi Tribe (w/ enclosure)
April 16, 2008

The Honorable Diane Enos
President
Salt River Pima-Maricopa Indian Community
10005 E. Osborn Road
Scottsdale, AZ 85256

RE: TEMPE SOUTH ALTERNATIVES ANALYSIS
SECTION 106 OF THE NATIONAL HISTORIC PRESERVATION ACT

Dear President Enos:

Valley Metro Rail (METRO) has initiated planning to extend high capacity transit to downtown Tempe, Arizona State University, southern Tempe, and West Chandler. The enclosed scoping brochure provides an overview of the study process, scoping process, the study area, and the project development process.

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Sincerely,

[Signature]

Jerri Horst
Environmental Manager

Enclosure

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    Jean Reynolds, Public History Coordinator, City of Chandler (w/o enclosure)
    Hymie Luden, FTA Region IX (w/o enclosure)
    Gene Rogge/Kirsten Erickson, URS Corporation (w/o enclosure)
    Shane Antone, Salt River Pima-Maricopa Indian Community (w/ enclosure)
April 16, 2008

The Honorable William Rhodes
Governor
Gila River Indian Community
P.O. Box 97
Sacaton, AZ 85247

RE: TEMPE SOUTH ALTERNATIVES ANALYSIS
SECTION 106 OF THE NATIONAL HISTORIC PRESERVATION ACT

Dear Governor Rhodes:

Valley Metro Rail (METRO) has initiated planning to extend high capacity transit to downtown Tempe, Arizona State University, southern Tempe, and West Chandler. The enclosed scoping brochure provides an overview of the study process, scoping process, the study area, and the project development process.

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Sincerely,

[Signature]

Jerri Horst
Environmental Manager

Enclosure

cc: James Garrison, SHPO (w/o enclosure)
    Joe Nucci, Tempe City Historic Preservation Officer (w/o enclosure)
    Jean Reynolds, Public History Coordinator, City of Chandler (w/o enclosure)
    Hymie Luden, FTA Region 9X (w/o enclosure)
    Gene Rogge/Kirsten Erickson, URS Corporation (w/o enclosure)
    Barnaby Lewis, Gila River Indian Community (w/ enclosure)
    Angela Garcia-Lewis, Gila River Indian Community (w/ enclosure)
April 16, 2008

The Honorable Delia M. Carlyle
Chairwoman
Ak-Chin Indian Community
42507 West Peters & Nall Road
Maricopa, AZ 85239

RE: TEMPE SOUTH ALTERNATIVES ANALYSIS
SECTION 106 OF THE NATIONAL HISTORIC PRESERVATION ACT

Dear Chairwoman, Carlyle:

Valley Metro Rail (METRO) has initiated planning to extend high capacity transit to downtown Tempe, Arizona State University, southern Tempe, and West Chandler. The enclosed scoping brochure provides an overview of the study process, scoping process, the study area, and the project development process.

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We propose to define the area of potential effects (APE) for each alternative route as the existing street right-of-way plus the adjacent parcels of property on both sides of the street. If historic districts or historic-age subdivisions listed in or eligible for the National Register are identified within this APE, the entire districts or subdivisions would be considered part of the APE.

**Known Historic Properties**

If you are aware of historic properties within the study area, particularly traditional cultural resources that have significance for your community, please provide that information so that we may consider those resources as project planning continues.

We would appreciate receiving your comments within 30 days of the date of this letter. Please contact me at 602-744-5584 or jhorst@metrolightrail.org if you have questions.

Sincerely,

[Signature]

Jerri Horst
Environmental Manager

Enclosure

cc: James Garrison, SHPO (w/o enclosure)
    Joe Nucci, Tempe City Historic Preservation Officer (w/o enclosure)
    Jean Reynolds, Public History Coordinator, City of Chandler (w/o enclosure)
    Hymie Luden, FTA Region IX (w/o enclosure)
    Gene Rogge/Kirsten Erickson, URS Corporation (w/o enclosure)
    Gary Gilbert, Ak-Chin Indian Community (w/ enclosure)
Mr. James Garrison  
State Historic Preservation Office  
1300 W. Washington St.  
Phoenix, AZ 85007  

Re: Tempe Streetcar Project  
Area of Potential Effect  

Re:  JUL 08 2011  

Dear Mr. Garrison:

The Federal Transit Administration (FTA) requests the Arizona State Historic Preservation Officer’s concurrence in FTA’s finding on the Area of Potential Effect (APE) for the Tempe Streetcar Project. The Tempe Streetcar project is a proposed 2.6-mile modern streetcar line with a construction cost of $160 million dollars, and estimated annual operating cost of $3.6 million.

Project Description

The Tempe Streetcar project is a proposed 2.6-mile modern streetcar line running from Downtown Tempe at the northern end to Southern Avenue at the southern end. In the Downtown area (north of University Drive), the streetcar line will traverse a one-way, counter-clockwise loop north on Mill Avenue, west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive until again turning south on Mill Avenue where it will resume a double-track operation to its terminus at Southern Avenue (See Attached Map). The streetcar will be electrically-powered from overhead powerlines located within the street right-of-way and would operate in mixed traffic.

Identification of the Area of Potential Effect

The Area of Potential Effect (APE) is defined as the first tier of parcels flanking the proposed alignment of the streetcar route. Within the central business district of Downtown Tempe, the one-way loop of streetcar track leaves an irregular “hole” in the APE where there are three or more adjacent parcels between Mill and Ash Avenues and between 3rd Street and University Drive. This “hole” is considered outside the APE. Where the first-rank parcel boundary of the APE overlaps a historic district comprised of many parcels (usually residential), the boundary stretches to encompass the entire historic district. The historic district is considered as a single unit for the sake of evaluation just as though it were an individual building on a single parcel. The effect of the proposed undertaking on the entire district is evaluated for its impact not only on the few properties adjacent to the track alignment, but also on the historic district as a whole.

The APE is defined as the first tier of parcels flanking the proposed alignment of the streetcar route. Within the central business district of Downtown Tempe, the one-way loop of streetcar track leaves an irregular “hole” in the APE where there are three or more adjacent parcels between Mill...
and Ash Avenues and between 3rd Street and University Drive. This "hole" is considered outside the APE. Where the first-rank parcel boundary of the APE overlaps a historic district comprised of many parcels (usually residential), the boundary stretches to encompass the entire historic district. The historic district is considered as a single unit for the sake of evaluation just as though it were an individual building on a single parcel. The effect of the proposed undertaking on the entire district is evaluated for its impact not only on the few properties adjacent to the track alignment, but also on the historic district as a whole.

On January 10, 2008, FTA delegated Valley Metro Rail, Inc (METRO) the authority to work directly with the Arizona State Historic Preservation Office on our behalf, pursuant to 36 CFR 800.3-800.4. METRO then submitted a letter to your office on October 16, 2008, formally initiating Section 106 Consultation for the Tempe Streetcar Project (Enclosed).

METRO, and the City of Tempe's Historic Preservation Office (CHPO) have collaborated on defining the APE for the Tempe Streetcar Project and the CHPO's approved and recommended APE letter is attached.

FTA is requesting your concurrence with the APE within 30 days of receipt of this letter. If we do not receive any correspondence within 30 days we will assume that your office is in concurrence with the APE. If you have questions, please contact Paul Page at (415)744-2734.

Sincerely,

[Signature]
Leslie T. Rogers
Regional Administrator

[Signature]
David Jacobs, Compliance Specialist
Date
SHPO Concurrence

Attachments: Tempe Map, Nucci Concurrence Letter

cc: Robert Forrest, Environmental Planner, METRO
    Joe Nucci, Tempe Historic Preservation Office, City of Tempe
May 4, 2012

Mr. Jim Garrison
Arizona State Parks Administrative
State Historic Preservation Office
1300 West Washington Street
Phoenix, AZ 85007

RE: TEMPE STREETCAR PROJECT
HISTORIC PROPERTIES AND ARCHAEOLOGICAL ASSESSMENT

Dear Mr. Garrison:

On March 7, 2012, the Federal Transit Administration (FTA) submitted the Inventory and Evaluation of Historic Properties and Districts for National Register Eligibility and Potential Adverse Effects and An Archaeological Assessment for the Tempe Streetcar reports for your review. Specifically, the FTA requested the Arizona State Historic Preservation Officer’s concurrence on the following FTA’s findings: 1) Historic Property Eligibility Evaluations, 2) Finding of “No Adverse Effect” to above-ground historic properties, and 3) Finding of “No Adverse effect” for archaeological resources.

On March 19, 2012, METRO was contacted by your office requesting additional information regarding a statement in the historic report that stamps in the concrete sidewalks are not “character-defining features” and a general concern the report neglected the assessment of indirect impacts on the circulation of traffic and pedestrians in the immediate and general areas around the streetcar route. METRO has coordinated with your office to address these concerns and has revised the report accordingly.

METRO, on behalf of the FTA, is submitting the revised reports to continue formal consultation with your office. Specifically the FTA is requesting your concurrence with the following: 1) Historic Property Eligibility Determinations, 2) Finding of “No Adverse Effects” to above-ground historic properties, and 3) finding of “no adverse affected” for archaeological sites.

If you have questions or need additional information, contact Robert Forrest at 602.322.4514 or via email to rforrest@metrolightrail.org.

Sincerely,

Benjamin Limmer
Planning Manager

cc: Robert Forrest, METRO, w/o enclosures
Paul Page, Federal Transit Administration, Region IX, w/o enclosures
Ray Sukys, Federal Transit Administration, Region IX, w/o enclosures
Neal Young, City of Phoenix, w/o enclosures
Document Control File
Ms. Vivian Burdette, Chairwoman
Tonto Apache Tribe
Tonto Apache Reservation #30
Payson, Arizona 85541

Re: Tempe Streetcar Project
Updated Section 106 Consultation

Dear Chairwoman Burdette:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

Valley Metro proposes to construct a streetcar system in Tempe that would operate bi-directionally on Rio Salado Parkway from the new Marina Heights near Packard Drive to Mill Avenue. The streetcar would then loop around downtown Tempe generally operating in a one-way couplet southbound on Ash Avenue and northbound on Mill Avenue. Specifically, the streetcar would traverse a one-way, counter-clockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, under general operating conditions the flow downtown would still be in a counter-clockwise direction on the portion of the loop on Rio Salado Parkway, Ash Avenue, and University Drive. However, where the trains on University Drive intersect with Mill Avenue, they would instead turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The proposed streetcar system would operate with a single car and would share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way. The exact type of rail vehicle has not yet been determined.

The area of potential effects (APE) for architectural resources is defined as the existing street rights-of-way along the route plus the adjacent property parcels on both sides of the streets (map enclosed). Within the central business district of downtown Tempe, the one-way loop of streetcar track leaves an
irregular gap in the APE where there are three or more adjacent property parcels between Mill and Ash Avenues and 3rd Street and University Drive. This gap is considered outside the APE. If historic districts or historic-age subdivisions listed or eligible for the National Register are identified within the APE, the entire districts or subdivisions would be considered part of the APE. Ground disturbance along the route would range from approximately 2 to 6 feet in depth. Therefore, the proposed APE for archaeological resources would include the same horizontal extent as the APE for architectural resources plus a vertical depth of approximately six feet.

If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc: Wally Davis, Jr., Cultural & NAGRPA Representative, Tonto Apache Reservation #30, Payson, Arizona 85541
Robert Forrest, Valley Metro
Mr. Chris Coder, Tribal Archaeologist  
Yavapai-Apache Nation  
2400 West Datsi Street  
Camp Verde, Arizona 86322

Re: Tempe Streetcar Project  
Updated Section 106 Consultation

Dear Mr. Coder:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

Valley Metro proposes to construct a streetcar system in Tempe that would operate bi-directionally on Rio Salado Parkway from the new Marina Heights near Packard Drive to Mill Avenue. The streetcar would then loop around downtown Tempe generally operating in a one-way couplet southbound on Ash Avenue and northbound on Mill Avenue. Specifically, the streetcar would traverse a one-way, counter-clockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, under general operating conditions the flow downtown would still be in a counter-clockwise direction on the portion of the loop on Rio Salado Parkway, Ash Avenue, and University Drive. However, where the trains on University Drive intersect with Mill Avenue, they would instead turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The proposed streetcar system would operate with a single car and would share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way. The exact type of rail vehicle has not yet been determined.

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If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

[Signature]

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc: Robert Forrest, Valley Metro
Ms. Diane Enos, President
Salt River Pima-Maricopa Indian Tribe
Route 1, Box 216, 10005 East Osborn Road
Scottsdale, Arizona 85256

Re: Tempe Streetcar Project
Updated Section 106 Consultation

Dear President Enos:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

Valley Metro proposes to construct a streetcar system in Tempe that would operate bi-directionally on Rio Salado Parkway from the new Marina Heights near Packard Drive to Mill Avenue. The streetcar would then loop around downtown Tempe generally operating in a one-way couplet southbound on Ash Avenue and northbound on Mill Avenue. Specifically, the streetcar would traverse a one-way, counter-clockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, under general operating conditions the downtown would still be in a counter-clockwise direction on the portion of the loop on Rio Salado Parkway, Ash Avenue, and University Drive. However, where the trains on University Drive intersect with Mill Avenue, they would instead turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The proposed streetcar system would operate with a single car and would share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way. The exact type of rail vehicle has not yet been determined.

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We are aware that Tempe Butte is culturally significant for the Four Southern Tribes as was documented in the National Register of Historic Places nomination form prepared by the City of Tempe. If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

[Signature]

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc  Angela Garcia-Lewis, Cultural Preservation Compliance Supervisor, Cultural Preservation Program, 10005 East Osborn Road, Scottsdale, Arizona 85256
Matthew L. Garza, NAGPRA Specialist, 10005 East Osborn Road, Scottsdale, Arizona, 85256
Robert Forrest, Valley Metro
Mr. Leigh Kuwanwiswma, Director
Cultural Preservation Office
Hopi Tribe
P.O. Box 123
Kykotsmovi, Arizona 86039

Re: Tempe Streetcar Project
Updated Section 106 Consultation

Dear Mr. Kuwanwiswma:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

Valley Metro proposes to construct a streetcar system in Tempe that would operate bi-directionally on Rio Salado Parkway from the new Marina Heights near Packard Drive to Mill Avenue. The streetcar would then loop around downtown Tempe generally operating in a one-way couplet southbound on Ash Avenue and northbound on Mill Avenue. Specifically, the streetcar would traverse a one-way, counterclockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, under general operating conditions the flow downtown would still be in a counter-clockwise direction on the portion of the loop on Rio Salado Parkway, Ash Avenue, and University Drive. However, where the trains on University Drive intersect with Mill Avenue, they would instead turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The proposed streetcar system would operate with a single car and would share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way. The exact type of rail vehicle has not yet been determined.

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If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc: Robert Forrest, Valley Metro
Mr. Ronnie Lupe, Chairman  
White Mountain Apache Tribe  
P.O. Box 1150  
Whiteriver, Arizona 85941

Re: Tempe Streetcar Project  
Updated Section 106 Consultation

Dear Chairman Lupe:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

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If you are not the designated representative for such consultation, please let us know.

Sincerely,

[Signature]
Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc: Mark Altaha, Tribal Historic Preservation Officer, Historic Preservation Office, P.O Box 507, Fort Apache, Arizona 85926
    Ramon Riley, Cultural Resource Office Repatriation Specialist, Historic Preservation Office, P.O Box 507, Fort Apache, Arizona 85926
    Robert Forrest, Valley Metro
Mr. Louis Manuel, Jr., Chairman  
Ak-Chin Indian Community  
42507 West Peters & Nall Road  
Maricopa, Arizona 85138  

Re: Tempe Streetcar Project  
Updated Section 106 Consultation

Dear Chairman Manuel:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

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We are aware that Tempe Butte is culturally significant for the Four Southern Tribes as was documented in the National Register of Historic Places nomination form prepared by the City of Tempe. If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, Plans, APE Map

cc  Caroline Antone, Cultural Resource Manager, 42507 West Peters and Nall Road Maricopa, Arizona 85138
Robert Forrest, Valley Metro
Re: Tempe Streetcar Project
Updated Section 106 Consultation

Dear Governor Mendoza:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

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irregular gap in the APE where there are three or more adjacent property parcels between Mill and Ash Avenues and 3rd Street and University Drive. This gap is considered outside the APE. If historic districts or historic-age subdivisions listed or eligible for the National Register are identified within the APE, the entire districts or subdivisions would be considered part of the APE. Ground disturbance along the route would range from approximately 2 to 6 feet in depth. Therefore, the proposed APE for archaeological resources would include the same horizontal extent as the APE for architectural resources plus a vertical depth of approximately six feet.

We are aware that Tempe Butte is culturally significant for the Four Southern Tribes as was documented in the National Register of Historic Places nomination form prepared by the City of Tempe. If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

Leslie T. Rogers  
Regional Administrator

Attachments: Project Map, APE Map

cc Barnaby Lewis, Tribal Historic Preservation Officer, P.O. Box 2140, Sacaton, Arizona 85147  
Kyle Woodson, Director, Cultural Resource Management Program, P.O. Box 2140, Sacaton, Arizona 85147  
Robert Forrest, Valley Metro
Mr. Peter Steere, Tribal Historic Preservation Officer  
Mr. Joe Joaquin, Cultural Resource Specialist  
Cultural Affairs Office  
Tohono O’odham Nation  
P. O. Box 837  
Sells, Arizona 85634

Re: Tempe Streetcar Project  
Updated Section 106 Consultation

Dear Messrs. Steere and Joaquin:

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.

Valley Metro proposes to construct a streetcar system in Tempe that would operate bi-directionally on Rio Salado Parkway from the new Marina Heights near Packard Drive to Mill Avenue. The streetcar would then loop around downtown Tempe generally operating in a one-way couplet southbound on Ash Avenue and northbound on Mill Avenue. Specifically, the streetcar would traverse a one-way, counter-clockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, under general operating conditions the flow downtown would still be in a counter-clockwise direction on the portion of the loop on Rio Salado Parkway, Ash Avenue, and University Drive. However, where the trains on University Drive intersect with Mill Avenue, they would instead turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The proposed streetcar system would operate with a single car and would share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way. The exact type of rail vehicle has not yet been determined.
The area of potential effects (APE) for architectural resources is defined as the existing street rights-of-way along the route plus the adjacent property parcels on both sides of the streets (map enclosed). Within the central business district of downtown Tempe, the one-way loop of streetcar track leaves an irregular gap in the APE where there are three or more adjacent property parcels between Mill and Ash Avenues and 3rd Street and University Drive. This gap is considered outside the APE. If historic districts or historic-age subdivisions listed or eligible for the National Register are identified within the APE, the entire districts or subdivisions would be considered part of the APE. Ground disturbance along the route would range from approximately 2 to 6 feet in depth. Therefore, the proposed APE for archaeological resources would include the same horizontal extent as the APE for architectural resources plus a vertical depth of approximately six feet.

We are aware that Tempe Butte is culturally significant for the Four Southern Tribes as was documented in the National Register of Historic Places nomination form prepared by the City of Tempe. If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits, FTA Region IX Community Planner at (415)744-2735 or email at dominique.paukowits@dot.gov.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc Robert Forrest, Valley Metro
Mr. Peter Yucupicio, Chairman  
Pascua Yaqui Tribe  
7474 South Camino de Oeste  
Tucson, Arizona 85746  

Re: Tempe Streetcar Project  
Updated Section 106 Consultation  

Dear Chairman Yucupicio:  

The Federal Transit Administration (FTA), in coordination with Valley Metro, is conducting consultation under the National Historic Preservation Act (NHPA) for the Tempe Streetcar Project (Project). We are updating our consultation and are contacting interested parties, including Native American tribes per 36 CFR Part 800.2(c)(4) and other consulting parties per 36 CFR Part 800.2(c)(5) to help identify prehistoric sites, sacred sites, and/or traditional cultural properties located in the vicinity of the Project Area. You have been identified as a federally recognized tribe with interest or knowledge of the Project study area. The Native American Heritage Commission (NAHC) has been contacted regarding the Project and recommended that we contact you.  

Valley Metro proposes to construct a streetcar system in Tempe that would operate bi-directionally on Rio Salado Parkway from the new Marina Heights near Packard Drive to Mill Avenue. The streetcar would then loop around downtown Tempe generally operating in a one-way couplet southbound on Ash Avenue and northbound on Mill Avenue. Specifically, the streetcar would traverse a one-way, counterclockwise loop west on Rio Salado Parkway, south on Ash Avenue, and east on University Drive. During some special events in downtown Tempe the streetcar would complete the counter-clockwise loop by turning north on Mill Avenue at University Drive and continue to Rio Salado Parkway. However, under general operating conditions the flow downtown would still be in a counter-clockwise direction on the portion of the loop on Rio Salado Parkway, Ash Avenue, and University Drive. However, where the trains on University Drive intersect with Mill Avenue, they would instead turn south and travel bi-directionally on Mill Avenue to 11th Street near ASU’s Gammage Auditorium. The bi-directional trackway would then follow the roadway curve around the southwest perimeter of Gammage Auditorium, turning onto Apache Boulevard and continuing in an east-west direction, eventually terminating near the current Dorsey/Apache Blvd LRT Station. The proposed streetcar system would operate with a single car and would share the existing auto travel lanes, thus minimizing the need to widen the current street rights-of-way. The exact type of rail vehicle has not yet been determined.  

The area of potential effects (APE) for architectural resources is defined as the existing street rights-of-way along the route plus the adjacent property parcels on both sides of the streets (map enclosed). Within the central business district of downtown Tempe, the one-way loop of streetcar track leaves an
irregular gap in the APE where there are three or more adjacent property parcels between Mill and Ash Avenues and 3rd Street and University Drive. This gap is considered outside the APE. If historic districts or historic-age subdivisions listed or eligible for the National Register are identified within the APE, the entire districts or subdivisions would be considered part of the APE. Ground disturbance along the route would range from approximately 2 to 6 feet in depth. Therefore, the proposed APE for archaeological resources would include the same horizontal extent as the APE for architectural resources plus a vertical depth of approximately six feet.

If you have any information or concern regarding potential impacts on prehistoric sites, sacred sites, and/or traditional cultural properties that would be relevant to this Project, please contact us. If you have any questions or need additional information, feel free to call Dominique M. Paukowits at (415)744-2735.

If you are not the designated representative for such consultation, please let us know.

Sincerely,

[Signature]

Leslie T. Rogers
Regional Administrator

Attachments: Project Map, APE Map

cc: Veronica La Motte Darnell, Office of the Attorney General, 7777 South Camino Huivisim, Bldg. C, Tucson, Arizona 85757
Robert Forrest, Valley Metro
Project location
Appendix B: Historic Property Inventory Forms and Update Forms

Compiled by Archaeological Consulting Services, Ltd., Solliday (2001a), and Ryden Architects, Inc.
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STATE OF ARIZONA HISTORIC PROPERTY INVENTORY FORM

Please type or print clearly. Fill out each applicable space accurately and with as much information as is known about the property. Use continuation sheets where necessary. Send completed form to: State Historic Preservation Office, 1300 W. Washington, Phoenix, AZ, 83007.

PROPERTY IDENTIFICATION
For properties identified through survey: Site No. ACS-6 Survey Area: Tempe Streetcar

Historic Name(s): Charles Trumbull Hayden Hall (Hayden Hall)

(Enter the name(s), if any, that best reflects the property's historic importance.)

Address: 250 E. Apache Boulevard

City or Town: Tempe County: Maricopa Tax Parcel No.: 132-43-001

Block: 26, 27 Lot(s): N/A Plat (Addition): Gage Addition

Township: 1N Range: 4E Section: 22 Quarter Section: NW1/4 Acreage: N/A

UTM reference: Zone 12 Easting Northing USGS 7.5' quad map: Tempe, Ariz

Architect: H.H. Green Builder: Homes & Son Construction

Construction Date: 1951

GOOD (Well-maintained; no serious problems apparent)

FAIR (Some problems apparent) Describe:

POOR (Major problems; imminent threat) Describe:

RUIN / UNINHABITABLE

USES/FUNCTIONS
Describe how the property has been used over time, beginning with original use.

ASU Dormitory (1951-present)

Sources:
ASU Hayden Library, AZ Collection

PHOTO INFORMATION
Date of photo: 12/23/2014

View Direction (looking towards): Northeast

Negative No.: P1020823 ACS6
SIGNIFICANCE

To be eligible for the National Register of Historic Places, a property must represent an important part of the history or architecture of an area. Note: a property need only be significant under one of the areas below to be eligible for the National Register.

A. HISTORIC EVENTS/TRENDS (On a continuation sheet describe how the property is associated either with a significant historic event, or with a trend or pattern of events important to the history of the nation, the state, or the local community.)

B. PERSON (On a continuation sheet describe how the property is associated with the life of a person significant in the past.)

C. ARCHITECTURE (On a continuation sheet describe how the property embodies the distinctive characteristics of a type, period, or method of construction, or represents the work of a master, or possesses high artistic values.)

Outbuildings: (Describe any other buildings or structures on the property and whether they may be considered historic.)

East and west wing additions are modern two-story brick buildings with aluminum casement and fixed windows.

INTEGRITY

To be eligible for the National Register, a property must have integrity, that is, it must be able to visually convey its importance. Provide detailed information below about the property’s integrity. Use continuation sheets if necessary.

1. LOCATION □ Original Site ☑ Moved date: __________________ Original Site: __________________

2. DESIGN (Describe alterations from the original design, including dates - known or estimated - when alterations were made)

This 3-story building with a horizontal rectilinear plan, is of brick construction, and reflects the International Style in its form and features. It has a flat roof with parapet, bands of ribbon windows with cantilevered hoods, and a main entry with two entrances.

3. SETTING (Describe the natural and/or built environment around the property)

Retail/commercial area along the Tempe downtown corridor with multi-lane streets, medians, and sidewalks.

Describe how the setting has changed since the property’s period of significance:

Arterial streets have been widened with addition of some ornamental landscaping and modern in-fill.

4. MATERIALS (Describe the materials used in the following elements of the property)

Walls (structure): Brick Foundation: Concrete Roof: Flat, parapet

Windows: Steel casement

If the windows have been altered, what were they originally ____________________

Wall sheathing: ____________________

If the sheathing has been altered, what was it originally ____________________

5. WORKMANSHIP (Describe the distinctive elements, if any, of craftsmanship or method of construction)

NATIONAL REGISTER STATUS (if listed, check the appropriate box)

☐ Individually Listed ☐ Contributor ☐ Noncontributor to: __________________ Historic District

Date Listed: ______________ □ Determined eligible by keeper of the National Register date: ______________

RECOMMENDATIONS OF ELIGIBILITY (opinion of HPO staff or survey consultant)

Property ☑ is ☐ is not eligible individually.

Property ☑ is ☐ is not eligible as a contributor to a potential historic district.

☐ More information needed to evaluate.

If not considered eligible, state reason: ____________________

FORM COMPLETED BY

Name and Affiliation: T. Jones and A. Gregory, ACS Form Date: 12/23/2014

Mailing Address: 424 W. Broadway, Tempe, AZ 85282 Phone: 480-894-5477
SIGNIFICANCE

A. HISTORIC EVENTS/TRENDS

The building is recommended eligible for listing on the NRHP at a local level of significance under Criterion A for its association with the Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959). Under his leadership and 36-year tenure, the campus was significantly expanded and modernized with the addition of new buildings. The teacher’s college was upgraded first to Arizona State College in 1945, then to a State University in 1958.

Currently, Irish Hall (RYDEN T-438), Charles Hayden Hall (ACS-6), and Best Hall (ACS-7), comprise the Arcadia Residential Community at ASU, which houses students pursuing majors in the School of Art; School of Arts, Media + Engineering; School of Dance; the Design School; School of Music; and School of Theatre and Film.

ASU is in the process of preparing a MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Patricia Olson, December 1, 2014).

B. ARCHITECTURE

It is uncertain at this time if International Style buildings are well represented in Tempe and ASU. If further research determines that this building type is rare within the community, the Hayden Hall may also be eligible under Criterion C as an excellent example of this particular style.
View of front façade with exterior staircase. View facing northeast.

View of east façade and modern two-story east wing addition. View facing northwest.
Front entry with two entrances, view facing north.
STATE OF ARIZONA  
HISTORIC PROPERTY INVENTORY FORM

Please type or print clearly. Fill out each applicable space accurately and with as much information as is known about the property. Use continuation sheets where necessary. Send completed form to: State Historic Preservation Office, 1300 W. Washington, Phoenix, AZ, 83007.

PROPERTY IDENTIFICATION

For properties identified through survey: Site No. ACS-7  Survey Area: Tempe Streetcar

Historic Name(s): Best Hall (Best A and B)  
(Enter the name(s), if any, that best reflects the property's historic importance.)

Address: 1215 S. Forest Avenue

City or Town: Tempe  County: Maricopa  Tax Parcel No.: 132-43-001

Vicinity  Township: 1N Range: 4E Section: 22 Quarter Section: NW1/4 Acreage: N/A

Lot(s):  Block: Plat (Addition): Year of plat (addition)

UTM reference: Zone 12 Easting Northing USGS 7.5’ quad map: Tempe, Ariz

Architect: Weaver and Drover  Builder: T.G.K. Construction Company

Construction Date: 1956  known  estimated

☐ not determined  ☑ known  
(source): ASU Hayden Library, AZ Collection

Structural Condition

☑ GOOD (Well-maintained; no serious problems apparent)  
☐ FAIR (Some problems apparent)  Describe:

☐ POOR (Major problems; imminent threat)  Describe:

☐ RUIN / UNINHABITABLE

USES/FUNCTIONS

Describe how the property has been used over time, beginning with original use.

ASU Dormitory (1956-present)

Sources:

ASU Hayden Library, AZ Collection

PHOTO INFORMATION

Date of photo: 12/23/2014  
View Direction (looking towards): Northeast

Negative No.: P1020844  ACS7
SIGNIFICANCE

To be eligible for the National Register of Historic Places, a property must represent an important part of the history or architecture of an area. Note: a property need only be significant under one of the areas below to be eligible for the National Register.

A. HISTORIC EVENTS/TRENDS (On a continuation sheet describe how the property is associated either with a significant historic event, or with a trend or pattern of events important to the history of the nation, the state, or the local community.)

B. PERSON (On a continuation sheet describe how the property is associated with the life of a person significant in the past.)

C. ARCHITECTURE (On a continuation sheet describe how the property embodies the distinctive characteristics of a type, period, or method of construction, or represents the work of a master, or possesses high artistic values.)

Outbuildings: (Describe any other buildings or structures on the property and whether they may be considered historic.)

Central Building constructed by 1968. Similar in form to its predecessors, it has five floors and decorative shade panels.

INTEGRITY

To be eligible for the National Register, a property must have integrity, that is, it must be able to visually convey its importance. Provide detailed information below about the property's integrity. Use continuation sheets if necessary.

1. LOCATION  ✔ Original Site  □ Moved  date:  ___________  Original Site:  ___________

2. DESIGN (Describe alterations from the original design, including dates - known or estimated - when alterations were made)

This complex of two 3-story buildings (North and South Buildings) are horizontal rectilinear buildings of brick construction, reflecting the International Style in their form and features. Both have a flat roof with parapet, ribbon windows, and cantilevered...

3. SETTING (Describe the natural and/or built environment around the property)

Retail/commercial area along the Tempe downtown corridor with multi-lane streets, medians, and sidewalks.

Describe how the setting has changed since the property's period of significance:

Arterial streets have been widened with addition of some ornamental landscaping and modern in-fill.

4. MATERIALS (Describe the materials used in the following elements of the property)

Walls (structure):  Brick  Foundation:  Concrete  Roof:  Flat, parapet  

Windows:  Steel casement, awning

If the windows have been altered, what were they originally  ___________

Wall sheathing:  ___________

If the sheathing has been altered, what was it originally  ___________

5. WORKMANSHIP (Describe the distinctive elements, if any, of craftsmanship or method of construction)

NATIONAL REGISTER STATUS (if listed, check the appropriate box)

☐ Individually Listed  ☐ Contributor  ☐ Noncontributor to:  ___________  Historic District  

Date Listed:  ___________  ☐ Determined eligible by keeper of the National Register  date:  ___________

RECOMMENDATIONS OF ELIGIBILITY (opinion of HPO staff or survey consultant)

Property  ✔ is  ☐ is not  eligible individually.

Property  ✔ is  ☐ is not  eligible as a contributor to a potential historic district.

☐ More information needed to evaluate.

If not considered eligible, state reason:  ___________

FORM COMPLETED BY

Name and Affiliation:  T. Jones and A. Gregory, ACS  Form Date:  12/23/2014

Mailing Address:  424 W. Broadway, Tempe, AZ 85282  Phone:  480-894-5477
SIGNIFICANCE

A. HISTORIC EVENTS/TRENDS

The building is recommended eligible for listing on the NRHP at a local level of significance under Criterion A for its association with the Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959). Under his leadership and 36-year tenure, the campus was significantly expanded and modernized with the addition of new buildings. The teacher’s college was upgraded first to Arizona State College in 1945, then to a State University in 1958.

Currently, Irish Hall (RYDEN T-438), Charles Hayden Hall (ACS-6), and Best Hall (ACS-7), comprise the Arcadia Residential Community at ASU, which houses students pursuing majors in the School of Art; School of Arts, Media + Engineering; School of Dance; the Design School; School of Music; and School of Theatre and Film.

ASU is in the process of preparing a MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Patricia Olson, December 1, 2014).

B. ARCHITECTURE

It is uncertain at this time if International Style buildings are well represented in Tempe and ASU. If further research determines that this building type is rare within the community, the Hayden Hall may also be eligible under Criterion C as an excellent example of this particular style.
View of Best B, the south wing of the complex. View facing southeast.

View of Best C, which is centrally located between Best A and B. This building was completed in ca. 1968. View facing east.
# Historic Property Inventory Form

**State of Arizona**

**HISTORIC PROPERTY INVENTORY FORM**

Please type or print clearly. Fill out each applicable space accurately and with as much information as is known about the property. Use continuation sheets where necessary. Send completed form to: State Historic Preservation Office, 1300 W. Washington, Phoenix, AZ, 83007.

**PROPERTY IDENTIFICATION**

For properties identified through survey:
- Site No. ACS-9  
- Survey Area: Tempe Streetcar

Historic Name(s): ASU Sun Devil Stadium

(Enter the name(s), if any, that best reflects the property's historic importance.)

Address: 500 E. Veteran's Way

City or Town: Tempe  
- County: Maricopa  
- Tax Parcel No.: 132-24-001C, 004

Township: 1N  
- Range: 4E  
- Section: 15  
- Quarter Section: SE1/4  
- Acreage: N/A

Block: Lot(s): Plat (Addition): Year of plat (addition):

UTM reference: Zone 12 Easting Northing USGS 7.5’ quad map: Tempe, Ariz

Architect: Edward L. Varney & Associates  
- Builder: F.H. Antrim Construction Co.

Construction Date: 1958-1960

- Year of plat (addition):

- USGS 7.5’ quad map:

**STRUCTURAL CONDITION**

- GOOD (Well-maintained; no serious problems apparent)
- FAIR (Some problems apparent) Describe:
- POOR (Major problems; imminent threat) Describe:

- RUIN / UNINHABITABLE

**USES/FUNCTIONS**

Describe how the property has been used over time, beginning with original use.

ASU Sun Devil Stadium: 1958-present

Sources:
- ASU Hayden Library, AZ Collection

**PHOTO INFORMATION**

Date of photo: 12/23/2014

View Direction: (looking towards):

North

Negative No.: P1020855 ACS9
SIGNIFICANCE

To be eligible for the National Register of Historic Places, a property must represent an important part of the history or architecture of an area. Note: a property need only be significant under one of the areas below to be eligible for the National Register.

A. HISTORIC EVENTS/TRENDS (On a continuation sheet describe how the property is associated either with a significant historic event, or with a trend or pattern of events important to the history of the nation, the state, or the local community.)

B. PERSON (On a continuation sheet describe how the property is associated with the life of a person significant in the past.)

C. ARCHITECTURE (On a continuation sheet describe how the property embodies the distinctive characteristics of a type, period, or method of construction, or represents the work of a master, or possesses high artistic values.)

Outbuildings: (Describe any other buildings or structures on the property and whether they may be considered historic.)

INTEGRITY

To be eligible for the National Register, a property must have integrity, that is, it must be able to visually convey its importance. Provide detailed information below about the property’s integrity. Use continuation sheets if necessary.

1. LOCATION ✓ Original Site □ Moved date: ____________ Original Site: ____________

2. DESIGN (Describe alterations from the original design, including dates - known or estimated - when alterations were made)

3. SETTING (Describe the natural and/or built environment around the property)

Retail/commercial area along the Tempe downtown corridor with multi-lane streets, medians, and sidewalks.  ______________________

Describe how the setting has changed since the property’s period of significance:

Artificial streets have been widened with addition of some ornamental landscaping and modern in-fill.

4. MATERIALS (Describe the materials used in the following elements of the property)

Walls (structure): Steel  Foundation: Concrete  Roof: N/A

Windows:  N/A

If the windows have been altered, what were they originally

Wall sheathing:

If the sheathing has been altered, what was it originally

5. WORKMANSHIP (Describe the distinctive elements, if any, of craftsmanship or method of construction)

NATIONAL REGISTER STATUS (if listed, check the appropriate box)

☐ Individually Listed  ☐ Contributor  ☐ Noncontributor to: __________________________ Historic District

Date Listed: ____________  ☐ Determined eligible by keeper of the National Register date: ____________

RECOMMENDATIONS OF ELIGIBILITY (opinion of HPO staff or survey consultant)

Property  ☑ is  ☐ is not  eligible individually.

Property  ☑ is  ☐ is not  eligible as a contributor to a potential historic district.

☐ More information needed to evaluate.

If not considered eligible, state reason: _______________________________________________________

FORM COMPLETED BY

Name and Affiliation:  T. Jones and A. Gregory, ACS  Form Date: 12/23/2014

Mailing Address:  424 W. Broadway, Tempe, AZ 85282  Phone:  480-894-5477
SIGNIFICANCE

A. HISTORIC EVENTS/TRENDS

The building is recommended eligible for listing on the NRHP at a local level of significance under Criterion A for its association with the Development of Higher Education at ASU under the Leadership of Grady Gammage (1933–1959). Under his leadership and 36-year tenure, the campus was significantly expanded and modernized with the addition of new buildings. The teacher’s college was upgraded first to Arizona State College in 1945, then to a State University in 1958. Sun Devil Stadium, completed in 1958, is an example of this expansion. The Goodwin Stadium, constructed in 1936 with federal assistance from the PWA, functioned as the primary campus stadium for twenty years. In the postwar years, however, the college realized a larger stadium was needed to raise money and awareness of the growing campus. The Sun Devil Stadium was completed in 1958, with additions made to the structure over the next four decades. Aside from college football games, the stadium hosted professional football games as the home stadium of the Arizona Cardinals NFL Team (1988–2005).

ASU is in the process of preparing a MPDF for ASU Tempe campus properties constructed through 1966 for internal use in making eligibility determinations under Criterion A associated with the tenure of Presidents Arthur John Matthews, Grady Gammage, and G. Homer Durham. At present, all ASU properties more than 50 years of age are to be considered eligible for listing in the National Register (personal communication, Patricia Olson, December 1, 2014).
Photograph showing ongoing construction at the stadium site, ca. 1958.
Hayden Archives, Arizona State University
UP UPC ASUB S964.C6:218

Oblique aerial of Sun Devil Stadium, facing south toward Tempe.
Hayden Archives, Arizona State University
UP UPC 280.2:11
Tempe Historic Subdivision Inventory Form

Historic Preservation Office
Development Services Department
132 East Sixth Street 101
Tempe, Arizona 85281

<table>
<thead>
<tr>
<th>Subdivision</th>
<th>COLLEGE VIEW</th>
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</thead>
<tbody>
<tr>
<td>City</td>
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<tr>
<td>County</td>
<td>Maricopa</td>
</tr>
<tr>
<td>Survey Area</td>
<td>Tempe Post-World War II Context Study</td>
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**IDENTIFICATION**

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<th>RANGE</th>
<th>4 E</th>
<th>SECTION</th>
<th>22</th>
<th>QUARTER</th>
<th>SW</th>
</tr>
</thead>
</table>

**PROPERTY TYPES**

Residential

**ACREAGE**

About 10

**ARCHITECTURAL DESCRIPTION**

Development Period

1944-53

Representative Styles

☑ Ranch

☐ Transitional/Early Ranch

☐ California Ranch

☐ American Colonial Ranch

☐ Spanish Colonial Ranch

☐ French Provincial Ranch

☐ National Folk Ranch

☐ International

☐ National Folk

☐ Other

Predominant Materials

☑ Concrete block

☑ Brick

☑ Stucco

☑ Wood siding

☑ Asphalt shingle roof

☐ Wood shingle roof

☐ Tile roof

☐ Built up roof

☑ Steel casement windows

☐ Wood double-hung windows

☐ Wood fixed windows

☐ Aluminum sliding windows

General Description

This subdivision consists of large custom homes on large lots. Most of the houses are well maintained and have a very high level of architectural integrity. Large irrigated lots have mature trees and lush vegetation. Includes 12 lots in the area roughly bounded by 13th Street, Mill Avenue, Hudson Lane, and Southern Pacific Railroad tracks. Inhabited are 2 properties, built 1946-1953; about 20 properties were previously inventoried in the Tempe MRA. Average square footage of homes is 1,950.

**STATEMENT OF SIGNIFICANCE**

Theme/Context

This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

Historical Association

Dr. R. J. Stroud built the first home in the area, at Mill Avenue and 13th Street, in late 1944. Shortly thereafter, E. W. Hudson filed a subdivision plat and began sales of lots through real estate agent Kenneth Clark. This subdivision with 18 lots extended Ash Avenue one block south to Hudson Lane. Initial development was slow due to the war. In December 1944, the city annexed 20 acres that included the small subdivision. In February 1945, city employees began grading Hudson Lane.

**BIBLIOGRAPHY/SOURCES**

Maricopa County Recorder, Book 30 of Maps, Page 4; TDN, 30 Nov, 15 Dec 1944, 1 Feb 1945.

**RECOMMENDATIONS**

This subdivision is currently eligible as an historic district.
## Tempe Historic Subdivision Inventory Form

<table>
<thead>
<tr>
<th>Historic Preservation Office Development Services Department</th>
<th>Subdivision</th>
<th>GAGE ADDITION</th>
</tr>
</thead>
<tbody>
<tr>
<td>132 East Sixth Street 101</td>
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<td>Tempe</td>
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<tr>
<td>Tempe, Arizona 85281</td>
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<td>Maricopa</td>
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<tr>
<td>Survey Area</td>
<td>Survey Area</td>
<td>Tempe Post-World War II Context Study</td>
</tr>
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</table>

### IDENTIFICATION
- **TOWNSHIP**: 1 N
- **RANGE**: 4 E
- **SECTION**: 22
- **QUARTER**: NW

### PROPERTY TYPES
- Residential
- Commercial

### ACREAGE
- About 24

### ARCHITECTURAL DESCRIPTION

#### Development Period
- 1920-1955

#### Representative Styles
- **☑ Ranch**
  - ✓ Transitional/Early Ranch
  - □ California Ranch
  - □ American Colonial Ranch
  - □ Spanish Colonial Ranch
  - □ French Provincial Ranch
  - □ National Folk Ranch
  - □ International
  - ✓ National Folk
  - □ Other

#### Predominant Materials
- ✓ Concrete block
- ✓ Brick
- □ Stucco
- □ Wood siding
- ✓ Asphalt shingle roof
- □ Wood shingle roof
- □ Tile roof
- □ Built up roof
- ✓ Steel casement windows
- ✓ Wood double-hung windows
- □ Wood fixed windows
- □ Aluminum sliding windows

#### General Description
Most homes in this subdivision are well maintained and have a high level of architectural integrity; they represent a broad range of early and mid-20th century styles. There is some encroachment of later high-density residential development. Large irrigated lots have mature trees and lush vegetation. Homes built during the Postwar period represent infill of remaining lots in an older established neighborhood. Includes 63 lots in the area roughly bounded by University Drive, Mill Avenue, 10th Street, and Southern Pacific Railroad tracks. Inventoryed are 8 properties, built 1950-1954; about 42 properties were previously inventoried in the Tempe MRA; about 6 properties were not.

#### Significance
- ✓ High
- □ Medium
- □ Low

#### Integrity
- ✓ High
- □ Medium
- □ Low

#### Condition
- ✓ Good
- □ Fair
- □ Poor

### STATEMENT OF SIGNIFICANCE

#### Theme/Context
This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

#### Historical Association
George N. Gage was one of the most important figures associated with the development of early Tempe. As secretary of the Tempe Land and Improvement Company, he was most directly responsible for development of the Tempe townsite during the community’s first period of real growth, 1888-1909. He promoted the sale of lots in the townsite and helped build commercial buildings to form the nucleus of the business center. He was also a home builder, lumber supplier, and co-founder the Bank of Tempe. In 1909, he subdivided 80 acres south of 9th Street (University Drive), initiating the first major expansion of the townsite.

### BIBLIOGRAPHY/SOURCES

### RECOMMENDATIONS
This subdivision is currently eligible as an historic district.
Tempe Historic Subdivision Inventory Form

Historic Preservation Office
Development Services Department
132 East Sixth Street 101
Tempe, Arizona 85281

<table>
<thead>
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IDENTIFICATION
TOWNSHIP 1 N  RANGE 4 E  SECTION 27  QUARTER NW

PROPERTY TYPES
Residential

PLATS
DATE PALM MANOR - filed by Arizona Title Guarantee & Trust Company on 22 Jan 1954, and DATE PALM MANOR AMENDED (24 Apr 1954).

ACREAGE  About 18

ARCHITECTURAL DESCRIPTION

Development Period
1953-59

Representative Styles
☑ Ranch
☐ Transitional/Early Ranch
☐ California Ranch
☐ American Colonial Ranch
☑ Spanish Colonial Ranch
☑ French Provincial Ranch
☐ National Folk Ranch
☐ International
☐ National Folk
☐ Other

Predominant Materials
☑ Concrete block
☑ Brick
☐ Stucco
☐ Wood siding
☑ Asphalt shingle roof
☐ Wood shingle roof
☐ Tile roof
☐ Built up roof
☑ Steel casement windows
☐ Wood double-hung windows
☐ Wood fixed windows
☐ Aluminum sliding windows

Significance
☑ High  ☐ Medium  ☐ Low

Integrity
☑ High  ☐ Medium  ☐ Low

Condition
☑ Good  ☐ Fair  ☐ Poor

General Description
This subdivision consists of large custom homes on large lots. Most of the houses are well maintained and have a very high level of architectural integrity. Many date palm trees located throughout the neighborhood are remnants of the date farm that once occupied the site. Small apartment buildings on the outer edges of the subdivision face Mill and Broadway. Includes 47 lots in the area roughly bound by Broadway Road, Mill Avenue, Palmer Court, and Dromedary Drive. Inventoried are 21 properties, built 1953-1959; about 11 properties were not inventoried due to integrity. Average square footage of homes is 2,000.

STATEMENT OF SIGNIFICANCE

Theme/Context
This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

Historical Association
In 1954, P. L. Agnew began turning the Valsunda Date Gardens, a 40-acre tract near Mill and Broadway, just south of the new Tempe High School, into an exclusive development. The Agnew Construction Company offered custom homes, each with its own individual design rather than a typical tract style. Many of the homes were built with central air conditioning and a swimming pool, and were often twice the price of homes in other subdivisions. Some lots were sold to individuals who wanted to build their own house, but they were required to build a home with a minimum of 1,200 square feet. Date Palm Manor opened in July. Sales were through Joe Williams and Robert T. Ashley at the Tempe Realty Company.

BIBLIOGRAPHY/SOURCES
Maricopa County Recorder, Book 58 of Maps, Page 18, Book 59, Page 8; TDN, 15 Jan, 3 Apr, 23 Jul 1954.

RECOMMENDATIONS
This subdivision will become eligible as an historic district in about 2006.
Tempe Historic Subdivision Inventory Form

Historic Preservation Office
Development Services Department
132 East Sixth Street 101
Tempe, Arizona 85281

Subdivision: UNIVERSITY ESTATES
City: Tempe
County: Maricopa
Survey Area: Tempe Post-World War II Context Study

IDENTIFICATION
TOWNSHIP 1 N RANGE 4 E SECTION 22 QUARTER SW

PROPERTY TYPES
Residential

PLATS
UNIVERSITY ESTATES - filed by Phoenix Title & Trust Company on 28 Jul 1949.

ACREAGE
About 40

ARCHITECTURAL DESCRIPTION

Development Period
1948-1960s

Representative Styles
☑ Ranch
☐ Transitional/Early Ranch
☑ California Ranch
☐ American Colonial Ranch
☐ Spanish Colonial Ranch
☑ French Provincial Ranch
☐ National Folk Ranch
☐ International
☐ National Folk
☐ Other

Predominant Materials
☑ Concrete block
☐ Brick
☐ Stucco
☐ Wood siding
☑ Asphalt shingle roof
☑ Wood shingle roof
☐ Tile roof
☐ Built up roof
☑ Steel casement windows
☐ Wood double-hung windows
☐ Wood fixed windows
☐ Aluminum sliding windows

General Description
This subdivision consists of large custom homes on large lots. Most homes are well maintained, but many have been substantially altered with infilled carports and insensitive additions and repairs. Large irrigated lots have mature trees and lush vegetation. The tract is adjacent to Dailey Park. Includes 120 lots in the area roughly bounded by Southern Pacific Railroad tracks, College Avenue, Broadway Road, and Mill Avenue. Inventario are 37 properties, built 1948-1960; about 62 properties were not inventoried due to integrity; about 10 properties were not inventoried due to construction date after 1960. Average square footage of homes is 1,750.

Significance
☑ High ☐ Medium ☐ Low

Integrity
☑ High ☐ Medium ☐ Low

Condition
☑ Good ☐ Fair ☐ Poor

STATEMENT OF SIGNIFICANCE

Theme/Context
This subdivision is associated with the contexts of Community Planning and Development, Federal Housing Policy, and Builders and Developers.

Historical Association
In February 1950, Universal Homes announced that it would build 95 new homes in this 40-acre tract. Several other homes were being privately built in University Estates. The first five homes built were two- and three-bedroom homes that sold for $5,950 to $6,650. They were built of red brick or block, with tile trim and redwood beams. Sales were through Universal Realty Company. By July 1950, 25 homes were built or under construction. In 1951, Karl S. Guelich, president of Tonto Homes, Inc., began building pumice block houses on Broadway Lane at a cost of $7,500 each.

BIBLIOGRAPHY/SOURCES

RECOMMENDATIONS
This subdivision will become eligible as an historic district in about 2010.
Tempe Historic Subdivision Inventory Form

Historic Preservation Office
Development Services Department
132 East Sixth Street 101
Tempe, Arizona 85281

Subdivision: UNIVERSITY PARK
City: Tempe
County: Maricopa
Survey Area: Tempe Post-World War II Context Study

Identification
TOWNSHIP 1 N
RANGE 4 E
SECTION 22
QUARTER SE

Plats

UNIVERSITY PARK - filed by Phoenix Title & Trust Company on 6 Apr 1945. Later subdivisions include BLADES SUBDIVISION (filed by Carl W. & Pauline Blades, 19 Nov 1947), HEWETTE PLACE (filed by Clyde R. & Mary B. Hewette, 22 Dec 1950), and OAKLEY PLACE (filed by Alvah S. Oakley, Jr., and Lora E. Oakley, 12 May 1951).

Acreage: About 80

Architectural Description

Development Period: 1945-56

Representative Styles
✓ Ranch
✓ Transitional/Early Ranch
□ California Ranch
□ American Colonial Ranch
✓ Spanish Colonial Ranch
✓ French Provincial Ranch
□ National Folk Ranch
□ International
□ National Folk
□ Other

Predominant Materials
✓ Concrete block
✓ Brick
✓ Stucco
□ Wood siding
✓ Asphalt shingle roof
□ Wood shingle roof
✓ Tile roof
□ Built up roof
✓ Steel casement windows
□ Wood double-hung windows
□ Wood fixed windows
□ Aluminum sliding windows

General Description

This subdivision consists of large custom homes on large irrigated lots with mature trees and lush vegetation. Most homes are well maintained and have a very high level of architectural integrity. Two churches, Tempe Seventh-Day Adventist Church and Lutheran Church of the Good Shepherd are located in the tract. Includes 190 lots in the area roughly bound by Apache Blvd., McAllister Ave., Southern Pacific RR tracks, and Mill Ave. Inventoried are 62 properties, built 1946-1956; about 22 properties were previously inventoried in the Tempe MRA; about 35 properties were not inventoried due to integrity; about 10 properties were not inventoried due to construction date

Significance
✓ High □ Medium □ Low

Integrity
✓ High □ Medium □ Low

Condition
✓ Good □ Fair □ Poor

Statement of significance

Theme/Context

This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

Historical Association

This 80-acre subdivision was developed by E. W. Hudson. The Urban Development Company, headed by E. H. Shumway and Renz L. Jennings of Phoenix, began promotion of the subdivision in 1945, and Kenneth Clark was the local real estate agent. Homes facing Mill Avenue or 13th Street were required to have at least 1,000 square feet of floor space; other homes were to be at least 900 square feet. Large lots ranged from 75' x 150' to 105' x 310'. In March 1945, the subdivision was annexed into the city. In September 1951, residents of University Park petitioned the City Council to pave the streets of the subdivision. In June 1952 a paving district was formed to pave College Avenue and 14th and 15th Streets, with properly owners paying assessments for the improvements. Tempe Realty Company was the sales agent for Oakley Place.

Bibliography/Sources


Recommendations

This subdivision is currently eligible as an historic district.
Tempe Historic Subdivision Inventory Form

Historic Preservation Office  
Development Services Department  
132 East Sixth Street 101  
Tempe, Arizona 85281

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### PROPERTY TYPES

- Residential

### PLATS

NU-VISTA 1 - filed by Phoenix Title & Trust Company on 5 Nov 1959. Later additions include NU-VISTA 2 (22 Apr 1960), NU-VISTA 3 (2 Aug 1960), and NU-VISTA 4 (Oct 1960).

### ACREAGE

About 160

### ARCHITECTURAL DESCRIPTION

#### Development Period

1960-61

#### Representative Styles

- ✔ Ranch
  - □ Transitional/Early Ranch
  - □ California Ranch
  - • American Colonial Ranch
  - □ Spanish Colonial Ranch
  - □ French Provincial Ranch
  - □ National Folk Ranch
  - □ International
  - □ National Folk
  - □ Other

#### Prodominant Materials

- ✔ Concrete block
- □ Brick
- □ Stucco
- □ Wood siding
- ✔ Asphalt shingle roof
- □ Wood shingle roof
- □ Tile roof
- □ Built up roof
- □ Steel casement windows
- □ Wood double-hung windows
- □ Wood fixed windows
- ✔ Aluminum sliding windows

### General Description

Most homes in this large subdivision are well maintained and have a very high level of architectural integrity. They include several different models of Knoll Homes, most of which include a prominently placed garage and decorative woodwork. Includes 405 lots in the area roughly bound by Alameda Drive, College Avenue, Huntington Drive, and Southern Pacific Railroad tracks. Invented are 176 properties, built 1958-1960; about 103 properties were not inventoried due to integrity; about 119 properties were not inventoried due to construction date after 1960. Average square footage of homes is 1,700.

### Significance

- ✔ High
- □ Medium
- □ Low

### Integrity

- ✔ High
- □ Medium
- □ Low

### Condition

- ✔ Good
- □ Fair
- □ Poor

### STATEMENT OF SIGNIFICANCE

#### Theme/Context

This subdivision is associated with the contexts of Community Planning and Development, Federal Housing Policy, and Builders and Developers.

#### Historical Association

After quick sales of their homes in the popular Hughes Acres tract, the Knoll Brothers Construction Company began developing a much larger subdivision between Alameda Drive and Southern Avenue, on both sides of Mill Avenue. In 1960, the company began building masonry houses with three or four bedrooms, two baths, a family room, and central air conditioning. All homes in Nu-Vista were built with a garage, and had a gas light in front. The innovative use of cul-de-sacs throughout the subdivision plan created small secluded neighborhoods with little through traffic. There were twelve different models, which sold for $12,900 to $15,750.

### BIBLIOGRAPHY/SOURCES


### RECOMMENDATIONS

This subdivision will become eligible as an historic district in about 2010.
# Tempe Historic Subdivision Inventory Form

**Historic Preservation Office**
**Development Services Department**
132 East Sixth Street 101
Tempe, Arizona 85281

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**IDENTIFICATION**

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**PROPERTY TYPES**

- Residential
- Commercial

**ACREAGE**

About 40

**ARCHITECTURAL DESCRIPTION**

**Development Period**

1920s-1950

**Representative Styles**

- ✓ Ranch
- □ Transitional/Early Ranch
- □ California Ranch
- □ American Colonial Ranch
- ✓ Spanish Colonial Ranch
- ✓ French Provincial Ranch
- □ National Folk Ranch
- □ International
- □ National Folk
- □ Other

**Predominant Materials**

- ✓ Concrete block
- ✓ Brick
- ✓ Stucco
- □ Wood siding
- □ Asphalt shingle roof
- □ Wood shingle roof
- □ Tile roof
- □ Built up roof
- ✓ Steel casement windows
- ✓ Wood double-hung windows
- □ Wood fixed windows
- □ Aluminum sliding windows

**General Description**

Most homes in this subdivision are well maintained and have a high level of architectural integrity. They represent a broad range of early and mid-20th century styles. There is some encroachment of later high-density residential development. Large irrigated lots have mature trees and lush vegetation. Homes built during the Postwar period represent infill of remaining lots in an older neighborhood. Includes 100 lots in the area roughly bound by 10th Street, Mill Avenue, 13th Street, and Southern Pacific RR tracks. inventoried are 17 properties, built 1948-1960; about 79 properties were previously inventoried in the Tempe MRA; about 4 properties were not inventoried due

**Significance**

- □ High
- ✓ Medium
- □ Low

**Integrity**

- ✓ High
- □ Medium
- □ Low

**Condition**

- ✓ Good
- □ Fair
- □ Poor

**STATEMENT OF SIGNIFICANCE**

**Theme/Context**

This subdivision is associated with the context of Community Planning and Development.

**Historical Association**

The Park Tract Trust was organized in 1920. Development of the subdivision began in the 1930s.

**BIBLIOGRAPHY/SOURCES**

Maricopa County Recorder, Book 13 of Maps, Page 27; TDN, 21 Feb 1945

**RECOMMENDATIONS**

This subdivision is currently eligible as an historic district.
Tempe Historic Subdivision Inventory Form

Historic Preservation Office
Development Services Department
132 East Sixth Street 101
Tempe, Arizona 85281

Subdivision: TEMPE ESTATES
City: Tempe
County: Maricopa
Survey Area: Tempe Post-World War II Context Study

IDENTIFICATION
TOWNSHIP 1 N RANGE 4 E SECTION 27 QUARTER NW

PROPERTY TYPES
Residential

PLATS
TEMPE ESTATES - filed by Phoenix Title & Trust Company on 25 Jan 1957.

ACREAGE
About 12

ARCHITECTURAL DESCRIPTION

Development Period
1958-1960s

Representative Styles
☑ Ranch
☐ Transitional/Early Ranch
☑ California Ranch
☐ American Colonial Ranch
☐ Spanish Colonial Ranch
☐ French Provincial Ranch
☐ National Folk Ranch
☐ International
☐ National Folk
☐ Other

Predominant Materials
☑ Concrete block
☐ Brick
☐ Stucco
☐ Wood siding
☑ Asphalt shingle roof
☑ Wood shingle roof
☐ Tile roof
☐ Built up roof
☑ Steel casement windows
☐ Wood double-hung windows
☐ Wood fixed windows
☑ Aluminum sliding windows

General Description
This subdivision consists of large custom homes on large lots. Most of the houses are well maintained and have a very high level of architectural integrity. Includes 34 lots on both sides of Palmcroft Drive, between College Avenue and Mill Avenue. Inventoried are 15 properties, built 1958-1960; about 12 properties were not inventoried due to integrity; about 6 properties were not inventoried due to construction date after 1960. Average square footage of homes is 1,900.

Significance
☑ High ☐ Medium ☐ Low

Integrity
☑ High ☐ Medium ☐ Low

Condition
☑ Good ☐ Fair ☐ Poor

STATEMENT OF SIGNIFICANCE

Theme/Context
This subdivision is associated with the contexts of Community Planning and Development and Builders and Developers.

Historical Association
The Tempe Estates subdivision was developed by Elmer Bradley, Clyde Gilliland, and C. I. Waggner in 1959. Bradley Construction Company built most of the homes in the tract.

BIBLIOGRAPHY/SOURCES
Maricopa County Recorder, Book 70 of Maps, Page 23; TDN, 20 Feb 1959.

RECOMMENDATIONS
This subdivision will become eligible as an historic district in about 2010.
HISTORIC SUBDIVISION INVENTORY FORM

PROPERTY IDENTIFICATION
Survey Area: Tempe Modern Streetcar Study
Site No.: TSC-HD8

Subdivision Name: Nu-Vista (Units 1-6)
Location: Approximately between Alameda Dr./Southern Ave. and College Ave./Farmer Ave.
City or Town: Tempe
County: Maricopa
Plats / Years of Platting: Nu-Vista Unit 1 – plat approved by City of Tempe on 22 Oct 1959.
Later additions include Unit 2 - 24 Mar 60, Unit 3 - 14 Jul 60, Unit 4 - 27 Oct 60, Unit 5 - 28 Jan 61,
and Unit 6 - 13 Apr 61.
Township: 1N
Range: 4E
Section: 27
Quarter Section: SW
Acreage: 110
UTM Reference: Zone: NAD: 38
East: A. 412288
B. 413052
C. 413043
D. 41288
North: A. 3696030
B. 3696030
C. 3695339
D. 3695563

FIELD PHOTO DATA
Description:
Typical Ranch style house
at 30 W. Del Rio Circle
Date of Photo:
3 May 2011
View Direction:
Toward northeast
Digital File / Image No:
DSC 03728
Photographer:
Paul Sikorski

PROPERTY USES AND FUNCTIONS
DOMESTIC/Single Dwelling=residences, Multiple Dwelling=duplexes; RELIGION/religious facility=church;
COMMERCE/business=office building, /restaurant

SIGNIFICANCE
Development Period: Initial: 1960
Substantial Build-Out: 1961
Final Build-out: 1962 (housing)
Context:
Production Housing Subdivisions in Tempe, Arizona; 1960-1975
Area(s) of Significance:
Community Planning and Development; Architecture
Significant under Criterion:
X A B C D; Consideration - ; Level local
Statement of Significance:
Criterion A. Historic Events & Associations
After quick sales of their homes in the popular Hughes Acres tract, the Knoell Brothers Construction Company
began developing a much larger subdivision on both sides of Mill Avenue south of Alameda Drive. In 1960, the
company began building masonry houses with three or four bedrooms, two baths, a family room, and central air
conditioning. All homes in Nu-Vista were built with a garage, and had a gas light in the front. The innovative use
of cul-de-sacs throughout the subdivision plan created small secluded neighborhoods with little through traffic.
Twelve different models sold for $12,900 to $15,750. Three large tracts of Nu-Vista hold A) church 1961, B)
commercial 1960, and C) duplexes 1968.

Criterion C. Design & Construction
Nu-Vista is significant as being one of the first of Tempe’s large-scaled production housing subdivisions that
combined financing, marketing, planning, materials, and design as a complete product for homebuyer
consumption. The houses began using concrete block and aluminum windows, air conditioners and two-car
GENERAL PHYSICAL DESCRIPTION

Design of Subdivision(s):
- Road / Block Layout: Curved streets, cul-de-sacs & alleys; subdiv flanks arterial street
- Parcel Shapes / Sizes: Narrow frontage rectangular lots about 70'x103'
- Right-of-way Features: Sidewalk at back of rolled curb/gutter; steel light poles
- Utilities: Sewer and overhead power lines in alley, water and gas in street
- Other: Large tracts left for commercial development along arterial streets

Design of Buildings:
- Representative Styles: Ranch Style
- Roof / Bldg Massing: Gable, hip, gabled-hip/rectangular, gable-front-with-wing
- Garages / Carports: Attached two-car garages flush with primary façade or porch
- Porches: Small shed porches or extended eaves over concrete stoops

Predominant Materials:
- Foundations: Concrete
- Wall Structure: Concrete block 8x4x16
- Wall Finishes: Painted concrete block
- Window Types: Mill-finish aluminum sliders
- Roofing: Asphalt shingles
- Features: Chalet fascias, weeping mortar, brick wainscots, clapboard gables

Workmanship / Distinctive Features:
- Standard mass-production construction for masonry houses; decorative woodwork

Setting:
- Landscape: Original green landscaping of trees, shrubs, and lawns
- Site Features: 6-ft-high concrete block walls around side and back yards
- Site Layout: Regular rhythm of house facades through uniform setbacks and spacing

PHYSICAL CONDITION

Describe: Generally well-maintained homes but landscaping needs more

INTEGRITY (Describe integrity losses)

Design:
- Some windows outlined w/ pop-out frames and alum. sliders changed to vinyl
- Some exterior concrete block walls are sheathed w/ stucco
- Masonry technique sometimes concealed by stucco
- Original lush landscaping is being changed to xeriscape and gravel

NATIONAL REGISTER ELIGIBILITY RECOMMENDATION as a Historic District

Name of Historic District: Nu-Vista Historic District

Listed X Eligible as HD Not eligible as HD Need more data to evaluate

408 Total Properties = 90% Est. Contributors + 10% Est. Noncontributes + 0% Vacant lots

Reason not eligible:
- Lack of significance
- Insufficient age Year may be eligible
- Loss of integrity Reversible
- Not reversible

BIBLIOGRAPHY / SOURCES

Maricopa County Recorder: Book 85 of Maps, Page 31; Bk 89, Pg 13; Bk 90, Pg 50; Bk 92, Pg 19; Bk 93, Pg 17’ Bk 85, Pg 1; TDN, 22, 25 Jun 1960.

FORM COMPLETED BY

Name and Affiliation: Don Ryden, AIA — Ryden Architects, Inc.
Mailing Address: 902 W. McDowell Rd. — Phoenix, AZ 85007
E-mail Address: thefrontdoor@rydenarchitects.com

Date: 30 June 2011
Phone: 602-253-5381
STATE OF ARIZONA

Historic Property Inventory Update Form

This form is used only to provide additional information about a property previously documented with a State of Arizona Historic Property Inventory Form on file at the State Historic Preservation Office. A property within a proposed historic district being nominated to the National Register of Historic Places must have information no less than three years old at the time of submission.

Inventory No.: RYDEN T-438
Address: 1201 S. Forest Avenue
City or Town: Tempe

HISTORIC SIGNIFICANCE
Note any additional information concerning the property's significance since initial recording

CONDITION
Describe the current structural condition of the property
☐ Good (well maintained) ☐ Fair (some problems apparent) ☐ Poor (major problems; imminent threat) ☐ Ruin/Uninhabitable

Comments:

INTEGRITY:
Describe any modifications/alterations to the property not previously noted on the original Historic Property Inventory Form.

PRIOR PROPERTY STATUS
☐ Listed Individually ☐ Contributor ☐ Noncontributor Date Listed: __________

☐ Determined eligible by Keeper of the National Register Date: __________

☒ Previously recommended eligible ☐ Previously recommended ineligible Date: 10/7/1996

If property was previously determined ineligible, briefly state reason (age, integrity):

RECOMMENDATIONS OF ELIGIBILITY (opinion of SHPO staff or survey consultant)
Property ☒ is ☐ is not eligible individually.
Property ☒ is ☐ is not eligible as a contributor to a potential historic district.

☐ More information needed to evaluate

If status has changed, state reason:

PHOTOGRAPH
Direction of View:
West

Update Form Completed By:
T. Jones and A. Gregory, ACS

Date: 12/23/2014
Appendix C: Maps of National Register Eligible Properties within APE
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Appendix D: Tempe Streetcar Project Conceptual Engineering Drawings
(Separate Volume)
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TEMPE STREETCAR
MARINA HEIGHTS / RIO SALADO PKWY TO DORSEY / APACHE BLVD STATION

DATE: 09 FEBRUARY 2015

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