



**PHASE I
ENVIRONMENTAL SITE ASSESSMENT**

0 Chism St.
(APN: 010-610-16)
Reno, Nevada, 89503

Prepared for:

Nevada Division of Environmental Protection-Brownfields Program
Attn: Mr. David Friedman
901 S. Stewart St., Suite 4001
Carson City, NV 89701
Task BC03-19
Category 54
Organizational Code 5429
Job Number 6681717

Prepared by:

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April 5, 2019

Project No.: 18-02-211



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Creating Solutions. Building Trust.

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Nevada Division of Environmental Protection-Brownfields Program
901 S. Stewart St., Suite 4001
Carson City, NV 89701

Attn: Mr. David Friedman

RE: Phase I Environmental Site Assessment, 0 Chism St., (APN: 010-610-16), Nevada 89503.

Dear Mr. Friedman:

Attached is the report titled *Phase I Environmental Site Assessment, 0 Chism St., (APN: 010-610-16), Nevada*. This report includes a description of activities performed and results obtained from the investigation.

Should you have questions regarding the work performed or results obtained, please do not hesitate to contact us.

Sincerely,

BROADBENT & ASSOCIATES, INC.

Brandon Reiff, PG, CEM #2300 (exp. 3/23/20)
Senior Geologist

Enclosure: Phase I Environmental Site Assessment

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List of Drawings

- 1 Site Location Map
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List of Commonly Used Acronyms

AAI – All Appropriate Inquiries
APN – Assessor’s Parcel Number
AST – Aboveground Storage Tank
ASTM – ASTM International
Broadbent – Broadbent & Associates, Inc.
CDL – Clandestine Drug Laboratory
CERCLA – Comprehensive Environmental Response, Compensation, and Liability Act
CFR – Code of Federal Regulations
CREC – Controlled Recognized Environmental Condition
EDR – Environmental Data Resources
EMI – Emissions Inventory Data
EPA – United States Environmental Protection Agency
ESA – Environmental Site Assessment
FID – Facility Inventory Database
FINDS – Facility Index System
FIFRA – Federal Insecticide, Fungicide and Rodenticide Act
HAZNET – Hazardous Waste Facility & Manifest Database
HREC – Historical Recognized Environmental Condition
LF – Landfill
LUST – Leaking Underground Storage Tank
NDEP – Nevada Division of Environmental Protection
NPL – National Priorities List
PCB – Polychlorinated-biphenyls
ppb – Parts per billion
ppm – Parts per million
PVC – polyvinyl chloride
RCRA – Resource Conservation & Recovery Act
RCRIS – Resource Conservation & Recovery Act Information System
RDA – Redevelopment Agency
REC – Recognized Environmental Condition
SARA – Superfund Amendments and Reauthorization Act
SLIC – Spills, Leaks, and Investigation Cleanups
SCS – Soil Conservation Service
SWEEPS – Statewide Environmental Evaluation and Planning System
SWF – Solid Waste Facility
SWRCY – Solid Waste Recycler Database
TSCA – Toxic Substances Control Act
USDA – United States Department of Agriculture
USGS – United States Geological Survey
UST – Underground Storage Tank

Executive Summary

To assist the City of Reno with their due diligence efforts, Broadbent & Associates, Inc. (Broadbent) has conducted this Phase I Environmental Site Assessment (ESA) on the real property located at 0 Chism St., (APN: 010-610-16), Reno, Nevada 89503. This ESA was conducted in conformance with the scope and limitations of ASTM Practice E1527-13: *Standard Practice for Environmental Site Assessments – Phase I Environmental Site Assessment Process*, and the United States Environmental Protection Agency (EPA) final rule contained within Code of Federal Regulations Volume 40 Part 312 – *Standards and Practices for All Appropriate Inquiries*. Exceptions to, or deletions from, this practice are described in Section 1 of this report. Use of the referenced ASTM Process is intended to satisfy requirements for conducting “all appropriate inquiries” (AAI) under the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA).

This assessment has revealed no recognized environmental conditions in connection with the Property.

Section 1: Introduction

This section describes the purpose of and authorization for conducting this assessment. Also discussed are significant assumptions, deviations, special terms and conditions, and user reliance on this report.

1.1 Purpose

To assist the City of Reno with their due diligence efforts relative to the site located at 0 Chism St., (APN: 010-610-16), in Reno, NV (Property), Broadbent & Associates, Inc. (Broadbent) conducted an All Appropriate Inquiry Phase I Environmental Site Assessment (ESA) consistent with the ASTM International Standard E1527-13: *Standard Practice for Environmental Site Assessments – Phase I Environmental Site Assessment Process*, and the United States Environmental Protection Agency (EPA) final rule contained within Code of Federal Regulations (CFR) Volume 40 Part 312 – *Standards and Practices for All Appropriate Inquiries* (AAI). The purpose of this due diligence investigation is to identify recognized environmental conditions (RECs), controlled recognized environmental conditions (CRECs), historical recognized environmental conditions (HRECs), and/or *de minimis* conditions as defined below.

A REC is defined by ASTM International as:

“The presence or likely presence of any hazardous substances or petroleum products in, on, or at a property: (1) due to release to the environment; (2) under conditions indicative of a release to the environment; or (3) under conditions that pose a material threat of a future release to the environment. *De minimis* conditions are not recognized environmental conditions.”

A HREC is defined by ASTM International as:

“A past release of any hazardous substances or petroleum products that has occurred in connection with the property and has been addressed to the satisfaction of the applicable regulatory authority or meeting unrestricted use criteria established by a regulatory authority, without subjecting the property to any required controls (for example, property use restrictions, activity and use limitations, institutional controls, or engineering controls).”

A CREC is defined by ASTM International as:

“A recognized environmental condition resulting from a past release of hazardous substances or petroleum products that has been addressed to the satisfaction of the applicable regulatory authority (for example, as evidenced by the issuance of a no further action letter or equivalent, or meeting risk-based criteria established by regulatory authority), with hazardous substances or petroleum products allowed to remain in place subject to the implementation of required controls (for example, property use restrictions, activity and use limitations, institutional controls, or engineering controls).”

A *De Minimis* Condition is defined by ASTM International as:

“A condition that generally does not present a threat to human health or the environment and that generally would not be the subject of an enforcement action if brought to the attention of appropriate governmental agencies. Conditions determined to be *de minimis* conditions are not recognized environmental conditions nor controlled recognized environmental conditions.”

1.2 Scope of Work

Various investigative methods were utilized to complete this ESA. Specific items accomplished include the following:

- Prepared a general site description
- Reviewed User-provided information
- Reviewed readily ascertainable environmental records
- Conducted a site reconnaissance
- Conducted interviews
- Identified data gaps (if present)
- Prepared this ESA report summarizing assessment results

1.3 Significant Assumptions

Conclusions stated in this report are based upon observations made by employees of Broadbent and also upon information provided by others. It is assumed that these observations and information are accurate. However, Broadbent cannot be held responsible for the accuracy of the information provided by others. The scope of this ESA does not purport to encompass every report, record, or other form of documentation relevant to the Property being evaluated.

1.4 Deviations

There were no deviations from the ASTM International standards.

1.5 Special Terms and Conditions

Observations contained within this assessment are based upon Property conditions readily visible and present at the time of the site reconnaissance. These Property observations are unable to specifically identify conditions of potential mold, asbestos containing building materials, subsurface soil, groundwater, vapor, or underground storage tanks, unless specifically mentioned. This ESA does not attempt to address the unidentified past or forecast future Property conditions.

1.6 Reliance

The enclosed ESA has been conducted for the use of NDEP and the City of Reno and may not be reproduced, distributed, or relied upon by others without the prior written authorization of NDEP and Broadbent. A Reliance Letter can be prepared for additional use upon request by NDEP.

Section 2: Site Description

This section describes the Property with its location and legal description, general vicinity characteristics, current uses, description of on-site improvements, and current uses of adjoining properties.

2.1 Location and Legal Description

The Property is located within the incorporated limits of Reno, NV. The Property's current physical address is 0 Chism St. APN 010-610-16, Reno, NV. The Washoe County Assessor's Parcel Number is 010-610-16. A Copy of the Washoe County Assessor's Parcel Map for the Property is provided in Appendix A.

Approximate latitude and longitude coordinates for the center of the Property are 39.525104 North, -119.829474 West NAD83. The Property is located within a portion of the southeast quarter of Section 10, Township 19 North, Range 19 East, relative to the Mount Diablo Baseline and Meridian. The Property is covered by the United States Geological Survey (USGS) 6723545 Reno, NV 7.5-minute quadrangle topographic map. A Site Location and Property Location Map are provided as Figures 1 and 2, respectively.

2.2 Current Uses of the Site

The Property is a vacant Industrial lot (1.538 acres). No RECs, CRECs, and/or HRECs were noted relative to the Property based on review of current uses of the Property.

2.3 Description of Structures, Roads, and Other Improvements

The Property is currently a vacant industrial lot. Additional Property information is provided in the table below.

Size of Property (approximate)	According to the Washoe County Assessor the approximate size of parcel is 1.538 acres.
General Topography of Property	The Property has a gradual downward slope to the south-southeast.
Adjoining and/or Access/Egress Roads	The Property is accessible by entrances/exits on the southern side of the Property via Chism St. and Arletta St.
Paved or Concrete Areas (including parking)	None
Unimproved Areas	There are no known unimproved areas.
Landscaped Areas	No landscaped areas were observed on the Property.
Surface Water	At its closest point the Truckee River is approximately 900 ft west-southwest of the Property.
Potable Water Source	Truckee Meadows Water Authority
Sanitary Sewer Utility	Washoe County
Storm Sewer Utility	Washoe County
Electrical Utility	NV Energy
Natural Gas Utility	NV Energy

No RECs, CRECs, and/or HRECs were identified relative to the Property based on review of structures, roads and other improvements to the Property.

2.4 Current Uses of Adjoining Properties

Adjoining properties are used for various purposes. Uses of adjoining properties at the time of this investigation are the following:

<i>Direction</i>	<i>Address</i>	<i>Use & Occupant</i>	<i>Comments</i>
North	N/A	Union Pacific Railroad	None
South	N/A N/A 250 Chism St.	Chism St. Arletta St. Industrial Warehouse	Public thoroughfare Public thoroughfare APN 010-041-01
West	0 Chism St.	Vacant Industrial lot	APN: 010-610-02
East	265 Keystone Ave.	Vacant Industrial buildings	APN: 010-610-17

No RECs, CRECs, and/or HRECs were identified relative to the Property based on review of current uses of adjoining properties.

Section 3: User-Provided Information

The purpose of this section is to detail User-provided information used to help identify the possibility of RECs in connection with the Property. A User Questionnaire was provided to the User to assist them in compiling pertinent information. User-provided information is summarized below and included in Appendix B.

3.1 Owner, Key Property Manager, or Occupant Provided Information

According to Washoe County Assessor Data, the Property is owned by the City of Reno. The Property is currently an undeveloped industrial lot.

3.2 Title Records, Environmental Liens or Activity and Use Limitations

Reasonably ascertainable recorded land title records should be checked by the User to identify environmental liens or activity and use limitations, if currently recorded against the Property. Environmental liens or activity and use limitations so identified are supposed to be reported to the Environmental Professional conducting the ESA. No evidence of environmental liens or activity and/or use limitations was discovered or brought to the attention of Broadbent.

No RECs, CRECs, and/or HRECs were identified relative to the Property based on review of title records, environmental liens, or activity and use limitations.

3.3 Specialized Knowledge

If the User has or is aware of any specialized knowledge or experience that is material to RECs in connection with the Property, it is the User's responsibility to communicate this information to the Environmental Professional. The User indicated there was an archeological site on the Property. The archeological case on the Property is currently closed. The User provided a Site Monitoring and Artifact Agreement (Appendix B). The Site Monitoring and Artifact Agreement is discussed further in Section 6.1.

No RECs, CRECs, and/or HRECs were identified relative to the Property based on review of available specialized knowledge.

3.4 Valuation Reduction for Environmental Issues

In a transaction involving the purchase of a parcel of real estate, if a User has actual knowledge that the purchase price of the Property is significantly less than the purchase price of comparable properties, the User should try to identify an explanation for the lower price and to make a written record of such explanation. User provided no information relative to valuation reduction relative to the Property.

No RECs, CRECs, and/or HRECs were noted relative to the Property based on review of information relative to valuation reduction for environmental issues.

3.5 Reason for Conducting Phase I

The purpose of this ESA was to identify existing or potential RECs, CRECs, and/or HRECs (as defined by ASTM Standard E1527-13) in connection with the Property, and it is assumed to also be to qualify the User for Landowner Liability Protection (LLP) relative to potential CERCLA liability.

Section 4: Records Review

The purpose of a Records Review is to obtain and review records that will help identify RECs, CRECs, and/or HRECs in connection with the Property. A discussion of each record source is provided below.

4.1 Physical Setting

Physical setting information for the Property was obtained by a review of sources that included, but was not limited to, USGS topographic maps and a USDA soil survey report.

4.1.1 *Topography*

The USGS, 6723545 Reno, NV Quadrangle 7.5-Minute series topographic map was reviewed for this ESA. According to the contour lines on the topographic map, the Property is located at an approximate elevation of 4,532 ft above mean sea level. The contour lines in vicinity of the Property indicate the area has a gradual downward slope to the south-southeast.

4.1.2 *Surface Water Bodies*

At its closest point the Truckee River is approximately 900 ft west-southwest of the Property. One monitoring well was observed on the Property. The monitoring well is discussed further in section 5.9. No on-site springs were observed during the Property reconnaissance. No settling ponds, lagoons, surface impoundments, wetlands or natural catch basins were observed on the Property during this investigation.

4.1.3 *Geology and Hydrology*

The Property is located adjacent west of downtown Reno, NV. The geological deposits of this area are described by the USGS as stratified sequences of quaternary alluvium. Based on the soil survey maps published by the USDA Soil Conservation Service (SCS), the Property is predominately mapped as "Orr" which is gravelly sandy loam soil texture. The Property soil hydrologic group classification is Class B – Moderate infiltration rates. Class B soils are "deep and moderately deep, moderately well and well drained soils with moderately coarse textures."

The groundwater flow direction in the vicinity of the Property is assumed to be toward the south based on surface topography and the proximity of the Truckee River. Depth to groundwater is expected to be approximately 5-15 feet below land surface (BLS) in the area near and beneath the Property, according to the Nevada Division of Water Resources on-line Well Log Database.

4.2 Environmental Record Sources

Broadbent contracted Environmental Data Resources, Inc. (EDR) to conduct a search of available state, federal, and other ascertainable environmental records. The area searched included the Property and surrounding area within approximate minimum search distances from the Property boundary, dependent on listing type, as defined by ASTM International. A complete listing of records searched is available in the EDR Radius Report provided in Appendix C. An abbreviated list of search results is provided in the table below relative to records that identified a regulatory listing relevant to the Property. A subsequent discussion is provided relative to identified potential concerns.

<i>Standard Database List Per ASTM International</i>	<i>Database Date (M/D/Y)</i>	<i>Subject Property Listed (Y or N)</i>	<i>Total No. of Listings</i>	<i>Environmental Concern Posed to the Subject Property (Y or N)</i>
Federal Agencies				
Federal NPL Sites (<1.0 mile)	11/14/18	N	0	N
Federal Delisted NPL Sites (<1.0 mile)	11/14/18	N	0	N
Federal SEMS Sites (< 0.5 mile)	11/14/18	N	0	N
Federal CERCLIS NFRAP Sites (<0.5 mile)	11/14/18	N	0	N
RCRA CORRACTS Sites (<1.0 mile)	3/1/18	N	0	N
RCRA non-CORRACTS TSD Facilities (< 0.5 mile)	3/1/18	N	0	N
RCRA LQG (<0.25 mile)	3/1/18	N	0	N
RCRA SQG (<0.25 mile)	3/1/18	N	0	N
RCRA CESQG (<0.25 mile)	3/1/18	N	5	N
Federal ERNS Sites (Property Only)	9/24/18	N	0	N
US Institutional/Engineering Controls (<0.5 mile)	7/31/18	N	0	N
State Agencies				
State & Tribal equivalent CERCLIS (SHWS) (<1.0 mile)	9/18/18	N	182	N
State & Tribal SWF/LF (<0.5 mile)	8/27/18	N	0	N
State & Tribal LUST (<0.5 mile)	9/18/18	N	2	N
State & Tribal ASTs (<0.25 mile)	1/25/18	N	0	N
State & Tribal USTs (<0.25 mile)	1/25/18	N	25	N
State & Tribal Voluntary Cleanup Sites (<0.5 mile)	9/18/18	N	0	N
State & Tribal Brownfield Sites (<0.5 mile)	9/18/18	N	0	N
Other Ascertainable Records				
US Brownfields (<0.5 mile)	9/18/18	N	0	N
Recycling Facilities in Nevada (SWRCY) (<0.5 mile)	10/12/18	N	6	N
RCRA-NonGen (<0.25)	3/1/18	N	22	N
EDR Exclusive				
EDR US Historic Auto Station (<0.125 mile)	NA	N	9	N
EDR US Historic Dry Cleaners (<0.125 mile)	NA	N	1	N
EDR US Manufactured Gas Plants (<0.25 mile)	NA	N	1	N

Based on information contained within the EDR report, the Property was not listed in the databases that were searched. Database results for properties surrounding the target property are discussed below.

Results of the records search found 182 sites located within one mile of the Property listed on the Corrective Action Sites (SHWS) database. Sixteen of these SHWS sites are within 0.25 miles of the Property. These 16 sites were identified as petroleum hydrocarbon releases affecting soil and/or groundwater. 15 of the 16 sites have been granted closure by the appropriate agency. The active SHWS site is approximately 800 ft east-northeast of the Property. The site is identified as Oppio Ranches LLC (Facility ID No. 4-000329). This site was listed on the SHWS database as a result of a gasoline release which affected soil at the site. The gasoline release at this site was reported to the NDEP on April 3, 2018. As of the date of this report, remedial action is being conducted (by the applicable responsible party) to address the release. Additional discussion relative to this site is provided in Section 4.5. Given that this release appears to only affect soil at the site, and that the applicable responsible party is currently addressing the release with oversight from the Washoe County Health Department (WCHD), the potential for environmental impact to the Property appears to be low.

The LUST database indicates two sites within 0.5 miles of the Property. The nearest LUST site is approximately 1,972 ft north of the Property. The site is identified as Keystone Shell (Facility ID No. 4-000573). This site is listed on the LUST database as a result of a gasoline release which affected soil and groundwater at the site. The site was granted closure on November 2, 2004 by the appropriate agency. Given the site status, and distance from the Property, the potential for environmental impact to the Property appears to be low.

The second LUST site is located approximately 2,198 ft north of the Property. The site is identified as AM/PM #82438 (Facility ID No. 4-000017). The Site is listed on the LUST database as a result of a gasoline release which affected soil and groundwater at the site. The site was granted closure on May 31, 2013 by the appropriate agency. Given the site status, and distance from the Property, the potential for environmental impact to the Property appears to be low.

Other sites listed in the table above, but not yet specifically discussed, do not likely pose a significant environmental concern relative to the Property for one or more of the following reasons: distance from Property; relative location to the Property, regulatory status of site, operating UST facilities with no violations, UST facilities that are permanently out of service, site listing not indicative of a release but rather simply indicating that the site/facility may possess chemicals of concern (e.g. RCRA Non-Gen).

4.3 Vapor Intrusion

Vapor intrusion occurs when chemicals volatilize and migrate from impacted soil and/or groundwater up into a building's interior space. Vapor intrusion can pose a potential health threat to the occupants of the building, especially to sensitive populations such as the elderly and children.

Sites within the approximate minimum search distances of 1/3 of a mile for chemicals of concern (COC) and 1/10 of a mile for petroleum hydrocarbon COC were reviewed. Based on the regulatory status, the characteristics of the offsite suspect sources, and/or lack of documented groundwater plumes within the areas of concern, it is unlikely that the Property has been impacted by vapor intrusion from surrounding sites.

4.4 Historical Record Sources

The following standard historical sources may be used to meet the historical record sources review requirements of ASTM E1527-13: aerial photographs; fire insurance maps; property tax files; land title records (although these cannot be the sole historical source consulted); topographic maps; city directories; building department records; or zoning/land use records. ASTM E1527-13 requires "All obvious uses of the property shall be identified from the present, back to the property's first developed use, or back to 1940, whichever is

earlier.” This task requires reviewing only as many of the standard historical sources as are necessary and that are reasonably ascertainable and likely to be useful.

4.4.1 Historical Topographic Maps

The following historical topographic maps were reviewed and described. Copies of the historical topographic maps are provided in Appendix D.

Date(s)	Map Source & Scale	Property Observations	Surrounding Area Observations
1891	Reno Quad 1:125000	Property is undeveloped.	Downtown Reno is recorded east of the Property on this map. Central Pacific Railroad, V&T Railroad, and the Truckee River are recorded on this map.
1893	Reno Quad 1:125000	No significant change.	No significant change.
1950	Reno Quad 1:62500	No significant change.	Increasing development of downtown Reno area. Apparent building structures are observed south of the Property. Reno High School, S. Virginia S., Idlewild Park, University of Nevada-Reno, Virginia Lake, and Highland Reservoir are recorded on this map.
1951	Reno Quad 1:62500	No significant change.	No significant change.
1967	Reno Quad 1:62500	Several buildings are now outlined on the Property.	Keystone Ave is identified east of the Property. A trailer park is recorded south of the Property. I-80 and the Union Pacific Railroad are recorded north of the Property.
1974	Reno Quad 1:24000	No significant change.	Increasing development of Reno. Interstate 80 is being constructed on the map. Surrounding area of the Property is predominately residential/commercial.
1982	Reno Quad 1:24000	No significant change.	I-80 is developed north of the Property. Additional residential structures are developed southeast of the Property.
2015	Reno Quad 1:24000	No significant change.	Surrounding area and roads appear to be developed in their current configuration on this map.

No RECs, CRECs, and/or HRECs were identified relative to the Property based on review of the historical topographic maps.

4.4.2 Historical Aerial Photographs

The following historical aerial photographs were reviewed and described. Copies of the historical aerial photographs are provided in Appendix D.

Date(s)	Photo Source & Scale	Property Observations	Surrounding Area Observations
1939	USDA 1" = 500'	Property is primarily undeveloped with the exception of a dirt road on the west side of the Property.	A vacant lot is adjacent west of the Property. An apparent residential/commercial structure is seen on the adjacent eastern property. Downtown Reno is adjacent east of the Property. The Truckee River is south of the Property. The Union Pacific Railroad is adjacent north of the Property.
1946	USGS 1" = 500'	Several apparent warehouse structures and storage of materials is apparent on the Property.	Adjacent warehouses are observed west and east of the Property. Apparent residential structures are seen south of the Property. Idlewild Park is developed southwest of the Property.
1953	USGS 1" = 500'	No significant change.	Development of a large commercial shopping complex to the north of the Property. A vacant lot is adjacent east of the Property. Further development of residential structures south of the Property
1959	NHD 1" = 500'	Increase in storage materials/equipment is seen on the Property.	Further development of residential housing southeast of the Property. Development of apparent warehouses and storage materials is observed adjacent east of the Property. Arletta St., and Chism St. are seen in this photo. Development of apparent warehouse and a residential mobile home park northwest of the Property. Reno High School is seen south of the Property on this map. Further development of industrial warehouses north of the Property.
1962	NHD 1" = 500'	No apparent building structures are observed on the Property. Majority of equipment/materials have been removed from Property.	Development of apparent commercial shopping plaza is seen north of the Property in this photo. Apparent warehouse is developed adjacent west of the Property.

1966	USGS 1" = 500'	A large warehouse is seen on the Property.	Development of a large warehouses adjacent west, south, and east of the Property. Keystone Ave. is developed to four lanes east of the Property. The Keystone Ave. bridge is being constructed over the Truckee River in this photo.
1972	SLA 1" = 500'	No significant change.	Further development of apparent warehouses adjacent east of the Property. I-80 is seen under construction north of the Property.
1974	USGS 1" = 1000'	No significant change. (Poor image quality)	No significant change. (poor image quality.)
1994	USGS 1" = 500'	Warehouses on the Property no longer appear. The Property is an apparent vacant lot. (poor quality photo).	I-80 is developed north of the Property. Several warehouses adjacent west and east of the Property no longer appear. Vacant lots are adjacent west and east of the Property. (poor quality photo).
1999	USGS/DOQQ 1" = 500'	The Property appears to have stockpiled soil/dirt on it.	Surrounding property to the east has apparent disturbed/stockpiled dirt piles on it.
2006	USDA/NAIP 1" = 500'	The Property is cleared and leveled as a vacant lot.	Surrounding area buildings appear to be developed in their current configuration in this photo.
2010	USDA/NAIP 1" = 500'	No significant change.	No significant change.
2013	USDA/NAIP 1" = 500'	No significant change.	No significant change.
2017	USDA/NAIP 1" = 500'	No significant change.	No significant change.

No RECs, CRECs, and/or HRECs were identified relative to the Property based on review of the historical aerial photographs.

4.4.3 Fire Insurance Maps

Fire insurance maps were initially produced by private companies (such as Sanborn, Perris, and the Fire Underwriters Inspection Bureau) for the insurance industry to provide information on the fire risks of buildings and other structures. Fire insurance maps have become a valuable historical resource for persons concerned with evaluating the potential for site contamination based on the history of past Property use. Fire insurance maps are available for approximately 12,000 US cities and towns during the period from 1852 to the present. Map coverage is most comprehensive in urban core areas

and in older suburbs. Map coverage is limited in suburban areas developed after 1950. Broadbent queried EDR's collection of fire insurance maps for coverage of the Property. A copy of the Certified Sanborn Map Report is provided in Appendix D.

Date(s)	Map Source	Property Observations	Surrounding Area Observations
1918	Sanborn	The Property does not have any mapped buildings.	The area east of the Property is mapped. The Union Pacific Railroad is mapped adjacent north of the Property. A Standard Oil Company and Reno Pressed Brick Company are recorded north of the Property on this map. Arletta St. is recorded on this map.
1949	Sanborn	No significant change.	The area east of the Property is mapped. Several kilns are mapped east of the Standard Oil Company building. Richfield Oil Company is recorded on this map. US Highway 40 is recorded on this map.
1955	Sanborn	No significant change.	Brick drying sheds and a garage are mapped north of the Property. The Mirador Motel is recorded on this map. Further development of industrial buildings north of US Hwy 40 are recorded on this map.
1957	Sanborn	No significant change.	No significant change.
1966	Sanborn	An industrial building is mapped on the eastern portion of the Property.	Development of industrial buildings are recorded east of the Property. Home Lumber & Supply Co., Cement warehouse, and a plumbing warehouse are recorded east of the Property on this map. The kilns and brick drying sheds are no longer recorded on this map. Further development of several small industrial buildings are recorded just north of the railroad on this map.
1970	Sanborn	No significant change.	No significant change.
1972	Sanborn	No significant change.	No significant change.

No environmental RECs, CRECs, and/or HRECs were identified relative to the Property based on review of the historical fire insurance maps.

4.4.4 City Directories

City directories have been published for cities and towns across the US since the 1700s. Originally a list of residents, the city directory developed into a sophisticated tool for locating individuals and businesses in a particular urban or suburban area. Twentieth-century directories are generally developed into three sections: a business index, a list of resident names and addresses, and a street index. With each address, the directory lists the name of the resident or, if a business is operated from this address, the name and type of business (if unclear from the name). While city directory coverage is comprehensive for major cities, it may be less comprehensive for rural areas and small towns.

Broadbent requested EDR to provide a search of available historic city directories that may list the Property. EDR researched Cole Information and Polk's City Directories for non-sequential years beginning in 1932 and up to 2013. It should be noted that residential addresses within the unincorporated portions of counties were typically not included within city directories. Results of this search did not yield any results on the target Property. Results of this search are included in Appendix D.

No environmental RECs, CRECs, and/or HRECs were noted relative to the Property based on review of the historical city directories.

4.5 Other Environmental Records

Broadbent conducted a file review on the nearby site identified as Oppio Ranches LLC (Facility ID No. 4-000329). As discussed in Section 4.2, this site was listed on the SHWS database as a result of a gasoline release which affected soil at the site. During demolition of the site's gas station dispenser canopy, petroleum hydrocarbon impacted soils were found during excavation of the canopy's footings. The petroleum hydrocarbon release at this site was reported to the NDEP on April 3, 2018. NDEP assigned spill report #180403-01 to the Property. Copies of NDEP and WCHD files regarding this release are provided in Appendix E.

As of the date of this report, remedial action is being conducted (by the applicable responsible party) to address the release. WCHD is overseeing the remediation of this release. Additional discussion relative to this site is provided in Section 5.3. Given that this release appears to only affect soil at the site, and that the applicable responsible party is currently addressing the release with oversight from the Washoe County Health Department (WCHD), the potential for environmental impact to the Property appears to be low.

Section 5: Site Reconnaissance

Mr. Brandon Reiff of Broadbent conducted a site reconnaissance of the Property on January 24, 2019, as discussed below. The weather was sunny and cold. Photographs of the Property and vicinity taken during the site reconnaissance are provided within Appendix F.

5.1 Hazardous Substances in Connection with Identified Uses

No hazardous substances or petroleum products in connection with current identified uses were observed within the boundaries of the Property during the site reconnaissance. No hazardous substances or petroleum products in connection with current identified uses were observed on properties adjoining the Property when observed from the Property or publicly accessible areas. As such, no RECs from hazardous substances or petroleum products in connection with current identified uses were known to be present on the Property at the time of the reconnaissance.

5.2 Hazardous Substance and Unidentified Substance Containers

No hazardous substance, unidentified substance, or petroleum products containers were observed within the boundaries of the Property during the site reconnaissance. No hazardous substance, unidentified substance, or petroleum product containers were observed on properties adjoining the Property when observed from the Property or publicly-accessible areas. As such, no RECs from hazardous substance or unidentified substance containers were known to be present on the Property at the time of the reconnaissance.

5.3 Storage Tanks

No evidence of existing or historic storage tanks, vent pipes, fill pipes, or access ways indicating USTs or ASTs was observed within the boundaries of the Property during the site reconnaissance or records review.

Evidence of storage tanks was observed on properties in the vicinity of the Property when observed from the Property or publicly-accessible areas. USTs were observed at the Maverick gas station (Oppio Ranches site) located approximately 800 feet east-northeast of the Property. According to the EDR Report, the site has four temporarily out of use USTs at the site. USTs for the Maverick gas station are listed below:

<i>Use Status</i>	<i>Year Installed</i>	<i>Capacity (gal.)</i>	<i>Contents</i>	<i>Construction Materials</i>	<i>Comments</i>
UST	May 1986	10,000	Gasoline	Composite Steel	Temporarily out of use
UST	May 1986	10,000	Gasoline	Composite Steel	Temporarily out of use
UST	May 1986	6,000	Gasoline	Composite Steel	Temporarily out of use
UST	May 1986	6,000	Diesel	Composite Steel	Temporarily out of use

No RECs from storage tanks were known to be present on the Property at the time of the reconnaissance.

5.4 Polychlorinated Biphenyls

Polychlorinated biphenyls (PCBs) are a class of stable compounds that are toxic to the liver and are linked to cancer. The US EPA considers PCBs a Priority Pollutant under the Clean Water Act. The maximum contaminant level of PCBs allowed in drinking water is 0.5 parts per billion (ppb). Due to PCBs' toxicity and classification as a persistent organic pollutant, the United States prohibited the manufacture of PCBs after July 1, 1979 in the Toxic Substances Control Act (TSCA) of 1976. Until then, PCBs were widely used as coolant and dielectric insulating fluids for oil-filled electrical transformers and capacitors (such as those used in ballasts of old fluorescent and high-intensity discharge lights). PCBs were also used as plasticizers in paints and cements, stabilizing additives in flexible polyvinyl chloride (PVC) coatings of electrical wiring and electronic components, pesticide extenders, cutting oils, reactive flame retardants, lubricating oils, vacuum pump fluids, hydraulic fluids, and sealants for caulking in schools and commercial buildings.

Although manufacture was prohibited after 1979, PCBs already in commerce continued to be allowed in "totally enclosed uses" such as transformers and capacitors. Due to their extended working life, some oil-filled electrical equipment may still contain PCBs. The US EPA considers a product to be "PCB-Contaminated" if the oil contains between 50-500 parts per million (ppm), and to be a PCB product if more than 500 ppm. After July 1, 1979 and through 1998, the US EPA required new oil-filled electrical equipment to be marked "No PCBs." If an item is not so labeled, and no information is available as to the date of manufacture, an item might be assumed to contain PCBs until proven otherwise. PCB content may or may not be a matter of record with equipment or transformers belonging to a utility company.

No indication of leaks or releases from electrical equipment was observed during the site visit. No verifiable RECs, CRECs, and/or HRECs associated with PCBs were observed or known to be present on the Property at the time of the site reconnaissance.

5.5 Odors, Pools of Liquid

No pools of liquids and/or standing surface water were observed within the boundaries of the Property during the site reconnaissance. No strong, pungent, or noxious odors were noted during the site reconnaissance. No odors, pools of liquid, or standing surface water were observed on properties adjoining the Property when observed from the Property or publicly-accessible areas. As such, no RECs associated with potential odors, pools of liquid, or standing surface water were known to be present on the Property at the time of the site reconnaissance.

5.6 Pits, Ponds, Lagoons

No pits, ponds, or lagoons were observed within the boundaries of the Property during the site reconnaissance. No pits, ponds, or lagoons were observed on properties adjoining the Property when observed from the Property or publicly-accessible areas. As such, no RECs from pits, ponds, or lagoons were known to be present on the Property at the time of the reconnaissance.

5.7 Stained Soil/Pavement, Stressed Vegetation

Stained soil and/or pavement was not observed within the boundaries of the Property during the Property reconnaissance. Additionally, stressed vegetation was not observed on the Property or properties adjoining the Property when observed from the Property or publicly-accessible areas. As such, no RECs from stressed vegetation or stained pavement were observed to be present on the Property at the time of site reconnaissance.

5.8 Indications of Solid Waste Disposal

Evidence of solid waste disposal was observed on the Property during the reconnaissance visit. Various trash and concrete barriers were observed on the Property. Solid waste is not a part of the definition of a REC. Consequently, no RECs from solid waste disposal are known to be present at the Property. However, the potential exists for a REC to be concealed by the solid waste.

5.9 Water, Storm Water, and Wastewater

Evidence of constructed storm water management drainage channels was observed along Chism St. south of the Property. No evidence of on-site current or historic water supply wells, or historic wastewater systems was observed within the boundaries of the Property during the Property reconnaissance or discovered during interviews or records review. As such, no RECs from water, storm water, or wastewater were known to be present on the Property at the time of the reconnaissance.

5.10 Monitoring Wells

One groundwater monitoring well was observed on the Property. Photos of the monitoring well are included in Appendix F. Broadbent contacted Mr. Chris Benedict (Remediation District Program Manager for Washoe County) with regard to identification and purpose of the monitoring well. According to Mr. Benedict, the monitoring well is identified as RETRACB13 and it is currently part of the Central Truckee Meadows Remediation District (CTMRD) monitoring network. The CTMRD was created by Nevada state statute and Washoe County ordinance in 1995 in order to address the presence of tetrachloroethene (PCE) in groundwater in Reno and Sparks. PCE contamination in the central Truckee Meadows is widespread and likely to have originated from multiple sources over time. According to Mr. Benedict, *monitoring well RETRACB13 is a 2" well, screened from 20-40 feet below ground surface. The well was installed by the City of Reno to monitor water levels during the construction of the adjacent railroad train trench. The Property resides outside the area of PCE contamination and therefore functions primarily as a water level monitoring point.*

The CTMRD samples the well annually (in September each year). The last 5 years of groundwater sample results are provided in Appendix E. Except for a single, low-concentration of dichloromethane (2.7 µg/L) detected in September 2017, groundwater constituents have been below laboratory reporting limits. Each groundwater constituent analyzed in the last 5 years from monitoring well RETRACB13 has been below state reportable concentrations. As such, no RECs from groundwater were known to be present on the Property at the time of the reconnaissance.

Section 6: Interviews

The following interviews were conducted in accordance with the requirements of ASTM E1527-13.

6.1 Interviews with Past and Present Owners and Occupants

Interviews were conducted with the following individuals. Use-Provided Information Questionnaires completed by the interviewees are provided in Appendix B. The Site Monitoring and Artifact Agreement can be found in Appendix H.

<i>Role</i>	<i>Title</i>	<i>Name</i>	<i>Company</i>	<i>Method</i>	<i>Comments</i>
ESA User	Property Agent	Ms. Lori Miles	City of Reno	Questionnaire	Archeological site – closed. Covenant running with the land (See Appendix H) No known environmental liens or contamination.

Review of the Site Monitoring and Artifact Agreement indicates that the Property parcel (010-610-16) and adjacent parcels (010-610-02 and 010-610-01) have a covenant between the City of Reno, the Redevelopment Agency of the City of Reno, and the Reno Sparks Indian Colony (RSIC) to uphold the Site Monitoring and Artifact Agreement (Appendix B).

In 2001 construction of the railroad subsurface transportation corridor known as the ReTRAC project involved Federal grants and oversight from the Federal Highways Administration which required Section 106 Consultation for the National Historic Preservation Act. Consultation resulted in the need for archaeological monitoring of ground disturbing activities throughout the course of the ReTRAC project. Archaeological monitors discovered significant archaeological deposits in the vicinity of the Property which resulted in the treatment of the deposits within the project corridor and the creation of a Covenant between the Owner (City of Reno) and the RSIC for future consideration of adjoining parcels.

Because of the potential for buried archaeological deposits the City and the RSIC entered into a covenant whereas any Owner who takes title or has interest in the Property must uphold the Site Monitoring and Artifact Agreement. This Agreement includes:

- Notification to RSIC of notice of sale or lease of site
- Notification to RSIC up to 4 days in advance of ground disturbing activities
- Allotment for an RSIC Monitor to be present for any ground disturbing activities
- Stipulations for actions if artifacts are discovered on the Property

During construction for ReTRAC artifacts and buried archaeological remains were encountered adjacent to the Property therefore, there is a strong possibility that buried archaeological deposits and artifacts exist on the Property. Any transfer of ownership or ground disturbing activities require compliance with the Covenant. If Federal dollars or oversight are involved with the future use or sale of the Property, or if the

purchaser is taking or using federal grants or dollars then Section 106 Consultation would be required in addition to upholding the terms of the covenant.

No RECs, CRECs, and/or HRECs were noted relative to the Property based on review of information gathered via interviews.

6.2 Interviews with State and/or Local Government Officials

Broadbent contacted the Nevada Division of Environmental Protection (NDEP) and Washoe County Health Department (WCHD) with regard to reported environmental issues at the Property. No environmental records were found in regard to the subject Property.

As discussed in Section 5.10, Broadbent contacted the contacted Mr. Chris Benedict (Remediation District Program Manager for Washoe County) with regard to identification and purpose of the monitoring well located on the Property. According to Mr. Benedict, the monitoring well is identified as RETRACB13 and it is currently part of the CTMRD monitoring network.

According to Mr. Benedict, monitoring well RETRACB13 is a 2" well, screened from 20-40 feet below ground surface. The well was installed by the City of Reno to monitor water levels during the construction of the adjacent railroad train trench. The Property resides outside the area of PCE contamination and therefore functions primarily as a water level monitoring point.

Section 7: Data Gaps

A data failure is failure to achieve the historical research objectives of ASTM E1527-13. A data gap is the incompleteness in activities required in this practice. The following data gaps occurred during conduct of this ESA: Recorded land title records were not provided by the client and County and City development records were not reviewed, and no coverage of City Directory was provided for the Property.

Based on the experience and good faith efforts of the environmental professionals responsible for conducting and reviewing this ESA, the above data gaps do not constitute a data failure and are not significant enough to affect identification of recognized environmental conditions on the Property.

Section 8: Findings

Findings of the ESA have been discussed throughout the body of this report and are tabulated below.

<i>Report Section</i>		<i>REC (Y/N)</i>	<i>CREC (Y/N)</i>	<i>HREC (Y/N)</i>	<i>De Minimis Conditions (Y/N)</i>	<i>Comments</i>
2	Site Description	N	N	N	N	Vacant industrial lot
3	User-Provided Information	N	N	N	N	Former archeological site Site Monitoring and Artifact Agreement
4	Records Review	N	N	N	N	None
5	Site Reconnaissance	N	N	N	N	Monitoring well RECTRACB13 located on the Property
6	Interviews	N	N	N	N	Site Monitoring and Artifact Agreement No known environmental contamination or liens

As indicated above, this assessment has revealed no RECs, CRECs, or HRECs in connection with the Property.

Section 9: Conclusion

Broadbent has conducted this ESA in conformance with the scope and limitations of ASTM Practice E1527-13 for the Property located at 0 Chism St. APN 010-610-16, Reno, NV. Exceptions to, or deviations from, this practice are described in Section 1.4 of this report.

This assessment has revealed no recognized environmental conditions in connection with the Property.

Section 10: Limitations & Exceptions of Assessment

Broadbent prepared this report for the exclusive use of NDEP and the City of Reno. This ESA is based on review of the site description, User-provided information, readily ascertainable environmental records, and results of site reconnaissance and interviews. This ESA was conducted in accordance with generally accepted environmental practices and procedures, as of the date of the report. Reputable environmental professionals practicing in this or similar localities conducted the services employing a degree of care and skill ordinarily exercised under similar circumstances. Findings and conclusions were made using methodologies employed per ASTM International Practice E1527-13 described by ASTM International as representing good commercial and customary practice for conducting an ESA of a property for the purpose of identifying RECs. No other warranties are implied or expressed.

No environmental sampling and associated analyses were undertaken for this ESA report. It is possible that variations in conditions could exist beyond points explored in this investigation.

This report represents professional opinion and judgment, which are dependent upon information obtained during the performance of consulting services. Environmental conditions may exist at the Property that cannot be identified. Conclusions are based, in part, on information supplied by others, the accuracy or sufficiency of which may not be independently reviewed. No investigation can be thorough enough to exclude the presence of hazardous materials at a given site; therefore, if no hazardous materials are identified during an assessment, such a finding should not be construed as a guarantee of the absence of such materials on a property, but rather the results of services conducted within project scope, cost, and other real limitations.

Opinions presented apply to conditions existing at the time services were conducted. Broadbent is unable to report on, or accurately predict events that may impact the Property following performance of the described services, whether occurring naturally or caused by the actions of others. Broadbent assumes no responsibility for conditions it is not authorized to investigate or conditions not generally recognized as environmentally unacceptable at the time services are conducted. Broadbent is not responsible for change in applicable environmental standards, practices, laws, or regulations following performance of services.

Section 11: Certification Statement & Signatures

As required by 40 CFR Part 312.21(d), I declare that, to the best of my professional knowledge and belief, I meet the definition of an Environmental Professional as defined in §312.10 of this part. I have the specific qualifications based on education, training, and experience to assess a property of the nature, history, and setting of the subject Property. I have developed and conducted the all appropriate inquiries in conformance with the standards and practices set forth in 40 CFR Part 312. My qualifications as an Environmental Professional are presented within Appendix G.

BROADBENT & ASSOCIATES, INC.

Signature:



Name: Brandon Reiff

Title: Senior Geologist

Date: April 5, 2019

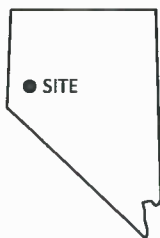
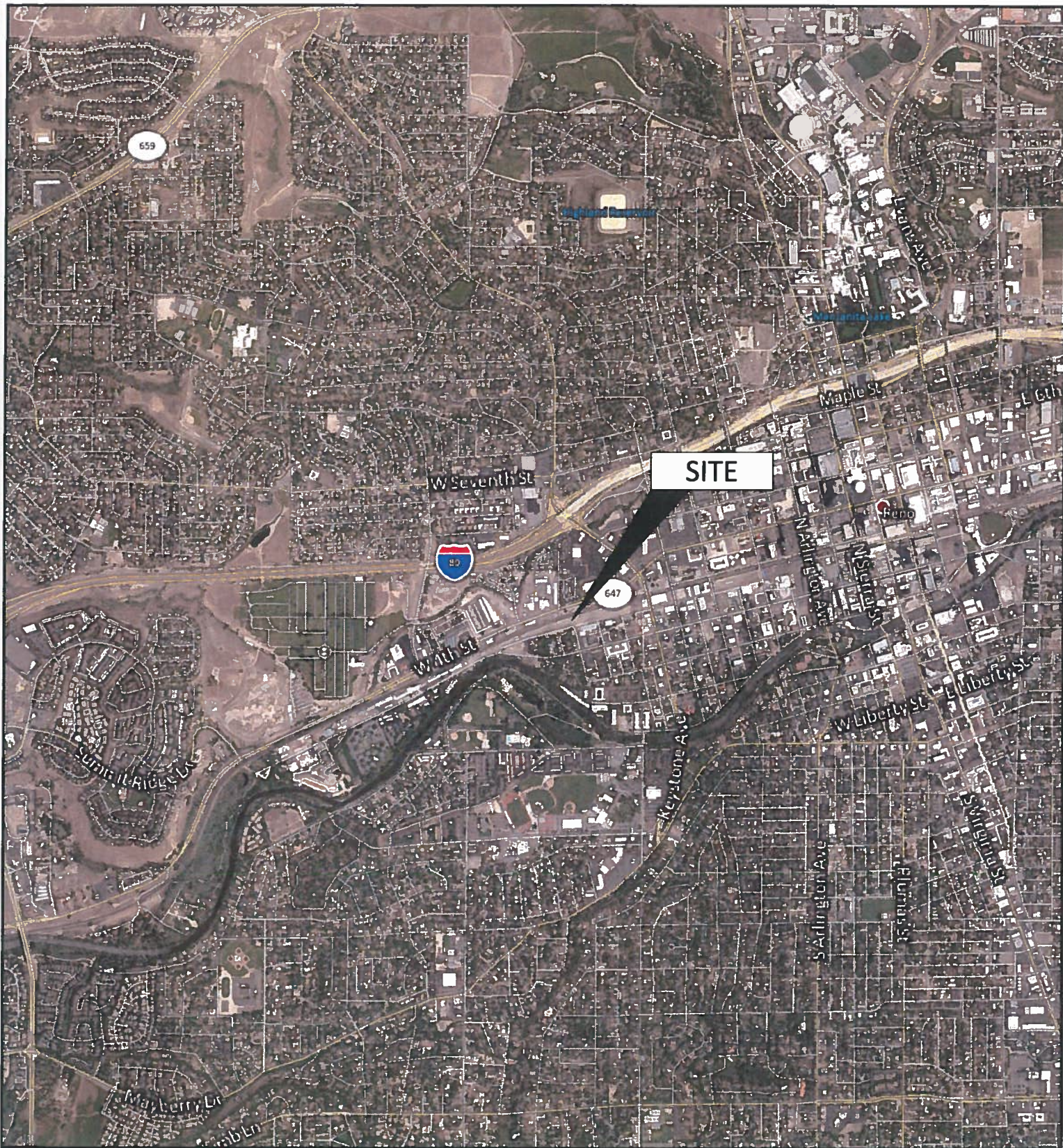
Registration No.: 2300

State of: NV

Section 12: References

- American Society for Testing and Materials, 6 November 2013. Designation E1527-13: Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process.
- City of Reno, 22 February 2017. Site Monitoring and Artifact Agreement.
- Environmental Data Resources, 14 December 2018. The EDR Aerial Photo Decade Package: City of Reno Brownfields, Chism/Keystone, Reno, NV 89503 (Inquiry # 5512658.36).
- Environmental Data Resources, 17 December 2018. The EDR-City Directory Abstract: City of Reno Brownfields, Chism/Keystone, Reno, NV 89503 (Inquiry # 5512658.33).
- Environmental Data Resources, 14 December 2018. The EDR Radius Map Report with GeoCheck: City of Reno Brownfields, Chism/Keystone, Reno, NV 89503 (Inquiry # 5512658.29s).
- Environmental Data Resources, 17 December 2018. Certified Sanborn Map Report: City of Reno Brownfields, Chism/Keystone, Reno, NV 89503 (Inquiry # 5512658.30).
- Environmental Data Resources, 14 December 2018. EDR Historical Topographic Map Report: City of Reno Brownfields, Chism/Keystone, Reno, NV 89503 (Inquiry # 5512658.31).
- Nevada Division of Environmental Protection, 27 April 2018. Request For Release/Spill Information, Oppio Ranches, LLC, 900 w 4th Street, Reno, Washoe County, Nevada.

FIGURES



0 2,000 4,000
APPROXIMATE SCALE (ft)

IMAGE SOURCE: Google Earth



Project No.: 18-02-211 Date: 1/10/2019

Phase I ESA
Chism/Keystone
Reno, Nevada

Site Location Map

Drawing

1



5450 Louie Lane, #101
Reno, Nevada 89511

Project No.: 18-02-211 Date: 1/23/2019

Phase I ESA
Chism/Keystone
Reno, Nevada

Property Location Map

Drawing

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