Appendix L

Historic Property Survey Report, State Route 32 Widening Project

File 55-0131 (G)

HISTORIC PROPERTY SURVEY REPORT

California Department of Transportation

1. UNDERTAKING DESCRIPTION AND LOCATION						
District	County	Route *(Local Agency)*	Kilo Posts *(Project prefix)*	Post Miles *(Project No.)*	Charge Unit *(Agreement)*	Expenditure Authorization *(Location)*
3	Butte	SR 32		PM 10.19 to 12.56 (SR 32) and PM 32.37 to 32.44 (SR 99)		EA 03-1E4900

Approved by Caltrans December 2006

Project Description

The State Route (SR) 32 Widening Project has been proposed by the City of Chico. The proposed project would widen and improve approximately 2.6 miles of SR 32 between SR 99 and Yosemite Drive. The purpose of the proposed project is to accommodate additional capacity needed as a result of approved and planned development adjacent to the SR 32 corridor. Construction of the project is tentatively scheduled for 2008/2009, depending on funding and environmental review. The project is being sponsored by the City of Chico which intends to construct the proposed project using only local funds; no state or federal funds are anticipated. Design and construction of the project is being coordinated with the California Department of Transportation (Caltrans) and the Butte County Association of Governments (BCAG). Figure 1 depicts the general project area.

The City, Caltrans and BCAG are proposing the following improvements as part of this project: 1) construct new travel lanes primarily north of the existing roadway to convert SR 32 from two to four lanes; 2) construct a new bridge over Dead Horse Slough and modify existing culvert over the South Fork of Dead Horse Slough; 3) construct intersection improvements at Fir Street, Forest Avenue, El Monte Avenue, Bruce Road, and Yosemite Drive including traffic signals at Fir Street and Yosemite Drive and signal improvements at all intersections; 4) improve the SR 99 on-ramps and off-ramps in a manner consistent with the recently approved SR 99 Auxiliary Lane Project; and, 5) modify Fir Street to provide one-way (northbound) movement only between westbound SR 32 and eastbound SR 32 only. The Bruce Road intersection may be reconstructed to a roundabout. SR 32 from the SR 99 interchange to east of Fir Street will be widened to three lanes in each direction. Soundwalls may be constructed as part of the project.

While there is not federal funding for this project, the project requires an Army Corps of Engineers 404 permit and therefore is subject to regulatory requirements set forth under Section 106 of the National Historic Preservation Act (36 CFR Part 800). Although this locally funded project does not involve the Federal Highway Administration, Caltrans has adopted guidance of the January 2004 *Programmatic Agreement Among the Federal Highway Administration, the Advisory Council on Historic Preservation, the California State Historic Preservation Officer, and the California Department of Transportation Regarding Compliance with Section 106 of the National Historic Preservation Act, as it Pertains to Administration of the Federally-Aided Highway Program in California* for all of its highway projects.

2. AREA OF POTENTIAL EFFECTS

The Area of Potential Effects (APE) for the project was established through consultation between John Holder (Project Manager, Caltrans Office of Special Funded Projects) and Jeff Haney (Caltrans Professionally Qualified Staff). The APE consists of the existing right-of-way and encompasses the entire boundaries of any archaeological site that may be affected by the undertaking (in accordance with Attachment 3 of the PA). Since the proposed widening project does not have the potential to directly or indirectly affect architectural resources, there is no separate architectural APE. Figures 2 through 6 depict the APE.

3. CONSULTING PARTIES / PUBLIC PARTICIPATION

X Native American Tribes, Groups and Individuals

On September 28, 2005, Pacific Legacy mailed letters to the Butte Tribal Council, Ms. Patti Reese-Allan and Mr. Jim Edwards of the Berry Creek Rancheria of Maidu Indians, Mr. Frank Watson and Ms. Glenda Nelson of the Enterprise Rancheria of Maidu Indians, Ms. Patsy Seek of the KonKow Valley Band of Maidu, Ms. Lorena Gorbet of the Maidu Cultural and Development Group, Ms. Clara LeCompte of the Maidu Nation, Mr. Steve Santos and Mr. Hygi Waetermans of the Mechoopda Indian Tribe of Chico Rancheria, and Mr. Gary Archuleta and Mr. James Sanders of the Mooretown Rancheria of Maidu Indians requesting that they contact Pacific Legacy if they had concerns about the project. On November 10, 2005, an additional letter was mailed to Arlene Ward of the Mechoopda Indian Tribe of Chico Rancheria. An email was also sent to Arlene Ward on January 12, 2006.

On January 13, 2006, Arlene Ward contacted Kim Erickson of Mark Thomas & Company. Arlene Ward expressed interest in several projects being managed by Kim Erickson and requested a site visit. The site visit was arranged for February 3, 2006 and Pacific Legacy fieldwork was scheduled to coincide with the visit. On February 3, 2006, Kevin Bartoy of Pacific Legacy met with Arlene Ward, Kim Erickson, and Clif Sellers of the City of Chico. During the meeting, Kevin Bartoy explained the current project findings. Arlene Ward expressed the need for early contact with the Mechoopda Indian Tribe on projects in the vicinity of Chico. She also expressed a desire for the Tribe to be involved in all phases of cultural resources studies, including survey and inventory. She was concerned about the accuracy of the records at the Northeast Information Center and informed Kevin Bartoy that she knew of unrecorded sites along Little Chico Creek as well as 23 known village sites in Chico and Butte County. She also cautioned that ground disturbance in sensitive areas should be monitored for unknown sites. She did not identify any sensitive areas within the current project area.

Follow-up telephone calls were made to Native American contacts on July 31 and August 1, 2006. The contacted individuals expressed no specific concerns about the current project. To date, no other replies have been received via mail, email, or telephone. If any responses are received, these will be forwarded to Mark Thomas & Company, Inc, the City of Chico, and Caltrans immediately. Correspondence with the NAHC and Native American parties is included in Appendix A of Attachment 1.

X Native American Heritage Commission

On September 13, 2005, a letter was sent to the Native American Heritage Commission (NAHC) requesting that they conduct a review of the sacred lands inventory. In a letter dated September 20, 2005, the NAHC stated that their check of the sacred lands file did not reveal any properties on the sacred lands inventory within the project area. The NAHC provided a list of potentially interested Native Americans for Butte County; see Appendix A in Attachment 1.

_ Local Historical Society / Historic Preservation Group

•

X Public Information Meetings

On March 9, 2006, a public information workshop was held at the City of Chico Council Chambers Building. Arlene Ward of the Mechoopda Indian Tribe of Chico Rancheria attended this meeting and left a comment card with cultural resources concerns for this project. No other comment cards expressed concerns related to cultural resources. Documentation of this meeting and Arlene Ward's comments are included as Attachment 2.

4. SUMMARY OF IDENTIFICATION EFFORTS

X	National Register of Historic Places	Month & Year: 1979-2002 & supplements
X	California Register of Historical Resources	Year: 1992 & supplemental information to date
X	California Inventory of Historic Resources	Year: 1976
X	California Historical Landmarks	Year: 1995 & supplemental information to date
X	California Points of Historical Interest	Year: 1992 & supplemental information to date
_	State Historic Resources Commission	Year: 1980-present, minutes from quarterly meetings
X	Caltrans Historic Highway Bridge Inventory: Dead Horse Slough Bridge No. 12-0135	Year: 2003 & supplemental information to date
X	Archaeological Site Records See Attachment 1 for full listing.	
X	Other sources consulted See Attachment 1 for full listing.	
X	**Results:**	

LITERATURE REVIEW

Attachment 1 contains a more detailed review of the literature. The record search revealed that the project area had not been previously studied. There are no recorded studies completed within the project area limits. The one mile radius surrounding the project area has been surveyed for 43 previous cultural resource studies. Of these studies, 24 were positive for cultural resources and 19 were negative.

Of the positive cultural resource studies within one mile of the project area, seven studies are adjacent to the project area limits. The record search also revealed that no cultural resources have been previously identified within the proposed project area. However, 19 cultural resources have been recorded within a one mile radius of the project area. Of these, ten are recorded prehistoric sites, one is an informally recorded prehistoric site, seven are recorded historic sites, and one is an informally recorded historic stone wall.

Of the 19 known resources within one mile of the project area, three cultural resources are adjacent to the project area limits. CA-BUT-1387H is located at the southeast corner of El Monte Avenue and SR 32. The resource consists of Mulkey Ranch structure foundations and features dated to ca. 1900. The site was determined not eligible for the California Register of Historical Resources (CRHR) in 2003 but this determination has not been reviewed by SHPO.

A second resource is an informally recorded historic rock wall located just east of the Bruce Road and SR 32 intersection. The rock wall runs northeast-southwest just outside the state route right-of-way fence line. The wall was determined not eligible for the CRHR in 2002 but this determination has not been reviewed by SHPO.

A third historic resource may be adjacent to the project area limits. The Humboldt Road Burn Dump (CA-BUT-2624H) was recorded as located along the north side of Humboldt Road and surrounding the Bruce Road/Humboldt Road intersection. The site was evaluated to a CEQA level of eligibility for inclusion in the CRHR and determined not eligible due to poor integrity. However, this eligibility determination has not been reviewed by SHPO.

SURVEY RESULTS

Attachment 1 contains a detailed report of the survey. A pedestrian survey of the project area was completed by Elena Reese, M.A. on October 20 and 21, 2005. An additional survey was conducted by Kevin M. Bartoy, Ph.C., on July 27, 2006 as a supplement for areas related to a potential roundabout at the intersection of Bruce Road and SR 32, which were not included in the initial survey. On November 21, 2006, an additional supplemental survey was conducted by Heather Blind, M.A., along Forest Avenue and

El Monte Avenue due to modifications of the APE. The proposed project area encompasses: 2.6 miles of the right-of-way surrounding SR 32; and, the intersections of SR 32 with Highway 99, Fir Street, Forest Avenue, El Monte Avenue, Bruce Road and Yosemite Drive. The overall topography of the project area limits was flat at the western end and gradually sloped uphill into gently undulating hillsides at the eastern end.

The survey did not result in the identification any prehistoric sites within the project area limits. However, one previously unrecorded historic period resource was identified within the project area limits. SR32-1 is an early to mid twentieth-century trash scatter. It was also noted during survey that displaced materials from the previously recorded CA-BUT-2624H were present within the project area in Dead Horse Slough. These materials have eroded from the site to the southeast into the drainage.

EVALUATION RESULTS

Attachment 1 contains a detailed report of the evaluation. Following the cultural resources inventory, which identified two previously unevaluated resources within the project area (SR32-1 and SR32-2), Pacific Legacy coordinated with Caltrans staff, Jeff Haney and Anmarie Medin, who recommended that SR32-1 be evaluated for eligibility to the California Register of Historical Resources (CRHR) and the National Register of Historic Places (NRHP). In a phone conversation with Anmarie Medin on June 27, 2006, it was decided that CA-BUT-2624H would not be evaluated as part of this project since the materials within the project area are displaced due to erosion. The recorded site boundaries of CA-BUT-2624H do not extend within the current project area.

On February 2 and 3, 2006, Kevin M. Bartoy and Nichole Jordan of Pacific Legacy conducted archaeological investigations at SR32-1. The cultural materials present at SR32-1 were most likely originally associated with CA-BUT-1387/H (Mulkey Ranch) located to the south of SR 32. The homogenization of the deposit as a result of construction has significantly reduced the potential for the data to address research questions. The deposit does not maintain a significant potential to yield information concerning activities that occurred at this location during a discrete period of time.

For this reason, it is our opinion that SR32-1 is not eligible for listing on the NRHP or the CRHR and should not be considered a "historic property" as per Section 106 of the NHPA or "historical resource" as per CEQA. Additionally, SR32-1 does not meet the requirements to be considered a "unique archaeological resources" as defined in Pub. Res. Code Section 21083.2.

5. PROPERTIES IDENTIFIED

_ **No cultural resources** in project APE.

•

X **Bridges listed as Category 5** in the Caltrans Historic Highway Bridge Inventory. Appropriate pages from the Caltrans Historic Bridge Inventory are attached.

- Bridge No. 12-0135

_ Properties **previously determined not eligible**:

X On behalf of **FHWA**, **Caltrans** has **determined** the following properties are **not eligible**:

SR32-1 (See Attachment 1)

_ Caltrans, on behalf of FHWA, has determined that the following **archaeological sites** shall be considered eligible for the National Register without conducting subsurface testing or surface collection within the APE, for which the **establishment of an ESA** will protect the sites from any potential effects, in accordance with Section 106 PA Stipulation VIII.C. See attached documentation.

•

_ Properties **previously listed or determined eligible**:

-

_ On behalf of FHWA, Caltrans has determined the following properties are **eligible**:

-

_ **State-owned** historical buildings and structures **to be added to the Master List**, per PRC §5024(d):

-

_ **State-owned** buildings and structures that are **not eligible** for the National Register or as a State Historical Landmark:

-

6. LIST OF ATTACHED DOCUMENTATION

X Project Vicinity, Location, and APE Maps
- Attachment 1, Figures 1 through 6

X California Historic Bridge Inventory sheet

_ Historical Resources Evaluation Report (HRER)

X Archaeological Survey Report and Archaeological Evaluation Report
- Attachment 1; Kevin M. Bartoy, John Holson, Elena Reese, and Heather Blind. Archaeological Survey and Test Excavation Report for the SR 32 Widening from SR 99 to Yosemite Drive Project, Chico, Butte County. Prepared for Mark Thomas & Company and Caltrans. August 2006. Ms. On file at Pacific Legacy Inc., 900 Modoc Street, Berkeley, CA 94707

X Other
- Attachment 2, Public Meeting and Comments Documentation

7. FINDINGS – HPSR to File

8. FINDINGS – HPSR to SHPO

X Under the authority of FHWA, Caltrans has determined that there are properties evaluated as a result of the project that are **not eligible** for inclusion the National Register within the project's APE. Under Section 106 PA Stipulation VIII.C, Caltrans requests SHPO's concurrence in this determination.
- See Attachment 1

X Under the authority of FHWA, Caltrans has determined a Finding of **No Historic Properties Affected**, according to Section 106 PA Stipulation IX.A and 36 CFR 800.4(d)(1), is appropriate for this undertaking.
- See Attachment 1

9. HPSR PREPARATION AND DEPARTMENT APPROVAL

Prepared by:
District ___ Caltrans
PQS/Generalist: _____ Date _____

Prepared by: *Kevin M. Bartoy, Ph.C.* 8/1/06

Consultant / discipline: *Senior Supervisor / Archaeologist* Date _____
Affiliation *Pacific Legacy Inc., 900 Modoc Street, Berkeley, CA., 94707*

Reviewed for approval by:
Jeff Haney
District 3 Caltrans PQS discipline/level: *Associate Environmental Planner* 12-20-06 Date

Approved by:
Jean L. Baker
District_3_ EBC: 12-20-06 Date

ATTACHMENT 1- ARCHAEOLOGICAL SURVEY AND TEST EXCAVATION REPORT

ARCHAEOLOGICAL SURVEY AND TEST EXCAVATION REPORT FOR THE SR 32 WIDENING FROM SR 99 TO YOSEMITE DRIVE PROJECT, CHICO, BUTTE COUNTY, CALIFORNIA

FINAL REPORT

Prepared for:
Mark Thomas & Company
7300 Folsom Boulevard, Suite 203
Sacramento, California 95826

Attn: Kim Erickson

and

California Department of Transportation, District 3
703 B Street
Marysville, California 95901

Attn: Jeff Haney
Email: jeff_w_haney@dot.ca.gov

Prepared by:
Kevin M. Bartoy, Ph.C., John Holson, M.A., Elena Reese, M.A.,
and Heather Blind, M.A.
Pacific Legacy, Incorporated
900 Modoc Avenue
Berkeley, California 94707
Email: bartoy@pacificlegacy.com

November 2006
1594-01

CONFIDENTIALITY STATEMENT

Archaeological and other heritage resources can be damaged or destroyed through uncontrolled public disclosure of information regarding their location. This document contains sensitive information regarding the nature and location of archaeological sites, which should not be disclosed to unauthorized persons.

Information regarding the location, character or ownership of a historic resource is exempt from the Freedom of Information Act pursuant to 16 U.S.C. 470w-3 (National Historic Preservation Act) and 16 U.S.C. § 470hh (Archaeological Resources Protection Act).

MANAGEMENT SUMMARY

This document was prepared to assist the City of Chico and Caltrans in addressing the potential impacts to cultural resources which would result from the State Route (SR) 32 Widening from SR 99 to Yosemite Drive Project. *Pacific Legacy, Inc.* was contracted by Mark Thomas & Company, Inc. to undertake a cultural resources survey for the proposed project. The survey of the area identified two cultural resources within the project area limits. SR32-1 and SR32-2, were newly discovered during the survey and had not been previously evaluated for eligibility to the National Register of Historic Places (NRHP) or the California Register of Historical Resources (CRHR). For this reason, Pacific Legacy conducted further investigations at SR32-1 and SR32-2 in order to evaluate their potential eligibility for listing on the NRHP and the CRHR.

This document was prepared to comply with Caltrans' historic preservation regulations, policies, and statutes including Section 106 of the National Historic Preservation Act (NHPA), the National Environmental Policy Act (NEPA), and the California Environmental Quality Act (CEQA). It is anticipated that the project will be built with local funds. This document presents studies that were conducted to identify and evaluate cultural resources which may be affected by the project.

The proposed project is located on SR 32 between SR 99 to the west and Yosemite Drive to the east in the City of Chico, Butte County. State Route 32 crosses SR 99 and is a two-lane and four-lane, east-west rural highway providing connections between Interstate 5 to the west with Chico and rural towns to the north and east of Chico.

Pedestrian survey of the project area identified two cultural resources within the project area. These resources were SR32-1 (historic trash scatter), and SR32-2 (drainage ditch). Cultural materials associated with CA-BUT-2624H (Humboldt Road Burn Dump) were noted within the project area, but it was determined that these were displaced materials eroded into the South Fork of Dead Horse Slough. In consultation with Anmarie Medin of Caltrans, these displaced materials were not evaluated. Our investigations of SR32-1 and SR32-2 detailed in this report determined both of these resources not eligible for the CRHR or the NRHP. Since these resources have been determined not eligible for the CRHR or NRHP and are not considered "unique archaeological resources" (Pub. Res. Code Section 21083.2), SR32-1 and SR32-2 are not considered "historic properties" as per Section 106 of the NHPA or "historical resources" as per CEQA. No historic properties or historical resources were identified with the Area of Potential Effects (APE) of the SR 32 Widening from SR 99 to Yosemite Drive Project.

TABLE OF CONTENTS

List of Figures

List of Tables

Appendices

1.0 INTRODUCTION

1.1 INTRODUCTION

This document was prepared to assist the City of Chico and Caltrans in addressing the potential impacts to cultural resources which would result from the SR 32 Widening from SR 99 to Yosemite Drive Project. *Pacific Legacy, Inc.* was contracted by Mark Thomas & Company, Inc. to undertake a cultural resources survey for the proposed project. The survey of the area identified two cultural resources within the project area limits. The survey also noted displaced cultural materials associated with CA-BUT-2624H within the APE. However, in consultation with Anmarie Medin of Caltrans, it was determined that these displaced materials did not require evaluation as they were eroded into the South Fork of Dead Horse Slough. The two newly recorded resources, SR32-1 and SR32-2, had not been previously evaluated for eligibility to the CRHR or the NRHP. For this reason, Pacific Legacy conducted further investigations at SR32-1 and SR32-2 in order to evaluate their eligibility to the CRHR and the NRHP.

This document was prepared to comply with Caltrans' historic preservation regulations, policies, and statutes including Section 106 of the NHPA, NEPA, and CEQA. It is anticipated that the project will be built with local funds. While there is not federal funding for this project, the project requires an Army Corps of Engineers 404 permit and therefore is subject to regulatory requirements set forth under Section 106 of the National Historic Preservation Act (36 CFR Part 800). Although this locally funded project does not involve the Federal Highway Administration, Caltrans has adopted guidance of the January 2004 *Programmatic Agreement Among the Federal Highway Administration, the Advisory Council on Historic Preservation, the California State Historic Preservation Officer, and the California Department of Transportation Regarding Compliance with Section 106 of the National Historic Preservation Act, as it Pertains to Administration of the Federally-Aided Highway Program in California* for all of its highway projects.

This document presents studies that were conducted to identify and evaluate cultural resources which may be affected by the project.

1.2 PROJECT LOCATION AND AREA OF POTENTIAL EFFECTS

The proposed project is located on SR 32 between SR 99 to the west and Yosemite Drive to the east in the City of Chico, Butte County (Figure 1). SR 32 crosses SR 99 and is a two-lane and four-lane, east-west rural highway providing connections between Interstate 5 to the west with Chico and rural towns to the north and east of Chico.

In the project area, SR 32 is four lanes from SR 99 to approximately 2,000 feet east of SR 99 where it narrows to a two-lane highway and continues as two lanes to the east.

SR 32 in the project area serves primarily local traffic associated with residential development along the project corridor. There are five intersections along the project

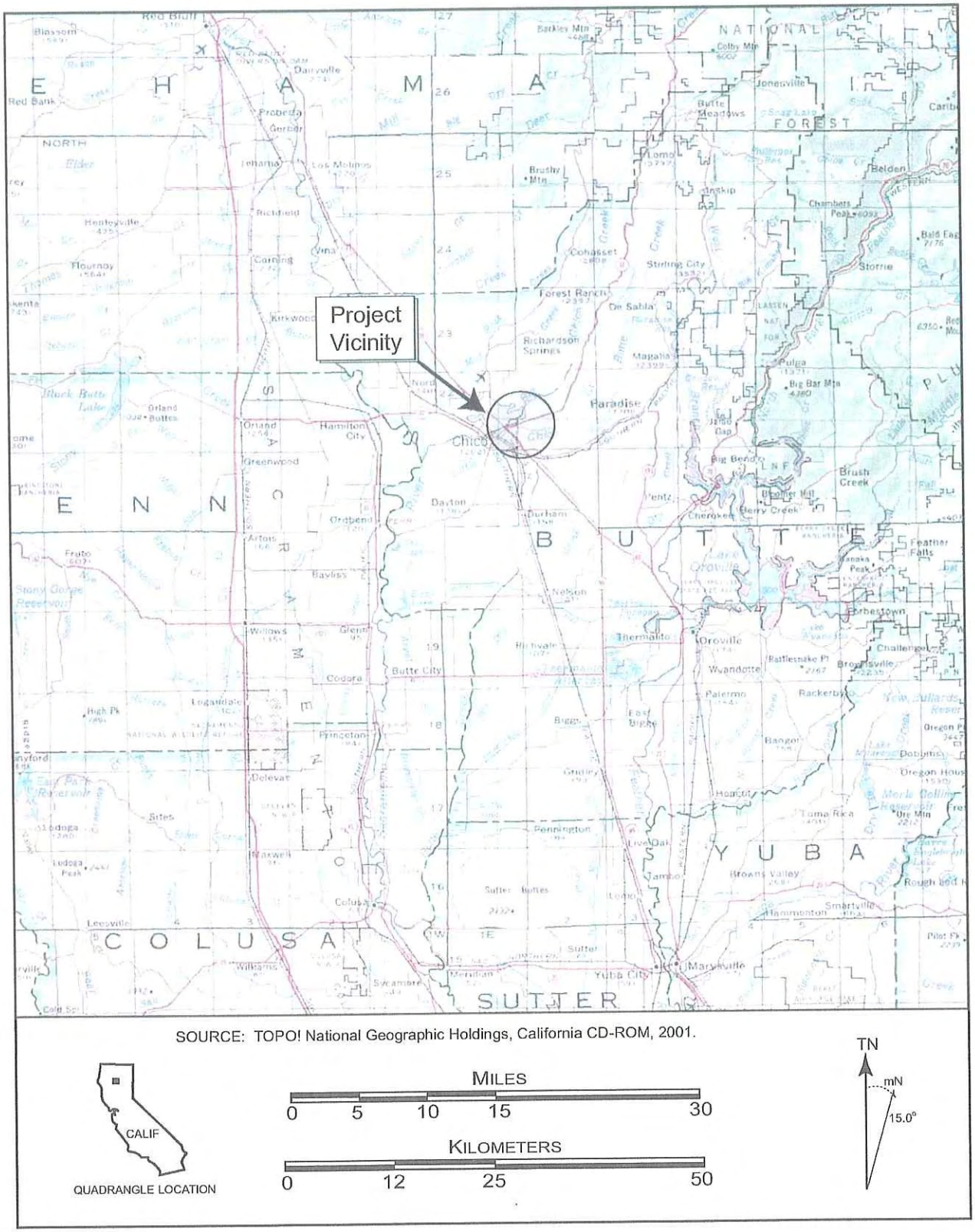

Figure 1. Project Vicinity Map.

corridor: Fir Street, Forest Avenue, El Monte Avenue, Bruce Road, and Yosemite Drive. In addition, there are four intersections associated with the SR 99 Interchange.

Land uses along the project corridor vary from urban uses (offices and businesses) near SR 99 to residential uses further east. Land between SR 99 and El Monte Avenue is generally developed, primarily with residential uses on the north and office, commercial and residential uses on the south. Two park-and-ride lots are located between the eastbound and westbound lanes on both sides of Fir Street. Dead Horse Slough crosses under SR 32 just east of Forest Avenue and the South Fork of Dead Horse Slough just east of Bruce Road. There are a few undeveloped parcels along this section; however, most of this area is developed. All of the residential development backs up to SR 32 with backyard fences and landscaping separating the residential development from the highway.

Land between El Monte Avenue and Yosemite Drive along the project corridor is generally undeveloped with the exception of a residential development located on the north side of SR 32 between Bruce Road and Yosemite Drive. The undeveloped land is characterized by an almost flat topography with non-native annual grassland, isolated wetlands and vernal pools. The South Fork of Dead Horse Slough crosses under SR 32 in a culvert just east of Bruce Road. Hank Marsh Junior High School is located just south of SR 32 at the intersection of Humboldt Road and El Monte Avenue.

The existing state right-of-way in the project corridor varies from approximately 100 feet to 142 feet. Based on the preliminary design, the proposed project can be accommodated within the existing right-of-way. However, a potential design option that includes the construction of a roundabout at the intersection of SR 32 and Bruce Road would require the acquisition of permanent right-of-way. Small temporary construction easements may also be required to construct the Dead Horse Slough Bridge and culvert extension. Figures 2 through 6 depict the APE.

1.3 STAFF QUALIFICATIONS

The following Pacific Legacy staff prepared this report:

- John Holson, M.A., 27 years experience in California Archaeology, Principal Investigator;
- Elena Reese, M.A., 18 years experience in California Archaeology, Archaeologist;
- Kevin M. Bartoy, Ph.C., 13 years experience in California Archaeology, Archaeologist;
- Heather Blind, M.A., 4 years experience in California Archaeology; and,
- Nichole Jordan, B.A., 3 years experience in California Archaeology, Archaeologist.

LEGEND

EXISTING RIGHT OF WAY (PROPERTY LINE)

APE FOR ARCHEOLOGICAL RESOURCES
(MAXIMUM AREA OF GROUND DISTURBANCE)

AREA OF POTENTIAL EFFECT		
DIST	COUNTY	PROJECT
3	BUT	SR 32 Widening

Jeff Harvey 12-20-06
DATE

ENVIRONMENTAL MANAGEMENT, BRANCH S3
CALTRANS, DISTRICT 3

12-28-06
DATE

JOHN HOLDER, PROJECT MANAGER
OFFICE OF SPECIAL FUNDED PROJECTS
CALTRANS, DISTRICT 3

MARK THOMAS & COMPANY, INC.
Providing Engineering, Surveying and Planning Services

INDEX MAP

11-30-06

SHEET NUMBER	TOTAL SHEETS
1	5

MARK THOMAS & COMPANY, INC.
Providing Engineering, Surveying and Planning Services

See Sheet 1 for Legend

0 100 200 400

STATE ROUTE 32
STATE ROUTE 99 TO YOSEMITE DRIVE
Area of Potential Effect Map

HOR. SCALE	
1":100'	
SHEET NUMBER	TOTAL SHEETS
2	5

EXISTING R/W

EXISTING
DEAD HORSE
SLOUGH BRIDGE

MATCH LINE SHEET 2

MATCH LINE SHEET 4

MARK THOMAS & COMPANY, INC.
Providing Engineering, Surveying and Planning Services

See Sheet 1 for Legend

0 100 200 400

STATE ROUTE 32
STATE ROUTE 99 TO YOSEMITE DRIVE
Area of Potential Effect Map

HOR SCALE	
1":100'	
SHEET NUMBER	TOTAL SHEETS
3	5

MARK THOMAS & COMPANY, INC.
Providing Engineering, Surveying and Planning Services

See Sheet 1 for Legend

0 100 200 400

STATE ROUTE 32
STATE ROUTE 99 TO YOSEMITE DRIVE
Area of Potential Effect Map

HOR SCALE	
1":100'	
SHEET NUMBER	TOTAL SHEETS
4	5

MATCH LINE SHEET 4

MATCH LINE SEE BELOW

MATCH LINE SEE ABOVE

See Sheet 1 for Legend

0 100 200 400

MARK THOMAS & COMPANY, INC.
Providing Engineering, Surveying and Planning Services

STATE ROUTE 32
STATE ROUTE 99 TO YOSEMITE DRIVE
Area of Potential Effect Map

HOR SCALE	
1":100'	
SHEET NUMBER	TOTAL SHEETS
5	5

2.0 NATIVE AMERICAN CONSULTATION

On September 13, 2005, a letter was sent to the Native American Heritage Commission (NAHC) requesting that they conduct a review of the sacred lands inventory. In a letter dated September 20, 2005, the NAHC stated that their check of the sacred lands file did not reveal any properties on the sacred lands inventory within the project area. The NAHC provided a list of potentially interested Native Americans for Butte County. On September 28, 2005, Pacific Legacy mailed letters to the Butte Tribal Council, Ms. Patti Reese-Allan and Mr. Jim Edwards of the Berry Creek Rancheria of Maidu Indians, Mr. Frank Watson and Ms. Glenda Nelson of the Enterprise Rancheria of Maidu Indians, Ms. Patsy Seek of the KonKow Valley Band of Maidu, Ms. Lorena Gorbet of the Maidu Cultural and Development Group, Ms. Clara LeCompte of the Maidu Nation, Mr. Steve Santos and Mr. Hygi Waetermans of the Mechoopda Indian Tribe of Chico Rancheria, and Mr. Gary Archuleta and Mr. James Sanders of the Mooretown Rancheria of Maidu Indians requesting that they contact Pacific Legacy if they had concerns about the project. On November 10, 2005, an additional letter was mailed to Arlene Ward of the Mechoopda Indian Tribe of Chico Rancheria. An email was also sent to Arlene Ward on January 12, 2006.

On January 13, 2006, Arlene Ward contacted Kim Erickson of Mark Thomas & Company. Arlene Ward expressed interest in several projects being managed by Kim Erickson and requested a site visit. The site visit was arranged for February 3, 2006 and Pacific Legacy fieldwork was scheduled to coincide with the visit. On February 3, 2006, Kevin Bartoy of Pacific Legacy met with Arlene Ward, Kim Erickson, and Clif Sellers of the City of Chico. During the meeting, Kevin Bartoy explained the current project findings. Arlene Ward expressed the need for early contact with the Mechoopda Indian Tribe on projects in the vicinity of Chico. She also expressed a desire for the Tribe to be involved in all phases of cultural resources studies, including survey and inventory. She was concerned about the accuracy of the records at the Northeast Information Center and informed Kevin Bartoy that she knew of unrecorded sites along Little Chico Creek as well as 23 known village sites in Chico and Butte County. She also cautioned that ground disturbance in sensitive areas should be monitored for unknown sites. She did not identify any sensitive areas within the current project area.

Follow-up telephone calls were made to Native American contacts on July 31 and August 1, 2006. The contacted individuals expressed no specific concerns about the current project. To date, no other replies have been received via mail, email, or telephone. If any responses are received, these will be forwarded to Mark Thomas & Company, Inc., the City of Chico, and Caltrains immediately. Correspondence with the NAHC and Native American parties is included in Appendix A.

3.0 BACKGROUND

The section presents a brief overview of the study area's environmental, ethnographic, historical, and archaeological background.

3.1 ENVIRONMENT

The City of Chico is in Butte County, located at the north end of the Sacramento Valley, east of the Coastal Range, west of the Sierra Nevada, southwest of the Mount Lassen volcanic area, and just east of the Sacramento River. The project area is located at the eastern edge of the valley as it starts sloping up into the foothills. Numerous creeks drain westward down through the area on the way to the Sacramento River, including Big Chico Creek and Little Chico Creek. The valley floor is characterized by an oak-savanna environment with oak woodland and grassland areas. The climate within the project area is typified by warm dry summers and cool moist winters. Elk, deer, acorn, cattail, berries, freshwater fish and a plentiful selection of avian fauna are among the available resources.

3.2 ETHNOGRAPHY

The Maidu language family has three dialect groups: Mountain Maidu or Northeastern Maidu, Northwestern Maidu or Konkow, and Southern Maidu or Nisenan. According to Riddell (1978:370), the Northeastern Maidu, herein referred to as the Maidu, occupied the high mountain meadows between Lassen Peak and the town of Quincy. The Northwestern Maidu, herein referred to as Konkow, occupied part of the Sacramento Valley area and the Sierra foothills east of Chico and Oroville. The Nisenan occupied the area to the southeast near Nevada City, Auburn, and Roseville.

The Konkow lived in semi-permanent winter villages of semi-subterranean earthen lodges, or roundhouses, and conical bark dwellings surrounding a central semi-subterranean roundhouse situated on ridges above river canyons or on elevated knolls. Burial grounds were often associated with the winter villages (Ramos, Price, and Jackson 2000). During the spring, summer and fall, the Konkow traveled through their territory gathering resources as they became available. They built temporary summer camps of brush-roofed sunshade structures (Riddell 1978).

The Konkow lived in a bountiful environment, at least prior to Euroamerican settlement in the mid 1800s, which brought the subsequent ecological changes associated with settlement and associated industries. Living near creeks, forests and grasslands, the Konkow exploited a variety of plants and animals for food, tools, shelter, decoration, and entertainment. Animal resources included: large mammals such as bear, deer, and antelope; smaller mammals such as porcupine, raccoon, and rabbit; fish; eels; insects; birds; and eggs. Useful plant resources included but were not limited to: various species of oak; nuts such as pine nuts and hazelnuts; various roots; seeds such as wild rye; various herbs and plants for teas and medicines; berries; and tobacco. Salt was

obtained from local salt deposits, but was not widely used. Many foods, such as salmon, acorns, nuts, and insects were preserved and stored for the winter when fresh foods were not as plentiful (Ramos, Price and Jackson 2000; Riddell 1978).

Stone technology included flaked stone knives, arrowheads, scrapers, and other tools made from obsidian, basalt, and silicates, as well as groundstone mortars and pestles made from local coarser-grained rocks. Baskets made either by twining or coiling served a multitude of purposes, including carrying (burden), milling, storage, dishes, seed beaters, and fish traps. Plants such as tules were either shredded or twined to make seats, beds, roofing, doors, mats, skirts, rafts, sacks, and headbands. Blankets and robes were woven out of the skin of rabbits, wildcats, geese, and crows. The colorful feathers of hummingbirds, quail, and yellowhammer were used to decorate baskets, ear ornaments, dancing implements, headdresses, belts, and other items of adornment. Shells and beads made of bone, shell, and minerals were also used for ornamentation. Clam shell beads were used as standard elements for monetary exchange. Dentalia were rare and highly prized (Ramos, Price and Jackson 2000; Riddell 1978).

Although plants and animals were plentiful, and materials such as basalts and silicates were locally available, the Konkow traded with the Maidu and Wintuan peoples for food items and other resources that were not available nearby. They obtained shell beads, abalone shells, pine nuts, and salmon in exchange for bows, arrows, and deer hide. Currency was a standard circular, disk-shaped shell bead (Ramos, Price and Jackson 2000; Riddell 1978).

3.3 HISTORIC OVERVIEW

3.3.1 Spanish Period

Spanish interest in Upper California began in the 1760s with rumors that Russia was planning to expand its colonial sphere of interest southward from Alaska. In response, the Spanish government sent Father Junípero Serra, along with 300 priests, soldiers, sailors, laborers, and retainers, to begin establishing a system of missions northward from Mexico. In 1769, Mission San Diego and the first presidio were established. This success was followed by a string of settlements and missions northward which ended with Mission San Francisco Solano in Sonoma County in 1823 (Hoover, et al. 1990).

The Spanish mission system was meant to bring Christianity to the native inhabitants and teach them how to become appropriate Spanish citizens. The Konkow area was outside of the Spanish sphere of direct affect; however, a few Spanish exploration parties did reach the edges of Konkow territory. In 1808, the Gabriel Moraga expedition reached the edge of Konkow territory while exploring the Sacramento and Feather Rivers. Capt. Luis Arguello led a second expedition into the Feather River area in 1820 and named the river *El Rio de Las Plumas* (Riddell 1978; Hoover et al. 1990).

3.3.2 Mexican Period

In 1821, Mexico rebelled against Spain, gained its independence, and Alta California became a Mexican colony. In 1836, the California missions were secularized, opening

their lands for private development in the form of land grants from the Mexican governors (Hoover et al. 1990).

During the 1820s and 1830s, several fur trapping parties traveled through the Konkow region. In 1833, a malaria epidemic swept through the Sacramento Valley and killed large numbers of Konkow and other valley peoples. In 1841, the United States Exploring Expedition was reported to have sent boats up the Sacramento River to a Konkow village (Riddell 1978).

In 1836, John A. Sutter, a German-Swiss immigrant, came to California via the overland route with Captain Tripp of the American Fur Company and traveled north to Fort Vancouver. He returned to California by boat in 1839, became a Mexican citizen, and petitioned Governor Alvarado for a grant of land in the Sacramento Valley to build a colony. Since the Mexican government had been having trouble with interior Native American groups rustling coastal settlement cattle, the proposal of Sutter's colony as a buffer was attractive. Governor Alvarado gave Sutter a passport to explore the area and agreed to grant him his colony once he decided where it should be located (Davis 1890:7). In 1841, Sutter was granted eleven leagues of land in Sacramento County and he established New Helvetia, also known as Sutter's Fort, which acted both as a safe haven and a trading post. During the 1840s, Sutter's Fort became a shelter for Euroamerican immigrants entering California via the overland trail (Hoover, et al. 1990).

In 1841, John Bidwell arrived in California and initially was employed at Sutter's Fort. In 1843, Bidwell first traveled to the Chico area. In 1844, Governor Micheltorena granted the lands that became Rancho del Arroyo Chico to William Dickey and Edward A. Farwell. In 1849, Bidwell purchased the 22,000 acres of Rancho del Arroyo Chico from William Dickey and Edward A. Farwell (Guinn 1906; Hoover, et al. 1990).

3.3.3 American Period

At the close of the Mexican-American War (1846-1848), California became part of the United States with the signing of the Treaty of Guadalupe Hidalgo. The discovery of gold short-circuited the usual territory phase and California became a state in 1850 (Hoover et al. 1990).

In 1848, James Marshall discovered gold on the American River while surveying a prospective sawmill site and announced the find at Sutter's Fort. The discovery brought tens of thousands of gold seekers from all over the world to California and the foothills above the Sacramento Valley (Hoover et al. 1990). Conflicts between the Native Americans and Euroamericans over land became an escalating problem. By 1851, settlers requested that Native Americans be segregated onto reservations and, within a year, reservations were being established. In 1854, the Nome Lackee Reservation was established in western Tehama County and the Nomlaki were moved there along with other Sacramento Valley peoples such as the Konkow. Unfortunately, the land was arable, so the Nome Lakee Reservation peoples were moved to Round Valley in 1863 (Riddell 1978). Thus, the Butte County region surrounding the project area opened up to further Euroamerican settlement during the 1850s and 1860s.

John Bidwell cultivated and improved his Rancho del Arroyo Chico during the 1850s and fought in the Civil War in the 1860s during which time he became a general. He filed a claim for his lands with the U. S. Lands Commission in 1852 and his ownership was confirmed in 1853. In 1860, he founded the town of Chico on his property. He later donated land for various churches and for the city hall plaza. In 1887, Bidwell gave land for the establishment of the Northern Branch State Normal School, which later became California State University, Chico (Guinn 1906; Hoover et al. 1990).

During the 1860s, Bidwell had the 64-mile long Humboldt Wagon Road built by Maidu employees from Chico to Prattville. It was originally used as a pack-animal road and was later improved to run stages and wagons between the towns (Chang 1992; Guinn 1906; Ramos et al. 2000). This road opened up the area for ranching, agriculture, and homesteading.

3.4 REGIONAL ARCHAEOLOGY

The project area lies within the eastern Sacramento Valley and western Sierra Nevada slope regions. Sierra Nevada region prehistoric archaeological deposits were first found during the Gold Rush era. Deposits consisting of mortars, charmstones, a pestle, and human remains were among the cultural resources discovered in the 1850s and 1860s (Moratto 1984). In the mid nineteenth century, mining led to the discovery of prehistoric sites. In the later nineteenth and twentieth centuries, dam construction within the Sierras also caused the discovery of numerous archaeological sites.

In 1952, a total of 26 northern Sierra sites were recorded by University of California Berkeley archaeologists, T. Bolt, A.B. Elsasser, and R.F. Heizer. Two archaeological cultures were identified from this survey, the Martis Complex (centered in the Martis Valley) and the Kings Beach Complex (Lake Tahoe area). The Martis Valley Complex was unusual for its use of basalt rather than obsidian for tool making. Dates from the tools suggest the complex is dated from 4000-2000 years B.C. to A.D. 500 (Moratto 1984).

The Kings Beach Complex (A.D. 500-1800) was distinguished by flaked obsidian and silicate implements, small projectiles points, the bow and arrow, and occasional scrapers and bedrock mortars (Moratto 1984). Two archaeologists, W.A. Davis and R. Elston, continued to piece together the connection between these two complexes and expanded testing. Jacks Lake and Spooner Lake Summit were two of the primary sites they used to develop a chronology that spanned about 7000 years (Moratto 1984).

In 1970, Ritter compared various Lake Oroville area sites to the Martis Valley and Kings Beach sites to help develop a chronology for the Lake Oroville area. The Lake Oroville chronology consists of the Mesilla, Bidwell, Sweetwater, and Oroville complexes, as well as the ethnographic Maidu era, and spans a period of about 3000 years (Moratto 1984).

The Mesilla Complex, identified at CA-BUT-84, CA-BUT-98 and CA-BUT-157, was identified as a sporadic occupation of the foothills. People who created this complex

hunted with atlatls and processed their food in mortar bowls and on millingstones. Shell beads, charmstones and bone pins show a close relationship between the Mesilla Complex and the Sacramento Valley cultures between 1000 B.C. and A.D. 1 (Moratto 1984).

After the Mesilla Complex occupation, the cultural sequence continued with the Bidwell Complex from A.D. 1 to A.D. 800. The Bidwell Complex people lived in permanent villages, hunted deer and smaller game with slate and basalt projectile points, fished, ground acorns on millingstones, and collected fresh water mussels. A new cultural element for this complex was the manufacture of steatite cooking vessels (Moratto 1984).

The Sweetwater Complex (A.D. 800-1500) was defined at CA-BUT-90 and -131. New cultural items and forms included: particular shell ornament types; wider use of steatite for cups, bowls and smoking pipes; and small, lighter projectile points that indicate the use of bows and arrows for hunting (Moratto 1984).

The Oroville Complex is significant because it represents the protohistoric Maidu (A.D. 1500 to 1833) (Moratto 1984). Sites CA-BUT-131 and CA-BUT-182 have connected the Maidu to this region during the protohistoric phase. The Maidu culture was characterized by bedrock mortars for acorn processing, dance halls, and burials were placed in tightly flexed positions on their sides marked with stone cairns. The Lake Oroville Chronology sequence ended with the Historic era and abandonment of traditional settlements in the nineteenth century (Moratto 1984).

4.0 SOURCES CONSULTED

A record and information search of the project area was conducted on October 12, 2005 by the Northeast Information Center of the California Historical Resources Information System at Chico State University. The information center record search file number was D05-82. This research included a review of:

- National Register of Historic Places (*Directory of Determinations of Eligibility*, California Office of Historic Preservation, Volumes I and II, 1990);
- California Register of Historic Resources (State of California 2005);
- *California Inventory of Historic Resources* (California Department of Parks and Recreation 1976);
- *California Historical Landmarks* (California Department of Parks and Recreation 1996);
- *California Points of Historical Interest* listing (California Department of Parks and Recreation 1992); and
- other pertinent historic data available.

In addition, historic data on file with Pacific Legacy was consulted.

The record search revealed that the project area had not been previously studied. There are no recorded studies completed within the project area limits. The one mile radius surrounding the project area has been surveyed for 43 previous cultural resource studies. Of these studies, 24 were positive for cultural resources and 19 were negative. These cultural resource studies are summarized in Table 1.

Table 1. Cultural Resource Studies within One Mile of the Project Area.

NEIC Study Number	Author	Date	Results	Type	In Project Area?
I.C. Report #136	Boynton, M.	1973	Negative	Environmental Impact Report	No
I.C. Report #144	Bechtol, B.	1975	Positive (CA-BUT-562, 563, 564, 565)	Environmental Impact Report	No
I.C. Report #146	Boynton, M.	1974	Positive (CA-BUT-564)	Environmental Impact Report	No
I.C. Report #152	Bass, H.	1974	Positive (CA-BUT-446, 562, 563, 564, 565)	Archaeological Survey	No
I.C. Report #407	Offerman, J. and R. Orlins	1980	Negative	Archaeological Survey	No
I.C. Report #1188	Hamusek, B. and S. Jenevein	1994	Positive (CA-BUT-186, 187)	Archaeological Survey	No
I.C. Report #1525	Jensen, P.	1997b	Positive (BRM, informally noted)	Archaeological Survey	No
I.C. Report #1542	Jensen, P.	1997d	Negative	Archaeological Survey	No
I.C. Report #1544	Vaughan, T.	1997	Negative	Archaeological Survey	No

NEIC Study Number	Author	Date	Results	Type	In Project Area?
I.C. Report #1546	Jensen, P.	1997e	Negative	Archaeological Survey	No
I.C. Report #1547	Jensen, P.	1997c	Positive (CA-BUT-446, 565)	Archaeological Survey	No
I.C. Report #1548	Jensen, P.	1997a	Positive (Possible historic feature noted)	Archaeological Survey	No
I.C. Report #1872	Vaughan, T.	1998	Negative	Archaeological Survey	No
I.C. Report #3181	Jensen, P.	1999a	Positive (Mortar, informally noted)	Archaeological Survey	No
I.C. Report #3182	Jensen, P.	2000	Negative	Archaeological Survey	No
I.C. Report #3183	Jensen, P.	1999b	Negative	Archaeological Survey	No
I.C. Report #3363	Jensen, P.	1998	Positive (P-04-001456, CA-BUT-565)	Archaeological Survey	No
I.C. Report #3430	Jensen & Associates	1995b	Positive (CA-BUT-1453, 2308, 2309)	Archaeological Evaluation and Data Recovery	No
I.C. Report #3437	Jensen, P.	2001b	Positive (Historic structures noted)	Archaeological Survey	No
I.C. Report #3438	Jensen, P.	2001a	Positive (Lithics, informally noted)	Archaeological Survey	No
I.C. Report #3550	Jensen, P. and S. Jensen	2001	Negative	Archaeological Survey	No
I.C. Report #4131	Jensen & Associates	1994b	Positive (CA-BUT-892H, 1453, 2308, 2309)	Archaeological Survey	No
I.C. Report #4659	Jensen, P.	2002	Negative	Archaeological Survey	No
I.C. Report #5642	Furry, J.	2003	Negative	Archaeological Survey	No
I.C. Report #5911	Deis, R.	2002	Positive (CA-BUT-2308, 1453, 1071H, Humboldt Road Burn Dump)	Archaeological Survey	No
I.C. Report #5932	Jensen & Associates	1997a	Positive (CA-BUT-892H, 1453, 2308, 2309, 2624H)	Archaeological Survey	No
I.C. Report #5982	Manning, J.	1979	Negative	Drainage Study	No
I.C. Report #6142	Jensen, P.	1985	Negative	Archaeological Survey	No
I.C. Report #6267	Dwyer, E. and L. Westwood	2004	Positive (CA-BUT-1387H)	Archaeological Survey	No
I.C. Report #6324	Jensen, P.	2005	Positive (CA-BUT-187)	Archaeological Survey	No

NEIC Study Number	Author	Date	Results	Type	In Project Area?
I.C. Report #6325	Jensen, P.	2004b	Positive (CA-BUT-2624H)	Archaeological Survey	No
I.C. Report #6326	Jensen, P.	2004a	Positive (CA-BUT-892H, 2624H)	Archaeological Survey	No
I.C. Report #B-L-1	Manning, J.	1978	Negative	Archaeological Survey	No
I.C. Report #B-L-358	Jensen & Associates	1986	Negative	Archaeological Survey	No
I.C. Report #B-L-435	Jensen & Associates	1991	Negative	Archaeological Survey	No
I.C. Report #B-L-516	Manning, J.	1985	Negative	Archaeological Survey	No
I.C. Report #B-L-519	Jensen & Associates	1993b	Positive (CA-BUT-562, 565)	Archaeological Survey	No
I.C. Report #B-L-520	Jensen & Associates	1993a	Positive (Mortar, lithic scatter, informally noted)	Archaeological Survey	No
I.C. Report #B-L-521	Noble, D. (Cal Trans)	1992	Negative	Archaeological Survey	No
I.C. Report #B-L-564	Jensen & Associates	1994a	Positive (CA-BUT-563)	Archaeological Survey	No
I.C. Report #B-L-625	Jensen & Associates	1995d	Negative	Archaeological Survey	No
I.C. Report #B-L-648	Jensen & Associates	1995c	Positive (Lithics, informally noted)	Archaeological Survey	No
I.C. Report #B-L-649	Jensen & Associates	1995a	Positive (CA-BUT-562, 565)	Archaeological Survey	No

Of the positive cultural resource studies within one mile of the project area, seven studies are adjacent to the project area limits. These include: Boynton (1974), Deis (2002), Dwyer and Westwood (2004), Jensen & Associates (1994b, 1995a, 1997a), and Jensen (2004b). One area previously surveyed includes a large parcel east of the SR 99 and SR 32 intersection on the south side of the road. The results of this survey were negative. Other studies have covered the area on the south side of the roadway from El Monte east to the proposed road widening termination point. Four sites were located during these surveys. Approximately 25 percent of the area adjacent to the roadway has been previously surveyed.

The record search also revealed that no cultural resources have been previously identified within the proposed project area. However, 19 cultural resources have been recorded within a one mile radius of the project area. Of these, ten are recorded prehistoric sites, one is an informally recorded prehistoric site, seven are recorded historic sites, and one is an informally recorded historic stone wall. These resources are summarized below in Table 2.

Table 2. Previously Identified Cultural Resources within One Mile of the Project Area.

Site Number	Recorded By	Date	Type	Location
CA-BUT-186	Clewett and Johnson	1964	Lithic scatter	Off Chico Canyon Road
CA-BUT-187	Bordin and Johnson	1964	Habitation site and lithic scatter	Off Chico Canyon Road
CA-BUT-446	Hill	1962	Habitation site and one burial	South of Humboldt Road
CA-BUT-562	Boynton and McCall	1973a	Habitation site and lithic scatter	South of Humboldt Road
CA-BUT-563	Boynton and McCall	1973b	Habitation site and lithic scatter	South of Humboldt Road
CA-BUT-564	Boynton and McCall	1973c	Midden deposit	South of Humboldt Road
CA-BUT-565	Boynton and McCall	1973d	Habitation site and lithic scatter	South of Humboldt Road
CA-BUT-1453	Jensen, S.	1994a	Midden deposit, lithic scatter and bedrock mortars	South of SR 32
CA-BUT-2308	Jensen & Associates	1995e	Lithic scatter and bedrock mortars	South of SR 32
CA-BUT-2309	Jensen, S.	1994b	Habitation site and lithic scatter	South of SR 32
No Number Assigned	Jensen & Associates	1993	Lithic scatter and bedrock mortars	South of Humboldt Road
CA-BUT-892H	Ramos, Shapiro, et al.	2000	Humboldt Wagon Road	Humboldt Road
CA-BUT-1071H	Swillinger	1988a	Stone fence	Stilson Canyon Road at Bruce Road
CA-BUT-1072H	Swillinger	1988b	Refuse deposit, landscaping and fence	North of Little Chico Creek
CA-BUT-1387H	Eco-Analysts	2004	Mulkey Ranch	SR 32 at El Monte Avenue
CA-BUT-1467H	Roberts	2002	Big Chico Creek Flume, footings and earthen ditch	Big Chico Creek
CA-BUT-2624H	Jensen & Associates	1997b	Humboldt Road Burn Dump	Between SR 32 and Humboldt Road
P-04-001456	Jensen & Associates	1998	Chico Slaughterhouse	North of Little Chico Creek
No Number Assigned	Deis	2002	Historic rock wall	East of SR 32 and Bruce Road

Of the 19 known resources within one mile of the project area, three cultural resources are adjacent to the project area limits. CA-BUT-1387H is located at the southeast corner of El Monte Avenue and SR 32. The resource consists of Mulkey Ranch structure foundations and features dated to ca. 1900. In 2004, Dwyer updated the Jensen & Associates (2003) site record, but the current record search revealed that the site has since been destroyed. Jensen & Associates (2003) evaluated the site and determined it was not significant under CEQA guidelines.

A second resource is an informally recorded historic rock wall noted by Deis (2002). This resource is located just east of the Bruce Road and SR 32 intersection. The rock wall runs northeast-southwest just outside the state route right-of-way fence line. Deis evaluated the rock wall under CEQA guidelines and determined that it was not significant.

A third historic resource may be adjacent to the project area limits. The Humboldt Road Burn Dump (CA-BUT-2624H) was recorded by Jensen & Associates as located south of SR 32 along the north side of Humboldt Road and surrounding the Bruce Road/Humboldt Road intersection. The site was evaluated to a CEQA level of eligibility for inclusion in the California Register of Historic Resources (CRHR) and determined not eligible due to poor integrity. Deis (2002) surveyed an adjacent project area just south of SR 32 and Bruce Road and noted that CA-BUT-2624H extended northward down a tributary of Dead Horse Slough. He concurred with the Jensen & Associates (1997a; 1997b) determination of the site being not eligible for the CRHR in his report.

5.0 ARCHAEOLOGICAL SURVEY

5.1 SURVEY METHODS

A pedestrian survey of the project area was completed by Elena Reese, M.A. on October 20 and 21, 2005. An additional survey was conducted by Kevin M. Bartoy, Ph.C., on July 27, 2006 as a supplement for areas related to a potential roundabout at the intersection of Bruce Road and SR 32, which were not included in the initial survey. Due to additional modifications of the APE along El Monte Avenue and Forest Avenue, an additional survey was conducted by Heather Blind, M.A., on November 21, 2006. The proposed project area encompasses: 2.6 miles of the right-of-way surrounding SR 32; and, the intersections of SR 32 with Highway 99, Fir Street, Forest Avenue, El Monte Avenue, Bruce Road and Yosemite Drive. The overall topography of the project area limits was flat at the western end and gradually sloped uphill into gently undulating hillsides at the eastern end.

The survey was conducted by walking the designated project area limits in five meter transects with special attention paid to landscaping features, rodent holes, ditches, and road- and creek-bank cuts that showed the soil profiles. The outer edges of the right-of-way were landscaped with dense vegetation including: oaks, redwoods, pepper trees, manzanita, bottlebrush, Cotoneaster, Pyracantha, blackberry, and various grasses. In most areas, the right-of-way closer to the road provided sufficient surface visibility although grass cover was present.

Visible soils at the western end of the roadway consisted of medium brown silty clays and clay loams with 10-15% gravel content. Gravels included sandstone, basalt, chert, and quartzite. As SR 32 started to slope uphill past El Monte Avenue, visible soils transitioned to orange-brown and orange silty clays with 30-75% gravel and cobble content. Soil visibility ranged from 0-25% depending on the density of vegetation coverage. Most areas had a soil visibility of 10-15% visibility.

5.2 SURVEY RESULTS

The record search revealed that 43 cultural resource surveys have been completed within one mile of the project area. The project area limits had not been previously surveyed for cultural resources; however, approximately 25 percent of the area adjacent to the right-of-way has been previously surveyed. The record search also revealed the identification of 17 previously recorded archaeological sites and two informally noted cultural resources within one mile of the project area. No resources were previously recorded within the project area limits. Native American consultation did not result in the identification of any specific areas of concern.

The survey did not result in the identification any prehistoric sites within the project area limits. However, two historic period resources were recorded within the project area limits. SR32-1 and SR32-2, had not previously been recorded. SR32-1 is an early to

mid twentieth-century trash scatter and SR32-2 is an earthen ditch. The locations of these resources are depicted on Figure 7.

Additionally, a sparse scatter of early to mid twentieth-century artifacts was located within the South Fork of Dead Horse Slough, southeast of the Bruce Road/SR 32 intersection on the south side of SR 32. Artifacts observed included: undecorated whiteware, decal-printed, transfer-printed, and yellowware ceramics; bottle glass; solarized purple glass; a melted salt shaker; and enameled pot fragments. Ceramic and bottle maker's marks indicated a date range of 1920s through 1960s. The scatter was associated stream grading and renovation disturbance to the south. Through visual inspection, these materials were determined to be displaced artifacts that have eroded from CA-BUT-2624H located outside of the APE to the southeast. The site boundaries of CA-BUT-2624H do not extend within in the current APE. In consultation with Anmarie Medin of Caltrans, it was determined that these displaced materials did not require evaluation.

5.2.1 SR32-1

A sparse historic trash deposit was found on the north side of SR 32 just east of the El Monte Avenue intersection. The site is a large, diffuse scatter of artifacts over an area of 140 meters (east/west) by 20 meters (north/south). Artifacts observed included: Asian, decal-printed, and undecorated whiteware ceramics; a canning lid liner; bottle glass; a pressed glass plate rim; and one piece of faunal bone. The trash scatter area was located across the road from CA-BUT-1387H and may be associated with the site (Eco-Analysts 2003). Archival research, which included an analysis of historic maps provided by the NEIC, did not provide additional information concerning chronology or association of the deposit.

5.2.2 SR32-2

An earthen ditch was encountered east of SR32-1 approximately 250 meters east of the intersection of SR32 and El Monte Avenue. The ditch lies along a property line and extends north from the SR 32 shoulder. The ditch measures 1.5 to 2 meters deep and is approximately 4 meters wide. The ditch is banked.

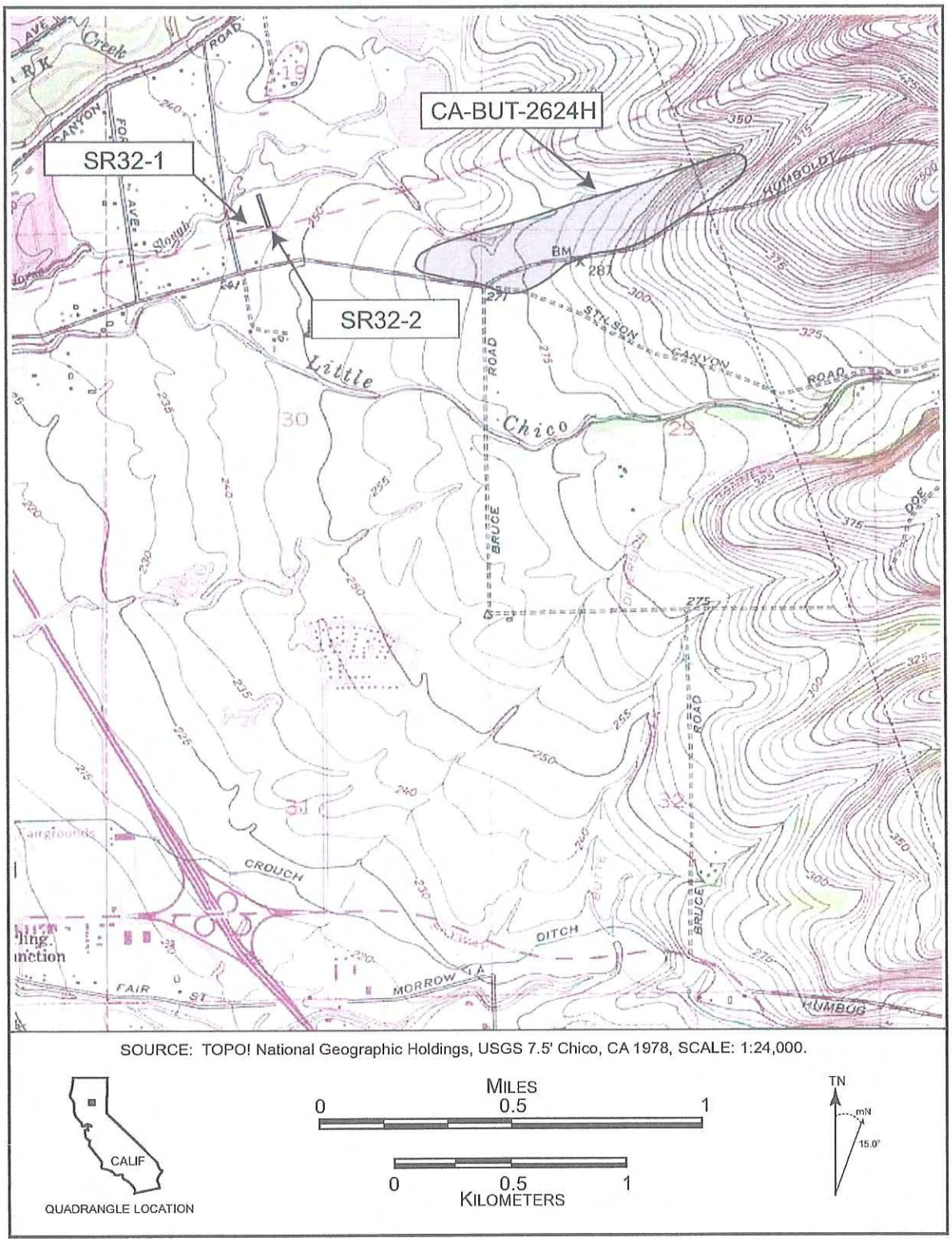

Figure 7. Resource Location Map

Pacific Legacy Incorporated

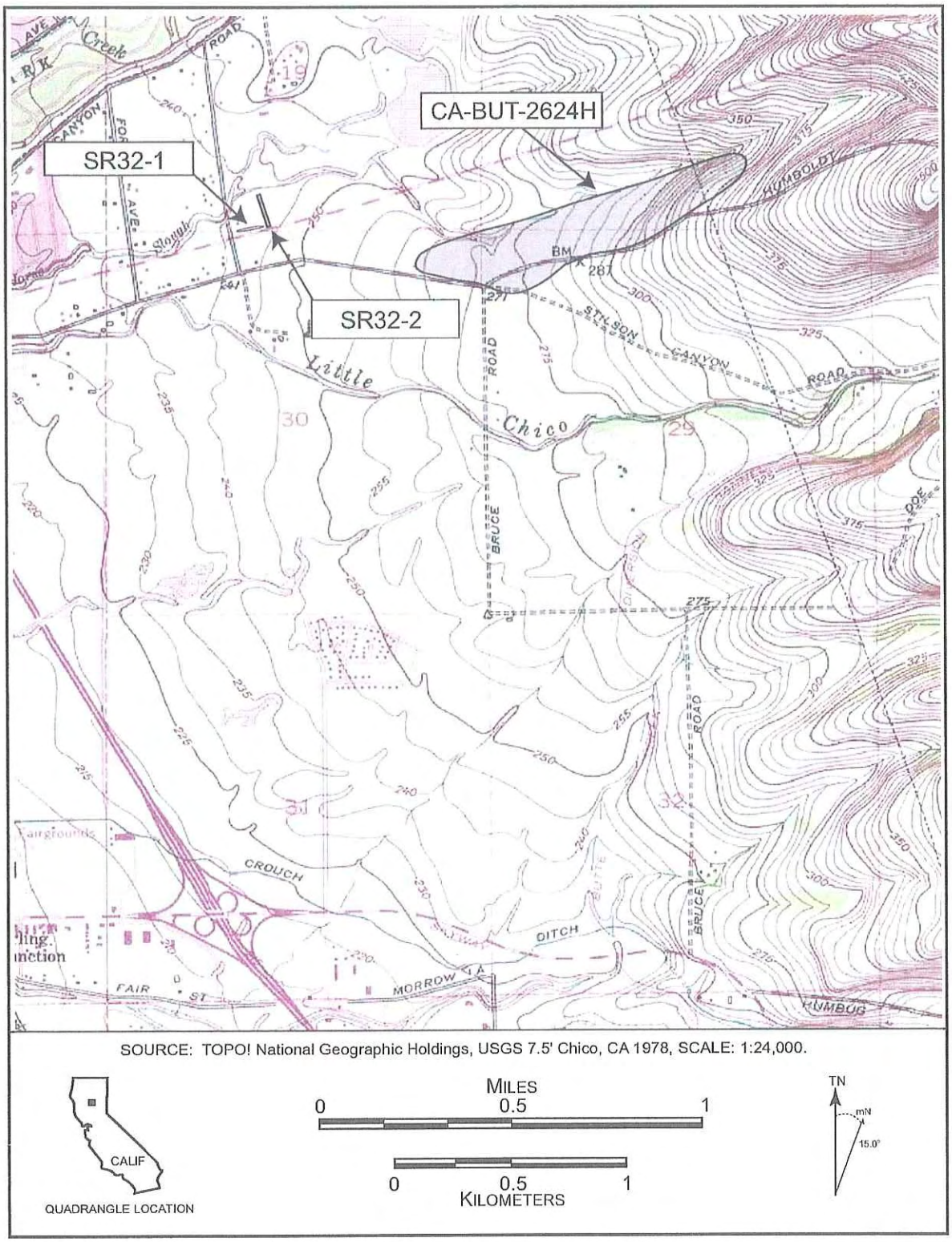

Figure 7. Resource Location Map

Pacific Legacy Incorporated

6.0 ARCHAEOLOGICAL INVESTIGATION

6.1 FIELD METHODS

Following the cultural resources inventory, which identified two previously unevaluated resources within the project area (SR32-1 and SR32-2), Pacific Legacy coordinated with Caltrans staff, Jeff Haney and Anmarie Medin, who recommended that SR32-1 and SR32-2 be evaluated for eligibility to the CRHR and NRHP. The trash scatter that was noted in the South Fork of Dead Horse Slough was determined to be displaced materials from CA-BUT-2624H. Since these materials had been displaced by stream maintenance and repair as well as erosion, Anmarie Medin of Caltrans stated in a telephone consultation on June 27, 2006 that these materials did not require evaluation. The site boundaries of CA-BUT-2624H are located outside of the current APE to the southeast.

On February 2 and 3, 2006, Kevin Bartoy and Nichole Jordan of Pacific Legacy conducted archaeological investigations at SR32-1 and SR32-2. Subsurface archaeological testing was conducted at SR32-1. The evaluation of SR32-2 did not include subsurface testing. For SR32-1, a total of 20 auger bores and 5 shovel test probes (50 cm x 50 cm) were excavated. The total amount of soil excavated in test probes amounted to 0.3575 cubic meters. A total of 797 artifacts were collected during subsurface testing.

Testing was conducted in a "nested" format in which less invasive methods, such as archival research, surface survey and auger bores, were used to identify locations of cultural deposits to be further tested by more invasive methods, such as shovel test units. Archival research, which included an analysis of historic maps provided by the NEIC, did not provide additional information concerning chronology or association of the deposit. Prior to subsurface excavation, an intensive surface survey of the site was conducted. The surface survey allowed for a delineation of site boundaries from the surface survey. When site boundaries had been determined by surface artifact concentrations, auger bores of no greater than 10 cm in diameter were hand drilled within and outside the boundaries of the site. Augers were systematically placed in transects parallel to the long axis of the site. The augers were placed at intervals of no greater than ten meters. Auger bores were drilled in intervals of 20 cmbs and all soil was dry screened through quarter-inch hardware cloth. All recovered materials were collected and provenienced by auger number and depth below surface. Soil was described according to type, texture, and color. Each auger bore was plotted on a location map and an auger bore log was recorded for each auger bore. A summary of auger bores is included as Appendix E.

More invasive testing was accomplished through the use of shovel test probes (50 cm x 50 cm). Shovel test probes were placed in areas of artifact concentration as indicated by auger bores. Shovel test probes were excavated using a single context recording system as outlined by Harris (1989). This system is often referred to as the Harris Matrix System and consists of assigning arbitrary numbers to each context that is excavated. For this

investigation, each context consisted of an arbitrary 20 cm level unless cultural strata were encountered. When possible, contexts were determined by cultural strata, yet all contexts were excavated to no more than 20 cm in depth in order to maintain vertical control over the sample. Soil was hand excavated by shovels, trowels, and other small hand tools. All soil was dry screened through quarter-inch hardware cloth. All recovered materials were collected and provenienced by context number. Each shovel test probe was plotted on a location map and a context record was completed for each excavated context. A summary of shovel test probes is included as Appendix F.

All artifacts recovered during excavation were bagged according to unit, context number, depth, and material type. Fragile items were kept softly-packed in rigid containers to prevent their destruction during transportation to the laboratory. Attempts were made to keep recovered materials in the same environmental condition in which they were found.

When the excavation was completed, all screened dirt was used to backfill the excavated units and restore the area to pre-excavation conditions.

6.2 LABORATORY METHODS

During this archaeological investigation, 797 artifacts were collected for laboratory analysis. All collected materials were brought to Pacific Legacy's Bay Area Division for processing. Artifacts were cleaned as appropriate based on material type and condition of the artifact, sorted by provenience and class for material identification, identified, briefly described, and catalogued individually or in lots. The catalog was generated using translatable computer database software (Microsoft Access®) and were structured to include necessary fields, such as accession and specimen numbers, provenience, and artifact data. The site catalog is included in this report as Appendix C.

6.3 SR32-1

SR32-1 is a previously unidentified sparse historic trash deposit located on the north side of SR 32 just east of the El Monte Avenue intersection. The site is a large, diffuse scatter of artifacts over an area of 140 meters (east/west) by 20 meters (north/south). The trash scatter is located across the road from CA-BUT-1387H and may be associated with the site (Eco-Analysts 2003).

Archaeological investigation of SR32-1 consisted of the placement of 20 auger bores and 5 shovel test probes (50 cm x 50 cm) (Figure 8). The total amount of soil excavated in test probes amounted to 0.3575 cubic meters. A total of 797 artifacts were collected during subsurface testing.

6.3.1 Stratigraphy

The stratigraphic characteristics of SR32-1 were primarily revealed through the excavation of five shovel test probes. Additional information was derived from auger bores, which provided information about the depth and density of cultural materials

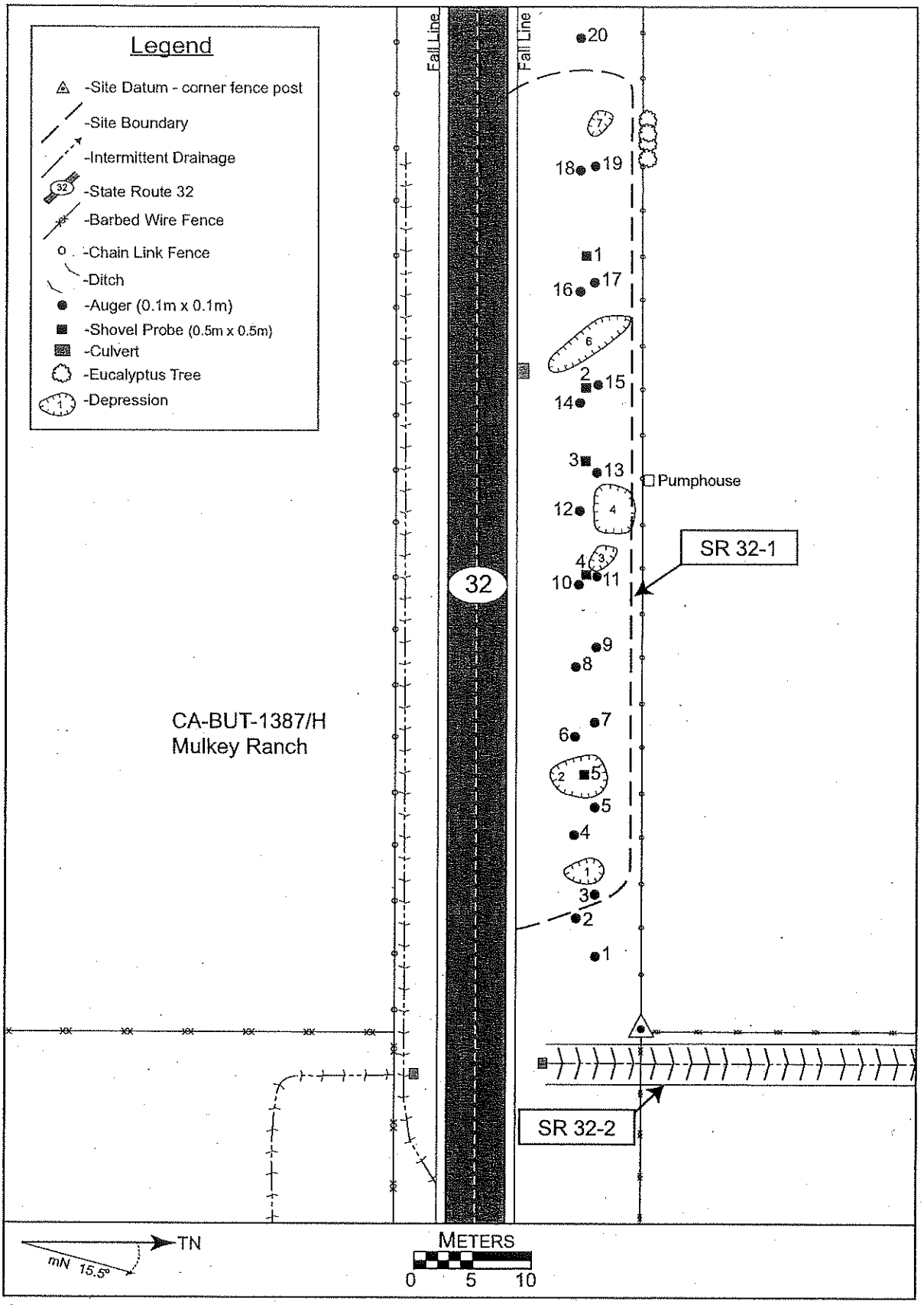

Figure 8. Site Map

across the site. Testing at SR32-1 revealed a lack of significant stratigraphy and a moderate to high density of cultural materials. The site deposit was confined to the upper 15 cmbs. At approximately 15 cmbs, a sterile red clay loam subsoil was encountered across the site.

The initial layer of soil, which varied in thickness from 8 to 15 cmbs, was characterized as a reddish brown clay loam with organic materials, such as fine rootlets. This layer extended from the surface of the site to approximately 15 cmbs. All cultural materials were encountered in this layer. The layer most likely was created during the construction of SR 32. This layer rested upon a layer of red clay loam subsoil that was devoid of cultural materials. This layer continued to at least 60 cmbs, which was the extent of auger testing at the site.

The stratigraphy recorded at SR32-1 may be the result of the construction of SR 32. It is likely that the cultural bearing layer was created during grading for SR 32 as evidenced by the fragmentation and dispersal of materials across the Caltrans right-of-way. The deposit does not continue on the property just outside of the right-of-way to the north.

6.3.2 Chronology

The chronology for SR32-1 was determined through the identification of chronologically sensitive artifacts. Of the 797 recovered artifacts, approximately 10 artifacts were chronologically diagnostic. An additional 29 artifacts were identified as modern debris, which included plastic, vinyl, and cardboard. The presence of these modern materials provides evidence for a level of disturbance to the deposit.

Chronologically sensitive artifacts were predominately glass and ceramic. Of the seven glass artifacts, two fragments were identified as a Vaseline bottle produced by the Chesebrough Manufacturing Company, who opened their first factory in 1870. One fragment has a cut-off scar on the base. These marks are indicative of the first fully machine-made bottles which date from 1904 to the present. One base fragment displays the mark of the Illinois Glass Company, which produced the mark from 1916 to 1929. Another base fragment displays the mark of the Owens Illinois Glass Company. This company produced the identified mark from 1929 to 1954 (Toulouse 1972:403). Another glass fragment is embossed "BLUE RIBBON" this mark was produced by the Standard Glass Company, Indiana from 1920 to 1930 (Toulouse 1972:87). One bottle finish fragment has an external thread which was popular throughout the twentieth century (BLM 2005).

Of the three ceramic artifacts, two fragments of white improved ware are marked with the manufacturer's mark of the Pope-Gosser China Company, who operated from 1902 to 1958 in Ohio (Lehner 1988:353). One whiteware sherd bears the mark of Knowles, Taylor, Knowles Company. This company operated from 1854 to 1931 and was located in Ohio. The mark was registered in 1919, although claimed use since 1905 (Lehner 1988:238).

As discussed in Section 6.3.4, SR32-1 is most likely of secondary deposit created during the construction of SR 32. Thus, the deposit would date to the 1960s.

6.3.3 Artifact Assemblage

A total of 797 artifacts, weighing 3643 grams (g), were recovered during this investigation. Table 3 lists the counts and weights of the materials by provenience and inventory category.

Household Ceramics

Household ceramics included sherds of vessels used in food preparation, storage, service, and consumption. A total of 82 sherds were recovered from excavations, comprising 9.8% of the total assemblage by weight (n=357.4 g). Household ceramics were sorted into seven waretypes: whiteware (n=19); white improved ware (n=19); earthenwares (n=2); porcelain (n=30); porcelainous stoneware (n=4); stoneware (n=1); and, yellowware (n=7).

Whiteware. White-bodied vessels and white improved earthenwares belong to the ceramic family of British-made, white-bodied wares produced from the 1700s into the 1900s (Majewski and O'Brien 1987). The majority are the products of nine potteries within Staffordshire: Tunstall; Longport; Burslem; Cobridge; Hanley; Stoke; Fenton; Lane End; and, Longton. These ceramics are chronologically-sensitive materials that were produced during the industrialization of the British ceramic industry, when improvements to vessel body, glaze, and decoration were being rapidly developed. A total of nineteen fragments of whiteware (39.7 g) were identified.

White Improved Wares. These refined earthenwares are the most common Euroamerican ceramic tableware recovered from historical sites (Pesnichak 2003:32). Improved whitewares can be distinguished from other whitewares by the hardness of paste. There are also stylistic differences. Improved wares commonly bear molded relief patterns and have thicker vessel walls. Improved whitewares remained a popular Euroamerican ceramic tableware through the nineteenth and twentieth centuries due to their low cost and durability (Pesnichak 2003:32). They were considered more durable for long distance transportation and use in frontier conditions. Often these whitewares and in particular ironstone were undecorated (Pesnichak 2003:32). Undecorated and molded improved wares were the dominant waretype for the period circa 1850 to circa 1890 (Miller 1993:20). Later wares tend to be undecorated whereas the earlier ones commonly have embossed molding (Miller 1993:19). A total of nineteen fragments (97.1 g), were identified as improved wares. None of the recovered fragments exhibited embossed molding.

Porcelains. Porcelains are dense, highly vitreous and generally translucent white-bodied wares. Produced initially in China as early as the seventeenth century, Asian-export, hard-paste porcelain was a commonly traded ware throughout the colonial New World. Additionally, British and French factories began to produce soft-paste porcelains and so-called "bone china" as early as the eighteenth century (Majewski and O'Brien 1987). Thirty porcelain fragments (107.0 g) were recovered.

Table 3. Materials Recovered from Each Unit at SR32-1

		Ceramics		Faunal		Glass		Metal		Other		Total	
Unit/Auger #	Level (cmbs)	Count	Weight	Count	Weight	Count	Weight	Count	Weight	Count	Weight	Count	Weight
1	0-15	2	2.1	-	-	113	586.1	1	0.7	2	0.1	118	589
2	0-10	5	8.3	-	-	9	18.8	-	-	-	-	14	27.1
3	0-15	56	222.4	1	4.2	198	872.9	16	59.1	26	29.2	297	1187.8
4	0-8	8	67	-	-	167	749.1	86	509.2	13	180.4	274	1505.7
5	0-5	6	48.8	1	0.5	47	146.5	1	1	2	1.8	57	198.6
AU06	0-20	2	3.5	-	-	-	-	-	-	-	-	2	3.5
AU10	0-15	1	2.3	-	-	10	77.6	1	6	-	-	12	85.9
AU11	0-20	-	-	-	-	7	5.7	-	-	-	-	7	5.7
AU13	0-20	1	2.5	-	-	1	1.3	-	-	-	-	2	3.8
AU15	0-20	1	0.5	-	-	5	7.5	2	20.9	4	3.2	12	32.1
AU17	0-20	-	-	-	-	2	3.8	-	-	-	-	2	3.8
	Total	82	357.4	2	4.7	559	2469.3	107	596.9	47	214.7	797	3643

Porcelainous Stoneware. Porcelainous stoneware can be identified by its vitrified, glassy paste with a slight blue to pale gray tint that blends into and is nearly indistinguishable from the glaze. This ceramic originates in Asia. The most popular items being exported to America from China were mainly dinner, breakfast, tea, or coffee services. Chinese wares could be made on special order for upper class Americans, but as their popularity increased, these wares were mass produced and sent in bulk for middle- to lower-income families (Mudge 1981:64). Only four fragments (21.6 g) were identified as porcelainous stoneware.

Yellowware. The term yellowware is applied to a ceramic body that fires to a yellowish hue. Yellowware was introduced to the United States from England during the 1820s, and by the 1840/50s yellowware was being manufactured widely along the eastern seacoast, with major sources located in New Jersey and Ohio (Ketchum 1987). Many pieces of yellowware were left undecorated, although annular decoration was also popular. The majority of yellowwares date from circa 1880 to the early-twentieth century, although rarer examples can be found dating to the 1830s (Ketchum 1987:51). Yellowware pottery was produced well into the twentieth century, although its popularity waned as the popularity of whitewares grew. Seven fragments of yellowware were recovered, and likely belong to the same vessel. The vessel is glazed but exhibits no decoration on the recovered fragments.

Earthenwares. Earthenware is fired at temperatures ranging from 900° to 1000° C. This ceramic is porous and requires glazing on at least one surface to hold liquids (Kowalsky and Kowalsky 1999:7). Earthenwares generally have a soft, porous paste, ranging from buff to yellow to pink to red to gray in color. Two fragments (14.8 g) were identified as earthenwares. These fragments are curved and are unglazed and were recovered from STP5.

Stoneware. Stoneware vessels are fired at temperatures between 1200° and 1300° C, resulting in a ware that is non-porous (vitrified). Paste color generally ranges from white to gray to tan. While stonewares are impervious to liquids and do not need to be glazed, they often are (Kowalsky and Kowalsky 1999:7). Only one fragment of stoneware (1.3 g) was recovered. Due to the small size of the fragment the vessel form can not be identified.

Glass

A total of 559 fragments of glass were recovered, comprising 67.8% of the total assemblage by weight (n=2469.3 g). For the purposes of this report, glass was subdivided into four general groups: tableware glass (n=18); bottle glass (n=136); pane glass (n=49); and, non-diagnostic glass (n=356).

Tableware. Tableware is a general term applied to glassware used on the table and associated with food and drink, as well as some items of decorative glassware, such as vases (Jones & Sullivan 1989:127). A total of 18 fragments (160.1 g) were identified as tableware. Vessel forms included stemware, bowls and jelly jars.

Bottle Glass. Bottle glass has a high potential to yield valuable chronological information in addition to indications of dietary habits, consumer choice, and trade routes and patterns. A total of 136 fragments (1020.7 g) were identified as bottle glass. The majority of fragments (n=62) were brown glass. Brown bottle glass was common throughout the nineteenth and twentieth centuries (BLM 2006). Two fragments were identified as milk glass, which was typically produced by the addition of tin or zinc oxide. The color was most commonly used in cosmetic and toiletry bottles (primarily from the 1870s to about 1920) and ointment/cream jars (1890s to the mid-20th century) although occasionally milk glass is found in other vessel forms (BLM 2005). During the eighteenth and nineteenth centuries, the light green/blue hue present in many glass fragments was caused by low levels of iron molecules present in sand deposits used for glass manufacture. Only ten fragments display an aqua hue. By 1920, aqua-hued bottles were uncommon (BLM 2006). Between 1875 and 1917, manganese was often added to the glass compound to neutralize this effect. The addition of manganese produced a purplish tint after prolonged exposure to ultraviolet rays (Jones & Sullivan, 1989:13). Only one fragment of solarized glass was recovered.

Pane Glass. A total of 49 fragments (259.2 g) of pane glass were recovered. Pane fragments were identified by their transparency, uniform thickness and fragments were large enough to ensure that it had no curvature.

Other Glass. Pieces of glass that could not be positively identified as tableware, bottles or pane glass were categorized as "other glass." Three hundred and fifty-six fragments (1029.3g) were categorized as other glass.

Metal

The metal assemblage consisted of 107 artifacts, comprising 16.4% of the total assemblage by weight (n=596.9 g). For the purpose of this report, metal artifacts were divided into three categories: ferrous metal (n=100); copper alloy (n=4); and, other metal (n=3). Ferrous metal can be identified by its magnetic propensities along with appearance and shape. A total of 100 fragments (576.9 g) were identified as ferrous metal. These were primarily wire nails and can fragments. Four fragments (11.4 g) were identified as copper alloy. These included wire, pencil eraser holders and a numbered tag. Three fragments (8.6 g) were identified as other metal, these included a two-holed button, a possible umbrella tip and an unidentified object.

Faunal Remains

A total of two fragments of faunal material were recovered, comprising 0.1% of the total assemblage by weight (n=4.7 g). Both fragments were calcined. Calcined bone was completely or partially whitened from high temperature heat exposure. One fragment was saw cut.

Other Materials

During cataloguing, some materials could not be easily assigned to any of the above categories. These materials were classified as other materials and included coal (n=13), cardboard (n=21), plastic (n=6), foil food wrappers (n=2), writing chalk (n=2), burnt

wood (n=1), peach/nectarine pit (n=1) and, one cork bottle stopper. These materials comprised 5.9% of the total assemblage (n=214.7 g).

6.3.4 Site Structure and Integrity

SR32-1 is currently located within Caltrans right-of-way to the north of SR 32. The horizontal extent of the site was estimated through surface survey and subsurface testing. At a minimum, the site occupies an area of 2,800 square meters. Subsurface testing revealed a lack of significant stratigraphy with all cultural materials confined to the initial 15 cmbs. The artifact density of the deposit was moderate to high. Cultural materials showed no significant horizontal differentiation. The presence of modern debris provided evidence of modern disturbance to the deposit.

Given the great horizontal extent of the site, the lack of depth for the deposit, and the high degree of fragmentation of the recovered materials, it is most likely that SR32-1 represents a secondary deposit related to the construction of SR 32. The cultural materials present at SR32-1 were most likely originally associated with CA-BUT-1387/H (Mulkey Ranch) located to the south of SR 32. The homogenization of the deposit as a result of construction has significantly reduced the potential for the data to address research questions. The deposit does not maintain a significant potential to yield information concerning activities that occurred at this location during a discrete period of time.

6.4 SR32-2

SR32-2 is an earthen ditch that is located adjacent to the east of SR32-1 and approximately 250 meters east of the intersection of SR 32 and El Monte Avenue. The ditch lies along a property line as indicated by a fence line. It extends north from the shoulder of SR 32 and empties into Dead Horse Slough approximately 200 meters to the north. The ditch measures 1.5 to 2 meters deep and is approximately 4 meters wide.

6.4.1 Descriptive Analysis

SR32-2 is an earthen ditch that extends north from SR 32 to empty into Dead Horse Slough. The ditch begins at a modern culvert that crosses under SR 32, but the ditch does not continue to the south of SR 32. A less developed ditch exists to the south of SR 32 and drains the adjacent fields through the culvert that eventually empties into SR32-2. At SR 32, the ditch is approximately four meters wide and two meters in depth. As the ditch progresses to the north, it becomes shallower and less developed. By its outlet at Dead Horse Slough, the ditch is no longer visible on the landscape. The construction of SR32-2 may be associated with the construction of a sewer line that parallels the ditch to the east and has created a berm. The soil that formed the berm appears to have originated from the ditch.

6.4.2 Chronology

According to Bob Feeney (2006, per. comm..), civil engineer with The Engineering Group, the sewer line, which parallels SR32-2 to the east, was placed in the 1970s or 1980s to support a proposed development to the south of SR 32. This sewer line appears

at least partially responsible for the creation of SR32-2. However, since a modern culvert under SR 32 exists in association with SR32-2, it is also likely that the ditch was constructed in conjunction with SR 32. This would place the initial construction of the ditch in the 1960s. SR32-2 most likely does not predate the construction of SR 32 as it does not continue to the south of the highway.

6.4.3 Integrity

Although SR32-2 appears to retain the integrity of its original construction, the ditch is of modern origin and does not meet the minimum age requirements for consideration as a historical resource.

7.0 EVALUATION AND RECOMMENDATIONS

7.1 REGULATORY FRAMEWORK

This report documents the archaeological investigation of two cultural resources within the APE of the SR 32 Widening from SR 99 to Yosemite Drive Project. This investigation was undertaken in order to evaluate the potential eligibility of the resources for the NRHP and/or the CRHR. The criteria for determining cultural resources significance are the NRHP as defined at 36 CFR Part 60.4, and the CRHR as defined at Section 5024.1 of the California Public Resources Code.

Because the proposed action may, due to funding or permitting, constitute a federal undertaking that requires compliance with Section 106 of the NHPA and NEPA, federal significance criteria apply. For federally funded projects, cultural resource significance is evaluated in terms of eligibility for listing in the NRHP. NRHP criteria for eligibility are defined as follows:

> The quality of significance in American history, architecture, archeology, and culture is present in districts, sites, buildings, structures, and objects of state and local importance that possess integrity of location, design, setting, materials, workmanship, feeling and association, and that:
>
> (a) are associated with events that have made a contribution to the broad pattern of our history;
>
> (b) are associated with the lives of people significant in our past;
>
> (c) embody the distinct 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; or,
>
> (d) have yielded, or are likely to yield, information important in prehistory or history (36 CFR Part 60.4).

CEQA defines a significant historical resource as "a resource listed or eligible for listing on the California Register of Historical Resources" (Pub. Res. Code Section 5024.1). For a historical resource to be eligible for listing in the CRHR, it must be significant at the local, state, or national level under one or more of the following four criteria:

> (1) it is associated with events that have made a significant contribution to the broad patterns of local or regional history, or the cultural heritage of California or the United States;

(2) it is associated with the lives of persons important to local, California, or national history;

(3) it embodies the distinctive characteristics of a type, period, region, or method of construction, or represents the work of a master or possesses high artistic values; or,

(4) it has yielded, or has the potential to yield, information important to the prehistory or history of the local area, California, or the nation.

Historical resources automatically listed in the CRHR include those historic properties listed in, or formally determined eligible for, the NRHP.

In addition to meeting one or more of the criteria set forth for listing in the NRHP or CRHR, a cultural resource must retain the quality of *integrity* in order to qualify for the NRHP or CRHR. The concept of integrity is usually interpreted to mean "intactness" of physical characteristics, but in terms of the NRHP and CRHR, integrity is a measure of the degree to which a property retains or is able to convey the essential characteristics defined under one of the four eligibility criteria. These characteristics may be expressed through integrity of location, design, setting, materials, workmanship, feeling, and association of a property. An archaeological property may retain sufficient integrity to qualify it for the NRHP or CRHR if the property retains the ability to yield information important to an understanding of history or prehistory. It must be demonstrated to have the potential, or to have previously yielded, data that can be used to address important research questions.

7.2 EVALUATIONS

7.2.1 SR32-1

Given the great horizontal extent of the site, the lack of depth for the deposit, and the high degree of fragmentation of the recovered materials, it is most likely that SR32-1 represents a secondary deposit related to the construction of SR 32. SR32-1 is currently located within Caltrans right-of-way to the north of SR 32. The horizontal extent of the site was estimated through surface survey and subsurface testing. At a minimum, the site occupies an area of 2,800 square meters. Subsurface testing revealed a lack of significant stratigraphy with all cultural materials confined to the initial 15 cmbs. The artifact density of the deposit was moderate to high. Cultural materials showed no significant horizontal differentiation. The presence of modern debris provided evidence of modern disturbance to the deposit.

The cultural materials present at SR32-1 were most likely originally associated with CA-BUT-1387/H (Mulkey Ranch) located to the south of SR 32. The homogenization of the deposit as a result of construction has significantly reduced the potential for the data to address research questions. The deposit does not maintain a significant potential to yield information concerning activities that occurred at this location during a discrete period of time.

For this reason, it is our opinion that SR32-1 is not eligible for listing on the NRHP or the CRHR and should not be considered a "historic property" as per Section 106 of the NHPA or a "historical resource" as per CEQA. Additionally, SR32-1 does not meet the requirements to be considered a "unique archaeological resource" as defined in Pub. Res. Code Section 21083.2.

7.2.2 SR32-2

According to Bob Feeney (2006, per. comm.), civil engineer with The Engineering Group, the sewer line, which parallels SR32-2 to the east, was placed in the 1970s or 1980s to support a proposed development to the south of SR 32. This sewer line appears at least partially responsible for the creation of SR32-2. However, since a modern culvert under SR 32 exists in association with SR32-2, it is also likely that the ditch was constructed in conjunction with SR 32. This would place the initial construction of the ditch in the 1960s. SR32-2 most likely does not predate the construction of SR 32 as it does not continue to the south of the highway.

SR32-2 appears to be less than 50 years old. As such, it does not meet the required 50 years of age that would allow for the recognition of its historical importance. Although Section 106 of the NHPA and CEQA do allow for special consideration for resources of exceptional importance that are less than 50 years old, SR32-2 cannot be demonstrated to meet the significance criteria to attain special consideration.

For this reason, it is our opinion that SR32-2 is not eligible for listing on the NRHP or the CRHR and should not be considered a "historic property" as per Section 106 of the NHPA or a "historical resource" as per CEQA. Additionally, SR32-2 does not meet the requirements to be considered a "unique archaeological resource" as defined in Pub. Res. Code Section 21083.2.

7.3 SUMMARY AND RECOMMENDATIONS

Pedestrian survey of the project area identified two cultural resources within the current project area. These resources were SR32-1 and SR32-2. Our investigations of SR32-1 and SR32-2 detailed in this report determined both of these resources not eligible for the NRHP or the CRHR. Since these resources have been determined not eligible for the NRHP and the CRHR, and are not considered "unique archaeological resources" (Pub. Res. Code Section 21083.2), SR32-1 and SR32-2 are not considered "historic properties" as per Section 106 of the NHPA or "historical resources" as per CEQA. No historic properties or historical resources were identified with the APE of the SR 32 Widening from SR 99 to Yosemite Drive Project.

Prior to the initiation of construction or ground-disturbing activities, all construction personnel should be alerted to the possibility of buried cultural remains within the construction corridor. This includes prehistoric and/or historic resources. Personnel should be instructed that upon discovery of buried cultural materials, work in the immediate area of the find be halted and the City and Caltrans notified. Once the find

has been identified, Caltrans in consultation with the City should make the necessary plans for treatment of the find(s) and for the evaluation and mitigation of impacts to the finds if they are found to be NRHP or CRHR eligible.

If buried human remains are encountered during construction, work in that area must halt, and the City, Caltrans, and the Butte County Coroner be immediately notified. If the remains are determined to be Native American, then the Native American Heritage Commission (NAHC) will be notified within 24 hours as required by Public Resources Code 5097. The NAHC will notify designated Most Likely Descendants who will provide recommendations for the treatment of the remains within 24 hours.

1992 *The Historical Geography of the Humboldt Wagon Road.* Association for Northern California Records and Research, Chico, California

Clewett, S. E. and K. Johnson
1964 Site record for CA-BUT-186. On file at the Northeast Information Center, California State University, Chico, California.

Deis, R. M.
2002 Addendum to the Archaeological Inventory Survey, City of Chico's Humboldt Road Burn Dump Site Project Area c. 14 acres. Study # 5911 on file at the Northeast Information Center, California State University, Chico, California.

Dixon, R.B.
1905 The Northern Maidu. *American Museum of Natural History Bulletin* XVII:119-346.

Dwyer, E.
2004 Site record for CA-BUT-1387H Update. On file at the Northeast Information Center, California State University, Chico, California.

Dwyer, E. and L. Westwood
2004 Final: Confidential Cultural Resources Inventory of the Proposed Mission Vista Hills Subdivision, City of Chico, Butte County, California. Study #6267 on file at the Northeast Information Center, California State University, Chico, California.

Eco-Analysts
2003 Site record for CA-BUT-1387H. On file at the Northeast Information Center, California State University, Chico, California.

Furry, J.
2003 Archaeological Reconnaissance of the Proposed Simmons Ranch Subdivision Project, Chico, Butte County, California. Study #5642 on file at the Northeast Information Center, California State University, Chico, California.

Guinn, J.M.
1906 *History of the State of California and Biographical Record of the Sacramento Valley, California.* Chapman Publishing Co. Chicago, Illinois.

Hamusek, B. and S. Jenevein
1994 Archaeological Reconnaissance of Lower and Upper Bidwell Park Vegetation Management Plan Project, Butte County, California. Study #1188 on file at the Northeast Information Center, California State University, Chico, California.

Harris, E.C.
1989 *Principles of Archaeological Stratigraphy*. Academic Press, London.

Hill, D.
1962 Site record for CA-BUT-446. On file at the Northeast Information Center, California State University, Chico, California.

Hoover, M.B., H.E. Rensch, E.G. Rensch, and W.N Abeloe
1990 *Historic Spots in California*. Fourth edition, revised by D.E. Kyle. Stanford University Press, Stanford, California.

Jensen & Associates
1986 Archaeological Reconnaissance of the Proposed Simmons Ranch Subdivision Project, Chico, Butte County, California. Study #B-L-358 on file at the Northeast Information Center, California State University, Chico, California.

1991 Archaeological Inventory Survey for the Proposed Testman/Hoffman Subdivision Project Involving c. Four Acres Located Adjacent to El Monte Avenue and Dead Horse Slough Near Chico, Butte County, California. Study #B-L-435 on file at the Northeast Information Center, California State University, Chico, California.

1993a Archaeological Inventory Survey: The Villages of Simmons Ranch, c. 60 Acre Portion, Between Stilson Canyon Road and Humboldt Road, Chico, Butte County, California. Study #B-L-520 on file at the Northeast Information Center, California State University, Chico, California.

1993b Archaeological Inventory Survey: City of Chico's Proposed Bicycle and Leisure Path, Involving c. 1.25 Miles along Little Chico Creek, Chico, Butte County, California. Study #B-L-519 on file at the Northeast Information Center, California State University, Chico, California.

1994a Archaeological Inventory Survey: Williams' Proposed Subdivision and Residential Development, c. 79 Acres Along Little Chico Creek, Chico, Butte County, California. Study #B-L-564 on file at the Northeast Information Center, California State University, Chico, California.

1994b Archaeological Inventory Survey: California Park South Subdivision Project Area, 360 Acres Between State Route 32 and Humboldt Road, East Chico, Butte County, California. Study #4131 on file at the Northeast Information Center, California State University, Chico, California.

1995a Archaeological Inventory Survey: Mulkey Development Site Project Area, 7 Acres Between State Route 32 and Humboldt Road, East Chico,

Butte County, California. Study #B-L-649 on file at the Northeast Information Center, California State University, Chico, California.

1995b Archaeological Evaluation and Data Recovery at Two Prehistoric Lithic Scatter Sites, East Chico, Butte County, California. Study #3430 on file at the Northeast Information Center, California State University, Chico, California.

1995c Archaeological Inventory Survey: Benedict Ranch Proposed Subdivision, 32.5 Acres on E. 8th St., Between Big Chico Creek and Dead Horse Slough, Chico, Butte County, California. Study #B-L-648 on file at the Northeast Information Center, California State University, Chico, California.

1995d Archaeological Inventory Survey: Northern Valley Catholic School Social Services Development Parcel, c. 2.7 Acres on Forrest Avenue at Hartford Street, Chico, Butte County, California. Study #B-L-625 on file at the Northeast Information Center, California State University, Chico, California.

1995e Site record for CA-BUT-2308 and update. On file at the Northeast Information Center, California State University, Chico, California.

1997a Archaeological Inventory Survey: City of Chico's Humboldt Road Burn Dump Site Project Area, c. 160 Acres Between State Route 32 and Humboldt Road, East Chico, Butte County, California. Study #5932 on file at the Northeast Information Center, California State University, Chico, California.

1997b Site record for CA-BUT-2624H. On file at the Northeast Information Center, California State University, Chico, California.

1998 Primary record for P-04-001456. On file at the Northeast Information Center, California State University, Chico, California.

Jensen, P. M.

1985 Archaeological Reconnaissance of a Proposed Expansion of the California Park Subdivision, Butte County, California. Study #6142 on file at the Northeast Information Center, California State University, Chico, California.

1997a Archaeological Inventory Survey: c. 19-Acre Site on Little Chico Creek, Proposed Humboldt Junior High School, Chico, Butte County, California. Study #1548 on file at the Northeast Information Center, California State University, Chico, California.

1997b Archaeological Inventory Survey: c. 60-Acre Alleghany Subdivision Project Area, Chico, Butte County, California. Study #1525 on file at the Northeast Information Center, California State University, Chico, California.

1997c Archaeological Inventory Survey, Heather Glen Subdivision and Development Project Area, c. 40 Acres Adjacent to Little Chico Creek near the Chico Mall, Chico, Butte County, California. Study #1547 on file at the Northeast Information Center, California State University, Chico, California.

1997d Archaeological Inventory Survey, 2.57-Acre Forest Glenn Investors, Elderly Care Facility Development Project, Chico, Butte County, California. Study #1542 on file at the Northeast Information Center, California State University, Chico, California.

1997e Archaeological Inventory Survey, 40-Acre Ashby Park Subdivision Project, Chico, Butte County, California. Study #1546 on file at the Northeast Information Center, California State University, Chico, California.

1998 Archaeological Inventory Survey: City of Chico's Proposed Humboldt Recreation Center Site and Notre Dame Blvd. Extension Project, Chico, Butte County, California. Study #3363 on file at the Northeast Information Center, California State University, Chico, California.

1999a Archaeological Inventory Survey, 85-Acre Eastgate Subdivision Project, Chico, Butte County, California. Study #3181 on file at the Northeast Information Center, California State University, Chico, California.

1999b Archaeological Inventory Survey, Proposed Humboldt Road to 20th Street Park Bike Path, Linear Corridor Adjacent to the West Side of State Route 99, Chico, Butte County, California. Study #3183 on file at the Northeast Information Center, California State University, Chico, California.

2000 Archaeological Survey, 2.8-Acre Stonehill Subdivision Project, Chico, Butte County, California. Study #3182 on file at the Northeast Information Center, California State University, Chico, California.

2001a Archaeological Inventory Survey: Proposed 37-ac. Residential Development Project on Bruce Road, Chico, Butte County, California. Study #3438 on file at the Northeast Information Center, California State University, Chico, California.

2001b Archaeological Survey, 14.3-Acres on Forest Avenue. Study #3437 on file at the Northeast Information Center, California State University, Chico, California.

2002 Archaeological Survey, c. 2.9 Acre Hidden Oaks Subdivision. Study #4659 on file at the Northeast Information Center, California State University, Chico, California

2004a Archaeological Inventory Survey: Chico Burn Dump Clean-up Project, c. 63 acres Adjacent to Humboldt Road, Chico, Butte County, California. Study #6326 on file at the Northeast Information Center, California State University, Chico, California.

2004b Archaeological Inventory Survey: Chico Crossing Project, c. 29 acres Adjacent to Humboldt Road, Chico, Butte County, California. Study #6325 on file at the Northeast Information Center, California State University, Chico, California.

2005 Archaeological Inventory Survey: Chico Creek Nature Center Expansion Project, < 1 acre in Bidwell Park, Chico, Butte County, California. Study #6324 on file at the Northeast Information Center, California State University, Chico, California.

Jensen, P. M. and S. M. Jensen

2001 Archaeological Inventory Survey, City of Chico's Proposed Manzanita Avenue Widening Project, Chico, Butte County, California. Study #3550 on file at the Northeast Information Center, California State University, Chico, California.

Jensen, S. M.

1994a Site record for CA-BUT-1453. On file at the Northeast Information Center, California State University, Chico, California.

1994b Site record for CA-BUT-2309. On file at the Northeast Information Center, California State University, Chico, California.

Jones, O. and C. Sullivan

1989 *The Parks Canada Glass Glossary for the Description of Containers, Tableware, Closures, and Flat Glass*. Canadian Government Publishing Centre, Quebec, Canada.

Ketchum, W. C.

1987 *American Country Pottery: Yellowware and Spongeware*. Knopf, New York.

Kowalsky, A. and D.E. Kowalsky

1999 *Encyclopedia of Marks on American, English, and European Earthenware, Ironstone and Stoneware, 1780-1980.* Schiffer Publishing, Ltd, Atglen, Pennsylvania.

Lehner, L.

1988 *Lehner's Encyclopedia of U.S. Marks on Pottery, Porcelain and Clay.* Collector Books, Paducah, Kentucky.

Majewski, T. and M.J. O'Brien

1987 The Use and Misuse of Nineteenth-Century English and American Ceramics in Archaeological Analysis. *Advances in Archaeological Method and Theory* 11: 97-209.

Manning, J. P.

1978 Archaeological Reconnaissance of McKinney Brothers, Inc. Property, APN: 46-044-24, c. 1.45 acres. Study #B-L-1 on file at the Northeast Information Center, California State University, Chico, California.

1979 East Chico Drainage Study. Study #5982 on file at the Northeast Information Center, California State University, Chico, California.

1985 Archaeological Reconnaissance of the Mangus Property, APN: 46-26-168, c. 3.65 acres. Study #B-L-516 on file at the Northeast Information Center, California State University, Chico, California.

Moratto, M.J.

1984 *California Archaeology.* Academic Press, Inc., Orlando, Florida.

Noble, D.

1992 Department of Transportation Negative Survey Report: District 3, Butte County, Route 32, 10.3: Park and Ride Facility Construction Site. Study #B-L-521 on file at the Northeast Information Center, California State University, Chico, California.

Offerman, J. K. and R. I. Orlins

1980 An Archaeological Survey of the Cottonwood-Elverta #3 Transmission Line in Shasta, Tehama, and Butte Counties, California. Study #407 on file at the Northeast Information Center, California State University, Chico, California.

Pesnichak, L. and S. Evans

2003 Results of Archaeological Monitoring of the Villages at Museum Park, San Jose, Santa Clara County, California. Report prepared by Archaeological Resource Service, Petaluma, California.

Ramos, B., H. Price, and R. Jackson

2000 Phase II Archaeological Investigations at Site PL-36-37 and Historic Studies Report for Cultural Resources Near Westwood, Lassen County, California. Prepared for Caltrans. On file at Pacific Legacy, Inc., Cameron Park, California.

Ramos, B., W. Shapiro, L. Shapiro, B. Clark, and B. Wood
2000 Site record for CA-BUT-892H. On file at the Northeast Information Center, California State University, Chico, California.

Riddell, F.A.
1978 Maidu and Konkow. In *Handbook of North American Indians, Volume 8, California,* edited by R.F. Heizer, pp. 370-386. Smithsonian Institution, Washington, D. C.

Roberts, S.
2002 Site record for CA-BUT-1467H. On file at the Northeast Information Center, California State University, Chico, California.

Swillinger, L.
1988a Site record for CA-BUT-1071H. On file at the Northeast Information Center, California State University, Chico, California.

Swillinger, L.
1988b Site record for CA-BUT-1072H. On file at the Northeast Information Center, California State University, Chico, California.

Toulouse, J.H.
1972 *Bottle Makers and Their Marks*. Thomas Nelson Inc., New York, Camden.

Vaughan, T.
1997 Archaeological Survey for Bartlett Street Annexation District No. 1. Study #1544 on file at the Northeast Information Center, California State University, Chico, California.

1998 Cultural Resource Survey Report for the Park Vista/Bidwell Park Storm Drain Project, Chico, Butte County, California, with a History of the Big Chico Flume of Butte Flume & Lumber Company, Sierra Flume & Lumber Company, and Sierra Lumber Company (1872-1904). Study #1872 on file at the Northeast Information Center, California State University, Chico, California.

Voegelin, E.
1942 Culture Element Distributions, XX: Northeast California. *University of California Anthropological Records* 7(2):47-252.