

ARCHITECTURAL REVIEW 19-07 AND USE PERMIT 19-02

ARCO AM/PM

INITIAL STUDY



Lead Agency:

City of Chico, Community Development Department

411 Main Street

Chico, CA 95928

March, 2019

Prepared By:

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- Appendix A** – Biological Resource Assessment
- Appendix B** – Butte County Meadowfoam Surveys
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- Appendix D** – Archaeological Inventory Survey
- Appendix E** – Tribal Consultation Letter
- Appendix F** – Phase I Environmental Site Assessment
- Appendix G** – Central Valley Flood Protection Board Comment Letter

List of Acronyms

AB	Assembly Bill
AR	Architectural Review
BCAQMD or Air District	Butte County Air Quality Management District
BCM	Butte County Meadowfoam
BMPs	Best Management Practices
BSA	Biological Survey Area
CAP	Climate Action Plan
Caltrans	California Department of Transportation
Cal Water	California Water Service Company
CBC	California Building Code
CC	Community Commercial
CEQA	California Environmental Quality Act
CFGC	California Fish and Game Commission
City	City of Chico
CMC	Chico Municipal Code
CNDDDB	California Natural Diversity Database
CRWQCB	California Regional Water Quality Control Board
CVFPB	Central Valley Flood Protection Board
CWHR	California Wildlife Habitat Relationships
dBA	decibel
DHS	Dead Horse Slough
DTSC	Department of Toxic Substances Control
EIR	Environmental Impact Report
ESA	Endangered Species Act
FEMA	Federal Emergency Management Agency
ft	Feet
GHG	Greenhouse gas
HRBD	Humboldt Road Burn Dump
LID	Low Impact Development
LSA	Limited Soils Assessment
MBTA	Migratory Bird Treaty Act
MND	Mitigated Negative Declaration
MMRP	Mitigation Monitoring and Reporting Program
NRCS	Natural Resources Conservation Service
NPDES	National Pollution Discharge Elimination Permit
NIC	Northeast Information Center
NO _x	Oxides of Nitrogen
OWOUS	Other Waters of the United States
Phase I ESA	Phase I Environmental Site Assessment
PM	Parcel Map
PM _{2.5}	Fine Particulate Matter
PM ₁₀	Respirable Particulate Matter
RC	Resource Constraint
ROG	Reactive Organic Gases
RPW	Relatively Permanent Water
R3	Medium High Density Residential
SLIC	Spills, leaks, investigations and cleanup
SMP	Soils Management Plan
SNC	Sensitive Natural Community
sq ft	Square feet
SWPPP	Stormwater Pollution Prevention Plan
TNW	Traditional Navigable Waters
UP	Use Permit
USFWS	United States Fish and Wildlife Service
UST	Underground Storage Tank

INITIAL STUDY

City of Chico Environmental Coordination and Review

I. PROJECT DESCRIPTION

- A. Project Title:** Arco AM/PM (ARB 19-07 and UP 19-02)
- B. Project Location:** The proposed project is located on the south side of the Bruce Road/State Route 32 (SR 32) Intersection (**Figure 1 – Location Map**).
- C. Applications:** Architectural Review 19-07
Use Permit 19-02
- D. Assessor's Parcel Number (APN):** 002-180-084
- E. Parcel Size:** 10.86 acres
- F. General Plan Designation:**
- Medium High Density Residential/Resource Constraint Overlay
 - Commercial Mixed Use/Resource Constraint Overlay
 - Commercial Mixed Use
- G. Zoning:**
- R3-RC: Medium High Density Residential with Resource Constraint Overlay
 - CC-RC: Community Commercial with Resource Constraint Overlay
 - CC: Community Commercial
- H. Environmental Setting:** The proposed project site is located within southeast Chico city limits. SR 32 borders the project site to the north with Bruce Road bisecting the project site into a western and eastern section. The project site encompasses 10.86 acres with 8.35 acres making up the western section and approximately 2.5 acres making up the eastern section. On September 20, 2018, City of Chico Planning Commission voted to approve (6-0-1) a parcel map to divide the site into two lots and a remainder parcel, resulting in each portion of the site (westerly and easterly) becoming a single lot. The parcel map is approved, but no public improvements have been constructed and the map has not been recorded.

Western Section

The topography of the western section is characterized by rolling hills with the elevation ranging from 225-250 feet (ft) above sea level with 0-8% slopes. The site consists of valley annual grassland with a number of wetland and large vernal pool features. The wetland and vernal pools make up approximately 0.8-acres of sensitive aquatic habitat with large occurrences of Butte County Meadowfoam (BCM), the state and federal listed endangered plant species.

Eastern Section

The eastern section of the parcel is further bisected by a channel of Dead Horse Slough (DHS) near the northeastern corner. Approximately 0.018-acre vernal pool has been verified present on the west side of DHS with additional portions of wetlands present on the east side of DHS. Coordination and permitting through the Army Corps of Engineers will be required.

On a larger scale, the project site lies at the transition zone between the Cascade foothills and the valley floor/City of Chico (City) limits. The site is located adjacent to SR 32, where the road begins its eastward ascent into the Sierra Nevada foothills. The City's 2030 General Plan

Environmental Impact Report identifies the site as being primarily grassland with seasonal wetlands.

Much of the land adjacent to the project site is currently undeveloped grassland. A large open space designated parcel (APN 002-180-083) forms the southern boundary of the western section, with smaller undeveloped parcels to the east and west. Located north of SR 32 is undeveloped land currently undergoing land division entitlements. Beyond the immediately adjacent land, Marsh Junior High School is located approximately 400 ft to the southwest and the Humboldt Road Burn Dump (HRBD) is located approximately 800 ft to the southeast. The HRBD is part of an extensive remediation project to reduce the amount of toxic materials within the soil and has been determined complete as of 2005.

I. Project Description: The project involves several land use entitlements including, a use permit and architectural review applications.

The proposed development would be limited to only the easterly portion of the site ("the site") identified as Parcel 1 on the approved parcel map; no construction is proposed on the westerly portion of the site (Parcel 2). The proposal consists of an approximately 3,800 square foot (sq ft) AM/PM convenience store, nine Arco pump stations under an approximately 5,500 sq ft canopy, and an approximately 1,200 sq ft car wash (see Figure 3 - Site Plan). Also included in the proposed development are two underground storage tanks, parking facilities, trash enclosure, landscaping, site lighting, illuminated signage and solar panels on the roof of the convenience store, pump station canopy and parking stalls.

Access to the site would be via two 35-ft driveways along Bruce Road. The convenience store would be situated to the far northerly portion of the site, being the closest component of the project to the Bruce Road and SR 32 intersection. The car wash is to be located on the southerly portion of the site with the pump stations and associated canopy situated in the middle. Vehicles would be able to exit the site from the proposed driveways with the northerly driveway right turn only and the southerly driveway by way of left and right turns. Currently, the California Department of Transportation (Caltrans) and the City's Public Works Department are designing the Bruce Road and SR 32 intersection and have provided the proposed right-of-way that would accommodate the possible intersection designs.

Per CMC §19.60.030, the Parcel Map designates a 25-ft setback from the top of the bank of DHS. No buildings or site improvements will be constructed within this designated setback. The project would incorporate appropriate design standards, bank modifications and vegetation management practices to avoid impacting, or being impacted by, DHS.

The project also involves the abandonment and relocation of an existing 115 kilovolt transmission power pole present within the existing Meriam Park conservation preserve and the abandonment and relocation of two poles within the project parcel. One existing pole is located within a vernal pool and will be relocated at least 15 feet in-line with the existing pole on the project parcel, outside of the boundary of the vernal pool. The new steel pole will be approximately 75 feet tall with an arm length of 14 feet set approximately 12.5 feet into the ground and will facilitate spanning to the project parcel. The existing pole will be abandoned and remain as to not disturb the biologically sensitive area. The new span length will be approximately 234 feet to a new pole on the east side of Bruce Road. This new wooden pole will be located in the southern portion of the project parcel, it will be approximately 80 feet tall and set approximately eight feet into the ground. From there the wire will span approximately 238 feet to another new wooden pole at the western edge of the parcel. This new pole will be approximately 75 feet tall and will be set approximately 9.5 feet into the ground. Finally, the line will span 292 feet to a new 90-foot wooden pole set nine feet deep in the same hole as the existing pole at the southwest corner of Bruce Road and State Route 32. The two existing poles within the project parcel will be removed to facilitate construction.

As per City policy, the project would connect to the sanitary sewer system. There are no known septic tanks currently on the project site. A curb and gutter catch basin system would be engineered for the collection of storm water runoff. Storm water would subsequently be

detained, allowing sediment to settle, or be filtered, prior to discharge into the City's storm water drainage system.

J. Public Agency Approvals:

1. Butte County Air Quality Management District – Authority to Construct
2. Central Valley Flood Protection Board - Consultation
3. City of Chico – Grading Permit, Building Permit, Use Permit and Architectural Review
4. Regional Water Quality Control Board – NPEDES and Water Quality Certification Permit
5. U.S. Army Corps of Engineers – Nationwide Permit 404 Individual Permit
6. U.S. Fish and Wildlife Service – Consultation Section 7

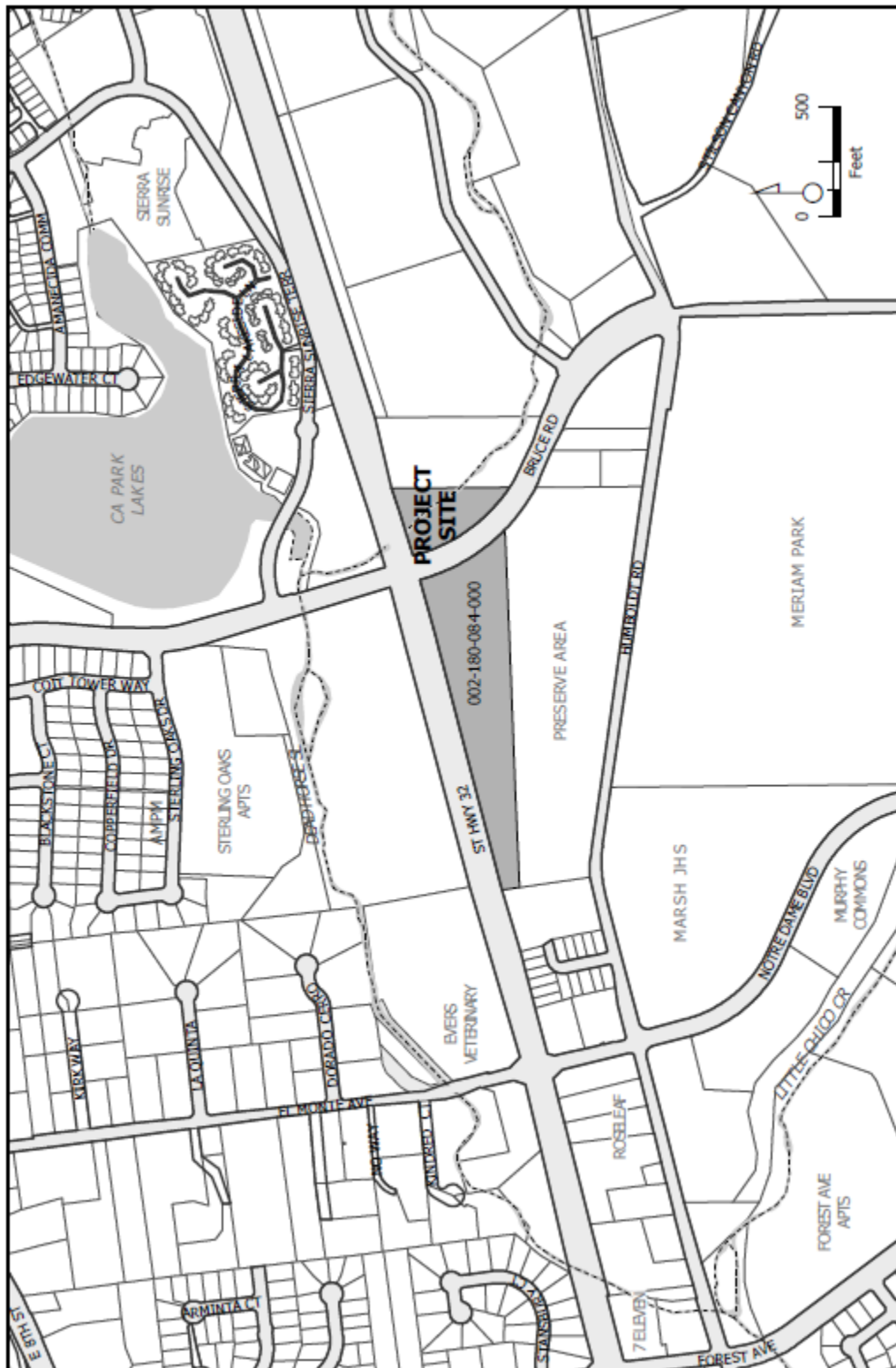
K. Applicants: Thomas Borge, Borge Development, Inc., 975 Fee Drive, Sacramento, CA 95815

L. City Contact: Shannon Costa, Associate Planner
City of Chico, 411 Main Street, Chico, CA 95928
Phone: (530) 879-6807
Email: shannon.costa@chicoca.gov

M. Have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code section 21080.3.1? If so, has consultation begun?

City Staff requested consultation with the Mechoopda Tribe on 04/23/18 and received no response as of the date of this initial study.

FIGURE 1 - LOCATION MAP



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II. ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED:

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist on the following pages.

- | | | |
|--|---|--|
| <input checked="" type="checkbox"/> Aesthetics | <input type="checkbox"/> Greenhouse Gas Emissions | <input type="checkbox"/> Population/Housing |
| <input type="checkbox"/> Agriculture and Forest | <input checked="" type="checkbox"/> Hazards/Hazardous Materials | <input type="checkbox"/> Public Services |
| <input checked="" type="checkbox"/> Air Quality | <input checked="" type="checkbox"/> Hydrology/Water Quality | <input type="checkbox"/> Recreation |
| <input checked="" type="checkbox"/> Biological Resources | <input type="checkbox"/> Land Use and Planning | <input type="checkbox"/> Transportation/Circulation |
| <input checked="" type="checkbox"/> Cultural Resources | <input type="checkbox"/> Mineral Resources | <input checked="" type="checkbox"/> Tribal Resources |
| <input type="checkbox"/> Geology/Soils | <input type="checkbox"/> Noise | <input type="checkbox"/> Utilities |

III. COMMUNITY DEVELOPMENT DIRECTOR DETERMINATION

On the basis of this initial evaluation:

-
- ☐ I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.
- ☒ I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared.
- ☐ I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.
- ☐ I find that the proposed project MAY have a potentially significant impact or have a potentially significant impact unless mitigated, but at least one effect has been adequately analyzed in an earlier document pursuant to applicable legal standards, and has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT (EIR) is required, but it must analyze only the effects that remain to be addressed.
- ☐ I find that although the proposed project could have a significant effect on the environment, there WILL NOT be a significant effect in this case because all potentially significant effects have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards and have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION including revisions or mitigation measures that are imposed upon the proposed project. No further study is required.

Signature

Shannon Costa, Associate Planner, for

Date

Printed Name (for Brendan Vieg, Community Development Deputy Director)

IV. EVALUATION OF ENVIRONMENTAL IMPACTS

- Responses to the following questions and related discussion indicate if the proposed project will have or potentially have a significant adverse impact on the environment.
- A brief explanation is required for all answers except “No Impact” answers that are adequately supported by referenced information sources. A “No Impact” answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g. the project falls outside a fault rupture zone). A “No Impact” answer should be explained where it is based on project-specific factors or general standards.
- All answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
- Once it has been determined that a particular physical impact may occur, then the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. “Potentially Significant Impact” is appropriate if there is substantial evidence that an effect may be significant. If there is at least one “Potentially Significant Impact” entry when the determination is made an EIR is required.
- Negative Declaration: “Less than Significant with Mitigation Incorporated” applies when the incorporation of mitigation measures has reduced an effect from “Potentially Significant Impact” to a “Less than Significant Impact.” The initial study will describe the mitigation measures, and briefly explain how they reduce the effect to a less than significant level (mitigation measures from Section 4, “Earlier Analysis,” may be cross-referenced).
- Earlier analyses may be used where, pursuant to tiering, a program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or negative declaration [Section 15063(c)(3)(D)].
- Initial studies may incorporate references to information sources for potential impacts (e.g. the general plan or zoning ordinances, etc.). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated. A source list attached, and other sources used or individuals contacted are cited in the discussion.
- The explanation of each issue should identify:
 - a. The significance criteria or threshold, if any, used to evaluate each question; and
 - b. The mitigation measure identified, if any, to reduce the impact to less than significant.

A. Aesthetics	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Will the project or its related activities:				
1. Have a substantial adverse effect on a scenic vista?			X	
2. Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?			X	
3. Substantially degrade the existing visual character or quality of the site and its surroundings?			X	
4. Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?			X	

DISCUSSION:

A.1 - A.3. Less Than Significant Impact. The proposed gas station will change the current visual character of the undeveloped site. The project is located in southeast Chico within the transition zone between the Cascade Foothills and the valley floor. The site is located within City limits south-adjacent to SR 32, where the road begins its eastward ascent into the Sierra Nevada Foothills. A majority of the surrounding area is currently either under entitlements or under construction with a mix of residential densities. The Oak Valley subdivision is located along SR 32 to the east, which is currently under construction. As commuters travel west on SR 32 into the City, the proposed development will be visible from the highway. The General Plan designation of the surrounding area is predominately commercial, which accommodates development consistent and similar to the proposed development. While the proposed project would be the first commercial development at the intersection, more commercial uses are expected and planned for the future build-out of the City.

As the first development at this prominent intersection, the proposed project will at first appear to dominate its surroundings and will impact the existing visual character of the vicinity. New light sources will be introduced to the site as part of the proposed project, including building-mounted light fixtures on the proposed convenient store and car wash facility, and ground-mounted light poles within the vehicle parking areas. The fueling station canopy would feature extensive lighting, including under-canopy can-lighting and internally illuminated canopy signs. The proposed lighting is consistent with lighting associated with commercial development expected and planned for the project vicinity, and review and approval by the Architectural Review and Historic Preservation Board will ensure consistency with the City's adopted Design Guidelines Manual, and lighting standards set forth in Chico Municipal Code Section 19.60.050 (Exterior Lighting). Over time, as more projects are developed in the vicinity, the projects appearance and lighting will soften.

The proposed development will not have a substantial adverse effect on a scenic vista. SR 32 is not designated as a state scenic highway nor are there any identified scenic resources including trees, rock outcroppings, and historic buildings, in the project area. It is anticipated that the project will have a **Less Than Significant Impact** on a scenic vista or scenic resource and would not substantially degrade the visual character or quality of the site and its surroundings.

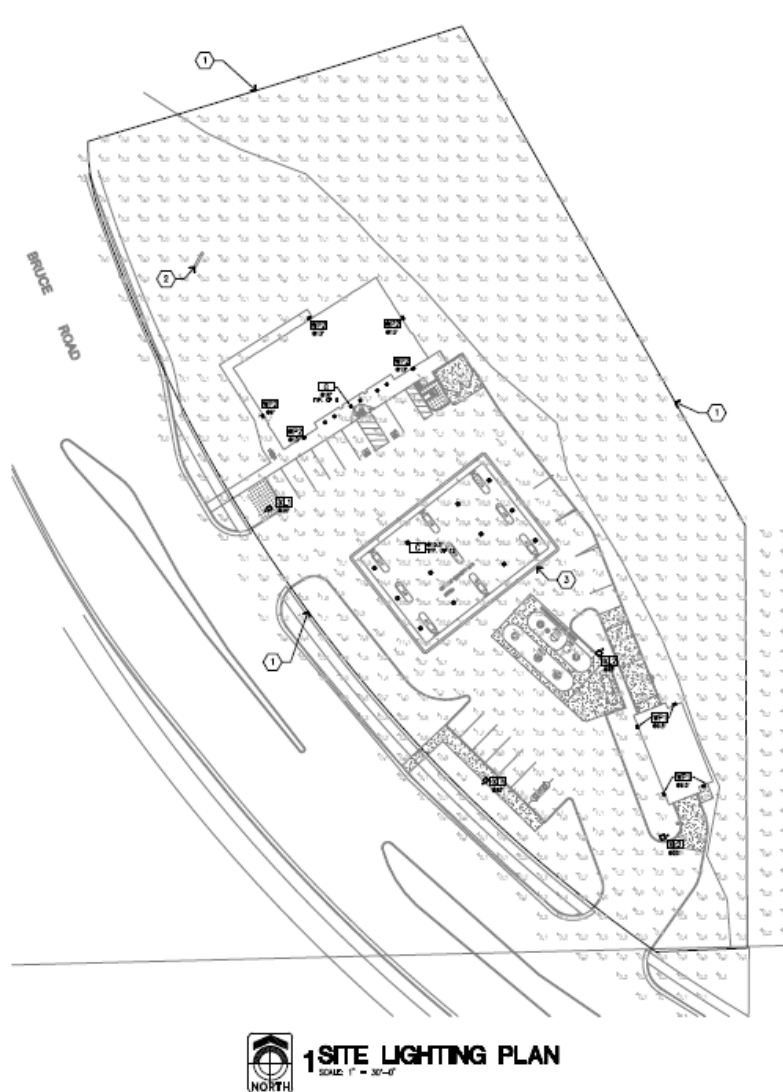
A.4. Less Than Significant Impact. The gas station and convenience store is proposed to operate 24 hours a day, seven days a week, which will introduce a new source of light and glare to the surrounding area. A photometric plan was created to quantify lumens produced from the proposed project. As shown in Figure 4 – Photometric Plan, a majority of light source will be concentrated under the gas station canopy. Minimal light spillage would occur from the project site to the surrounding roads and parcels. With the convenience store situated on the north portion of the property no light spillage is anticipated

along SR 32. All proposed lighting would need to comply with CMC §19.60.050 (*Exterior lighting*). Therefore, the project would have a **Less Than Significant Impact** on light or glare that could affect day or nighttime views.

MITIGATION: None Required.

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FIGURE 3 – PHOTOMETRIC PLAN



GENERAL SHEET NOTES - PHOTOMETRIC PLAN

- A. UNITS FOR VALUES SHOWN ON PHOTOMETRIC PLAN ARE IN FOOT-CANDELES.
B. SPACING OF FOOT-CANDLE VALUES SHOWN IS 10' (TYP).

KEYED NOTES

- ① PROPERTY LINE
② HIGH MONUMENT SIGN
③ GAS STATION CANOPY W/ 9 PUMPS

FEATURE	DESCRIPTION	MANUFACTURER & PART NUMBER
1	SURFACE MOUNT GAS CANOPY (2)	LS 010 54-10-01-HH-01
2	WALL MOUNT (2)	LS 102-3-LED-10-10-10-10-10-10
3	LED WALL SIGNAGE	LS 100-2-LED-10-10-10-10-10-10
4	LED WALL SIGNAGE	LS 100-2-LED-10-10-10-10-10-10
5	Pole-Mounted Wall LED	LS 102-3-LED-10-10-10-10-10-10
6	Pole-Mounted Wall LED	LS 102-3-LED-10-10-10-10-10-10

2 LIGHTING FIXTURE SCHEDULE

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B. Agriculture and Forest Resources: Would the project or its related activities:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?				X
2. Conflict with existing zoning for agricultural use, or a Williamson Act contract?				X
3. Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code Section 4526, or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?				X
4. Result in the loss of forest land or conversion of forest land to non-forest use?				X
5. Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?				X

DISCUSSION:

B.1.–B.5. No Impact. The project will not convert Prime or Unique Farmland, or Farmland of Statewide Importance to a non-agricultural use. The California Department of Conservation, Division of Land Resource Protection, Farmland Mapping and Monitoring Program's 'Butte County Important Farmland 2010' map identifies the project site as "Grazing Land". Grazing land is characterized as land on which the existing vegetation is suited to the grazing of livestock. Review of historical aerial photographs dating to 1941 revealed that the site had not been utilized for agricultural purposes but has remained vacant and undeveloped (Appendix F).

The project will not conflict with existing zoning for agricultural use or forest land and is not under a Williamson Act Contract. The project will not result in the loss of forest land, conversion of forest land, or involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland or forest land. The site is located on a vacant parcel with no agriculture or timber resources, is bounded by SR 32 to the north and undeveloped open space to the east, west, and south, and is designated for commercial development in the Chico 2030 General Plan. The project will result in **No Impact** to agriculture and forest resources.

MITIGATION: None required.

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
C. Air Quality				
Will the project or its related activities:				
1. Conflict with or obstruct implementation of the applicable air quality plans (e.g., Northern Sacramento Valley Planning Area 2012 Triennial Air Quality Attainment Plan, Chico Urban Area CO Attainment Plan, and Butte County AQMD Indirect Source Review Guidelines)?			X	
2. Violate any air quality standard or contribute substantially to an existing or projected air quality violation.		X		
3. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)?		X		
4. Expose sensitive receptors to substantial pollutant concentrations?			X	
5. Create objectionable odors affecting a substantial number of people?			X	

DISCUSSION:

C.1–3. Less Than Significant with Mitigation Incorporated. The project consists of construction of a 3,800 sq ft AM/PM convenience store, nine Arco pump stations under an approximately 5,500 sq ft canopy, and a 1,200 sq ft car wash. The project will neither conflict with nor obstruct implementation of the applicable air quality plan for the Northern Sacramento Valley, nor will the project violate any air quality standard or contribute substantially to an existing or projected air quality violation. The project will not result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard.

According to Butte County Air Quality Management District (BCAQMD or Air District) California Environmental Quality Act (CEQA) Air Quality Handbook, Butte County is designated as a federal and state non-attainment area for ozone and particulate matter (BCAQMD 2014).

Table 1
Butte County Ambient Air Quality Attainment Status

Pollutant	State	Federal
1-hour Ozone	Nonattainment	-
8-hour Ozone	Nonattainment	Nonattainment
Carbon Monoxide	Attainment	Attainment
Nitrogen Dioxide	Attainment	Attainment
Sulfur Dioxide	Attainment	Attainment
24-hour PM ₁₀ *	Nonattainment	Attainment
24-hour PM _{2.5} *	No Standard	Attainment
Annual PM ₁₀ *	Attainment	No Standard
Annual PM _{2.5} *	Nonattainment	Attainment
* PM ₁₀ – Respirable particulate matter less than 10 microns in size		
* PM _{2.5} – Fine particulate matter less than 2.5 microns in size		

Source: BCAQMD 2014

Potential air quality impacts related to development are separated into two categories:

- A. Temporary impacts resulting from construction-related activities (earth moving and heavy-duty vehicle emissions), and
- B. Long-term indirect source emission impacts related to ongoing operations, such as motor vehicle, water and heating usage, etc.

Construction

Construction-related activities such as grading, and operation of construction vehicles would create a temporary increase in fugitive dust within the immediate vicinity of the project site and contribute temporarily to slight increases in vehicle emissions (ozone precursor emissions, such as reactive organic gases (ROG) and oxides of nitrogen (NO_x), and fine particulate matter). All stationary construction equipment, other than internal combustion engines less than 50 horsepower, require an "Authority to Construct" and "Permit to Operate" from the District. Emissions are prevented from creating a nuisance to surrounding properties under BCAQMD Rule 200 *Nuisance*, and visible emissions from stationary diesel-powered equipment are also regulated under BCAQMD Rule 201 *Visible Emissions*.

With regard to fugitive dust, the majority of the particulate generated as a result of grading operations is anticipated to quickly settle. Under the Air District's Rule 205 (Fugitive Dust Emissions) all development projects are required to minimize fugitive dust emissions by implementing Best Management Practices (BMPs) for dust control. These BMPs include but are not limited to the following:

- Watering de-stabilized surfaces and stock piles to minimize windborne dust.
- Ceasing operations when high winds are present.
- Covering or watering loose material during transport.
- Minimizing the amount of disturbed area during construction.
- Seeding and watering any portions of the site that will remain inactive for 3 months or longer.
- Paving, periodically watering, or chemically stabilizing on-site construction roads.
- Minimizing exhaust emissions by maintaining equipment in good repair and tuning engines according to manufacturer specifications.
- Minimizing engine idle time, particularly during smog season (May-October).

Continuing the City practice of ensuring that grading plans include fugitive dust BMPs and compliance with existing BCAQMD rules will ensure that construction related dust impacts are minimized.

Operation

The District's CEQA Air Quality Handbook provides screening criteria for when a quantified air emissions analysis is required to assess and mitigate potential air quality impacts from non-exempt CEQA projects. Projects that fall below screening thresholds need only to implement best practices to ensure that operational air quality impacts remain less than significant. The screening criteria are as follows:

Table 2
BCAQMD Screening Criteria for Criteria Air Pollutants

Land Use Type	Model Emissions for Project Greater Than:
Single Family Unit Residential	30 units
Multi-Family Residential	75 units
Commercial	15,000 sq ft
Educational	24,000 sq ft
Retail	11,000 sq ft
Recreational	5,500 sq ft
Industrial	59,000 sq ft

Source: BCAQMD 2014

The proposed development would result in the creation of an approximately 10,500 sq ft of retail development, including an approximately 3,800 square foot (sq ft) AM/PM convenience store, nine Arco pump stations under an approximately 5,500 sq ft canopy, and an approximately 1,200 sq ft car wash

facility. Since the proposed square footage is less than the applicable screening criteria in the table above, no enhanced mitigation is required.

Compliance with BCAQMD Rule 221 *Phase I Vapor Recovery Requirements*, which requires a vapor recovery system for Phase I storage tanks and Rule 222 *Phase II Vapor Recovery Requirements* which requires a vapor recovery system for Phase II storage tanks will be required.

Although no enhanced mitigation is required, implementing standard construction BMP's is still necessary to reduce potentially significant contributions to cumulative air quality impacts in the region. No air quality BMP's were included as part of the proposed project, therefore Mitigation C.1 is included below to ensure that Air District BMPs are selected and applied to the construction phase of the project. With Mitigation C.1 resulting in, air quality impacts **Less Than Significant with Mitigation Incorporated**.

C.4.-5. Less Than Significant. Apart from the potential for temporary odors associated with construction activities (i.e., paving operations) and intermittent fuel pump, the proposed project will neither expose sensitive receptors to substantial pollutant concentrations, nor create significant objectionable odors. These potential impacts are short-term in nature and considered **Less Than Significant**.

MITIGATION C.1 (Air Quality): To minimize air quality impacts during the construction phase of the project, specific best practices shall be incorporated during initial grading and subdivision improvement phases of the project as specified in Appendix C of the Butte County Air Quality Management District's (BCAQMD) CEQA Air Quality Handbook, October 23, 2014, available at http://www.bcaqmd.org/page/_files/CEQA-Handbook-Appendices-2014.pdf. Examples of these types of measures include but are not limited to:

- Limiting idling of construction vehicles to 5 minutes or less.
- Ensuring that all small engines are tuned to the manufacturer's specifications.
- Powering diesel equipment with Air Resources Board-certified motor vehicle diesel fuel.
- Utilizing construction equipment that meets ARB's 2007 certification standard or cleaner.
- Using electric powered equipment when feasible.

MITIGATION MONITORING C.1: Prior to approval of grading permits, City staff will review the plans to ensure that Mitigation Measure C.1 is incorporated into the construction documents, as appropriate. City inspection staff will ensure that construction, grading, and erosion control operations are conducted in accordance with BCAQMD standards.

D. Biological Resources	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Will the project or its related activities:				
1. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species as listed and mapped in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?		X		
2. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service.		X		
3. Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?		X		
4. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?			X	
5. Result in the fragmentation of an existing wildlife habitat, such as blue oak woodland or riparian, and an increase in the amount of edge with adjacent habitats.			X	
6. Conflict with any local policies or ordinances, protecting biological resources?			X	

DISCUSSION:

D.1. Less Than Significant with Mitigation Incorporated. A *Biological Resource Assessment* (BRA) was prepared for the project site in April 2018 by NorthStar Engineering (Appendix A). The purpose of the BRA is to document the current endangered, threatened, sensitive and rare species, and their critical habitats that occur in the biological survey area (BSA) of the project. Since no development is proposed for Parcel 2 or the remainder portion of land resulting from the Parcel Map, impacts to biological resources discussed below will pertain to the proposed gas station and convenience store development on the project site (Parcel 1).

The special-status species with the potential to occur within the project area are Butte County meadowfoam (BCM), vernal pool crustaceans, northwestern pond turtle (*Actinemys marmorata*), and western spadefoot (*Spea hammondi*). Additionally, suitable habitat for loggerhead shrike (*Lanius ludovicianus*), Swainson's hawk (*Buteo swainsoni*), and a variety of other migratory birds and raptors occurs within the project area. The following discusses each special status species found to potentially occur on the project site.

Butte County Meadowfoam

BCM is a state and federal listed endangered species and critical habitat has been designated by the United States Fish and Wildlife Service (USFWS). BCM has been identified exclusively in a narrow 25-mile strip along the eastern edge of the Sacramento Valley from central Butte County to the northern portion of the City. The winter annual herb belonging to the false meadowfoam family (Limnanthaceae) occurs in shallow soils within vernal swales, along the edges of vernal pools and ephemeral streams, and less frequently around the edges of isolated vernal pools. It has also been observed on uplands immediately adjacent to vernal swales and pools and within abandoned irrigation canals and roadside drainage ditches. Species found in association with BCM are common vernal pool inhabitants including Fremont's tidy tips (*Layia fremontii*), California goldfields (*Lasthenia californica* ssp *californica*), yellow carpet (*Blennosperma nanum*), and coyote thistle (*Eryngium vaseyi*) (Dole and Sun 1992). BCM is adapted to cross pollination by insects, however, past research has suggested it undergoes substantial amounts of self-pollination. The genetic variation within populations is quite low suggesting very little gene flow between populations. The low genetic variability in association with the large population fluctuations observed in BCM could expose it to increased risks of extinction (Sloop et al. 2010). The nearest known occurrence is located on the south side of SR32, along the northern property boundary, in a vernal pool within the Caltrans ROW and on the western remainder portion of the existing parcel.

The grassland habitat within the BSA provides potentially suitable habitat for BCM, and the site is adjacent to a few large BCM population centers that occur along the eastern side of the City. A majority of the BSA is comprised of a soil map unit, Doemill-Jokerst complex 3-8% slopes, that supports BCM populations in the surrounding population centers. However, there is very little mesic habitat present on-site that could support BCM. The South Fork of DHS is likely sub-marginal habitat for BCM as there is little saturated soil that is not completely inundated. The small vernal pools within the parcel boundaries provide potentially suitable habitat for BCM. While BCM has been observed in upland habitat away from vernal pools it is very rare. In addition, the upland habitat within the project site is heavily invaded with slender oat which would likely exclude BCM from the uplands.

The BRA concluded that protocol level surveys for BCM were conducted within the area of the project site in 2016 and 2017 by Northstar Engineering with negative results (Appendix B). Figure 5 – Butte County Meadowfoam Occurrence Map, shows BCM occurrences from 2007 on the designated remainder (westerly) portion of the existing parcel. No development is proposed on this site due to the extreme biological resource constraints.

Vernal Pool Fairy Shrimp

The vernal pool fairy shrimp (*Branchinecta lynchi*) has known populations extending from Shasta County through the Central Valley to Tulare County. Additionally, the species is found along the central coast, from Solano County to San Benito County. Several disjunct populations exist in San Luis Obispo County, Santa Barbara County, and Riverside County. This geographic range is the widest of any listed vernal pool crustacean however, it is seldom abundant where found.

The species occupies a variety of different vernal pool habitats including small, clear, sandstone rock pools to large, turbid, alkaline grassland valley floor pools. Although the species has been observed in large vernal pools, it generally occupies smaller pools. It is frequently found in pools smaller than 0.05 acres. These small pools are most commonly found in grass or mud bottomed swales, or basalt flow depression pools in grasslands. Vernal pool fairy shrimp are typically collected from approximately December to early May.

There is a high potential for the species to occur within the BSA as the vernal pools present are suitable for the species and there are known occurrences within close proximity.

Vernal Pool Tadpole Shrimp

The vernal pool tadpole shrimp (*Lepidurus packardii*) is found in California from Shasta County to Merced County, a disjunct population can be found in the San Francisco Bay National Wildlife Refuge in Alameda

County. They inhabit vernal pools with clear to highly turbid water ranging in size from approximately 50 sq ft up to large playa pools such as Olcott Lake at Jepson Prairie.

The species' diet consists of organic debris and living organisms, including fairy shrimp and other invertebrates. Vernal pool tadpole shrimp have a relatively high reproductive rate, and fecundity increases with body size. Large females can deposit as many as six clutches, ranging from 32-61 eggs per clutch. Hatching is temperature dependent, and optimal hatching conditions occur between 10-15 degrees Celsius.

There is a high potential for the species to occur within the BSA as the vernal pools are suitable for the species and there are known occurrences in close proximity.

Wetlands were identified within the BSA, which provide suitable habitat for vernal pool fairy shrimp and vernal pool tadpole shrimp (see Impact D.3 below for discussion regarding wetlands). As such, unless protocol-level surveys are conducted to determine their presence or absence, vernal pool fairy shrimp and vernal pool tadpole shrimp should be assumed to be present. If protocol-level surveys are conducted, the protocol will require one wet-season survey and one dry season survey. If vernal pool fairy shrimp and vernal pool tadpole shrimp are assumed to be present, mitigation will be required for the loss of species habitat. Section 7 consultation with the USFWS will be required. Mitigation Measure D.1 has been included to mitigate impacts to vernal pool crustaceans.

The project also involves the abandonment and relocation of an existing 115 kilovolt transmission power pole present within the existing Meriam Park conservation preserve and the abandonment and relocation of two poles within the project parcel. One existing pole is located within a vernal pool and will be relocated at least 15 feet in-line with the existing pole on the project parcel, outside of the boundary of the vernal pool. The new steel pole will be approximately 75 feet tall with an arm length of 14 feet set approximately 12.5 feet into the ground and will facilitate spanning to the project parcel. The existing pole will be abandoned and remain as to not disturb the biologically sensitive area. The new span length will be approximately 234 feet to a new pole on the east side of Bruce Road. This new wooden pole will be located in the southern portion of the project parcel, it will be approximately 80 feet tall and set approximately eight feet into the ground. From there the wire will span approximately 238 feet to another new wooden pole at the western edge of the parcel. This new pole will be approximately 75 feet tall and will be set approximately 9.5 feet into the ground. Finally, the line will span 292 feet to a new 90-foot wooden pole set nine feet deep in the same hole as the existing pole at the southwest corner of Bruce Road and State Route 32. The two existing poles within the project parcel will be removed to facilitate construction.

Northwestern Pond Turtle

The northwestern pond turtle can be found throughout California and is the only abundant native turtle in California. They are associated with permanent or nearly permanent water in a wide variety of habitats at elevations ranging from near sea level to 4,700 ft. They require basking sites including partially submerged logs, rocks, mats of floating vegetation, or open mud banks. The northwestern pond turtle hibernates in colder areas underwater on muddy bottoms. Nesting sites are typically constructed along the banks of permanent water in soils at least 10 centimeters deep and must have high internal humidity for eggs to develop and hatch (Jennings and Hayes 1994).

The South Fork of DHS may provide suitable habitat for the species during certain times of the year. Additionally, the upland habitat adjacent to the South Fork of DHS may provide suitable nesting habitat for the species. Mitigation Measure D.2 has been included to mitigate potential impacts to the northwestern pond turtle.

Western Spadefoot

The western spadefoot is a State of California Species of Special Concern and its status is currently under review by USFWS. The species could potentially become listed under the federal Endangered Species Act (ESA) as a threatened or endangered species. It is a relatively small, smooth skinned toad,

with white or orange tipped tubercles on its back, and distinctive vertical pupils. It is named for its sharp-edged "spades" on the hind feet that are used for digging.

The species occupies grassland, sage scrub, and woodland habitats from Tehama County to Baja. Adults will forage on insects, worms and other invertebrates. It has been speculated that an adult toad may acquire sufficient energy reserves for their long dormancy period in only a few weeks (Dimmitt and Ruibal 1980). They are dependent upon ephemeral pools or slow-moving water courses for breeding which typically begins in January and lasts to May. Approximately 300-500 eggs are laid on plant stems or dead plant material in the bottom of pools and the eggs will usually hatch within three to four days (Stebbins 1985). Larval development will take on average 58 days but can be completed in as little as 30 days if pools begin to dry (Morey 1998).

The western spadefoot is typically below 3,000-foot elevation but has been found as high as 4,500 feet. The biggest threat to the species is loss of habitat and non-native predators (USFWS 2005). The closest extant California Natural Diversity Database (CNDDB) records occur approximately 1.5 miles northwest of the BSA within and near the Sycamore Creek overflow channel.

The vernal pools and section of the South Fork of DHS present within the project parcel could provide potential aquatic breeding habitat. The soils within a majority of the BSA are shallow and may not be friable but there may be suitable friable soils adjacent to the South Fork of DHS for western spadefoot estivation. No western spadefoot adults or metamorphs were encountered during biological surveys, nor were there any tadpoles present in the wetted portion of the South Fork of DHS. Mitigation Measure D.2 has been included to mitigate potential impacts to the western spadefoot.

Swainson's hawk

Swainson's hawk is listed as Threatened under the California ESA. It is a long-distance migrant with nesting grounds in western North America. Swainson's hawks arrive in the Central Valley between March and early April to establish breeding territories. Breeding occurs from late March to late August, peaking in late May through July (Fitzner 1980).

Swainson's hawks' nest in isolated trees, small groves, or large woodlands, adjacent to open grasslands or agricultural fields. This species typically nests near riparian areas; however, it has been known to nest in urban areas as well. Nest locations are usually in close proximity to suitable foraging habitats, which include grasslands, fallow fields, irrigated pastures, alfalfa and other hay crops, and low-growing row crops. Swainson's hawks primarily prey upon small rodents such as ground squirrels (*Spermophilus* spp.), pocket gophers (*Thomomys* spp.), voles (*Microtus* spp), but insects, reptiles, and birds may be consumed as well (Snyder and Wiley 1976; Fitzner 1980; Estep 1989). Swainson's hawks leave their breeding grounds to return to their wintering grounds in late August or early September (Bloom and DeWater 1994).

Swainson's hawks' largest threats are loss of habitat and secondary poisoning from insecticides on their wintering grounds (Woodbridge et al. 1995a).

According to the CNDDB the nearest known active nest is located in a walnut orchard south of the Chico State Farm approximately 4.5 miles southwest from the project site. An examination of aerial imagery and knowledge of the location suggest this nest is no longer extant. The orchard present in 1998 when the nest was observed no longer exists, as the walnuts have been removed and replaced with non-orchard plantings. The next nearest presumed extant nest is located near the confluence of Big Chico Creek and the Sacramento River off River Road approximately 8.35 miles from the project site. The last recorded observation of this nest was in 1998.

The grassland habitat present in the project area may provide suitable foraging habitat for Swainson's hawk. It should be noted that the project site is small (less than five acres) and disjunct from the surrounding grassland habitat, it is surrounded by existing urban development to the north and northeast. In addition, the Oak Valley residential subdivision is under construction to the east and south of the project site. The property likely does not support the foraging habitat needed to support the reproductive efforts of a Swainson's hawk pair. However, Mitigation Measure D.3 has been included to mitigate potential impacts to the Swainson's hawk.

Loggerhead Shrike, Migratory Birds, and Nesting Raptors

The loggerhead shrike is a state species of special concern that can be found in open habitats with scattered shrubs, trees, posts, fences, utility lines or other perches. Typically, they occur in open canopied valley foothill hardwood, valley foothill hardwood-conifer, valley foothill riparian, pinyon-juniper, juniper, desert riparian, and Joshua tree habitats. Loggerhead shrikes are opportunistic predators that primarily eat large insects, but will also take small birds, mammals, amphibians, reptiles, fish, and carrion. Interestingly, loggerhead shrikes will use sharp multi-stemmed plants and barbed wire fences, to impale prey for storage or ease of consumption. Nesting occurs in shrubs or trees at variable heights but generally around one to two meters above the ground. Adults lay eggs from March to May with male and females tending young into July or August (Yosef 1996).

The annual grassland habitat within the project area is suitable for loggerhead shrike. There are numerous perches in the project area that could be used to scan for prey. Additionally, the small trees and shrubs present on-site near DHS could provide suitable nesting substrates.

Migratory birds are protected in varying degrees under California Fish and Game Code, Section 3503.5, the Migratory Bird Treaty Act (MBTA), and CEQA. The project site currently provides suitable nesting and/or foraging habitat for several of these species that may nest on the ground in the low vegetation present within the project area. The site also provides a very small amount of riparian vegetation that may be used by birds protected by the MBTA.

To avoid impacts to bird and raptor species, including loggerhead shrike, protected under the MBTA and the California Fish and Game Commission (CFGF), Mitigation Measure D.4 has been included.

The landscape plan for the proposed development was prepared by Thomas Phelps Landscape Architect, Inc. and provides the location and table of existing trees on-site specifying their species, size, proposed retention or removal, and mitigation requirements (Figure 6 – Landscape Plan). The proposed development will result in the removal of existing vegetation and trees located on the project site, including 15 existing pistache trees on-site. Pursuant to CMC Chapter 16.66 - *Tree Preservation Regulations*, the 15 trees do not qualify for required mitigation or preservation as they do not meet the minimum stem diameter. Additionally, there is a black walnut tree on-site, which does qualify for mitigation or preservation. The applicant is proposing to retain the black walnut on-site. Therefore, no mitigation regarding tree removal is required unless the applicant decides to remove the black walnut, in which case a tree removal permit will need to be obtained pursuant to CMC Chapter 16.66.

With this mitigation and others discussed, potential impacts to species and habitat at the site will be **Less Than Significant with Mitigation Incorporated**.

D.2. Less Than Significant with Mitigation Incorporated. The BRA evaluated the project site for any indication of riparian or other critical habitat, as well as sensitive natural communities (SNCs). California habitat types are described in the California Wildlife Habitat Relationships (CWHR) system based on classifications created by Mayer and Laudenslayer (1988). The CWHR system was designed to aid in the mapping of habitats utilized by California's commonly-occurring birds, mammals, reptiles, and amphibians. The project area is composed almost exclusively of annual grassland, a small section of riverine habitat is found in the northeastern portion of the property comprised of the South Fork of DHS.

Annual Grassland

Annual grassland habitats can be found throughout California and generally consist of a variety of introduced invasive species. Species composition is strongly influenced by abiotic factors and compositional changes fluctuate seasonally due to the phenology of plants found within an area. Common plant species found within the site include numerous introduced grass species such as slender oat (*Avena barbata*), Italian ryegrass (*Festuca perennis*), hare barley (*Hordeum murinum* ssp. *leporinum*), and medusa head (*Elymus caput-medusae*). Common forbs encountered included yellow star thistle (*Centaurea solstitialis*), spikeweed (*Centromadia fitchii*), vinegarweed (*Trichostema lanceolatum*), turkey mullein (*Croton setigerus*), and clover (*Trifolium* spp.).

A number of species use annual grasslands for breeding and foraging. Species encountered during surveys included western fence lizard (*Sceloporus occidentalis*), western meadowlark (*Sturnella neglecta*), lesser goldfinch (*Spinus psaltria*), and western kingbird (*Tyrannus verticalis*).

Riverine

Riverine habitats consist of intermittent or perennial running water. Higher elevation rivers and streams tend to be smaller and higher velocity. At lower elevations, rivers and streams become slow and enlarged. The transition from higher elevation to lower will cause temperature and turbidity to increase, dissolved oxygen will decrease and the bottom will transition from rocky towards muddy or silty. Riverine habitats are found in close association with terrestrial habitats and in many cases, are contiguous with lake and emergent wetland habitats.

Riverine habitat is present as the South Fork of DHS, an intermittent creek that contains flow during the winter and spring months secondarily to precipitation events. The channel is dry during the summer and fall months. Seasonal precipitation events during the winter months and localized runoff from the surrounding areas likely contribute to the hydrology observed in the canal. Wildlife observed in the riverine habitat within the project area included great blue heron, mallard, wood duck, black phoebe, red swamp crawfish, and an unidentified freshwater mussel. Per Chico Municipal Code Section 19.60.030 (*Creekside development*), all structures and site improvements will be setback from Dead Horse Slough's top of bank by 25 ft to reduce potential impacts to the DHS channel.

Sensitive Natural Communities

SNCs are important ecologically as their elimination or degradation could threaten populations of dependent plant and wildlife species and significantly reduce the regional distribution and viability of the community. The loss of SNCs may eliminate or reduce important ecosystem functions including water filtration by wetlands or bank stabilization by riparian woodlands.

One sensitive natural community was present within the BSA. Several small Northern hardpan vernal pools are present within the proposed gas station parcel. Northern hardpan vernal pools occur on old alluvial fans along the eastern portion of California's Central Valley. The hardpan layers are formed by leaching, redeposition, and cementing of silica minerals higher in the soil profile. Northern hardpan vernal pools tend to be found in acidic soils and generally exhibit rounded soil mounds commonly referred to as mima mound topography. Impacts to the hardpan vernal pool SNC is discussed further in Impact D.3 below, which includes a mitigation measure to compensate for the loss of wetlands and vernal pools in the BSA.

Potential impacts to critical habitat and SNCs at the site will be **Less Than Significant with Mitigation Incorporated**.

D.3. Less Than Significant with Mitigation Incorporated. A *Draft Delineation of Waters of the United States* (Appendix C) was prepared for the project site and adjacent parcels in 2007 by Gallaway Consulting, Inc. The types of aquatic resources identified within the BSA are distinguished as Other Waters of the United States (OWOUS) and vernal pools. As shown on Figure 7 – Wetland Delineation Map, the parcel identified as Parcel 1 on the approved Parcel Map contains an approximately 0.018-acre vernal pool that would be eliminated by development associated with the project. The vernal pools within the project site are designated as Palustrine Emergent Non-Persistent Seasonally Flooded (P-EM-2-C).

The South Fork of DHS exhibited an ordinary high-water mark and contained bed, bank, and/or scour morphology. The South Fork of DHS is a Non-Relatively Permanent Water (NRPW) and designated as Riverine Intermittent Streambed Cobble/gravel (R-4-SB-3). DHS is intermittent because flow is only present during the fall, winter, and early spring months. Within the site, the South Fork of DHS collects sheet flow and conveys it off site and eventually into Little Chico Creek.

No traditional navigable waters (TNW) occur within the project area. There were no Relatively Permanent Waters (RPW) present on the site, nor were there any Potentially Non-Jurisdictional Features.

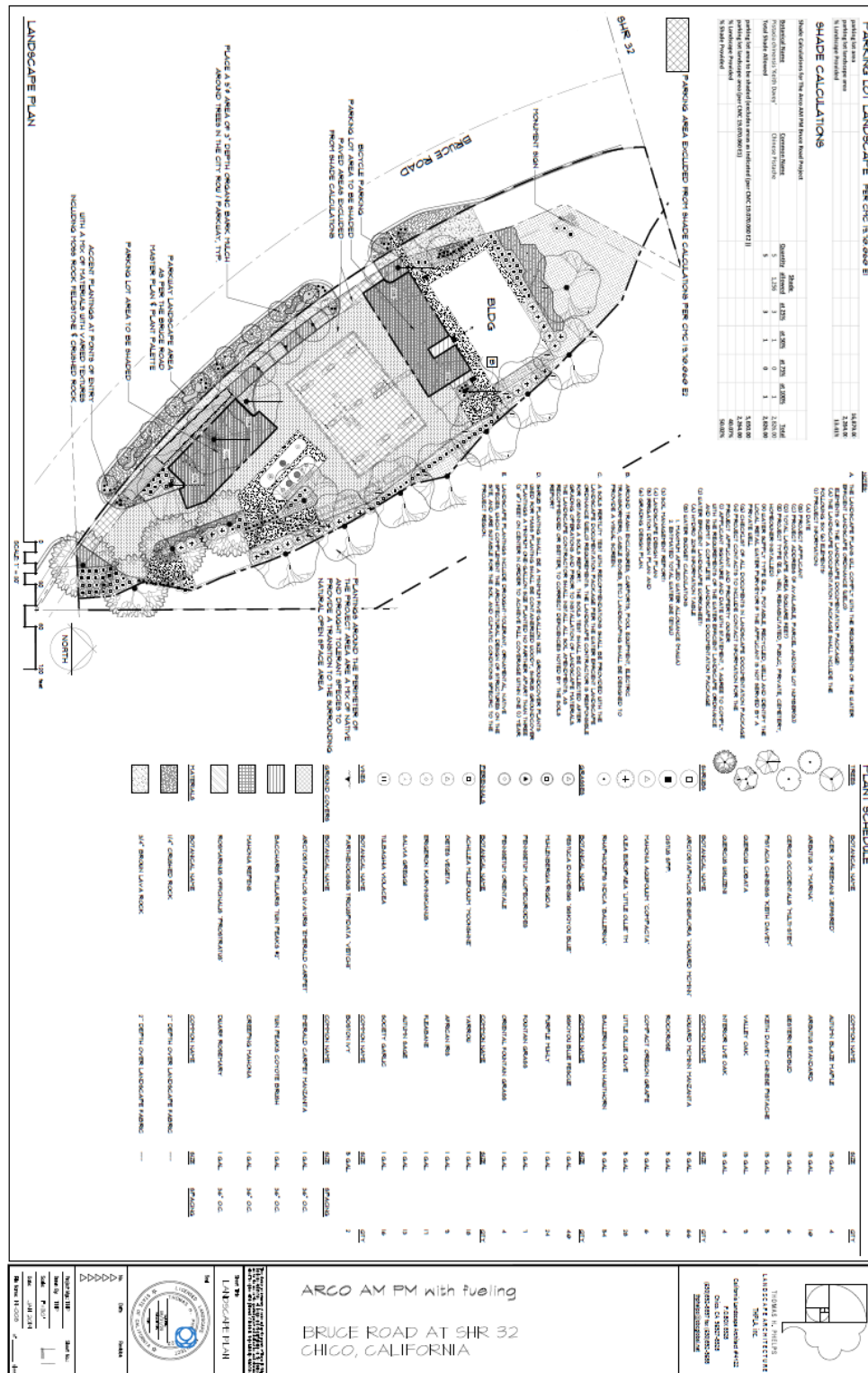
The proposed filling of wetlands requires permits from both the U.S. Army Corps of Engineers and the California Regional Water Quality Control Board (CRWQCB). Part of the Corps permitting process includes consultation with the USFWS regarding impacts to listed species, including the shrimp species with potential habitat at the project site.

These state and federal permitting processes are anticipated to result in permits with specific conditions that will require compensation in the form of purchasing wetland credits at a certified mitigation bank for the loss of wetlands and for the loss of potential listed shrimp habitat. It is therefore not necessary for the City to require offsite mitigation for impacts of the project on biological resources, but the City should verify that the state and federal permits have been obtained by the developer prior to issuance of any grading permits for the project.

To ensure proper timing of any City approvals for grading or other site-disturbing activities, Mitigation Measure D.5, below will require the applicant to provide the city with copies of final permits from the U.S. Army Corps of Engineers and CRWQCB as a pre-condition for issuing such permits authorizing disturbance of the site. With this mitigation, potential impacts to biological resources at the site will be **Less Than Significant with Mitigation Incorporated.**

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FIGURE 5 – LANDSCAPE PLAN



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D.4.- D.6 Less Than Significant. The project will not result in the fragmentation of an existing wildlife habitat nor conflict with any local policies or ordinances protecting biological resources. The project's impact would be **Less Than Significant**.

MITIGATION:

MITIGATION D.1 (Biological Resources):

Prior to any ground-disturbing activities, the applicant shall compensate for direct impacts to habitat that may support vernal pool tadpole and fairy shrimp. The applicant shall purchase credits at an approved mitigation bank as defined by the U.S. Fish and Wildlife Service Biological Opinion.

MITIGATION MONITORING D.1: Planning and Engineering staff will require final copies of the purchased credits documenting relief thereof, prior to issuance of any grading or other permits that will result in disturbances to the site.

MITIGATION D.2 (Biological Resources):

No later than 48 hours prior to any ground disturbance, pre-construction surveys will be conducted by a qualified biologist within the project limits for northwestern pond turtle and western spadefoot. If a pond turtle or western spadefoot is observed in the project limits during construction, all work will be stopped, and the turtle or western spadefoot will:

- 1) be allowed to leave on its own volition, or
- 2) be moved by the project biologist in the direction it was heading, at a safe distance from the grading activities, and at a safe location.

The biologist will report observations and relocations to the City.

MITIGATION MONITORING D.2: Planning and Engineering staff will require final copies of the pre-construction surveys for Northwestern pond turtle and western spadefoot, prior to issuance of any grading or other permits that will result in disturbances to the site. Should the species occur on the project site a qualified biologist shall be retained on-site during ground-disturbance.

MITIGATION D.3 (Biological Resources):

Prior to any ground-disturbing activities, the applicant shall compensate for direct impacts to habitat that may support Swainson's hawks. The purchase of compensatory mitigation will be necessary per the 1994 CDFW *Staff Report regarding Mitigation for Impacts to Swainson's Hawks (Buteo swainsoni) in the Central Valley of California* at a ratio of 0.5:1 (0.5 acre preserved for every 1 acre of habitat affected). The applicant shall purchase credits or preserve Swainson's hawk foraging habitat.

MITIGATION MONITORING D.3: Planning and Engineering staff will require final copies of the purchased credits documenting relief thereof, prior to issuance of any grading or other permits that will result in disturbances to the site.

MITIGATION D.4 (Biological Resources):

If vegetation removal or initial ground disturbances occur during the avian breeding season (February 1 – August 31) the applicant shall hire a qualified biologist to conduct a migratory bird and raptor survey to identify any active nests within 250 feet of the biological survey area (BSA). A qualified biologist shall:

- Conduct a survey for all birds protected by the Migratory Bird Treaty Act and California Fish and Game Commission within seven (7) days prior to vegetation removal or initial ground disturbances (whichever activity comes first), and map all active nests located within 500 feet of the BSA where accessible;
- Develop buffer zones around active nests. The qualified biologist shall determine appropriate species protections buffers around active nests based on the species tolerance of disturbance, species type, nest location and activities that will be conducted near the nest. Construction activities shall be prohibited within the buffer zones until the young have fledged or the nest fails. Active nests shall be monitored once per week or as necessary and a report submitted to the City of Chico Community Development Department weekly or as necessary.

- If construction activities stop for more than 15 days then another migratory bird and raptor survey shall be conducted within seven (7) days prior to the continuation of construction activities.

MITIGATION MONITORING D.4: If initial ground disturbance is proposed to be conducted during the avian breeding season, Planning and Engineering staff will require final copies of the required surveys documenting relief thereof, prior to issuance of any grading or other permits that will result in disturbances to the site. If active nests are encountered, the qualified biologist shall determine appropriate species protections buffers around active nests based on the species tolerance of disturbance, species type, nest location and activities that will be conducted near the nest. Construction activities shall be prohibited within the buffer zones until the young have fledged or the nest fails. Active nests shall be monitored once per week or as necessary and a report submitted to the City of Chico Community Development Department weekly or as necessary.

MITIGATION D.5 (Biological Resources):

Prior to issuance of any grading permit or other city approval that would directly result in disturbance to the site the applicant shall provide Planning staff with final copies of the permits required by the U.S. Army Corps of Engineers and California Regional Water Quality Control Board, or copies of relevant correspondence documenting that no permit is required, as applicable.

MITIGATION MONITORING D.5: Planning and Engineering staff will require final copies of the required permits or letters documenting relief thereof, prior to issuance of any grading or other permits that will result in disturbances to the site.

E. Cultural Resources Will the project or its related activities:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Cause a substantial adverse change in the significance of an historical resource as defined in PRC Section 15064.5?		X		
2. Cause a substantial adverse change in the significance of an archaeological resource pursuant to PRC Section 15064.5?		X		
3. Directly or indirectly destroy a unique paleontological resource or site or unique geological feature?		X		
4. Disturb any human remains, including those interred outside of dedicated cemeteries?		X		

DISCUSSION:

E.1. – E.4. Less Than Significant with Mitigation Incorporated. An Archaeological Inventory Survey was conducted by the Northeast Information Center (NIC) for the proposed development site (Parcel 1) on May 1, 2018 (Appendix D). The survey consisted of examining official maps and records for archaeological sites and surveys on-site or in the surrounding area. Based upon the records search, local topography, and regional history, the project site is in an area considered to be highly sensitive for prehistoric, protohistoric, and historic cultural resources. The Mechoopda subgroup of Konkow Maidu populations used the local region for seasonal and/or permanent settlement, as well as for the gathering of plants, roots, seeds, domestic materials, and hunting seasonal game. City Staff requested consultation with the Mechoopda Tribe on 4/23/18 and received no response as of the date of this Initial Study (Appendix E). Historically, Euro-Americans utilized the region for farming and transportation opportunities. The site is currently undeveloped and contains no structures. However, one prehistoric site and one historic site have been previously recorded on the subject property.

Since the Archaeological Inventory Survey revealed that sites exist within the project area, Mitigation Measure E.1, below, requires the applicant to obtain a professional archaeologist to conduct a cultural resource review of the project area. Additionally, there is a potential that site-disturbing activities could uncover previously unrecorded cultural resources. Halting construction work and observing standard protocols for contacting City staff and arranging for an evaluation of cultural resources in the case of a discovery is a required standard City practice, typically noted on all grading and building plans. Mitigation Measure E.2, below, would minimize the potential damage to previously unknown cultural resources in the event that such resources are unearthed during construction and would reduce this potential impact to a level that is **Less Than Significant with Mitigation Incorporated**.

MITIGATION:

MITIGATION E.1. (Cultural Resources): The applicant shall obtain a professional archeologist, who meets the Secretary of the Interior's Professional Qualification Standards for prehistoric and historic archaeology and who is familiar with the archaeological record of Butte County, to conduct a cultural resource review of the project area. The project archeologist shall provide a written review offering recommendations for avoidance and protection of previously recorded as well as any newly identified resources. The project archeologist shall also contact the appropriate local Native American representatives for information regarding traditional cultural properties that may be located within the project boundaries.

MITIGATION MONITORING E.1: Planning staff will require final copies of the cultural resource review prior to issuance of any grading or other permits.

MITIGATION E.2. (Cultural Resources): A note shall be placed on all grading and construction plans which informs the construction contractor that if any bones, pottery fragments or other potential cultural resources are encountered during construction, all work shall cease within the area of the find pending an examination of the site and materials by a professional archaeologist. If during ground disturbing activities, any bones, pottery fragments or other potential cultural resources are encountered, the developer or their supervising contractor shall cease all work within the area of the find and notify Planning staff at 879-6800. A professional archaeologist who meets the Secretary of the Interior's Professional Qualification Standards for prehistoric and historic archaeology and who is familiar with the archaeological record of Butte County, shall be retained by the applicant to evaluate the significance of the find. Further, Planning staff shall notify all local tribes on the consultation list maintained by the State of California Native American Heritage Commission, to provide local tribes the opportunity to monitor evaluation of the site. Site work shall not resume until the archaeologist conducts sufficient research, testing and analysis of the archaeological evidence to make a determination that the resource is either not cultural in origin or not potentially significant. If a potentially significant resource is encountered, the archaeologist shall prepare a mitigation plan for review and approval by the Community Development Director, including recommendations for total data recovery, Tribal monitoring, disposition protocol, or avoidance, if applicable. All measures determined by the Community Development Director to be appropriate shall be implemented pursuant to the terms of the archaeologist's report. The preceding requirement shall be incorporated into construction contracts and plans to ensure contractor knowledge and responsibility for proper implementation.

MITIGATION MONITORING E.2: Planning staff will verify that the above wording is included on construction plans. Should cultural resources be encountered, the supervising contractor shall be responsible for reporting any such findings to Planning staff, and contacting a professional archaeologist, in consultation with Planning staff, to evaluate the find.

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
F. Geology/Soils Will the project or its related activities:				
1. Expose people or structure to potential substantial adverse effects, including the risk of loss, injury, or death involving:				X
a. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? (Div. of Mines & Geology Special Publication 42)?				X
b. Strong seismic ground shaking?			X	
c. Seismic-related ground failure/liquefaction?			X	
d. Landslides?			X	
2. Result in substantial soil erosion or the loss of topsoil?			X	
3. Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?			X	
4. Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial risks to life or property?			X	
5. Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water, or is otherwise not consistent with the Chico Nitrate Action Plan or policies for sewer service control?				X

DISCUSSION:

F.1. No Impact. The City of Chico is located in one of the least active seismic regions in California. Currently, there are no designated Alquist-Priolo Special Studies Zones within the Chico Planning Area, nor are there any known or inferred active faults. Thus, the potential for ground rupture within the Chico area is considered very low. The project would result in **No Impact** as there are no known earthquake faults within the Chico Planning Area.

As there are no known faults in the project area, the rupture of a known fault would, at most, result in a seismic ground-shaking event on the project site. Under existing regulations, all future structures will incorporate California Building Code (CBC) standards into the design and construction that are designed

to minimize potential impacts associated with strong ground-shaking during an earthquake. Therefore, the project would result in a **Less Than Significant Impact**.

Liquefaction occurs in areas with shallow groundwater and recently deposited alluvium or poorly compacted fill. These characteristics are likely to be encountered in the vicinity of stream channels. Thus, portions of the project site may be prone to liquefaction during seismic events. As stated, all proposed structures will incorporate CBC standards into the design and construction that are designed to minimize potential impacts associated with liquefaction and unstable soils. Additionally, all structures and site improvements will be setback from DHS's top of bank by 25 ft per CMC §19.60.030 (*Creekside development*). Therefore, the project would result in a **Less Than Significant Impact**.

The project site is not located in an area of sloping topography that would result in a landslide risk. Potential soil instability in, and around, the channel of DHS would not result in potentially significant impacts through the incorporation of appropriate development standards and adherence to all necessary permits and certifications. Therefore, the project would result in a **Less Than Significant Impact**.

F.2.-4. Less Than Significant Impact. The City's General Plan Environmental Impact Report (EIR) identifies the eastern portion of the Chico Planning Area along the base of the Cascade foothills as the Tuscan Formation. The Tuscan Formation consists of a series of layers deposited by streams and mudflows between two and four million years ago. The mudflows spread out over the area, burying older rock, filling low areas, and gradually building a flat subdued landscape (City of Chico 2011b).

Soil series on the project site are identified as Redtough-Redswale and Doemill-Jokerst by the Natural Resources Conservation Service (NRCS). The western (remainder) portion of the proposed site consists of Redtough-Redswale complex, which consists of 0- to 2-percent slopes with moderate shrink-swell potential. No development is proposed on the westerly portion of the site because of its location in a Resource Constraint overlay zone and its high occurrence of special status biological species. CMC §19.52.060 of (-RC overlay zone) identifies the purpose of the -RC overlay. Among others, the City identifies the following purpose for the creation of the overlay:

"Maintain a sustainable environment consistent with existing biotic resources, soils, geology, topography, and drainage patterns and avoid development that would result in adverse or unmitigated environmental impacts."

The eastern portion of the site consists of Doemill-Jokerst complex. The Doemill-Jokerst complex consists of 3- to 8-percent slopes with low shrink-swell potential and is typically associated with uses such as livestock grazing, homesite development, wildlife habitat, and watershed.

Development of the site will be subject to the City's Grading Ordinance (CMC Chapter 16R.22). The proposed project would be required to incorporate site-specific and City-wide measures, as identified in the Best Practices Technical Manual as well as grading standards defined in the CBC, which describe appropriate measures used to reduce potential impacts resulting from unstable soils and soil shrink-swell. All projects disturbing greater than one acre must comply with and obtain coverage under the applicable National Pollution Discharge Elimination Permit (NPDES) from the California Regional Water Quality Control Board (CRWQCB) per §402 of the Clean Water Act. The proponent will be required to prepare and implement Storm Water Pollution Prevention Plan (SWPPP) pursuant to Regional Water Quality Control Board (RWQCB) requirements. The SWPPP would require site specific, detailed measures to be incorporated into grading plans to control erosion and sedimentation. Furthermore, the City and the Air District require implementation of all applicable fugitive dust control measures, which further reduces the potential for construction-generated erosion.

Therefore, prior to issuance of any grading or building permits, the City would ensure that the proposed project has incorporated appropriate, site-specific construction and design standards per CMC §16R.22 and §19.52.060 and the City's Best Practices Technical Manual. As a result, potential future impacts relating to geology and soils are considered to be **Less Than Significant**.

F.5. No Impact. No septic tanks or alternative waste water disposal systems are proposed for the subject property. All new structures will be connected to the City sewer system, which is located within the Humboldt Road public right-of-way. The site does not fall within a connection area for the Chico

Urban Area Nitrate Compliance Program. The project will result in **No Impact** relative to policies governing sewer service control.

MITIGATION: None Required.

G. Greenhouse Gas Emissions	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Will the project or its related activities:				
1. Generate greenhouse gas (GHG) emissions, either directly or indirectly, that may have a significant impact on the environment?			X	
2. Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?			X	

DISCUSSION:

G.1.-2. Less Than Significant. In 2012, the Chico City Council adopted a Climate Action Plan (CAP) which sets forth objectives and actions that will be undertaken to meet the City's greenhouse gas (GHG) emission reduction target of 25 percent below 2005 levels by the year 2020. This target is consistent with the State Global Warming Solutions Act of 2006 (AB 32, Health & Safety Code, Section 38501[a]).

Development and implementation of the CAP are directed by a number of goals, policies and actions in the City's General Plan (SUS-6, SUS-6.1, SUS-6.2, SUS-6.2.1, SUS-6.2.2, SUS-6.2.3, S-1.2 and OS-4.3). Growth and development assumptions used for the CAP are consistent with the level of development anticipated in the General Plan EIR. The actions in the CAP, in most cases, mirror adopted General Plan policies calling for energy efficiency, water conservation, waste minimization and diversion, reduction of vehicle miles traveled, and preservation of open space and sensitive habitat.

Chico's CAP, in conjunction with the General Plan, meet the State criteria for tiering and streamlining the analysis of GHG emissions in subsequent CEQA project evaluation. Therefore, to the extent that a development project is consistent with CAP requirements, potential impacts with regard to GHG emissions for that project are considered to be less than significant.

As part of the City's land use entitlement and building plan check review processes, development projects in the City are required to include and implement applicable measures identified in the City's CAP. As the proposed project is consistent with the City's General Plan, includes development contemplated in the scope of the General Plan Update EIR, and is subject to measures identified in the City-adopted CAP, it is therefore considered to be **Less Than Significant**.

MITIGATION: None Required.

H. Hazards / Hazardous Materials Will the project or its related activities:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?			X	
2. Create a significant hazard to the public or the environment through reasonable foreseeable upset and accident conditions involving the release of hazardous materials into the environment?			X	
3. Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?			X	
4. Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?		X		
5. For a project located within the airport land use plan, would the project result in a safety hazard for people residing or working in the Study Area?				X
6. For a project within the vicinity of a private airstrip, would the project result in a safety hazard for people residing or working in the Study Area?				X
7. Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?				X
8. Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?			X	

DISCUSSION:

A *Phase I Environmental Site Assessment* (Phase I ESA) was prepared for the project site in October 2016 by SALEM Engineering Group, Inc. to determine the presence or absence of hazardous materials on the project site (Appendix F).

H.1. – H.2. Less Than Significant. Grading and construction activities may involve the limited transport, storage, usage, or disposal of hazardous materials, such as the fueling/servicing of construction equipment. However, such activity is short-term or one-time in nature and is subject to

federal, State, and local health and safety requirements. Adherence to health and safety requirements would reduce the potential impacts associated with construction activities to less than significant.

The proposed project would result in the construction of an approximately 10,500 sq ft gas station development. Potentially hazardous materials such as petroleum products, pesticides, fertilizer, and other household hazardous products such as paint products, solvents, and cleaning products would be stored in conjunction with the proposed convenience store and car wash. The transport, storage, handling, and retail sale of these substances are routinely conducted at such sites. All activity involving hazardous substances would be conducted in accordance with applicable local, State, and Federal safety standards. The transport and delivery of fuel to gasoline stations is regulated by the Federal Department of Transportation while the Butte County Public Health Department provides permitting, inspection, and enforcement activities of gas stations including leaking and non-leaking underground storage tanks (USTs) and spill incidents. With adherence to the existing requirements applicable to activities at the gas station, potential impacts associated with the use, transport, storage, and disposal of hazardous materials would be **Less Than Significant**.

H.3. Less Than Significant. The site is located within one-quarter mile of Marsh Junior High School. Exhaust emissions and fugitive dust generated during construction activities would be reduced by adhering to the Mitigation Measure C.1 identified in the Air Quality section of this document. The proposed gas station development would not result in the generation, storage or transport of hazardous materials that would likely impact nearby schools. State and federal guidelines regulate land uses that may result in impacts to sensitive receptors through the potential release of toxic substances, including particulates. The proposed development would not generate potentially significant impacts as a result of the proposed project's spatial relationship to existing or proposed schools. As discussed, the proposed development would be required to adhere to standards and regulations that ensure **Less Than Significant** potential impacts generated by proposed land uses in close proximity to schools.

H.4. Less Than Significant with Mitigation. According to the Phase I ESA, the subject site was listed on the Spills, Leaks, Investigations and Cleanup (SLIC) Database due to heavy metal-impacted soil encountered during the proposed widening of SR32 along the South Fork of DHS (Appendix F). According to the Department of Toxic Substances Control (DTSC) and the CVRWQCB, waste material and contaminated sediment containing burn ash originating from the Humboldt Road Burn Dump (HRBD), located approximately 840 ft southeast of the project site, is deposited on-site from the seasonal flow of the DHS, which transects the site. The primary constituents of concern identified in the sediment of DHS were lead, arsenic, antimony, polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans. Remediation and confirmation soil sampling activities of the HRBD were primarily conducted in 2004 and 2005 under the regulatory agency supervision of the Central Valley RWQCB and DTSC. Remediation of the HRBD has been determined complete; however, no confirmation soil samples appeared to have been collected on the northern portion of the subject site. Mitigation Measure H.1, requires the applicant to conduct a Limited Soils Assessment, in order to, assess on-site shallow soil for potential impacts from the aforementioned constituents of concern prior to any ground disturbing activities, lessening the potential impact to **Less Than Significant with Mitigation**.

H.5-H.6. No Impact. The project site is not located within the vicinity of a public or private airport. With regard to potential aircraft overflight safety hazards the project is considered to have **No Impact**.

H.7. No Impact. Development of the proposed project would neither hinder the implementation, nor physically interfere with, emergency response or evacuation plans. Street designs and improvements will be adequate for ingress and egress of emergency response vehicles. The proposed project is considered to have **No Impact**.

H.8. Less Than Significant. The project site is located in an area of high sensitivity to wildland fire risks. The City's Best Practices Technical Manual and General Plan Policies identify impact-reducing measures for structures potentially exposed to wildland fire risks. Any new development or redevelopment in areas at risk for wildland fire hazards would be required to comply with minimum standards for materials and material assemblies to provide a reasonable level of exterior wildfire exposure protection for buildings in wildland-urban interface areas as required by the 2007 California Fire Code. The proposed project is required to comply with all requirements to minimize the potential to expose the project to wildland fire risks and have a **Less Than Significant Impact**.

MITIGATION H.1 (Hazards): Prior to any ground-disturbing activities, a Limited Soils Assessment (LSA) shall be conducted in the northern portion of the proposed Parcel 1 for the purpose of assessing on-site shallow soil for potential impacts from the following constituents of concern: lead, arsenic, antimony, polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans. The LSA shall also determine if excavated soils generated during construction activities are likely to be classified as a regulated waste. Should any of the constituents of concern be found in excess concentrations, the applicant shall prepare a Soil Management Plan (SMP), which shall be distributed to construction personnel. The SMP shall establish protocols for handling, sampling, storage, and disposal of any suspected led-impacted soils generated during construction activities.

MITIGATION MONITORING H.1: Planning and Engineering staff will require final copies of the required assessment/plan documenting relief thereof, prior to issuance of any grading or other permits that will result in disturbances to the site.

I. Hydrology/ Water Quality Will the project or its related activities:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Violate any water quality standards or waste discharge requirements?			X	
2. Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g. the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted?			X	
3. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?			X	
4. Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on-or off-site?			X	
5. Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?			X	
6. Otherwise substantially degrade water quality?			X	
7. Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?				X
8. Place within a 100-year flood hazard area structures which would impede or redirect flood flows?		X		
9. Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?		X		
10. Inundation by seiche, tsunami, or mudflow?				X

DISCUSSION:

I.1. Less Than Significant. The proposed project includes a new storm drainage system with a new outfall that will discharge into the existing storm drainage facilities along Bruce Road. No work is proposed between the existing DHS channel top of bank and the stream. Under existing State regulations, the project proponent is required to obtain a water quality certification or waiver from the Central Valley RWQCB. Through the RWQCB's permitting process, the project will be required to avoid,

minimize, and/or compensate for potential discharges into regulated waterways based on a detailed review of the storm drain system design.

Existing State permitting requirements by the RWQCB, along with storm water Low Impact Development (LID) requirements as outlined below will ensure that the project will not result in the violation of any water quality standards or waste discharge requirements. With these existing permitting and water quality requirements in place, potential impacts to water quality from the project are considered to be **Less Than Significant**.

I.2. Less Than Significant. There would be no new sources of groundwater extraction. With its limited size the project will not substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted).

California Water Service Company (Cal Water) is the local water provider in the Chico area with the sole source of water for the Chico District, including the project site. Cal Water relies entirely on groundwater pumped from the Sacramento Valley Basin, which is characterized as having abundant supplies and having demonstrated a historical ability for its groundwater levels to recover quickly after drought events. Cal Water's 2015 Urban Water Management Plan for the Chico-Hamilton City District indicates that potable water supplies were estimated to be 18,227 acre-feet in 2015 and are expected to increase to 37,974 acre-feet by 2040. Actual groundwater supplies available to Cal Water are significantly greater than the 2015–2040 supply totals reported in the Plan, as the company only pumps what it needs to meet customer demand (California Water Service, 2016). Therefore, the proposed project is anticipated to result to a level that is **Less Than Significant**.

I.3 – I.6. Less Than Significant. The project would alter the existing drainage patterns at the site, however, it would not result in substantial erosion or siltation on- or off-site, or create excessive runoff because prior to construction the project would have to demonstrate compliance with City/State post-construction storm water management requirements including the General Construction Permit requirements of the NPDES, as well as, the preparation of a SWPPP that incorporates water quality control BMP's.

As of July 2015, all development projects that create or replace 5,000 square feet or more of impervious surface are considered "regulated projects" subject to post-construction storm water management requirements, including source control measures and LID design standards. Source control measures deal with specific onsite pollution-generating activities and sources, and LID design standards apply techniques that infiltrate, filter, store, evaporate and detain runoff close to the source of rainfall to maintain a site's pre-development runoff rates and volumes. Further, regulated projects that create and/or replace one acre or more of impervious surface require "hydromodification management" that limits post-project runoff to pre-project flow rates for the 2-year, 24-hour storm. Project compliance with these storm water regulations is assessed and required by City staff prior to issuance of building permits.

With the application of the existing regulations outlined above, the project will not substantially degrade water quality drainage systems or provide substantial additional sources of polluted runoff. Under existing City/State requirements for the project to implement BMPs and incorporate LID design standards, storm water impacts from anticipated future construction and operation of the project would be **Less Than Significant**.

I.7. No Impact. The project consists of construction of a 3,800 sq ft AM/PM convenience store, nine Arco pump stations under an approximately 5,500 sq ft canopy, and a 1,200 sq ft car wash. The project would not place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map. The project would result in **No Impact**.

I.8.-I.9. Less Than Significant with Mitigation Incorporated. According to the Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map No. 06007C0506E, the project site is located in "Zone X" via provisional certification of the city portions of the Sycamore-Mud Creek levee system in

the project vicinity. The provisional certification of the levee system was issued in 2011 by FEMA based on a series of technical studies that demonstrated that the relevant levees meet the minimum certification criteria outlined in 44 CFR 65.10. No substantial evidence has been identified to suggest that the long-standing levee system in the area would potentially fail and expose people or structures in the project area to significant risk of loss, injury or death involving flooding as a result of the failure of a levee. Therefore, it is not anticipated that the project would expose people or structures to a significant risk of loss, injury or death involving flooding events and potential flooding impacts. However, per a letter dated April 30, 2018 from the Central Valley Flood Protection Board (CVFPB), DHS is a regulated stream under CVFPB's purview (Appendix G). Engagement with CVFPB staff is required and it may require permitting prior to construction. Mitigation Measure I.1 would require CVFPB consultation resulting in an impact **Less Than Significant with Mitigation Incorporated**.

I.10. No Impact. The project site is not located in an area that is prone to seiche, tsunami or mudflows. Risks associated with inundation by seiche, tsunami, or mudflow would not occur beyond existing conditions. The project would result in **No Impact**.

MITIGATION:

MITIGATION I.1. (Hydrology): Prior to grading and ground-disturbance, the applicant shall consult with Central Valley Flood Protection Board to determine if any permits are necessary for the proposed project.

MITIGATION MONITORING I.1: Planning staff shall require written documentation of consultation.

J. Land Use and Planning Will the project or its related activities:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Physically divide an established community?				X
2. Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the City of Chico General Plan, Title 19 "Land Use and Development Regulations", or any applicable specific plan) adopted for the purpose of avoiding or mitigating an environmental effect?			X	
3. Conflict with any applicable habitat conservation plan or natural community conservation plan?				X

DISCUSSION:

J.1. No Impact. The project will not physically divide an established community. Therefore, the project is anticipated to have **No Impact**.

J.2. Less Than Significant with Mitigation Incorporated. As discussed, Bruce Road bisects the parcel into a western and eastern section. The previously approved parcel map would divide the eastern section into two parcels, leaving the western section as a remainder portion of land. The remainder land contains split General Plan designations and zoning districts. The west portion of the remainder land is designated Medium High Density Residential with a Resource Constraint Overlay (RCO) by the General Plan Land Use Diagram and is zoned R3-RC (Medium High Density Residential with a Resource Constraint Overlay). The east portion of the remainder land is designated Commercial Mixed Use (CMU) with a RCO on the General Plan Land Use Diagram and is zoned CC-RC (Community Commercial with a Resource Constraint Overlay). The General Plan defines the RCO as follows:

This is an overlay designation that identifies areas with significant environmental resources that result in development constraints. The RCO requires subsequent studies to determine the exact location and the intensity of development that can take place in light of identified constraints.

No development is proposed for the remainder land, as there are many occurrences of BCM, wetlands and other sensitive species and habitat. Since no development is proposed for this portion, the proposed project is consistent with the City of Chico General Plan and Title 19 of the CMC.

The portion of the parcel for which the project is located (eastern section) is designated Commercial Mixed Use (CMU) on the General Plan Land Use Diagram and is within the CC (Community Commercial) zoning district. The General Plan defines CMU as follows:

This designation encourages the integration of retail and service commercial uses with office and/or residential uses. In mixed-use projects, commercial use is the predominant use on the ground floor. This designation may also allow hospitals and other public/quasi-public uses. Other uses may be allowed by right or with approval of a Use Permit, as outlined in the Municipal Code.

Through the UP and AR process the proposed development has been found consistent with General Plan Goals and Policies, and Title 19 of the Chico Municipal Code, specifically §19.76.090 (*Gas stations*) and §19.60.030 (*Creekside development*). The Architectural Review and Historic Preservation Board will review the proposed development and provide a recommendation to the Planning Commission for a final decision. Both decision making bodies will provide input and ensure compliance with appropriate design standards. Additionally, the project is not located in an area covered by a specific plan. Through Planning Commission review and by adhering to pertinent zoning regulations of the CC districts, as well as,

Creekside development and gas station development standards, the project would result in potential land use and planning impacts that would be **Less Than Significant**.

J.3. No Impact. The proposed project does not fall under an applicable habitat conservation plan or natural community conservation plan. Therefore, the project would have **No Impact**.

MITIGATION: None Required.

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
K. Mineral Resources				
Would the project or its related activities:				
1. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?				X
2. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?				X

DISCUSSION:

K.1.-2. No Impact. There are no active mines and no known areas with mineral resource deposits within the Chico Planning Area, although historically several areas along Butte Creek were mined for gold, sand, and gravel. The majority of the closest mining operations are located to the southeast, outside of the Chico Planning Area (City of Chico, 2011b). The project would not result in the loss of availability of a known mineral resource or mineral resource recovery site. Mineral resources are not associated with the project or located on the project site. Therefore, the project would have **No Impact** on mineral resources.

MITIGATION: None Required.

L. Noise	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Will the project or its related activities result in:				
1. Exposure of persons to or generation of noise levels in excess of standards established in the Chico 2030 General Plan or noise ordinance.			X	
2. Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels?			X	
3. Exposure of sensitive receptors (residential, parks, hospitals, schools) to exterior noise levels (CNEL) of 65 dBA or higher?			X	
4. A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?			X	
5. A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?			X	
6. For a project located within the airport land use plan, would the project expose people residing or working in the Study Area to excessive noise levels?				X
7. For a project within the vicinity of a private airstrip, would the project expose people residing or working in the Study Area to excessive noise levels?				X

DISCUSSION:

L.1, L.4. Less Than Significant Impact. The project site is located within the SR 32 noise contour established in the General Plan Noise Element. The far north portion of the site is within the 60 and 65 decibel (dBA) contours of SR 32. A Noise Study Report was conducted by Illingworth & Rodkin, Inc. in 2006 for the Highway 32 Widening Project, which included a number of sampling sites in the vicinity of the proposed project site. Measured noise levels in at these points ranged from 51 to 70 dBA. The General Plan states, "...noise impacts generated by commercial and industrial uses need to be evaluated on a project and site-specific basis. Within the City, commercial and industrial land uses are located primarily along major roadway corridors and at the edges of the community" (City of Chico 2011a). The proposed project is consistent with the General Plan in that the gas station (a commercial use) would be located along a major roadway. Additionally, the surrounding parcels are zoned for commercial uses and residentially zoned parcels are at a minimum 1,000 feet from the project site. Typical noise generation from the proposed development would include vehicle movement, pump station noise, and car wash noise. The site design is configured in a way to lessen the noise impact from SR32 to the site. As shown in Figure 3 – Site Plan, the convenience store is located towards the far north portion of the proposed parcel creating a solid buffer between SR 32 and the gas station canopy and car wash. Noise levels associated with the future development is not anticipated to create a substantial increase in the future noise levels at the site or surrounding area. Therefore, noise exposure levels resulting from the project would be **Less Than Significant**.

L.2. Less Than Significant. There are no sources of excessive groundborne vibration or groundborne noise levels in the project vicinity. Any groundborne vibration due to construction at the site will be

temporary in nature and cease once the project is constructed. Therefore, the impact from groundborne vibration will be **Less Than Significant**.

L.3. Less Than Significant. The proposed project is predominately surrounded by commercially zoned property. Any residentially zoned property in the project area is at a minimum 1,000 feet from the project, which includes the Oak Valley Subdivision 0.5 miles to the east and property across SR32. The proposed gas station, convenience store, and car wash would not expose sensitive receptors (residential, parks, hospitals, schools) to exterior noise levels (CNEL) of 65 dBA or higher; therefore, the impact is considered to be **Less Than Significant**.

L.5. Less Than Significant. Temporary noise events will be generated during the construction phase; however, these impacts are considered to be less than significant because they are short term, and project contractors will be required to comply with the City's existing noise regulations which limit the hours of construction and maximum noise levels. Therefore, the impact is considered to be **Less Than Significant**.

L.6 - L.7. No Impact. The project site is not located within an airport land use plan nor is it located within the vicinity of a private airstrip. Noise exposure levels due to proximity to a public airport or private airstrip therefore the project would have **No Impact**.

MITIGATION: None Required

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
M. Population and Housing Will the project or its related activities:				
1. Induce substantial population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?				X
2. Displace substantial numbers of existing housing, necessitating the construction of replacement housing elsewhere?				X
3. Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?				X

DISCUSSION:

M.1.-M.3. No Impact. The proposed project is a commercial development and would not induce substantial population growth, nor would it displace people or housing. Project impacts to population/housing are therefore considered to have **No Impact**.

MITIGATION: None Required.

N. Public Services

Will the project or its related activities have an effect upon or result in a need for altered governmental services in any of the following areas:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Fire protection?			X	
Police protection?			X	
Schools?			X	
Parks and recreation facilities? (See Section O - Recreation)			X	
Other government services?			X	

DISCUSSION:

O.1.-5. Less Than Significant Impact. The proposed development at the project site will require payment of development impact fees to partially offset the cost of new facilities for police, fire, parks, and other public services. With the payment of impact fees, impacts to public services are considered **Less Than Significant**.

MITIGATION: None Required.

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
O. Recreation				
Will the project or its related activities:				
1. Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?				X
2. Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?				X

DISCUSSION:

O.1.-2. No Impact. The proposed project would not add users of parks and recreation facilities in the City of Chico area. Therefore, it is anticipated that the proposed project would have **No Impact** on recreational facilities.

MITIGATION: None Required.

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
P. Transportation/Circulation				
Will the project or its related activities:				
1. Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including but not limited to intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit?			X	
2. Conflict with an applicable congestion management program, including, but not limited to level of service standards and travel demand measures, or other standards established by the county congestion management agency for designated roads or highways?			X	
3. Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks?				X
4. Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?			X	
5. Result in inadequate emergency access?			X	
6. Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities?			X	

DISCUSSION:

P.1.-2., P.6. Less Than Significant Impact. No aspect of the proposed project has been identified to be in conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, nor will the project conflict with an applicable congestion management program or adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities or safety of such facilities.

As discussed, the proposed commercial use is consistent with the General Plan land use designation for the site. The General Plan analyzes circulation and traffic volumes in relation to the intended build-out of the City. Development of the future gas station at the site will require payment of street facility impact fees, which constitute the project's fair share contribution toward addressing any traffic issues that arise as General Plan build-out occurs. The traffic increases associated with project are considered **Less Than Significant**.

P.3. No Impact. The project would not affect air traffic patterns and would therefore have **No Impact**.

P.4.-5. Less Than Significant Impact. The proposed project would provide two access driveways along Bruce Road with no access to SR 32. The 35 ft driveway closest to the SR 32 and Bruce Road intersection is restricted to right in, right out only while the driveway located on the southerly property line will

accommodate left turns onto Bruce Road. This site access configuration would not increase hazards or incompatible uses, nor would it result in inadequate emergency access. Therefore, this impact is considered to be **Less Than Significant**.

MITIGATION: None Required.

Q. Tribal Cultural Resources	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project:				
1. Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				
a. Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code section 5020.1(k), or		X		
b. A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.		X		

DISCUSSION:

Q.1. Less Than Significant with Mitigation Incorporated. The site is classified High Sensitivity on the Prehistoric Archaeological Sensitivity Areas map in the Chico General Plan. Based on the results of the Archeological Inventory Survey it was determined that one prehistoric site and one historic site have been previously recorded on the subject property (Appendix D). City Staff requested consultation with the Mechoopda Tribe on 4/23/18 and received no response as of the date of this Initial Study (Appendix E). The site is not listed or eligible for listing in the California Register of Historical Resources, or in a local register. The applicant shall obtain a professional archaeologist to conduct a cultural resource review of the project area prior to the issuance of grading permits (Mitigation Measure E.1) and should an unrecorded cultural or tribal resource be discovered during site-disturbing activities Mitigation Measure E.2, would minimize the potential damage to the previously unknown resource. Therefore, the potential impact to tribal resources would be reduced to a level that is **Less Than Significant with Mitigation Incorporated**.

MITIGATION: Implementation of Mitigation E.1 and E.2 would reduce impacts to a less-than-significant level. See Impact E. Cultural Resources for mitigation measure specifics.

R. Utilities Will the project or its related activities have an effect upon or result in a need for new systems or substantial alterations to the following utilities:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Water for domestic use and fire protection?			X	
2. Natural gas, electricity, telephone, or other communications?			X	
3. Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board?			X	
4. Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?			X	
5. Require or result in the construction of new storm water drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?			X	
6. Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?			X	
7. Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?			X	
8. Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?			X	
9. Comply with federal, state, and local statutes and regulations related to solid waste?			X	

DISCUSSION:

R.1.-R.7. Less Than Significant. The proposed project would connect to the area's existing potable water provided by Cal Water. The project would be required to install appropriate fire protection facilities, including hydrants and sprinkler systems. Gas, electric and telephone facilities are already present in the project area. All necessary utilities (water, storm drain, sewer, gas, phone or other communications, and electric facilities) are available near the site and extending them throughout the development will be required. The project would not exceed the capacity of wastewater treatment facilities. Utilities are available and adequate to serve the proposed development. Impacts regarding the provision of utilities and wastewater services are considered **Less Than Significant**.

R.8.-R.9. Less Than Significant. Available capacity exists at the Neal Road landfill to accommodate waste generated by the project. Per the City's General Plan EIR, Neal Road landfill has a remaining 95.9 percent capacity. Recycling containers and service will be provided for the project as required by state law. This impact would be **Less Than Significant**.

MITIGATION: None Required.

T. Wildfire

If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
1. Substantially impair an adopted emergency response plan or emergency evacuation plan.				X
2. Due to slope, prevailing wind and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?				X
3. Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?				X
4. Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?				X

DISCUSSION:

T.1.-T.4. Less Than Significant. The City of Chico is identified as a non-very high fire hazard severity zone (non-VHFHSZ) as recommended by Cal Fire. The project site is served by the City of Chico Fire Department and is not located in a Local Responsibility Area (LRA) pursuant to Fire Hazard Severity Zones in SRA map adopted by Cal Fire on November 7, 2017. The proposed project would have **No Impact** on wildfire.

MITIGATION: None Required.

U. MANDATORY FINDINGS OF SIGNIFICANCE

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
A. The project has the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory.			X	
B. The project has possible environmental effects which are individually limited but cumulatively considerable. (Cumulatively considerable means that the incremental effects of an individual project are considerable when viewed in connection with the effects of past, current and probable future projects).			X	
C. The environmental effects of a project will cause substantial adverse effects on human beings, either directly or indirectly.			X	

DISCUSSION:

A-C. Less Than Significant. The project does not have the potential to significantly degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory. Based on the preceding environmental analysis, the application of existing regulations and incorporation of identified mitigation measures will ensure that all potentially significant environmental impacts associated with the project, including those related to air quality, biological resources, cultural resources and hydrology would be minimized or avoided, and the project will not result in direct or indirect adverse effects on human beings or the environment, nor result in significant cumulative impacts. Cumulative impacts related to the build-out of the project area was analyzed in the City's 2030 General Plan. Therefore, with the incorporation of the identified mitigation measures, the project will result in a **Less Than Significant** impact.

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