

**Biological Survey Report for Peaker  
Construction at Barre Substation in Stanton, CA**

*Prepared by:*  
Southern California Edison  
Natural & Cultural Resource Group  
G.O. 1, Quad 3A  
2244 Walnut Grove Avenue  
Rosemead, CA 91770  
Contact: Adelina O. Muñoz

December 2006

---

# Contents

Introduction..... D-2  
Project Description..... D-2  
Survey Methods and Limitations..... D-3  
Environmental Setting..... D-3  
Biological Resources..... D-4  
Permits and Technical Studies..... D-5  
Project Impacts ..... D-6  
Avoidance and Minimization Measures..... D-6  
Reference..... D-7

**Attachments**

Figure 1 Project Location..... D-8  
Figure 2 Project Quad..... D-9  
Figure 3 Project Aerial..... D-10  
Figure 4 Project Plans..... D-11  
Figure 5 Project Layout..... D-12  
Figure 6-10 Project Photos..... D-13-17

# Introduction

---

A biological site assessment was conducted for the Barre Substation Peaker Project on September 20, 2006. The substation is located south of Cerritos Avenue and east of Dale Avenue, adjacent to Union Pacific railroad tracks and an ornamental tree and shrub nursery in the city of Stanton in Orange County (Figure 1: Project Location). Southern California Edison (SCE) is proposing to construct a “peaker” in the southernmost corner of the substation property. The California Public Utility Commission (CPUC) directed SCE to address future electric reliability needs. This peaker will provide necessary grid support during times of prolonged high electricity demand. The purpose of the survey was to determine whether the proposed activities have the potential to affect sensitive biological resources.

## Project Description

---

SCE plans to build a peaker (a new small electricity generating unit) and a soundwall within SCE existing Barre substation property. The proposed site for the peaker is surrounded by residential and small commercial areas (Figure 2: Quad map). The Barre peaker project location is an unoccupied portion of the substation property, which is presently a plowed vacant field dominated with scattered non native annuals and trees.

The project is proposed to be located within the southwestern corner of the existing Barre substation property. Project facilities will be located within an approximate 220 by 320 foot area, as depicted on Figure 3. The main project facilities will include the GE gas turbine generator, 80-foot tall exhaust stack, continuous emission monitoring system, selective catalytic reduction and an oxidation catalyst system enclosure, ammonia storage tank (for SCR injection), gas fuel line, water line, water storage tanks, transmission transformers, 66 kV transmission tap line, and facility control module. A soundwall will be constructed south and west of the peaker boundary. Landscaping activities may include the construction of a blockwall on the northwest, west and south property line boundaries and the potential replacement of existing landscaping along the southern property line. A new gate and access road may be constructed on the eastern boundary of the property. All site facilities are depicted on Figure 4.

## Survey Methods and Limitations

---

The study area boundaries included surveying the southernmost area of the substation property. Biological surveys were conducted within areas accessible by foot to identify vegetation types within the project site and to determine the potential impacts to sensitive biological resources. Surveys to evaluate biological resources were conducted by Adelina Munoz, SCE Biologist on September 20, 2006, between 9:30-11:00 am.

## Environmental Setting

---

The findings of this biological site assessment are based on one field survey for the entire project study area on September 20, a review of aerial photographs, U.S. Geological Survey (USGS) topographic maps (for Anaheim USGS quad), California Native Plant Society's Electronic Inventory (CNPS) and the California Natural Diversity Database (CNDDB).

### **Description of the Existing Biological and Physical Conditions**

The proposed site contains a few native plant species and several non native plant species. The soil and vegetation is constantly disturbed by human activities of annual mowing of ruderal plants (weeds). The project area is open and relatively flat with approximately 50 percent vegetative cover (Figures 6 through 9). Mature ornamental trees and vines border the project site (Figure 10). The primary hydrological resource identified within the general vicinity of the substation is the Stanton storm drain which is approximately 100 feet west of the project site and is considered to be "waters of the United States". The substation construction and proposed access to the substation are not expected to impact this storm drain, therefore, this project will not require U. S. Army Corps of Engineers, California Department of Fish and Game, and Regional Water Quality Control Board permits or other related biological resource or wetland permits.

### **Vegetation and Wildlife**

#### **Vegetation Communities**

Plant communities within the project area are composed of non-native ornamental trees, a ruderal plant community and a few scattered natives.

- Ornamental species: *Passifloracea* sp. (*Passionflower vine*), peruvian pepper tree (*Schinus molle*), elm (*Ulnus* sp.) and mexican palm (*Washingtonia robusta*).
- Ruderal dominate species: russian thistle (*Salsola tragus*), smilo grass (*Piptatherum milliaceum*), purple thistle (*Cirsium* sp), hairy fleabane (*Conyza bonariensis*), tree tobacco (*Nicotiana glauca*), *Chenopodium* sp. and prickly wildlettuce (*Lactuca serriola*).
- Native shrubs and trees: mexican elderberry (*Sambucus mexicana*), mulefat (*Baccharis salicifolia*), horseweed (*Conyza canadensis*) and common sunflower (*Helianthus annus*).

**Wildlife**

Wildlife species observed or detected during the survey include gulf fritillary (*Agraulis vanillae*), Western kingbird (*Tyrannus verticalis*), mourning dove (*Zenaida macroura*), red-tailed hawk (*Buteo jamaicensis*), American kestrel (*Falco sparverius*), northern mocking bird (*Mimus polyglottos*), Anna’s hummingbird (*Calypte anna*), black phoebe (*Sayornis nigricans*), and red fox (*Vulpes vulpes*). Small burrows potentially suitable for gophers (*Thomomys bottae*) or ground squirrel (*Spermophilus beechyi*) were also observed.

## Biological Resources, Discussion of Impacts and Mitigation

---

### Sensitive Species Potentially in the Project Area

**Table 1: Project Study Area Sensitive Species Table**

| Scientific Name                                 | Common Name            | Status            | Specific Habitat Present/ Absent             | Species Presence/ Absence | Rationale   |
|---|------------------------|-------------------|--|---------------------------|---|
| <i>Centromadia parryi</i> ssp. <i>austrails</i> | Southern tarplant      | SSC<br>CNPS<br>1B | Alkaline soils in grassland or vernal pools. | A                         | Project site does not contain any of the native habitats to support this species. |
| <i>Dudleya multicaulis</i>                      | Many-stemmed dulleya   | CNPS<br>1B        | Clay soils in foothill grasslands            | A                         | Barre Substation property does not contain the required habitat for this species. |
| <i>Abronia villosa</i> var. <i>aurita</i>       | Chaparral sand-verbena | CNPS<br>1B        | Sandy soils in chaparral,                    | A                         | Barre Substation does not contain any of the required habitats for this species.  |

| Scientific Name                                  | Common Name                     | Status | Specific Habitat Present/Absent   | Species Presence/Absence | Rationale   |
|--|---------------------------------|--------|---|--------------------------|---|
|  |                                 |        | coastal sage scrub, and desert dunes  |                          |   |
| <i>Chorizanthe parryi</i> var. <i>fernandina</i> | San Fernando Valley spineflower | FC SE  | Sandy soils in coastal sage scrub.  | A                        | Barre Substation does not contain the required habitat for this species.        |
| <i>Sidalcea neomexicana</i>                      | Salt Spring checkerbloom        | CNPS 2 | Playas, alkaline soils in mesic locations.  | A                        | Barre Substation does not contain the required habitat for this species.        |
| <i>Phrynosoma coronatum</i>                      | Coast (San Diego) horned lizard | SSC    | Inhabits coastal sage scrub and chaparral in arid and semi-arid climate. Micro: Prefers friable, rocky, or shallow sandy soils. | A                        | Barre Substation does not contain any of the required habitats for this species |

Absent [A] means no further work needed. Present [P] means general habitat is present and species may be present. Status: Federal Endangered (FE); Federal Threatened (FT); Federal Proposed (FP, FPE, FPT); Federal Candidate (FC), Federal Species of Concern (FSC); State Endangered (SE); State Threatened (ST); Fully Protected (FP); State Rare (SR); State Species of Special Concern (SSC); California Native Plant Society (CNPS) 1B-rare, threatened or endangered in California and elsewhere; CNPS 2-species is rare, threatened or endangered in California but more common elsewhere.

### Survey Results

The Regional sensitive species were identified using the CNDDDB (2006) for the Anahiem quadrangle (Table 1). None of the species identified in Table 1 is found within the proposed project area. The habitat necessary for these species is not present; therefore, there is no potential for sensitive species within the project area. Sensitive plant and wildlife species will not be impacted by project construction activities.

# Permits and Technical Studies for Special Laws or Conditions

---

Construction activities associated with the Barre peaker project would not result in impact to Federal and State waterways, Federal and State endangered species or wetlands; therefore, no regulatory permits for biological resources and/or wetlands will be required by the U. S. Army Corps of Engineers, California Department of Fish and Game, Regional Water Quality Control Board, US Fish & Wildlife Service or other biological resource agencies for this project.

## Project Impacts

---

Project impacts including staging, soundwall, and gas line will be limited to existing roads and currently disturbed portions of the substation. Some existing landscaped ornamental trees and shrubs may need to be replaced due to construction activities. Noise impacts could have an indirect impact on local wildlife populations, but would not be considered significant due to the constant ambient noise of the area. Direct impacts to nesting birds and wildlife due to grubbing of trees and shrubs are possible, especially if conducted during the nesting season.

## Avoidance and Minimization Measures

---

- The impact area for the project will be kept to a minimum.
- If construction activities occur during the general nesting season, surveys for nesting birds in adjacent vegetation will be conducted one week prior to the start of construction.
- Any vegetation removal or trimming that is required will be conducted before March 1<sup>st</sup> or a preconstruction survey will be conducted for nests one week prior to the start of construction.
- At no time will active bird nests (with eggs or young) be destroyed.
- If any sensitive biological resources are found during construction, all activities that may harm that resource shall cease, until a biologist, and the appropriate resource agencies are contacted to review options.
- Construction lighting will be directed away from adjacent properties to avoid impacts to wildlife.

## Reference:

---

California Natural Diversity Database. Wildlife & Habitat Data Analysis Branch  
Department of Fish and Game Data (Version 07/01/06). Whittier quad.

(Accessed September 27, 2006).

Sibley, D. 2003. The Sibley Field Guide of Birds of Western North America. Alfred A. Knopf. First Edition.

*CalFlora*: Information on California plants for education, research and conservation. [web application]. 2005. Berkeley, California: The CalFlora Database [a non-profit organization]. Available: <http://www.calflora.org/>. (Accessed: September 21, 2006)



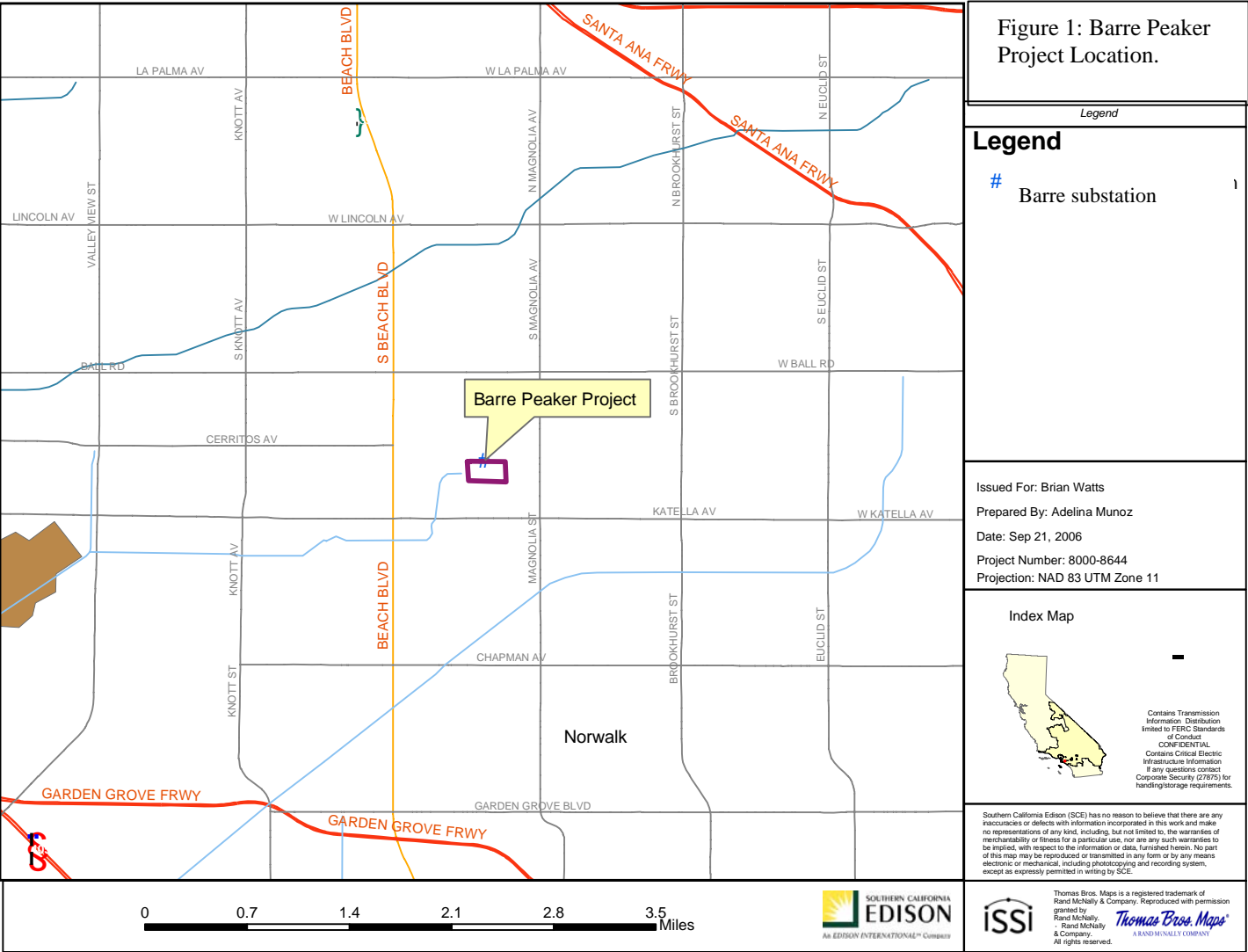


Figure 1: Barre Peaker Project Location.

Legend

**Legend**

# Barre substation

Issued For: Brian Watts  
 Prepared By: Adelina Munoz  
 Date: Sep 21, 2006  
 Project Number: 8000-8644  
 Projection: NAD 83 UTM Zone 11

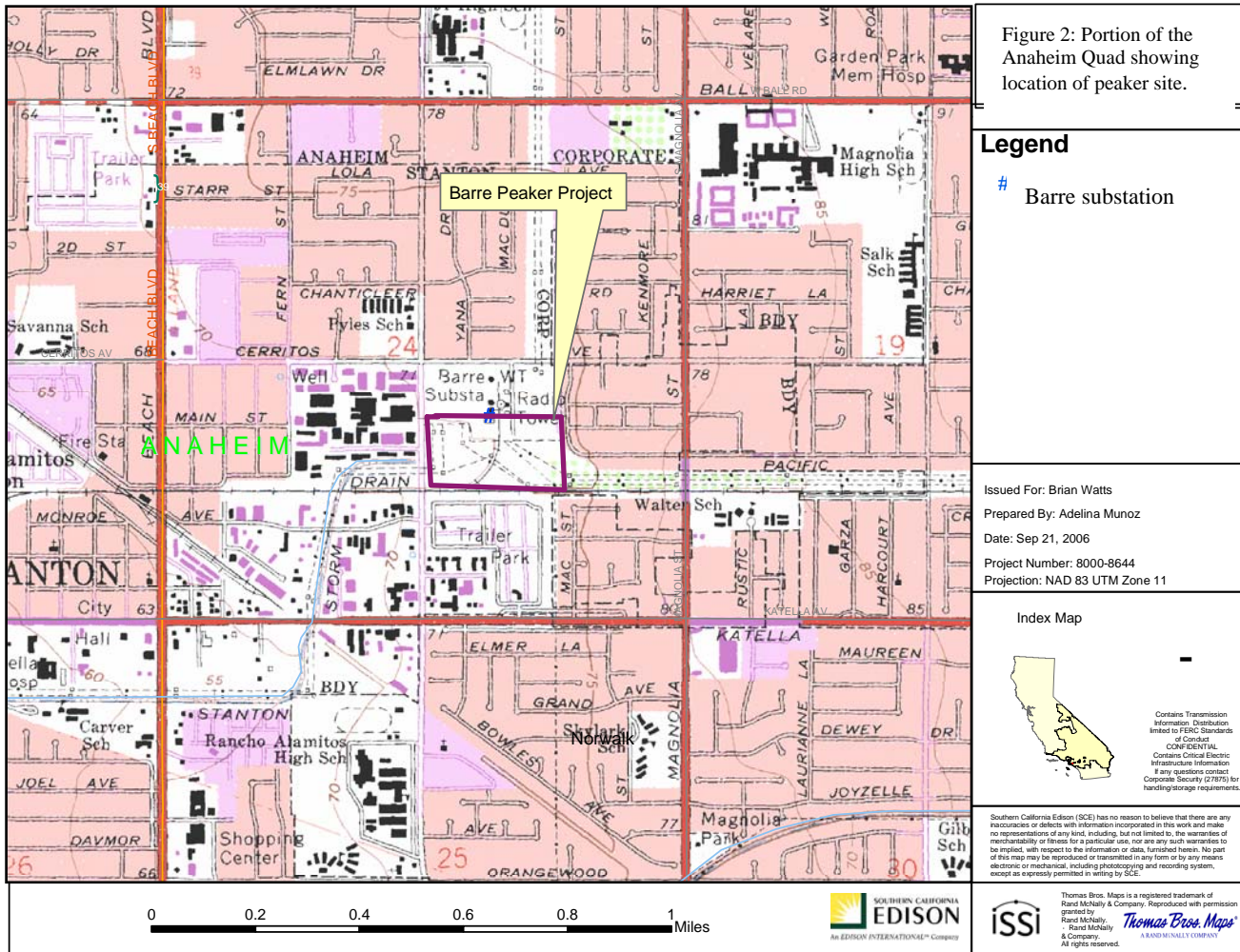
Index Map



Contains Transmission Information. Distribution limited to FERC Standards of Conduct.  
 CONFIDENTIAL  
 Contains Critical Electric Infrastructure Information. If any questions contact Corporate Security (27875) for handling/storage requirements.

Southern California Edison (SCE) has no reason to believe that there are any inaccuracies or defects with information incorporated in this work and make no representations of any kind, including, but not limited to, the warranties of merchantability or fitness for a particular use, nor are any such warranties to be implied, with respect to the information or data, furnished herein. No part of this map may be reproduced or transmitted in any form or by any means electronic or mechanical, including photocopying and recording system, except as expressly permitted in writing by SCE.





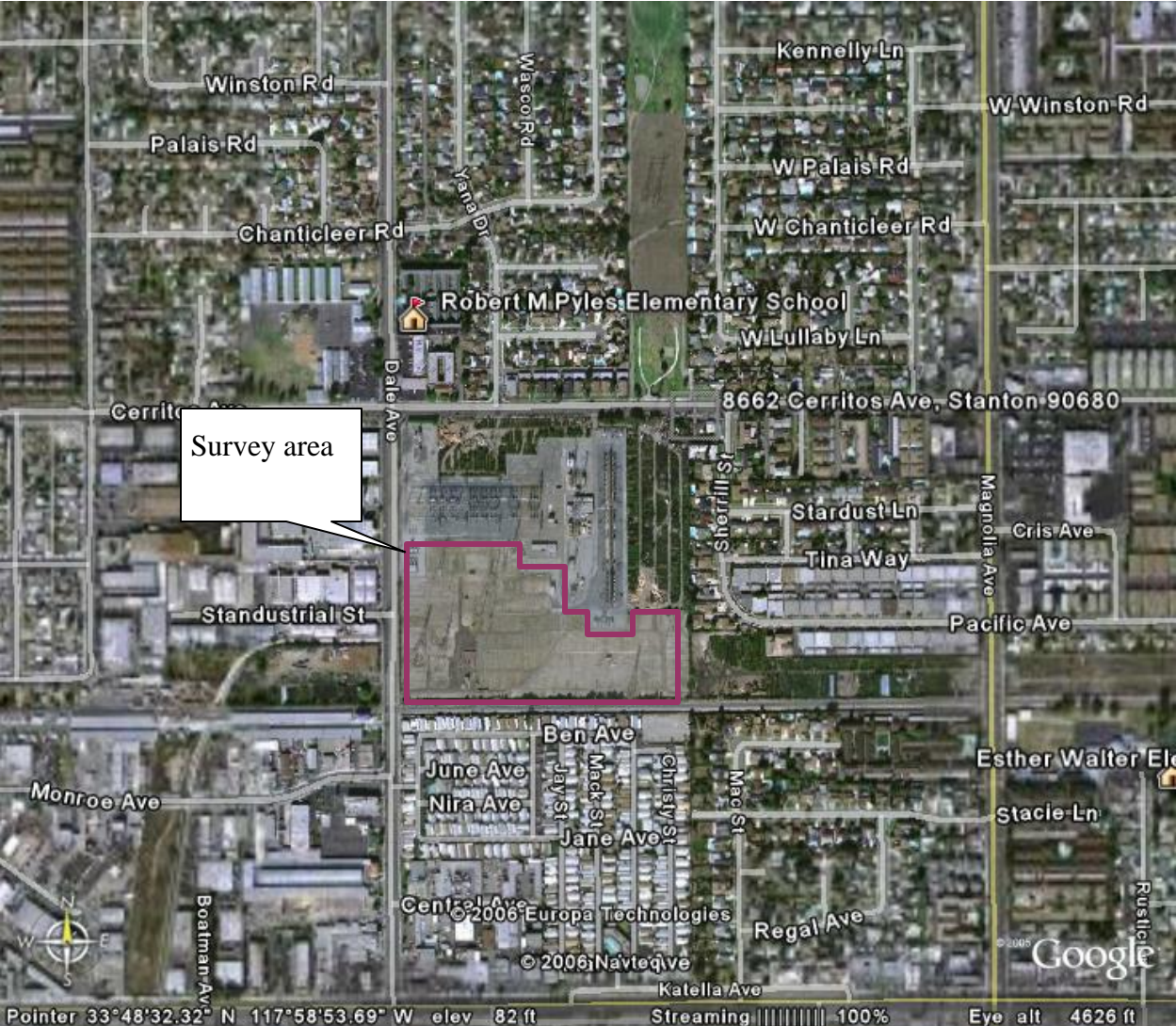


Figure 3, Aerial showing survey area.

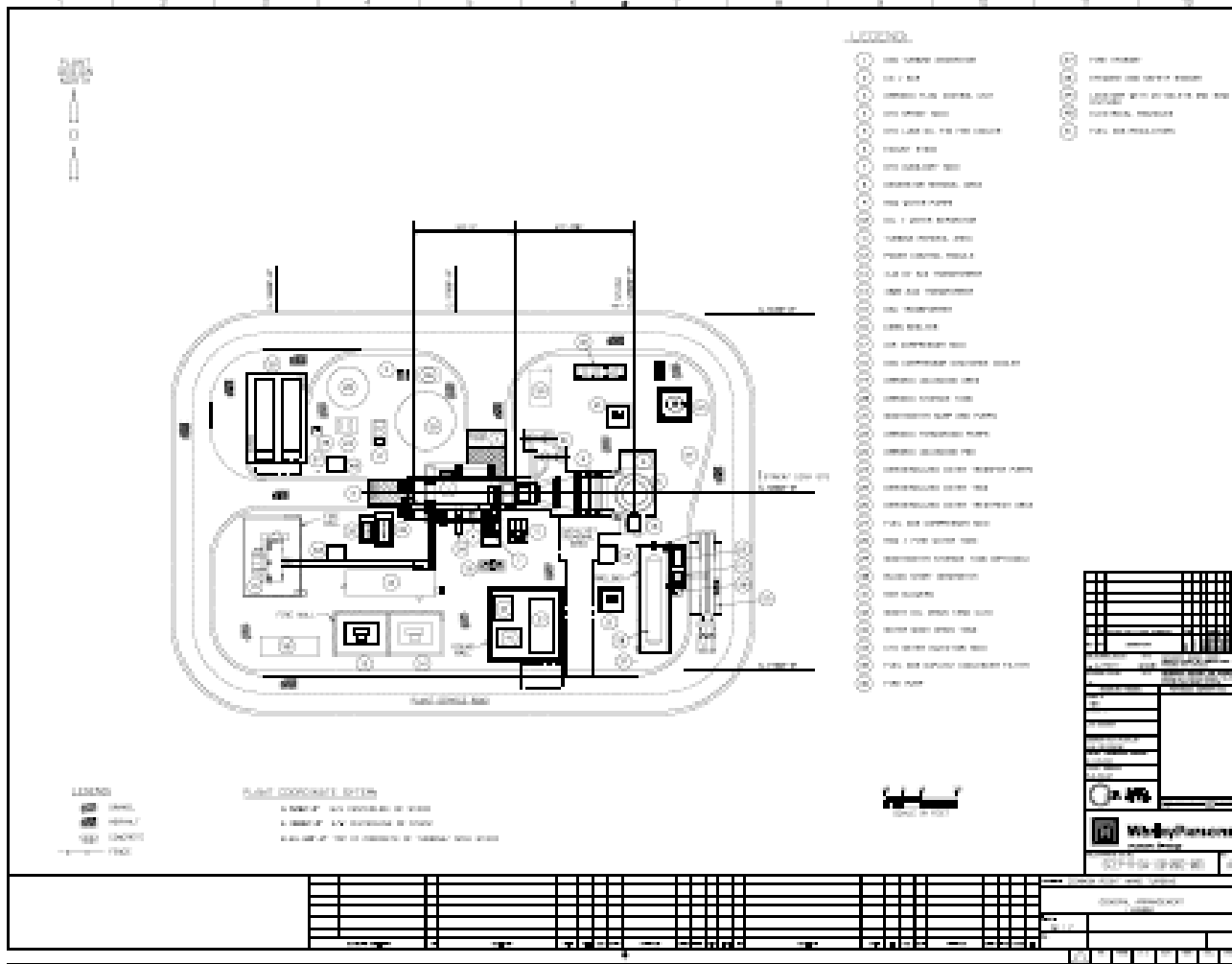


Figure 4: Project plans showing peaker location.

Attachment E

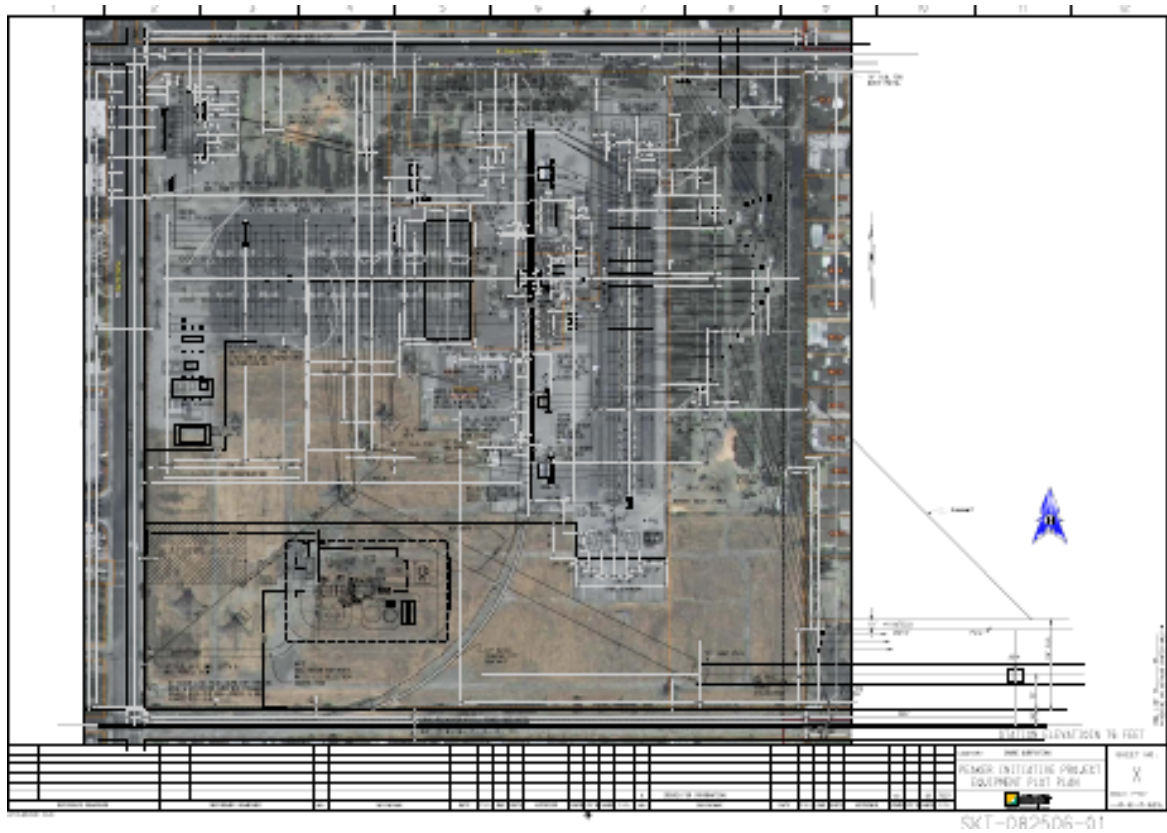


Figure 5: Project layout.



Figure 6: Looking west from the center of proposed peaker site.



Figure 7: Looking east from the center of proposed peaker site.



Figure 8: Looking northwest from the southeast corner of substation property.





Figure 9: Existing access from Dale Ave.



Figure 10: Looking west at location for existing landscaping.